CO TAQA Technical Report

Southeast Connector

I-20/I-820/US 287 Interchanges
I-20 from Forest Hill Drive to Park Springs Boulevard
I-820 from I-20 to Brentwood Stair Road
US 287 from Bishop Street to Sublett Road

Tarrant County, Texas
Fort Worth District

CSJ: 0008-13-125, etc.

December 2019

The environmental review, consultation, and other actions required by applicable Federal environmental laws for this project are being, or have been, carried-out by TxDOT pursuant to 23 U.S.C. 327 and a Memorandum of Understanding dated December 16, 2014, and executed by FHWA and TxDOT.

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1. PROJECT DESCRIPTION

The Texas Department of Transportation (TxDOT) is proposing to reconstruct and add capacity to Interstate Highway (I) 20, I-820 and United States Highway (US) 287 including three major interchanges in southeast Tarrant County within the cities of Arlington, Forest Hill, Fort Worth, and Kennedale. The major interchanges are the I-820/US 287 Interchange, the I-20/I-820 Interchange, and the I-20/US 287 Interchange. This project spans approximately 16 miles and would add main lanes and frontage roads to I-20 from Forest Hill Drive to Park Springs Boulevard, I-820 from I-20 to Brentwood Stair Road, and US 287 from Bishop Street to Sublett Road. New frontage roads would be constructed at various locations, and bicycle and pedestrian accommodations would be provided throughout. The project is collectively referred to as the "Southeast Connector."

Please see the following document and figures that have been uploaded into TXECOS: Project Description (0008-13-125, etc.).pdf, Project Location Map (0008-13-125, etc.).pdf, and Aerial Project Location Map (0008-13-125, etc.).pdf. See the attached **Appendix A: Overview Map** and **CO Receptor Location Map**, **Appendix B: TxDOT Transportation Planning and Programming (TPP) Division Approved Traffic (August 2019); Appendix C: Project Schematic;** and **Appendix D: CO Model Output Files**.

2. BACKGROUND INFORMATION

This Carbon Monoxide Traffic Air Quality Analysis (CO TAQA) technical report was prepared in accordance to the TxDOT's *Environmental Guide Volume 2 Activity Instructions (August 2019), Documentation Standard for a CO TAQA Technical Report (September 2015)*, and *Guidance for Preparing Air Quality Statements (August 2019)*. This report documents results of the CO TAQA analysis and supports the environmental document that evaluates the social, economic, and environmental impacts resulting from the proposed project.

A CO TAQA is required if a roadway project is not exempt under 40 Code of Federal Regulations (CFR) 93.126, is adding capacity, and would reach average annual daily traffic (AADT) greater than 140,000 vehicles per day (VPD) by the design year. The proposed project meets these criteria.

A conference call between the Federal Highway Administration (FHWA), TxDOT Environmental Affairs (ENV), TxDOT Fort Worth District (TxDOT-FTW), North Central Texas Council of Governments (NCTCOG), Civil Associates, Inc. (CAI), and HDR was conducted on January 14, 2019 to discuss and determine the CO modeling methodology and assumptions. For the purpose of the CO analysis, the proposed project's estimated time of completion (ETC) year and design year were determined to be 2028 and 2045, respectively.

Table 1 shows the projected traffic volumes on the Southeast Connector for the ETC year 2028 and design year 2045.

Table 1: Projected AADT and DHV Along the Southeast Connector

Location	2028 (ETC Year)		2045 (Design Year)	
	AADT[1] (VPD[2])	DHV[3] (VPD)	AADT (VPD)	DHV* (VPD)
I-820				
From I-20 to US 287				
Mainlanes	152,920	15,140	196,100	19,420
Frontage Roads	Not Applicable			
From US 287 to Brentwood Stair Road				
Mainlanes	116,305	11,520	149,200	14,780
Frontage Roads	32,760	3,250	41,600	4,120
I-20				
From I-20/I-820 Interchange to Park Springs Boulevard				
Mainlanes	243,410	17,530	312,600	22,510
Frontage Roads	39,665	2,860	50,800	3,660
From I-20/I-820 Interchange to Forest Hills Drive				
Mainlanes	212,690	15,320	272,700	19,640
Frontage Roads	21,670	1,570	28,300	2,040
US 287				
From I-820 to Bishop Street				
Mainlanes	78,000	7,570	100,100	9,710
Frontage Roads	15,565	1,510	19,900	1,940
From I-20 to Sublett Road				
Mainlanes	77,800	7,550	99,900	9,700
Frontage Roads	25,565	2,480	33,300	3,240

Source: TxDOT Transportation Planning and Programming (TPP) Division (August 2019).
[1] AADT – Average Annual Daily Traffic.
[2] VPD – Vehicles per day.
[3] DHV – Design hour volume. DHV was calculated by multiplying each segment's AADT by the project-specific K factor (I-820 - 0.099, I-20 – 0.072, US 287 – 0.097).

As shown in Table 1, the AADT projections for four sections of the project exceed 140,000 VPD in the design year; therefore, a TAQA is required. The topography and meteorology of the project area would not restrict dispersion of the air pollutants. The traffic data used in the analysis was obtained from the TxDOT Transportation Planning and Programming (TPP) Division and projected to the years 2028 and 2045 (Appendix B).

3. ANALYSIS METHODOLOGY

Carbon monoxide concentrations for the proposed action were modeled using CAL3QHC and MOVES2014, and factored in adverse meteorological conditions and CO receptors at the ROW line in accordance with TxDOT's *Standard Operating Procedure for Complying with CO TAQA Requirements* and the Environmental Protection Agency's (EPA) *Guideline for Modeling Carbon Monoxide from Roadway Intersections (November 1992)*. The traffic data used in the analysis was obtained from the TxDOT TPP Division and projected to the years 2028 and 2045 to determine if the CO concentrations exceed the National Ambient Air Quality Standards

(NAAQS) in the ETC and design years. The traffic data utilized in the analysis for each roadway segment analyzed for both ETC and design years is shown in **Table 2**

Table 2: Traffic Data Per Roadway Segment and CAL3QHC Links

Traffic Air Quality Analysis Area	Roadway Segment CAL3QHC Link	2028 (ETC[1] Year)		2045 (Design Year)	
		ADT[2]	DHV[3]	ADT	DHV
I-820 at Sun Valley Drive Intersection	NBFRP1-P2	15,865	1,571	20,200	2,000
	NBFRP2-P3	15,865	1,571	20,200	2,000
	NBFRP3-P4 APP Q	12,600	1,247	16,000	1,584
	NBFRP3-P4 RT Q	845	84	1,100	109
	NBFRP3-P4 LT Q	4,135	409	4,900	485
	NBFRP4-P5	17,695	1,752	22,200	2,198
	NBMLP1-P2	79,060	7,827	101,500	10,049
	NBMLP2-P3	79,060	7,827	101,500	10,049
	NBMLP3-P4	79,060	7,827	101,500	10,049
	NBMLP4	79,060	7,827	101,500	10,049
	SBMLP1-P2	70,810	7,010	90,700	8,979
	SBMLP2-P3	70,810	7,010	90,700	8,979
	SBMLP3-P4	70,810	7,010	90,700	8,979
	SBMLP4	70,810	7,010	90,700	8,979
	SBFRP1-P2	15,065	1,491	19,400	1,921
	SBFRP2-P3	15,065	1,491	19,400	1,921
	SBFRP3-P4 APP Q	10,010	991	12,900	1,277
	SBFRP3-P4 RT Q	830	82	1,000	99
	EBSUNP1-P2	2,105	208	2,700	267
	EBSUNP2-P3	2,105	208	2,700	267
	EBSUNP3-P4 APP Q	1,260	125	1,600	158
	EBSUNP3-P4 LT Q	2,090	207	2,600	257
	EBSUNP4-P5	3,050	302	3,900	386
	EBSUNP5	3,050	302	3,900	386
	WBSUNP1-P2	3,075	304	3,500	347
	WBSUNP2-P3	3,075	304	3,500	347
	WBSUNP3-P4 APP Q	2,245	222	2,500	248
	WBSUNP3-P4 LT Q	3,880	384	4,900	485
	WBSUNP4-P5	3,050	302	3,900	386
I-820 at Spur 303 Intersection	NBFRP1-P2	18,815	24,000	1,863	2,376
	NBFRP2-P3	18,815	24,000	1,863	2,376
	NBFRP3-P4	12,995	17,500	1,287	1,733
	NBFRP4-P5=EB303-3-WB303-4	20,808	31,050	2,060	3,074
	NBFRP5-P6 APPQ	10,710	13,600	1,060	1,346
	NBFRP5-P6 RTQ	4,840	6,200	479	614
	NBFRP7-P8	15,550	19,800	1,539	1,960
	NBFRP8-P9	20,705	26,400	2,050	2,614
	NBMLP1-P2	56,020	72,000	5,546	7,128
	NBMLP2-P3	56,020	72,000	5,546	7,128
	NBMLP3-P4	56,020	72,000	5,546	7,128
	NBMLP4-P5	50,865	65,400	5,036	6,475
	SBMLP1-P2	37,775	3,740	48,400	4,792
	SBMLP2-P3	42,930	4,250	55,000	5,445
	SBMLP3-P4	42,930	4,250	55,000	5,445
	SBMLP4-P5	42,930	4,250	55,000	5,445

Table 2: Traffic Data Per Roadway Segment and CAL3QHC Links

Traffic Air Quality Analysis Area	Roadway Segment CAL3QHC Link	2028 (ETC[1] Year)		2045 (Design Year)	
		ADT[2]	DHV[3]	ADT	DHV
	SBFRP1-P2	7,160	709	9,200	911
	SBFRP2-P3	21,580	2,136	27,700	2,742
	SBFRP3-P4	16,425	1,626	21,100	2,089
	SBFRP4-P5	16,425	1,626	21,100	2,089
	SBFRP5-P6 APP Q	13,400	1,327	25,400	2,515
	SBFRP5-P6 LT Q	5,570	551	7,100	703
	SBFRP5-P6 RT Q	2,520	249	3,200	317
	SBFRP6-P7	18,630	1,844	23,900	2,366
	SBFRP7-P8	18,630	1,844	23,900	2,366
	SBFRP8-P9	10,010	991	12,900	1,277
	NBENTR1P1-P2	5,155	510	6,600	653
	SBEXR1P1-P2	5,155	510	6,600	653
	EB303P1-P2	12,630	1,250	16,200	1,604
	EB303P2-P3	12,630	1,250	16,200	1,604
	EB303P3-P4Q	11,470	1,136	14,700	1,455
	EB303P4-P5 APP Q	7,790	771	10,000	990
	EB303P4-P5 LT Q	3,680	364	4,700	465
	EB303P6-P7	7,475	740	9,600	950
	WB303P1-P2	6,415	635	8,200	812
	WB303P2-P3	7,690	761	9,900	980
	WB303P3-P4 APP Q	3,895	386	5,000	495
	WB303P3-P4 LT Q	3,795	376	4,900	485
	WB303P5-P6 APP Q	6,630	656	8,500	842
	WB303P5-P6 RT Q	6,000	594	7,700	762
I-820 from Meadowbrook Road to Brentwood Stair Road	NBFRP1-P2	20,643	2,044	29,950	2,965
	NBFRP2-P3	20,643	2,044	29,950	2,965
	NBFRP3-P4	20,643	2,044	29,950	2,965
	NBFRP4-P5	20,808	2,060	31,050	3,074
	NBMLP1-P2	39,280	3,889	50,500	5,000
	NBMLP2-P3	58,755	5,817	75,500	7,475
	NBMLP3-P4	58,755	5,817	75,500	7,475
	NBMLP4-P5	58,755	5,817	75,500	7,475
	SBMLP1-P2	55,460	5,491	71,100	7,039
	SBMLP2-P3	45,980	4,552	58,900	5,831
	SBMLP3-P4	45,980	4,552	58,900	5,831
	SBMLP4-P5	45,980	4,552	58,900	5,831
	SBFRP1-P2	8,635	855	11,100	1,099
	SBFRP2-P3	8,635	855	11,100	1,099
	SBFRP3-P4	18,115	1,793	23,300	2,307
	SBFRP4-P5	18,115	1,793	23,300	2,307
	NBENTR1P1-P2	9,480	939	12,200	1,208
	NBEXR1P1-P2	19,475	1,928	25,000	2,475
	SBEXR1P1-P2	9,480	939	12,200	1,208
I-20 at Mansfield Highway Intersection	WBFRP1-WBFRP2	12,030	870	15,600	1,130
	WBFRP2-WBFRP3	12,030	870	15,600	1,130
	WBFRP3-WBFRAPP4	20,035	1,450	25,900	1,870
	WBFRAPP4-WBFRAPP5	17,000	1,230	22,100	1,600
	WBFRAPP5-WBFRP6	13,390	970	17,300	1,250
	WBFRP6-WBFRP7	13,505	980	17,500	1,260

Table 2: Traffic Data Per Roadway Segment and CAL3QHC Links

Traffic Air Quality Analysis Area	Roadway Segment CAL3QHC Link	2028 (ETC[1] Year)		2045 (Design Year)	
		ADT[2]	DHV[3]	ADT	DHV
	WBFRP7-WBFRP8	12,760	920	16,500	1,190
	WBFRP8-WBFRP9	12,760	920	16,500	1,190
	WBFRP9-WBFRP10	12,760	920	16,500	1,190
	WBFRRTP1-WBFRRTP2	2,950	220	3,800	280
	WBFRRTP2-WBFRRTP3	2,950	220	3,800	280
	WBDCP1-WBDCP2	8,005	580	10,300	750
	WBDCP2-WBDCP3	8,005	580	10,300	750
	SBDCP1-SBDCP2	26,160	1,890	33,300	2400
	SBDCP2-SBDCP3	26,160	1,890	33,300	2,400
	SBDCP3-SBDCP4	26,160	1,890	33,300	2,400
	SBDCP4-SBDCP5	26,160	1,890	33,300	2,400
	SBDCP5-SBDCP6	26,160	1,890	33,300	2,400
	WBMLP1-WBMLP2	67,775	4,880	86,900	6,260
	WBMLP2-WBMLP3	67,775	4,880	86,900	6,260
	WBMLP3-WBMLP4	67,775	4,880	86,900	6,260
	WBMLP4-WBMLP5	67,775	4,880	86,900	6,260
	WBMLP5-WBMLP6	67,775	4,880	86,900	6,260
	WBMLP6-WBMLP7	67,775	4,880	86,900	6,260
	WBFRP7-WBEBRRUTRNP1	745	60	1,000	80
	WBEBRRUTRNP1-WBEBRRUTRNP2	745	60	1,000	80
	WBEBRRUTRNP2-WBEBRRUTRNP3	745	60	1,000	80
	WBEBRRUTRNP3-WBEBRRUTRNP4	745	60	1,000	80
	WBEBRRUTRNP4-WBEBRRUTRNP5	745	60	1,000	80
	WBEBRRUTRNP5-WBEBRRUTRNP6	745	60	1,000	80
	WBEBRRUTRNP6-WBEBRRUTRNP7	745	60	1,000	80
	WBEBRRUTRNP7-WBEBRRUTRNP8	745	60	1,000	80
	WBEBUTRNP1-WBEBUTRNP2	115	10	200	20
	WBEBUTRNP2-WBEBUTRNP3	115	10	200	20
	WBEBUTRNP3-WBEBUTRNP4	115	10	200	20
	EBMLP1-EBMLP2	101,300	7,300	130,200	9,380
	EBMLP2-EBMLP3	73,635	5,310	94,800	6,830
	EBMLP3-EBMLP4	73,635	5,310	94,800	6,830
	EBMLP4-EBMLP5	73,635	5,310	94,800	6,830
	EBMLP5-EBMLP6	73,635	5,310	94,800	6,830
	EBMLP6-EBMLP7	73,635	5,310	94,800	6,830
	NBDCP1-NBDCP2	27,665	2,000	35,400	2,550
	NBDCP2-NBDCP3	27,665	2,000	35,400	2,550
	NBDCP3-NBDCP4	27,665	2,000	35,400	2,550
	NBDCP4-NBDCP5	25,660	1,850	32,800	2,370
	NBDCP5-NBDCP6	25,660	1,850	32,800	2,370
	NBDCP4-NBDC2P1	2,005	150	2,600	190
	NBDC2P1-NBDC2P2	2,005	150	2,600	190

Table 2: Traffic Data Per Roadway Segment and CAL3QHC Links

Traffic Air Quality Analysis Area	Roadway Segment CAL3QHC Link	2028 (ETC[1] Year)		2045 (Design Year)	
		ADT[2]	DHV[3]	ADT	DHV
	NBDC2P2-NBDC2P3	2,005	150	2,600	190
	EBEXRP1-EBEXRP2	5,370	390	6,900	500
	EBEXRP2-EBEXRP3	5,370	390	6,900	500
	EBEXRP3-EBEXRP4	5,370	390	6,900	500
	EBEXRP4-EBFRAPP1	5,370	390	6,900	500
	EBFRAPP1-EBFRAPP2	6,130	450	8,000	580
	EBFRAPP2-EBFRP3	14,965	1,080	19,300	1,390
	EBFRP3-EBFRP4	20,795	1,500	27,000	1,950
	EBFRP4-EBFRP5	20,910	1,510	27,200	1,960
	EBFRP5-EBFRP6	13,205	960	17,200	1,240
	EBWBUTRNP1-EBWBUTRNP2	115	10	200	20
	EBWBUTRNP2-EBWBUTRNP3	115	10	200	20
	EBWBUTRNP3-EBWBUTRNP4	115	10	200	20
	EBWBUTRNP4-WBFRP6	115	10	200	20
	EBFRMHRTP1-EBFRMHRTP2	3,580	260	4,600	340
	EBFRMHRTP2-EBFRMHRTP3	3,580	260	4,600	340
	EBFRMHLTP1-EBFRMHLTP2	1,460	110	1,800	130
	NBDC3P1-NBDC3P2	7,705	560	10,000	720
	NBDC3P2-NBDC3P3	7,705	560	10,000	720
	NBMHP1-NBMHP2	13,035	940	17,200	1,240
	NBMHP2-NBMHAPP3	8,665	630	11,300	820
	NBMHAPP3-NBMHAPP4	3,940	290	5,300	390
	NBMHAPP4-NBMHP5	3,940	290	5,300	390
	NBMHP5-NBMHP6	6,890	500	9,100	660
	NBMHLTP1-NBMHLTP2	4,725	350	6,000	440
	SBMHAPP1-SBMHAPP2	6,820	500	9,200	670
	SBMHAPP2-SBMHP3	16,385	1,180	21,400	1,550
	SBMHP3-SBMHAPP4	16,385	1,180	21,400	1,550
	SBMHAPP4-SBMHAPP5	7,550	550	10,100	730
	SBMHAPP5-SBMHP6	7,550	550	10,100	730
	SBMHP6-SBMHP7	11,130	810	14,700	1,060
	SBMHRTP1-SBMHRTP2	1,260	100	1,600	120
	SBMHLTP1-SBMHLTP2	8,835	640	11,300	820
I-20 at Bowman Springs Road Intersection	WBFRP1-WBFRP2	14,860	1,070	18,600	1,340
	WBFRP2-WBFRP3	14,860	1,070	18,600	1,340
	WBFRP3-WBFRP4	14,860	1,070	18,600	1,340
	WBFRP4-WBFRAPP5	14,745	1,070	18,400	1,330
	WBFRAPP5-WBFRAPP6	10,650	770	13,200	960
	WBFRAPP6-WBFRP7	14,015	1,010	17,500	1,260
	WBFRP7-WBFRP8	14,130	1,020	17,700	1,280
	WBFRP8-WBFRP9	14,130	1,020	17,700	1,280
	WBFRP9-WBFRP10	14,130	1,020	17,700	1,280
	WBFRP10-WBFRP11	14,130	1,020	17,700	1,280
	WBEBUTRP1-WBEBUTRP2	115	10	200	20
	WBEBUTRP2-WBEBUTRP3	115	10	200	20
	WBEBUTRP3-WBEBUTRP4	115	10	200	20
	WBEBUTRP4-EBFRP7	115	10	200	20
	WBFRRTP1-WBFRRTP2	1,375	100	1,800	130
	WBFRLTP1-WBFRLTP2	2,720	200	3,400	250

Table 2: Traffic Data Per Roadway Segment and CAL3QHC Links

Traffic Air Quality Analysis Area	Roadway Segment CAL3QHC Link	2028 (ETC[1] Year)		2045 (Design Year)	
		ADT[2]	DHV[3]	ADT	DHV
	WBCDP1-WBCDP2	48,630	3,510	62,400	4,500
	WBCDP2-WBCDP3	48,630	3,510	62,400	4,500
	WBCDP3-WBCDP4	48,630	3,510	62,400	4,500
	WBCDP4-WBCDP5	48,630	3,510	62,400	4,500
	WBMLP1-WBMLP2	75,780	5,460	97,200	7,000
	WBMLP2-WBMLP3	75,780	5,460	97,200	7,000
	WBMLP3-WBMLP4	75,780	5,460	97,200	7,000
	EBMLP1-EBMLP2	51,540	3,720	66,500	4,790
	EBMLP2-EBMLP3	86,080	6,200	110,900	7,990
	EBMLP3-EBMLP4	86,080	6,200	110,900	7,990
	EBDCP1-EBDCP2	34,540	2,490	44,400	3,200
	EBDCP2-EBDCP3	34,540	2,490	44,400	3,200
	EBDCP3-EBDCP4	34,540	2,490	44,400	3,200
	EBCDP1-EBCDP2	32,920	2,380	42,100	3,040
	EBCDP2-EBCDP3	32,920	2,380	42,100	3,040
	EBCDP3-EBCDP4	32,920	2,380	42,100	3,040
	EBCDP4-EBCDP5	32,920	2,380	42,100	3,040
	EBCDP5-EBCDP6	32,920	2,380	42,100	3,040
	EBFRP1-EBFRP2	16,900	1,220	22,000	1,590
	EBFRP2-EBFRP3	2,635	190	3,400	250
	EBFRP3-EBFRP4	2,520	190	3,200	240
	EBFRP4-EBFRAPP5	2,520	190	3,200	240
	EBFRAPP5-EBFRAPP6	115	10	200	20
	EBFRAPP6-EBFRP7	2,120	160	2,800	210
	EBFRP7-EBFRP8	2,235	170	3,000	220
	EBFRP8-EBFRP9	2,235	170	3,000	220
	EBFRP9-EBFRP10	2,235	170	3,000	220
	EBFRP10-EBFRP11	16,500	1,190	21,600	1,560
	EBFRLTP1-EBFRLTP2	1,990	150	2,500	180
	EBFRLTP2-EBFRLTP3	1,990	150	2,500	180
	EBFRRTP1-EBFRRTP2	415	30	500	40
	EBFRRTP2-EBFRRTP3	415	30	500	40
	EBFRBPP1-EBFRBPP2	14,265	1,030	18,600	1,340
	EBFRBPP2-EBFRBPP3	14,265	1,030	18,600	1,340
	EBFRBPP3-EBFRP10	14,265	1,030	18,600	1,340
	EBWBUTRP1-EBWBUTRP2	115	10	200	20
	EBWBUTRP2-EBWBUTRP3	115	10	200	20
	EBWBUTRP3-EBWBUTRP4	115	10	200	20
	EBWBUTRP4-EBWBUTRP5	115	10	200	20
	EBWBUTRP5-WBFRP8	115	10	200	20
	NBBSP1-NBBSAPP2	1,690	130	2,200	160
	NBBSAPP2-NBBSAPP3	630	50	800	60
	NBBSAPP3-NBBSP4	2,620	190	3,300	240
	NBBSP4-NBBSAPP5	2,620	190	3,300	240
	NBBSAPP5-NBBSAPP6	1,260	100	1,600	120
	NBBSAPP6-NBBSP7	2,635	190	3,400	250
	NBBSP7-NBBSP8	2,635	190	3,400	250
	NBBSLTP1-NBBSLTP2	1,360	100	1,700	130
	NBBSRTP1-NBBSRTP2	1,060	80	1,400	110

Table 2: Traffic Data Per Roadway Segment and CAL3QHC Links

Traffic Air Quality Analysis Area	Roadway Segment CAL3QHC Link	2028 (ETC[1] Year)		2045 (Design Year)	
		ADT[2]	DHV[3]	ADT	DHV
	SBBSP1-SBBSAPP2	3,395	250	4,500	330
	SBBSAPP2-SBBSAPP3	1,390	110	1,900	140
	SBBSAPP3-SBBSP4	4,110	300	5,300	390
	SBBSP4-SBBSAPP5	4,110	300	5,300	390
	SBBSAPP5-SBBSAPP6	3,165	230	4,100	300
	SBBSAPP6-SBBSP7	3,580	260	4,600	340
	SBBSP7-SBBSP8	3,580	260	4,600	340
	SBBSP8-SBBSP9	3,580	260	4,600	340
	SBBSRTP1-SBBSRTP2	2,005	150	2,600	190
I-20 at Green Oaks Boulevard Intersection	WBFRP1-WBFRP2	27,350	1,970	35,000	2,520
	WBFRP2-WBFRP3	27,350	1,970	35,000	2,520
	WBFRP3-WBFRP4	27,350	1,970	35,000	2,520
	WBFRP4-WBFRP5	20,505	1,480	26,200	1,890
	WBFRP5-WBFRGOAPP6	20,505	1,480	26,200	1,890
	WBFRGOAPP6-WBFRGOAPP7	11,125	810	14,100	1,020
	WBFRGOAPP7-WBFRP8	11,125	810	14,100	1,020
	WBFRP8-WBFRP9	26,190	1,890	33,500	2,420
	WBFRP9-WBFRP10	18,500	1,340	23,600	1,700
	WBEBUTRNP1-WBEBUTRNP2	215	20	300	30
	WBEBUTRNP2-WBEBUTRNP3	215	20	300	30
	WBEBUTRNP3-WBEBUTRNP4	215	20	300	30
	WBEBUTRNP4-EBFRP6	215	20	300	30
	WBFRGORTP1-WBFRGORTP2	7,160	520	9,200	670
	WBFRGORTP2-WBFRGORTP3	7,160	520	9,200	670
	WBFRGOLTP1-WBFRGOLTP2	2,005	150	2,600	190
	WBENTR1P1-WBENTR1P2	7,690	560	9,900	720
	WBENTR1P2-WBENTR1P3	7,690	560	9,900	720
	WBMLP1-WBMLP2	89,470	6,450	114,800	8,270
	WBMLP2-WBMLP3	89,470	6,450	114,800	8,270
	WBMLP3-WBMLP4	89,470	6,450	114,800	8,270
	WBMLP4-WBMLP5	96,315	6,940	123,600	8,900
	WBMLP5-WBMLP6	96,315	6,940	123,600	8,900
	WBMLP6-WBMLP7	104,005	7,490	133,500	9,620
	WBENTR2P1-WBENTR2P2	7,690	560	9,900	720
	WBENTR2P2-WBENTR2P3	7,690	560	9,900	720
	EBMLP1-EBMLP2	95,660	6,890	123,200	8,880
	EBMLP2-EBMLP3	95,660	6,890	123,200	8,880
	EBMLP3-EBMLP4	95,660	6,890	123,200	8,880
	EBMLP4-EBMLP5	88,815	6,400	114,400	8,240
	EBMLP5-EBMLP6	88,815	6,400	114,400	8,240
	EBMLP6-EBMLP7	88,815	6,400	114,400	8,240
	EBEXR1P1-EBEXR1P2	7,690	560	9,900	720
	EBEXR1P2-EBEXR1P3	7,690	560	9,900	720
	EBEXR2P1-EBEXR2P2	6,845	500	8,800	640
	EBEXR2P2-EBEXR2P3	6,845	500	8,800	640
	EBEXR2P3-EBEXR2P4	6,845	500	8,800	640
	EBFRP1-EBFRP2	17,715	1,280	22,900	1,650
	EBFRP2-EBFRP3	17,715	1,280	22,900	1,650
	EBFRP3-EBFRGOAPP4	25,405	1,830	32,800	2,370

Table 2: Traffic Data Per Roadway Segment and CAL3QHC Links

Traffic Air Quality Analysis Area	Roadway Segment CAL3QHC Link	2028 (ETC[1] Year)		2045 (Design Year)	
		ADT[2]	DHV[3]	ADT	DHV
	EBFRGOAPP4-EBFRGOAPP5	10,095	730	12,900	930
	EBFRGOAPP5-EBFRP6	16,625	1,200	21,300	1,540
	EBFRP6-EBFRP7	19,160	1,380	24,600	1,780
	EBFRP7-EBFRP8	19,160	1,380	24,600	1,780
	EBFRP8-EBFRP9	19,160	1,380	24,600	1,780
	EBFRP9-EBFRP10	26,005	1,880	33,400	2,410
	EBWBUTRNP1-EBWBUTRNP2	3,165	230	4,100	300
	EBWBUTRNP2-EBWBUTRNP3	3,165	230	4,100	300
	EBWBUTRNP3-EBWBUTRNP4	3,165	230	4,100	300
	EBWBUTRNP4-WBFRP8	3,165	230	4,100	300
	EBFRGOLTP1-EBFRGOLTP2	7,090	520	9,300	670
	EBFRGORTP1-EBFRGORTP2	5,055	370	6,500	470
	EBFRGORTP2-EBFRGORTP3	5055	370	6,500	470
	NBGOP1-NBGOAPP2	12100	880	15,500	1120
	NBGOAPP2-NBGOAPP3	9780	710	12,500	900
	NBGOAPP3-NBGOP4	16870	1,220	21,800	1,570
	NBGOP4-NBGOAPP5	16870	1,220	21,800	1,570
	NBGOAPP5-NBGOAPP6	11815	860	15,300	1,110
	NBGOAPP6-NBGOP7	11815	860	15,300	1,110
	NBGOP7-NBGOP8	18975	1,370	24,500	1,770
	NBGORTP1-NBGORTP2	2,320	170	3,000	220
	NBGORTP2-NBGORTP3	2,320	170	3,000	220
	NBGOLTP1-NBGOLTP2	5,055	370	6,500	470
	SBGOP1-SBGOAPP2	19,685	1,420	24,700	1,780
	SBGOAPP2-SBGOAPP3	12,840	930	15,900	1,150
	SBGOAPP3-SBGOP4	14,845	1,070	18,500	1,340
	SBGOP4-SBGOAPP5	14,845	1,070	18,500	1,340
	SBGOAPP5-SBGOAPP6	8,315	600	10,100	730
	SBGOAPP6-SBGOP7	8,315	600	10,100	730
	SBGOP7-SBGOP8	8,315	600	10,100	730
	SBGOP8-SBGOP9	13,370	970	16,600	1,200
	SBGOP9-SBGOP10	13,370	970	16,600	1,200
	SBGOLTP1-SBGOLTP2	6,530	480	8,400	610
US 287 at the Willbarger Street and Miller Avenue Intersections	NBFRP1-P2	2,205	214	2,800	272
	NBFRP2-P3	2,205	214	2,800	272
	NBFRP3-P4	6,415	622	8,200	795
	NBFRP4-P5	6,415	622	8,200	795
	NBENTRP1-P2	4,210	408	5,400	524
	NBENTRP2-P3	4,210	408	5,400	524
	NBENTRP3-P4	4,210	408	5,400	524
	WMNBMLP1-P2	35,055	3,400	45,000	4,365
	WMNBMLP2-P3	35,055	3,400	45,000	4,365
	WMNBMLP3-P4	35,055	3,400	45,000	4,365
	SBMLP1-P2	34,525	3,349	44,300	4,297
	SBMLP2-P3	34,525	3,349	44,300	4,297
	SBMLP3-P4	34,525	3,349	44,300	4,297
	SBMLP4-P5	30,515	2,960	39,100	3,793
	SBEXRP1-P2	4,010	389	5,200	504
	WMSBFRP1-P2	4,985	484	6,600	640

Table 2: Traffic Data Per Roadway Segment and CAL3QHC Links

Traffic Air Quality Analysis Area	Roadway Segment CAL3QHC Link	2028 (ETC[1] Year)		2045 (Design Year)	
		ADT[2]	DHV[3]	ADT	DHV
	WMSBFR P2-P3	4,985	484	6,600	640
	WMSBFRP3-P4	4,985	484	6,600	640
	MillerSBMLP1-P2	8,835	857	11,300	1,096
	MillerSBMLP2-MillerSBAPP1	7,160	695	9,200	892
	MillerSBAPP1-P2	7,160	695	9,200	892
	MillerSBAPP2-MillerSBMLP2	6,630	643	8,500	825
	MillerSBMLP3-P4	11,685	1,133	15,000	1,455
	MillerSBMLP4-P5	11,685	1,133	15,000	1,455
	MillerSBMLP5-P6	6,845	664	8,800	854
	MillerSBLTP1-P2	530	51	700	68
	MillerSBLTFRP1-P2	4,840	469	6,200	601
	SBFRP1-P2	8,735	847	11,200	1,086
	SBFRP2-P3	8,735	847	11,200	1,086
	NBFRP1-P2	6,615	642	8,400	815
	NBFRP2-P3	6,615	642	8,400	815
	NBFRP3-P4	6,615	642	8,400	815
	MillerNBMLP1-P2	9,050	878	11,600	1,125
	MillerNBMLP2-MillerNBAPP1	9,050	878	11,600	1,125
	MillerNBAPP1-P2	6,630	643	8,500	825
	MillerNBAPP2-MillerNBMLP3	6,215	603	8,000	776
	MillerNBMLP3-P4	7,590	736	9,800	951
	MillerNBMLP4-P5	11,700	1,135	15,100	1,465
	MillerNBMLP5-P6	7,175	696	9,300	902
	MillerNBLTP1-P2	415	40	500	49
	MillerNBLTFRP1-P2	4,525	439	5,800	563
	WilbEBMLP2-WilbEBAPP1	3,680	357	4,700	456
	WilbEBAPP1-P2	8,350	810	10,900	1,057
	WilbEBAPP2-WilbEBMLP3	1,820	177	2,500	243
	WilbEBMLP3-P4	3,295	320	4,400	427
	WilbEBMLP4-P5	3,295	320	4,400	427
	WilbEBMLP5-P6	3,295	320	4,400	427
	WilbEBLTP1-P2	2,320	225	3,000	291
	WilbWBMLP1-P2	3,180	308	4,200	407
	WilbWBMLP2-WilbWBAPP1	3,180	308	4,200	407
	WilbWBAPP1-P2	9,280	900	12,000	1,164
	WilbWBAPP2-WilbWBMLP3	2,850	276	3,700	359
	WilbWBMLP3-P4	4,740	460	6,100	592
	WilbWBMLP4-P5	4,740	460	6,100	592
	WilbWBMLP5-P6	5,055	490	6,500	631
	WilbWBLTP1-P2	2,320	225	3,000	291
US 287at Village Creek Road Intersection	NBFRP1-P2	6,615	642	8,400	815
	NBFRP2-P3	6,615	642	8,400	815
	NBFRP3-P4	6,615	642	8,400	815
	NBFRP4-P5	6,615	642	8,400	815
	NBFRP5-P6	6,615	642	8,400	815
	NBFRP6-P7	6,615	642	8,400	815
	NBFRP7-P8	6,615	642	8,400	815
	NBFRP8-P9	6,615	642	8,400	815
	NBFRP9-P10	6,615	642	8,400	815

Table 2: Traffic Data Per Roadway Segment and CAL3QHC Links

Traffic Air Quality Analysis Area	Roadway Segment CAL3QHC Link	2028 (ETC[1] Year)		2045 (Design Year)	
		ADT[2]	DHV[3]	ADT	DHV
	NBFRP10-P11	6,615	642	8,400	815
	NBFRP11-P12	6,615	642	8,400	815
	NBFRP12-P13	12,200	1,183	15,600	1,513
	NBFRP13-P14	7,260	704	9,300	902
	NBFRP14-P15	7,260	704	9,300	902
	NBFRP15-P16	7,260	704	9,300	902
	NBFRP16-NBVCAP P2	7,260	704	9,300	902
	NBVCAPP2-P1	3,780	367	4,800	466
	NBVCAPP1-NBFRP17	8,190	794	10,400	1,009
	NBFRP17	8,190	794	10,400	1,009
	NBVCRTP1-P2	2,205	214	2,800	272
	NBVCRTP2-P3	2,205	214	2,800	272
	NBVCRTP3	2,205	214	2,800	272
	NBVCLTP1-P2	2,205	214	2,800	272
	NBVCLTP2-P3	2,205	214	2,800	272
	NBVCLTP3	2,205	214	2,800	272
	NBENTRP1-P2	5,585	542	7,200	698
	NBENTRP2-P3	5,585	542	7,200	698
	NBENTRP3-P4	5,585	542	7,200	698
	NBENTRP4-P5	5,585	542	7,200	698
	NBENTRP5-P6	5,585	542	7,200	698
	NBENTRP6-P7	5,585	542	7,200	698
	NBENTRP7-P8	5,585	542	7,200	698
	NBENTRP8-P9	5,585	542	7,200	698
	NBENTRP9-P10	5,585	542	7,200	698
	NBENTRP10-P11	5,585	542	7,200	698
	NBENTRP11-P12	5,585	542	7,200	698
	NBENTRP12	5,585	542	7,200	698
	NBEXRP1-P2	4,940	479	6,300	611
	NBEXRP2-P3	4,940	479	6,300	611
	NBEXRP3-P4	4,940	479	6,300	611
	NBEXRP4-P5	4,940	479	6,300	611
	NBEXRP5	4,940	479	6,300	611
	NBML1-P2	35,055	3,400	45,000	4,365
	NBMLP2-P3	29,470	2,859	37,800	3,667
	NBMLP3-P4	29,470	2,859	37,800	3,667
	NBMLP4-P5	29,470	2,859	37,800	3,667
	NBMLP5-P6	29,470	2,859	37,800	3,667
	NBMLP6-P7	29,470	2,859	37,800	3,667
	NBMLP7-P8	29,470	2,859	37,800	3,667
	NBMLP8-P9	29,470	2,859	37,800	3,667
	NBMLP9-P10	29,470	2,859	37,800	3,667
	NBMLP10-P11	29,470	2,859	37,800	3,667
	NBMLP11-P12	29,470	2,859	37,800	3,667
	NBMLP12-P13	29,470	2,859	37,800	3,667
	NBMLP13	34,410	3,338	44,100	4,278
	SBMLP1-P2	34,525	3,349	44,300	4,297
	SBMLP2-P3	30,515	2,960	39,100	3,793
	SBMLP3-P4	30,515	2,960	39,100	3,793

Table 2: Traffic Data Per Roadway Segment and CAL3QHC Links

Traffic Air Quality Analysis Area	Roadway Segment CAL3QHC Link	2028 (ETC[1] Year)		2045 (Design Year)	
		ADT[2]	DHV[3]	ADT	DHV
	SBMLP4-P5	30,515	2,960	39,100	3,793
	SBMLP5-P6	30,515	2,960	39,100	3,793
	SBMLP6-P7	30,515	2,960	39,100	3,793
	SBMLP7-P8	30,515	2,960	39,100	3,793
	SBMLP8-P9	30,515	2,960	39,100	3,793
	SBMLP9-P10	30,515	2,960	39,100	3,793
	SBMLP10-P11	30,515	2,960	39,100	3,793
	SBMLP11-P12	30,515	2,960	39,100	3,793
	SBEXRP1-P2	4,010	389	5,200	504
	SBEXRP2-P3	4,010	389	5,200	504
	SBEXRP3-P4	4,010	389	5,200	504
	SBEXRP4-P5	4,010	389	5,200	504
	SBEXRP5-P6	4,010	389	5,200	504
	SBEXRP6-P7	4,010	389	5,200	504
	SBENTRP1-P2	4,940	479	6,300	611
	SBENTRP2-P3	4,940	479	6,300	611
	SBENTRP3-P4	4,940	479	6,300	611
	SBENTRP4-P5	4,940	479	6,300	611
	SBENTRP5-P6	4,940	479	6,300	611
	SBFRP1-P2	8,735	847	11,200	1,086
	SBFRP2-P3	8,735	847	11,200	1,086
	SBFRP3-P4	8,735	847	11,200	1,086
	SBFRP4-P5	8,735	847	11,200	1,086
	SBFRP5-P6	8,735	847	11,200	1,086
	SBFRP6-P7	8,735	847	11,200	1,086
	SBFRP7-P8	8,735	847	11,200	1,086
	SBFRP8-P9	12,745	1,236	16,400	1,591
	SBFRP9-P10	12,745	1,236	16,400	1,591
	SBFRP10-P11	7,805	757	10,100	980
	SBFRP11-P12	7,805	757	10,100	980
	SBFRP12-P1	7,805	757	10,100	980
	SBVCAPP1-P2	4,425	429	5,700	553
	SBVCAPP2-P14	7,375	715	9,500	922
	SBFRP14-P15	7,375	715	9,500	922
	SBFRP15-P16	7,375	715	9,500	922
	SBVCLTP1-P2	1,375	133	1,800	175
	SBVCRTP1-P2	2,005	194	2,600	252
	WBVCAPP1-P2	5,355	519	6,800	660
	WBVCAPP2-WBVC P3	5,355	519	6,800	660
	WBVCP3-WBVCAP P4	5,555	539	7,000	679
	WBVCAPP4-P5	5,555	539	7,000	679
	WBVCAPP5-WBVC P6	5,555	539	7,000	679
	WBVCP6-P7	5,770	560	7,300	708
	EBVCAPP1-P2	1,920	186	2,600	252
	EBVCAPP2-EBVC P3	1,920	186	2,600	252
	EBVCP3-EBVCAP P4	2,135	207	2,900	281
	EBVCAPP4-P5	2,135	207	2,900	281
	EBVCAPP5-EBVC P6	2,135	207	2,900	281
	EBVCP6-P7	2,865	278	3,800	369

Table 2: Traffic Data Per Roadway Segment and CAL3QHC Links

Traffic Air Quality Analysis Area	Roadway Segment CAL3QHC Link	2028 (ETC[1] Year)		2045 (Design Year)	
		ADT[2]	DHV[3]	ADT	DHV
US 287 at the Little Road Intersection	NBFRP1-P2	18,000	1,746	23,100	2,241
	NBFRP2-P3	11,900	1,154	15,300	1,484
	NBFRP3-P4	11,900	1,154	15,300	1,484
	NBFRP4-P5	11,900	1,154	15,300	1,484
	NBFRP5-NBLRAP P1	10,740	1,042	13,800	1,339
	NBLRAPP1-P2	1,360	132	1,700	165
	NBLRAPP2-P3	1,360	132	1,700	165
	NBLRLTUTP1-P2	1,160	113	1,500	146
	NBLRLTUTP2-P3	1,160	113	1,500	146
	NBLRLTUTP3-P4	1,160	113	1,500	146
	NBLRLTUTP4-P5	1,160	113	1,500	146
	NBLRLTUTP5-P6	1,160	113	1,500	146
	NBLRLTUTP6-P7	1,160	113	1,500	146
	NBLRRTP1-P2	7,060	685	9,100	883
	NBENTRP1-P2	6,100	592	7,800	757
	NBENTRP2-P3	6,100	592	7,800	757
	NBENTRP3-P4	6,100	592	7,800	757
	NBENTRP4-P5	6,100	592	7,800	757
	NBMLP1-P2	31,160	3,023	40,000	3,880
	NBMLP2-P3	37,260	3,614	47,800	4,637
	NBMLP3-P4	37,260	3,614	47,800	4,637
	NBMLP4-P5	37,260	3,614	47,800	4,637
	NBMLP5-P6	37,260	3,614	47,800	4,637
	NBMLP6-P7	37,260	3,614	47,800	4,637
	NBMLP7-NBCDP8	37,260	3,614	47,800	4,637
	NBCDP8-P9	37,260	3,614	47,800	4,637
	NBCDP9-P10	27,780	2,695	35,600	3,453
	NBCDP10-P11	27,780	2,695	35,600	3,453
	NBCDP11-P12	27,780	2,695	35,600	3,453
	NBDCP1-P2	9,480	920	12,200	1,183
	NBDCP2-P3	9,480	920	12,200	1,183
	NBDCP3-P4	9,480	920	12,200	1,183
	NBDCP4-P5	9,480	920	12,200	1,183
	NBDCP5-P6	9,480	920	12,200	1,183
	NBDCP6-P7	9,480	920	12,200	1,183
	NBDCP7-P8	9,480	920	12,200	1,183
	SBCDP1-P2	25,545	2,478	32,600	3,162
	SBCDP2-P3	25,545	2,478	32,600	3,162
	SBCDP3-P4	25,545	2,478	32,600	3,162
	SBCDP4-P5	25,545	2,478	32,600	3,162
	SBCDP5-P6	25,545	2,478	32,600	3,162
	SBCDP6-SBMLP7	25,545	2,478	32,600	3,162
	SBMLP7-P8	25,545	2,478	32,600	3,162
	SBMLP8-P9	34,595	3,356	44,200	4,287
	SBMLP9-P10	34,595	3,356	44,200	4,287
	SBMLP10-P11	34,595	3,356	44,200	4,287
	SBMLP11-P12	26,705	2,590	34,100	3,308
	SBMLP12-P13	26,705	2,590	34,100	3,308
	SBDCP1-P2	9,050	878	11,600	1,125

Table 2: Traffic Data Per Roadway Segment and CAL3QHC Links

Traffic Air Quality Analysis Area	Roadway Segment CAL3QHC Link	2028 (ETC[1] Year)		2045 (Design Year)	
		ADT[2]	DHV[3]	ADT	DHV
	SBDCP2-P3	9,050	878	11,600	1,125
	SBDCP3-P4	9,050	878	11,600	1,125
	SBDCP4-P5	9,050	878	11,600	1,125
	SBDCP5-P6	9,050	878	11,600	1,125
	SBDCP6-P7	9,050	878	11,600	1,125
	SBDCP7-P8	9,050	878	11,600	1,125
	SBDCP8-P9	9,050	878	11,600	1,125
	SBDCP9-P10	9,050	878	11,600	1,125
	SBEXRP1-P2	7,890	765	10,100	980
	SBEXRP2-P3	7,890	765	10,100	980
	SBEXRP3-P4	7,890	765	10,100	980
	SBENTRP1-P2	11,615	1,127	15,100	1,465
	SBENTRP2-P3	11,615	1,127	15,100	1,465
	SBENTRP3-P4	11,615	1,127	15,100	1,465
	SBENTRP4-P5	11,615	1,127	15,100	1,465
	SBFRP1SBLRAPP1	16,085	1,560	21,100	2,047
	SBLRAPP1-P2	7,035	682	9,500	922
	SBLRAPP2-P3	7,035	682	9,500	922
	SBLRAPP3-P4	7,035	682	9,500	922
	SBLRAPP4-P5	7,035	682	9,500	922
	SBLRAPP5-SBFR P2	13,665	1,326	18,000	1,746
	SBFRP2-P3	13,665	1,326	18,000	1,746
	SBFRP3-P4	13,665	1,326	18,000	1,746
	SBFRP4-P5	13,665	1,326	18,000	1,746
	SBFRP5-P6	13,665	1,326	18,000	1,746
	SBFRP6-P7	13,665	1,326	18,000	1,746
	SBFRP7-P8	23,155	2,246	29,700	2,881
	SBFRP8-P9	11,540	1,119	14,600	1,416
	SBLRLTP1-P2	7,575	735	9,700	941
	SBLRLTP2-P3	7,575	735	9,700	941
	SBLRLTP3-P4	7,575	735	9,700	941
	SBLRLTP4-P5	7,575	735	9,700	941
	SBLRRTP1-P2	1,475	143	1,900	184
	SBLRRTP2-P3	1,475	143	1,900	184
	SBLRRTP3-P4	1,475	143	1,900	184
	SBLRRTP4-P5	1,475	143	1,900	184
	SBLRRTP5-P6	1,475	143	1,900	184
	WBLRP1WBLRAPP2	11,530	1,118	15,100	1,465
	WBLRAPP2-P3	7,220	700	9,600	931
	WBLRAPP3-WBLR P4	7,220	700	9,600	931
	WBLRP4-WBLRAP P5	10,900	1,057	14,300	1,387
	WBLRAPP5-P6	10,900	1,057	14,300	1,387
	WBLRAPP6-WBLR P7	12,375	1,200	16,200	1,571
	WBLRP7-P8	12,375	1,200	16,200	1,571
	WBLRLTP1-P2	4,310	418	5,500	534
	WBLRLTP2-P3	4,310	418	5,500	534
	WBLRLTP3-P4	4,310	418	5,500	534
	WBLRLTP4-P5	4,310	418	5,500	534
	EBLRP1EBLRAPP2	11,795	1,144	16,300	1,581

Table 2: Traffic Data Per Roadway Segment and CAL3QHC Links

Traffic Air Quality Analysis Area	Roadway Segment CAL3QHC Link	2028 (ETC[1] Year)		2045 (Design Year)	
		ADT[2]	DHV[3]	ADT	DHV
	EBLRAPP2-P3	11,795	1,144	16,300	1,581
	EBLRAPP3-EBLRP4	18,210	1,766	24,500	2,377
	EBLRP4-EBLRAPP5	17,365	1,684	23,400	2,270
	EBLRAPP5-P6	17,365	1,684	23,400	2,270
	EBLRAPP6-EBLRP7	25,270	2,451	33,600	3,259
	EBLRP7-P8	25,270	2,451	33,600	3,259
	EBLRP8-P9	25,270	2,451	33,600	3,259
	EBLRLTP1-P2	845	82	1,100	107
	EBLRLTP2-P3	845	82	1,100	107

Source: Projected TPP-Approved Traffic Diagrams and Study Team (August 2019).
[1] ETC – Estimated Time to Completion.
[2] ADT – Average Daily Traffic.
[3] DHV – Design Hour Volume.

Table 3 shows the CO emission rates in grams per mile (gpm) corresponding to urban roadways for the design speeds of 65 miles per hour (mph) for mainlanes, 40 mph for collector distributers, direct connectors, frontage roads, and ramps, 35 or 30 mph for cross-streets, 15 mph for U-turns, and 2.5 mph for idle traffic at intersections.

Table 3: CO Emission Rates (gpm[1])

Speed (mph)	2028 (ETC[2] Year)	2045[3] (Design Year)
65	0.77	0.45
40	0.78	0.43
35	0.86	0.47
30	0.94	0.51
15	1.34	0.72
2.5	3.01	1.49

Source: MOVES2014 TxDOT Emission Rate Lookup Tables.
[1] gpm – grams per mile
[2] ETC – Estimated Time Completion
[3] 2040 emission factors were used in the analysis.

Table 4 shows the meteorological parameters used in the CO analysis.

Table 4: Meteorological Parameters[1]

Atmospheric Stability Class	6
Mixing Height	1,000 Meters
Wind Speed	1 Meter Per Second
Wind Directions Modeled	10, 20, 30, 40, 50, 60, 70, 80, 90, 100, 110, 120, 130, 140, 150, 160, 170, 180, 190, 200, 210, 220, 230, 240, 250, 260, 270, 280 ,290, 300, 310, 320, 330, 340, 350, 360
K Factor (Percent)[2]	(I-820 – 9.9, I-20 – 7.2, US 287 – 9.7)
One-Hour CO Background Concentration	1.7
Eight-Hour CO Background Concentration	1.4

Sources:
[1] TxDOT *Environmental Guide Volume 2 Activity Instructions, Appendix A and B,* (August 2019).
[2] TxDOT TPP, August 2019.
The project's CAL3QHC input and output files have been submitted to the TxDOT District for inclusion in the project files.

4. RECEPTOR LOCATIONS

The TAQA was conducted at 43 receptor locations along the project. The receptors are located at intersections and along sections of the roadway that contain the highest traffic volumes. The intersections, roadway sections, and their corresponding 2028 and 2045 traffic volumes are shown in Table 2. The modeled roadway information used in the CAL3QHC CO analysis including the receptors, roadways, number of lanes, receptor distances from the roadways, ROW width, 2028 and 2045 DHV, and traffic speed is shown in Table 5.

Table 5: Modeled Roadway Information

Receptor	Modeled Roadway	Number of Lanes	Receptor Distance from Roadway (feet)	ROW Width (feet)	2028 DHV[1] (ETC[2] Year)	2045 DHV (Design Year)	Speed (mph[3])
I-820 at Sun Valley Drive Intersection							
R-1	SBFR	3	358	423	991 – 1,491	1,277 – 1,921	2.5 - 40
	SBML	7	223		7,010	8,979	65
	NBML	7	114		7,827	10,049	65
	NBFR	3	20		1,247 – 1,571	1,584 – 2,000	2.5 - 40
	EB Sun Valley Dr.	1 – 2	54		125 - 302	158 - 386	2.5 - 35
R-2	SBFR	3	360	465	991 – 1,491	1,277 – 1,921	2.5 - 40
	SBML	7	221		7,010	8,979	65
	NBML	7	111		7,827	10,049	65

Table 5: Modeled Roadway Information

Receptor	Modeled Roadway	Number of Lanes	Receptor Distance from Roadway (feet)	ROW Width (feet)	2028 DHV[1] (ETC[2] Year)	2045 DHV (Design Year)	Speed (mph[3])
	NBFR	3	28		1,247 – 1,571	1,584 – 2,000	2.5 - 40
	WB Sun Valley Dr.	1	34		222 – 304	248 - 386	2.5 - 35
R-3	SBFR	3	20	424	991 – 1,491	1,277 – 1,921	2.5 - 40
	SBML	7	104		7,010	8,979	65
	NBML	7	211		7,827	10,049	65
	NBFR	3	346		1,247 – 1,571	1,584 – 2,000	2.5 - 40
	WB Sun Valley Dr.	1	49		222 – 304	248 - 386	2.5 - 35
R-4	SBFR	3	24	458	991 – 1,491	1,277 – 1,921	2.5 - 40
	SBML	7	94		7,010	8,979	65
	NBML	7	206		7,827	10,049	65
	NBFR	3	343		1,247 – 1,571	1,584 – 2,000	2.5 - 40
	EB Sun Valley Dr.	1 – 2	55		125 - 302	158 - 386	2.5 - 35
I-820 at Spur 303 Intersection							
R-1	SBFR	2 – 3	27	404	709 – 2,136	911 – 2,742	2.5 - 40
	SBML	4 – 5	112		3,740 – 4,250	4,792 – 5,445	65
	NBML	4 – 5	198		5,036 – 5,546	6,475 – 7,128	65
	NBENTR	1	277		510	653	40
	NBFR	3 – 5	325		1,060 – 2,060	1,346 – 3,074	2.5 - 40
	EB Spur 303	1 – 3	23		771 – 1,250	990 – 1,604	2.5 - 35
R-2	SBFR	2 – 3	23	409	709 – 2,136	911 – 2,742	2.5 - 40
	SBML	4 – 5	115		3,740 – 4,250	4,792 – 5,445	65
	NBML	4 – 5	200		5,036 – 5,546	6,475 – 7,128	65
	NBENTR	1	276		510	653	40
	NBFR	3 – 5	328		1,060 – 2,060	1,346 – 3,074	2.5 - 40
	WB Spur 303	2 – 4	26		386 – 761	495 - 980	2.5 - 35
R-3	SBFR	2 – 3	318	419	709 – 2,136	911 – 2,742	2.5 - 40
	SBML	4 – 5	215		3,740 – 4,250	4,792 – 5,445	65
	NBML	4 – 5	150		5,036 – 5,546	6,475 – 7,128	65
	NBENTR	1	114		510	653	40
	NBFR	3 – 5	34		1,060 – 2,060	1,346 – 3,074	2.5 - 40
	WB Spur 303	2 – 4	21		386 – 761	495 - 980	2.5 - 35

Table 5: Modeled Roadway Information

Receptor	Modeled Roadway	Number of Lanes	Receptor Distance from Roadway (feet)	ROW Width (feet)	2028 DHV[1] (ETC[2] Year)	2045 DHV (Design Year)	Speed (mph[3])
R-4	SBFR	2 – 3	346	401	709 – 2,136	911 – 2,742	2.5 - 40
	SBML	4 – 5	218		3,740 – 4,250	4,792 – 5,445	65
	NBML	4 – 5	157		5,036 – 5,546	6,475 – 7,128	65
	NBENTR	1	116		510	653	40
	NBFR	3 – 5	32		1,060 – 2,060	1,346 – 3,074	2.5 - 40
	EB Spur 303	1 – 3	35		771 – 1,250	990 – 1,604	2.5 - 35
I-820 from Meadowbrook Road to Brentwood Stair Road							
R-1	SBFR[4]	2 - 3	10	347	855 – 1,793	1,099 – 2,307	40
	SBML[5]	5 – 6	77		4,552 – 5,491	5,831 – 7,039	65
	NBML[5]	3 – 4	164		3,889 – 5,817	5,000 – 7,475	65
	NBENTR[6]	1	264		939	1,208	40
	NBFR[4]	3	282		2,044 – 2,060	2,965 – 3,074	40
R-2	SBFR	2 - 3	302	348	855 – 1,793	1,099 – 2,307	40
	SBML	5 – 6	178		4,552 – 5,491	5,831 – 7,039	65
	NBML	3 – 4	93		3,889 – 5,817	5,000 – 7,475	65
	NBFR	3	23		2,044 – 2,060	2,965 – 3,074	40
R-3	SBFR	2 - 3	162	494	855 – 1,793	1,099 – 2,307	40
	SBEXR[7]	1	202		1,928	2,475	40
	SBML	5 – 6	247		4,552 – 5,491	5,831 – 7,039	65
	NBML	3 – 4	319		3,889 – 5,817	5,000 – 7,475	65
	NBFR	3	432		2,044 – 2,060	2,965 – 3,074	40
I-20 at Mansfield Highway Intersection							
R-1	WBFR[4]	2 – 4	45	586	870 – 1,450	1,130 – 1,870	2.5 - 40
	SBDC[8]	2	115		1,890	2,400	40
	WBML[5]	5	194		4,880	6,260	65
	EBML[5]	4 – 6	277		5,310 – 7,300	6,830 – 9,380	65
	NBDC[8]-2	1	407		150	190	40
	EBFR[4]	2 – 3	458		380 – 1,500	490 – 1,960	2.5 – 40
	SB Mansfield Highway	2 – 3	58		500 – 1,180	670 – 1,550	2.5 – 40
R-2	WB U-Turn	2	29	610	60	80	40
	WBFR	2 – 4	75		870 – 1,450	1,130 – 1,870	2.5 - 40
	SBDC	2	135		1,890	2,400	40
	WBML	5	167		4,880	6,260	65
	EBML	4 – 6	253		5,310 – 7,300	6,830 – 9,380	65
	NBDC	2	347		1,850 – 2,000	2,370 – 2,550	40
	EBEXR[7]	1	426		390	500	40
	EBFR	2 – 3	445		380 – 1,500	490 – 1,960	2.5 – 40
	EB U-Turn	2	543		60	80	40

Table 5: Modeled Roadway Information

Receptor	Modeled Roadway	Number of Lanes	Receptor Distance from Roadway (feet)	ROW Width (feet)	2028 DHV[1] (ETC[2] Year)	2045 DHV (Design Year)	Speed (mph[3])
	SB Mansfield Highway	2 – 3	631		500 – 1,180	670 – 1,550	2.5 – 40
R-3	WB U-Turn	2	453	521	60	80	40
	WBFR	2 – 4	403		870 – 1,450	1,130 – 1,870	2.5 - 40
	SBDC	2	362		1,890	2,400	40
	WBML	5	289		4,880	6,260	65
	EBML	4 – 6	203		5,310 – 7,300	6,830 – 9,380	65
	NBDC	2	162		150	190	40
	EBEXR	1	129		390	500	40
	EBFR	2 – 3	87		380 – 1,500	490 – 1,960	2.5 – 40
	EB U-Turn	2	30		60	80	40
	SB Mansfield Highway	2 – 3	965		500 – 1,180	670 – 1,550	2.5 – 40
R-4	WBFR	2 – 4	498	604	870 – 1,450	1,130 – 1,870	2.5 - 40
	SBDC	2	445		1,890	2,400	40
	WBML	5	299		4,880	6,260	65
	EBML	4 – 6	213		5,310 – 7,300	6,830 – 9,380	65
	NBDC-2	1	119		150	190	40
	EBFR	2 – 3	55		380 – 1,500	490 – 1,960	2.5 – 40
	NB Mansfield Highway	2 – 3	47		290 – 940	390 – 1,240	2.5 – 40
I-20 at Bowman Springs Road Intersection							
R-1	WBFR	2 – 3	22	584	770 - 1070	960 – 1,340	2.5 – 40
	WBCD[9]	4	113		3,510	4,500	40
	WBML	6	223		5,460	7,000	65
	EBML	4 – 5	326		3,720 – 6,200	4.790 – 7,990	65
	EBCD[9]	4	448		2,380	3,040	40
	EBFR	2 – 3	519		10 – 1,220	20 – 1,590	2.5 - 40
	NB Bowman Springs Road	1	1,331		50 – 190	60 - 240	2.5 - 30
R-2	WBFR	2 – 3	27	913	770 - 1070	960 – 1,340	2.5 – 40
	WBCD	4	251		3,510	4,500	40
	WBML	6	331		5,460	7,000	65
	EBML	4 – 5	452		3,720 – 6,200	4.790 – 7,990	65
	EBDC[8]	2	509		2,490	3,200	40
	EBCD	4	576		2,380	3,040	40
	EBFR By-Pass	1	640		1,030	1,340	40
	EBFR	2 – 3	836		10 – 1,220	20 – 1,590	2.5 - 40

Table 5: Modeled Roadway Information

Receptor	Modeled Roadway	Number of Lanes	Receptor Distance from Roadway (feet)	ROW Width (feet)	2028 DHV[1] (ETC[2] Year)	2045 DHV (Design Year)	Speed (mph[3])
	SB Bowman Springs Road	2	34		110 – 300	140 - 390	2.5 - 30
R-3	WBFR	2 – 3	29	534	770 - 1070	960 – 1,340	2.5 – 40
	WBCD	4	65		3,510	4,500	40
	WBML	6	164		5,460	7,000	65
	EBML	4 – 5	268		3,720 – 6,200	4.790 – 7,990	65
	EBDC	2	343		2,490	3,200	40
	EBCD	4	389		2,380	3,040	40
	EBFR By-Pass	1	466		1,030	1,340	40
	EBFR	2 – 3	493		10 – 1,220	20 – 1,590	2.5 - 40
	SB Bowman Springs Road	2	857		110 – 300	140 - 390	2.5 - 30
R-4	WBFR	2 – 3	483	538	770 - 1070	960 – 1,340	2.5 – 40
	WBCD	4	406		3,510	4,500	40
	WBML	6	287		5,460	7,000	65
	EBML	4 – 5	206		3,720 – 6,200	4.790 – 7,990	65
	EBDC	2	164		2,490	3,200	40
	EBCD	4	79		2,380	3,040	40
	EBFR By-Pass	1	57		1,030	1,340	40
	EBFR	2 – 3	29		10 – 1,220	20 – 1,590	2.5 - 40
	SB Bowman Springs Road	2	849		110 – 300	140 - 390	2.5 - 30
R-5	WBFR	2 – 3	832	910	770 - 1070	960 – 1,340	2.5 – 40
	WBCD	4	587		3,510	4,500	40
	WBML	6	465		5,460	7,000	65
	EBML	4 – 5	367		3,720 – 6,200	4.790 – 7,990	65
	EBCD	4	262		2,380	3,040	40
	EBFR By-Pass	1	235		1,030	1,340	40
	EBFR	2 – 3	22		10 – 1,220	20 – 1,590	2.5 - 40
	NB Bowman Springs Road	1	37		50 – 190	60 - 240	2.5 - 30
R-6	WBFR	2 – 3	520	569	770 - 1070	960 – 1,340	2.5 – 40
	WBCD	4	431		3,510	4,500	40
	WBML	6	278		5,460	7,000	65
	EBML	4 – 5	176		3,720 – 6,200	4.790 – 7,990	65
	EBCD	4	79		2,380	3,040	40
	EBFR	2 – 3	29		10 – 1,220	20 – 1,590	2.5 - 40

Table 5: Modeled Roadway Information

Receptor	Modeled Roadway	Number of Lanes	Receptor Distance from Roadway (feet)	ROW Width (feet)	2028 DHV[1] (ETC[2] Year)	2045 DHV (Design Year)	Speed (mph[3])
	NB Bowman Springs Road	1	1,621		50 – 190	60 - 240	2.5 - 30
I-20 at Green Oaks Boulevard Intersection							
R-1	WBFR	3 – 4	18	563	810 – 1,970	1,020 – 2,520	2.5 - 40
	WBML	5 – 6	219		6,450 – 7,490	8,270 – 9,620	65
	EBML	5 – 6	297		6,400 – 6,890	8,240 – 8,880	65
	EBFR	2 – 3	484		730 – 1,880	930 – 2,410	2.5 - 40
	NB Green Oaks Blvd.	3	2,282		710 – 1,370	900 – 1,770	2.5 - 30
R-2	WBFR	3 – 4	77	656	810 – 1,970	1,020 – 2,520	2.5 - 40
	WBML	5 – 6	223		6,450 – 7,490	8,270 – 9,620	65
	EBML	5 – 6	329		6,400 – 6,890	8,240 – 8,880	65
	EBFR	2 – 3	521		730 – 1,880	930 – 2,410	2.5 - 40
	NB Green Oaks Blvd.	3	73		710 – 1,370	900 – 1,770	2.5 - 30
R-3	WBFR	3 – 4	24	515	810 – 1,970	1,020 – 2,520	2.5 - 40
	WBENTR[6]	1	102		560	720	40
	WBML	5 – 6	161		6,450 – 7,490	8,270 – 9,620	65
	EBML	5 – 6	259		6,400 – 6,890	8,240 – 8,880	65
	EBEXR	1	418		500	640	40
	EBFR	2 – 3	462		730 – 1,880	930 – 2,410	2.5 - 40
	SB Green Oaks Blvd.	2 – 3	777		600 – 1,420	730 – 1,780	2.5 – 30
R-4	WBFR	3 – 4	453	519	810 – 1,970	1,020 – 2,520	2.5 - 40
	WBENTR	1	377		560	720	40
	WBML	5 – 6	271		6,450 – 7,490	8,270 – 9,620	65
	EBML	5 – 6	167		6,400 – 6,890	8,240 – 8,880	65
	EBEXR	1	83		500	640	40
	EBFR	2 – 3	11		730 – 1,880	930 – 2,410	2.5 - 40
	SB Green Oaks Blvd.	2 – 3	694		600 – 1,420	730 – 1,780	2.5 – 30
R-5	WBFR	3 – 4	519	613	810 – 1,970	1,020 – 2,520	2.5 - 40
	WBENTR	1	493		560	720	40
	WBML	5 – 6	313		6,450 – 7,490	8,270 – 9,620	65
	EBML	5 – 6	211		6,400 – 6,890	8,240 – 8,880	65

Table 5: Modeled Roadway Information

Receptor	Modeled Roadway	Number of Lanes	Receptor Distance from Roadway (feet)	ROW Width (feet)	2028 DHV[1] (ETC[2] Year)	2045 DHV (Design Year)	Speed (mph[3])
	EBFR	2 – 3	42		730 – 1,880	930 – 2,410	2.5 - 40
	SB Green Oaks Blvd.	2 – 3	43		600 – 1,420	730 – 1,780	2.5 – 30
R-6	WBFR	3 – 4	504	591	810 – 1,970	1,020 – 2,520	2.5 - 40
	WBML	5 – 6	289		6,450 – 7,490	8,270 – 9,620	65
	EBML	5 – 6	199		6,400 – 6,890	8,240 – 8,880	65
	EBFR	2 – 3	41		730 – 1,880	930 – 2,410	2.5 - 40
	NB Green Oaks Blvd.	3	2,447		710 – 1,370	900 – 1,770	2.5 - 30
US 287at Little Road Intersection and Mainlanes							
R-1	NBFR	1 – 3	30	695	132 – 1,746	165 – 2,241	2.5 - 40
	NBML	3 – 4	271		2,695 – 3,614	3,453 – 4,637	65
	SBML	3 – 4	372		2,478 – 3,356	3,162 – 4,287	40 - 65
	SBDC	1	445		878	1,125	40
	SBFR	2 – 4	628		682 – 2,246	922 – 2,881	2.5 - 40
	EB Little Road	3	144		1,144 – 2,451	1,581 – 3,259	2.5 - 35
R-2	NBFR	1 – 3	11	389	132 – 1,746	165 – 2,241	2.5 - 40
	NBENTR	1	64		592	757	40
	NBML	3 – 4	109		2,695 – 3,614	3,453 – 4,637	65
	SBML	3 – 4	190		2,478 – 3,356	3,162 – 4,287	40 - 65
	SBEXR	1	307		765	980	40
	SBFR	2 – 4	324		682 – 2,246	922 – 2,881	2.5 - 40
R-3	NBFR	1 – 3	24	400	132 – 1,746	165 – 2,241	2.5 - 40
	NBML	3 – 4	124		2,695 – 3,614	3,453 – 4,637	65
	SBML	3 – 4	196		2,478 – 3,356	3,162 – 4,287	40 - 65
	SBFR	2 – 4	322		682 – 2,246	922 – 2,881	2.5 - 40
R-4	NBDC	1	841	1,088	920	1,183	40
	NBML	3 – 4	710		2,695 – 3,614	3,453 – 4,637	65
	SBML	3 – 4	441		2,478 – 3,356	3,162 – 4,287	40 - 65
	SBDC	1	470		878	1,125	40
	SBFR	2 – 4	25		682 – 2,246	922 – 2,881	2.5 - 40
	WB Little Road	3	688		700 – 1,200	931 – 1,571	2.5 - 35

Table 5: Modeled Roadway Information

Receptor	Modeled Roadway	Number of Lanes	Receptor Distance from Roadway (feet)	ROW Width (feet)	2028 DHV[1] (ETC[2] Year)	2045 DHV (Design Year)	Speed (mph[3])
R-5	NBFR	1 – 3	589	672	132 – 1,746	165 – 2,241	2.5 - 40
	NBML	3 – 4	350		2,695 – 3,614	3,453 – 4,637	65
	SBML	3 – 4	281		2,478 – 3,356	3,162 – 4,287	40 - 65
	SBDC	1	247		878	1,125	40
	SBFR	2 – 4	44		682 – 2,246	922 – 2,881	2.5 - 40
	EB Little Road	3	195		1,144 – 2,451	1,581 – 3,259	2.5 - 35
R-6	NBFR	1 – 3	408	485	132 – 1,746	165 – 2,241	2.5 - 40
	NBML	3 – 4	295		2,695 – 3,614	3,453 – 4,637	65
	SBML	3 – 4	198		2,478 – 3,356	3,162 – 4,287	40 - 65
	SBFR	2 – 4	47		682 – 2,246	922 – 2,881	2.5 - 40
R-7	NBFR	1 – 3	341	410	132 – 1,746	165 – 2,241	2.5 - 40
	NBENTR	1	319		592	757	40
	NBML	3 – 4	229		2,695 – 3,614	3,453 – 4,637	65
	SBML	3 – 4	133		2,478 – 3,356	3,162 – 4,287	40 - 65
	SBFR	2 – 4	39		682 – 2,246	922 – 2,881	2.5 - 40
US 287 at Village Creek Road Intersection							
R-1	NBFR	2 – 3	29	365	367 – 1,183	466 – 1,513	2.5 - 40
	NBENTR	1	73		542	698	40
	NBML	3 – 4	125		2,859 – 3,400	3,667 – 4,365	65
	SBML	3 – 4	184		2,960 – 3,439	3,793 – 4,404	65
	SBEXR	1	276		389	504	40
	SBFR	2 – 3	310		429 – 1,236	553 – 1,591	2.5 - 40
R-2	NBFR	2 – 3	20	352	367 – 1,183	466 – 1,513	2.5 - 40
	NBENTR	1	58		542	698	40
	NBML	3 – 4	113		2,859 – 3,400	3,667 – 4,365	65
	SBML	3 – 4	174		2,960 – 3,439	3,793 – 4,404	65
	SBFR	2 – 3	287		429 – 1,236	553 – 1,591	2.5 - 40
R-3	NBFR	2 – 3	27	358	367 – 1,183	466 – 1,513	2.5 - 40
	NBML	3 – 4	108		2,859 – 3,400	3,667 – 4,365	65
	SBML	3 – 4	181		2,960 – 3,439	3,793 – 4,404	65
	SBENTR[6]	1	263		479	611	40

Table 5: Modeled Roadway Information

Receptor	Modeled Roadway	Number of Lanes	Receptor Distance from Roadway (feet)	ROW Width (feet)	2028 DHV[1] (ETC[2] Year)	2045 DHV (Design Year)	Speed (mph[3])
	SBFR	2 – 3	295		429 – 1,236	553 – 1,591	2.5 - 40
R-4	NBFR	2 – 3	309	362	367 – 1,183	466 – 1,513	2.5 - 40
	NBENTR	1	279		542	698	40
	NBML	3 – 4	187		2,859 – 3,400	3,667 – 4,365	65
	SBML	3 – 4	127		2,960 – 3,439	3,793 – 4,404	65
	SBFR	2 – 3	32		429 – 1,236	553 – 1,591	2.5 - 40
R-5	NBFR	2 – 3	56	830	367 – 1,183	466 – 1,513	2.5 - 40
	NBEXR[7]	1	251		479	611	40
	NBML	3 – 4	276		2,859 – 3,400	3,667 – 4,365	65
	SBML	3 – 4	335		2,960 – 3,439	3,793 – 4,404	65
	SBFR	2 – 3	544		429 – 1,236	553 – 1,591	2.5 - 40
	EB Village Creek Rd.	2	82		186 - 278	252 - 369	2.5 - 30
R-6	NBFR	2 – 3	468	573	367 – 1,183	466 – 1,513	2.5 - 40
	NBEXR	1	350		479	611	40
	NBML	3 – 4	268		2,859 – 3,400	3,667 – 4,365	65
	SBML	3 – 4	222		2,960 – 3,439	3,793 – 4,404	65
	SBENTR	1	188		479	611	40
	SBFR	2 – 3	13		429 – 1,236	553 – 1,591	2.5 - 40
	WB Village Creek Rd.	2	172		519 – 560	660 - 708	2.5 - 30
US 287 at Miller Avenue & Wilbarger Street Intersection							
R-1	SBFR	3	302	353	847	1086	40
	SBML	3 – 4	109		2,960 – 3,349	3,793 – 4,297	65
	NBML	3	186		3,400	4,365	65
	NBFR	2	508		642	815	40
	EB Wilbarger St.	1 – 2	90		177 – 810	243 – 1,057	2.5 - 30
	SB Miller Ave.	2	92		643 – 1,133	825 - 1455	2.5 - 40
R-2	SBFR	3	513	353	847	1086	40
	SBML	3 – 4	184		2,960 – 3,349	3,793 – 4,297	65
	NBML	3	100		3,400	4,365	65
	NBFR	2	322		642	815	40
	WB Wilbarger St.	1 – 2	94		276 – 900	359 – 1164	2.5 - 30
	NB Miller Ave.	2	91		603 – 1,135	776 - 1465	2.5 - 40
R-3	SBFR	3	513	897	847	1086	40
	SBML	3 – 4	184		2,960 – 3,349	3,793 – 4,297	65
	NBML	3	100		3,400	4,365	65

Table 5: Modeled Roadway Information

Receptor	Modeled Roadway	Number of Lanes	Receptor Distance from Roadway (feet)	ROW Width (feet)	2028 DHV[1] (ETC[2] Year)	2045 DHV (Design Year)	Speed (mph[3])
	NBFR	2	322		642	815	40
	EB Wilbarger St.	1 – 2	94		177 – 810	243 – 1,057	2.5 - 30
	NB Miller Ave.	2	91		603 – 1,135	776 - 1465	2.5 - 40

Source: Projected TPP-approved traffic diagrams and Study Team, September 2018.
[1] DHV – Design Hour Volume.
[2] ETC – Estimated Time Completion
[3] mph – miles per hour
[4] SBFR, NBFR, WBFR, EBFR – Southbound Frontage Road, Northbound Frontage Road, Westbound Frontage Road, Eastbound Frontage Road.
[5] SBML, NBML, WBML, EBML – Southbound Mainlane, Northbound Mainlane, Westbound Mainlane, Eastbound Mainlane
[6] NBENTR, WBENTR, SBENTR – Northbound Entrance Ramp, Westbound Entrance Ramp, Southbound Entrance Ramp
[7] SBEXR, EBEXR, NBEXR – Southbound Exit Ramp, Eastbound Exit Ramp, Northbound Exit Ramp
[8] SBDC, NBDC, EBDC – Southbound Direct Connector, Northbound Direct Connector, Eastbound Direct Connector
[9] WBCD, EBCD – Westbound Collector-Distributor, Eastbound Collector-Distributor

The receptor locations on aerial photographs are shown in **Appendix A.**

5. ANALYSIS RESULTS

Table 6 shows the 2028 and 2045 one-hour and eight-hour CO concentrations, and their corresponding percentages of the NAAQS, at the 43 receptors along the project.

Table 6: Project Carbon Monoxide Concentrations

Year	Receptor	1-Hour CO Concentration*	1-Hour % NAAQS*	8-Hour CO Concentration	8-Hour % NAAQS
I-820 at Sun Valley Drive Intersection					
2028	R-1	2.0	5.7	1.6	17.9
	R-2	2.1	6.0	1.7	18.7
	R-3	2.1	6.0	1.7	18.7
	R-4	2.1	6.0	1.7	18.7
2045	R-1	1.9	5.4	1.5	17.1
	R-2	1.9	5.4	1.5	17.1
	R-3	1.9	5.4	1.5	17.1
	R-4	1.9	5.4	1.5	17.1
I-820 at Spur 303 Intersection					
2028	R-1	2.0	5.7	1.6	17.9
	R-2	2.0	5.7	1.6	17.9
	R-3	2.0	5.7	1.6	17.9
	R-4	2.0	5.7	1.6	17.9
2045	R-1	2.0	5.7	1.6	17.9
	R-2	2.0	5.7	1.6	17.9
	R-3	2.0	5.7	1.6	17.9
	R-4	1.9	5.4	1.5	17.1
I-820 from Meadowbrook Road to Brentwood Stair Road					
2028	R-1	2.0	5.7	1.6	17.9

Table 6: Project Carbon Monoxide Concentrations

Year	Receptor	1-Hour CO Concentration*	1-Hour % NAAQS*	8-Hour CO Concentration	8-Hour % NAAQS
	R-2	2.0	5.7	1.6	17.9
	R-3	1.9	5.4	1.5	17.1
2045	R-1	2.0	5.7	1.6	17.9
	R-2	1.9	5.4	1.5	17.1
	R-3	1.9	5.4	1.5	17.1
I-20 at Mansfield Highway Intersection					
2028	R-1	1.9	5.4	1.5	17.1
	R-2	1.9	5.4	1.5	17.1
	R-3	1.8	5.1	1.5	16.3
	R-4	1.9	5.4	1.5	17.1
2045	R-1	1.7	4.9	1.4	15.6
	R-2	1.8	5.1	1.5	16.3
	R-3	1.8	5.1	1.5	16.3
	R-4	1.7	4.9	1.4	15.6
I-20 at Bowman Springs Road Intersection					
2028	R-1	1.8	5.1	1.5	16.3
	R-2	1.9	5.4	1.5	17.1
	R-3	1.9	5.4	1.5	17.1
	R-4	1.9	5.4	1.5	17.1
	R-5	1.8	5.1	1.5	16.3
	R-6	1.9	5.4	1.5	17.1
2045	R-1	1.7	4.9	1.4	15.6
	R-2	1.7	4.9	1.4	15.6
	R-3	1.9	5.4	1.5	17.1
	R-4	1.8	5.1	1.5	16.3
	R-5	1.7	4.9	1.4	15.6
	R-6	1.8	5.1	1.5	16.3
I-20 at Green Oaks Boulevard Intersection					
2028	R-1	2.1	6.0	1.7	18.7
	R-2	1.9	5.4	1.5	17.1
	R-3	2.0	5.7	1.6	17.9
	R-4	1.9	5.4	1.5	17.1
	R-5	1.9	5.4	1.5	17.1
	R-6	2.0	5.7	1.6	17.9
2045	R-1	2.0	5.7	1.6	17.9
	R-2	1.9	5.4	1.5	17.1
	R-3	1.8	5.1	1.5	16.3
	R-4	1.9	5.4	1.5	17.1
	R-5	1.9	5.4	1.5	17.1
	R-6	1.8	5.1	1.5	16.3
US 287 at Wilbarger Street at Miller Avenue Intersection					
2025	R-1	1.9	5.4	1.5	17.1
	R-2	1.9	5.4	1.5	17.1
	R-3	1.9	5.4	1.5	17.1
2045	R-1	1.8	5.1	1.5	16.3
	R-2	1.8	5.1	1.5	16.3
	R-3	1.7	4.9	1.4	15.6
US 287 at Village Creek Road Intersection					
2028	R-1	1.8	5.1	1.5	16.3
	R-2	1.7	4.9	1.4	15.6
	R-3	1.7	4.9	1.4	15.6

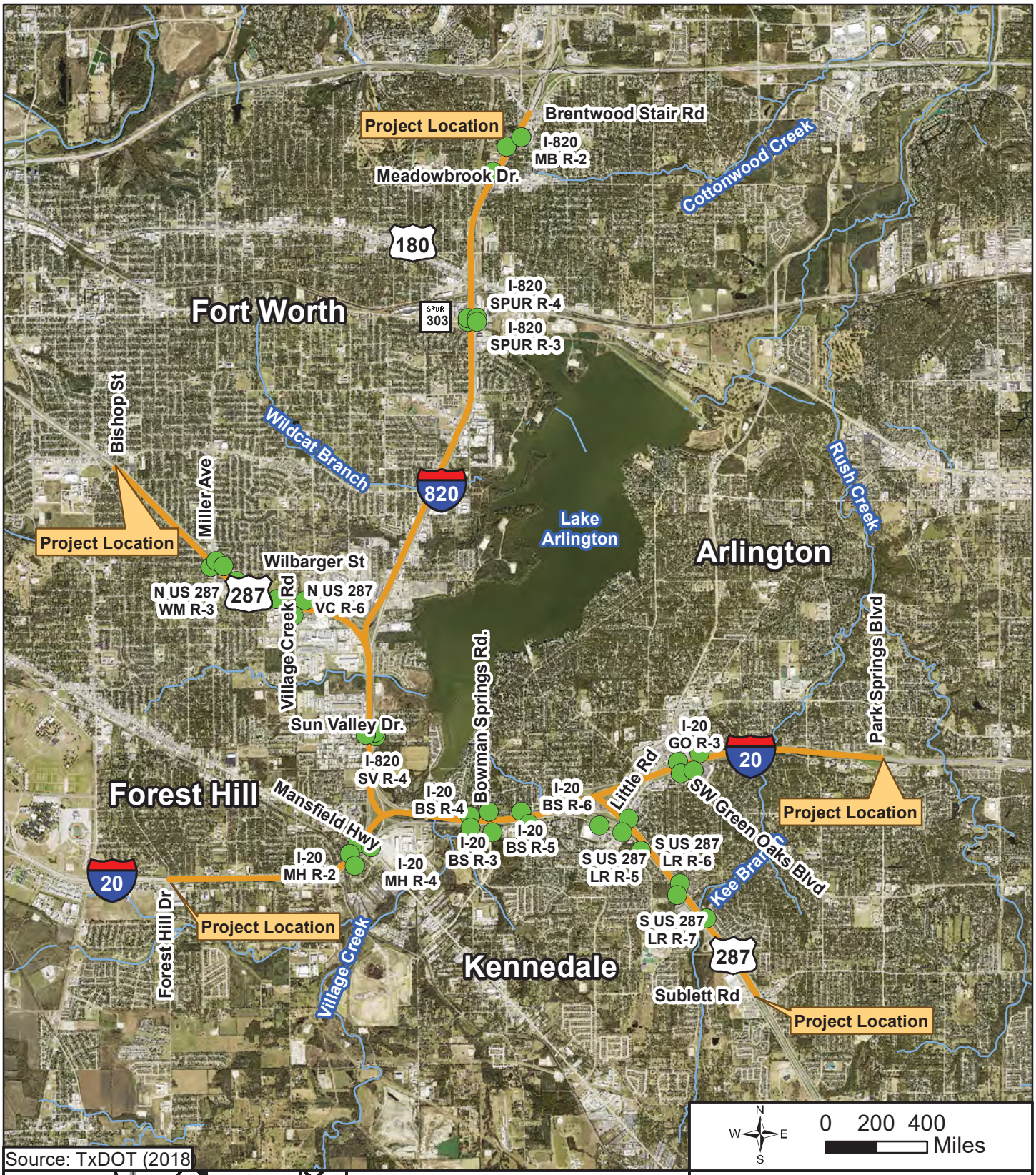
Table 6: Project Carbon Monoxide Concentrations

Year	Receptor	1-Hour CO Concentration*	1-Hour % NAAQS*	8-Hour CO Concentration	8-Hour % NAAQS
	R-4	1.7	4.9	1.4	15.6
	R-5	1.7	4.9	1.4	15.6
	R-6	1.7	4.9	1.4	15.6
2045	R-1	1.7	4.9	1.4	15.6
	R-2	1.7	4.9	1.4	15.6
	R-3	1.7	4.9	1.4	15.6
	R-4	1.7	4.9	1.4	15.6
	R-5	1.7	4.9	1.4	15.6
	R-6	1.7	4.9	1.4	15.6
US 287 at Little Road Intersection					
2028	R-1	1.7	4.9	1.4	15.6
	R-2	1.9	5.4	1.5	17.1
	R-3	2.0	5.7	1.6	17.9
	R-4	1.7	4.9	1.4	15.6
	R-5	1.7	4.9	1.4	15.6
	R-6	1.8	5.1	1.5	16.3
	R-7	2.0	5.7	1.6	17.9
2045	R-1	1.7	4.9	1.4	15.6
	R-2	1.8	5.1	1.5	16.3
	R-3	1.9	5.4	1.5	17.1
	R-4	1.7	4.9	1.4	15.6
	R-5	1.7	4.9	1.4	15.6
	R-6	1.7	4.9	1.4	15.6
	R-7	1.8	5.1	1.5	16.3

Source: Study Team, November 2019.
* The NAAQS for CO is 35 ppm for 1-hour and 9 ppm for 8-hours. Analysis includes a one-hour CO background concentration of 1.7 ppm and an 8-hour CO background concentration 1.4 ppm.

As shown in **Table 6**, none of the receptors approach the one-hour or eight-hour NAAQS of 35 ppm and 9 ppm, respectively. Local concentrations of CO are not expected to exceed national standards at any time. The CALINE3 output files are located in **Appendix D**.

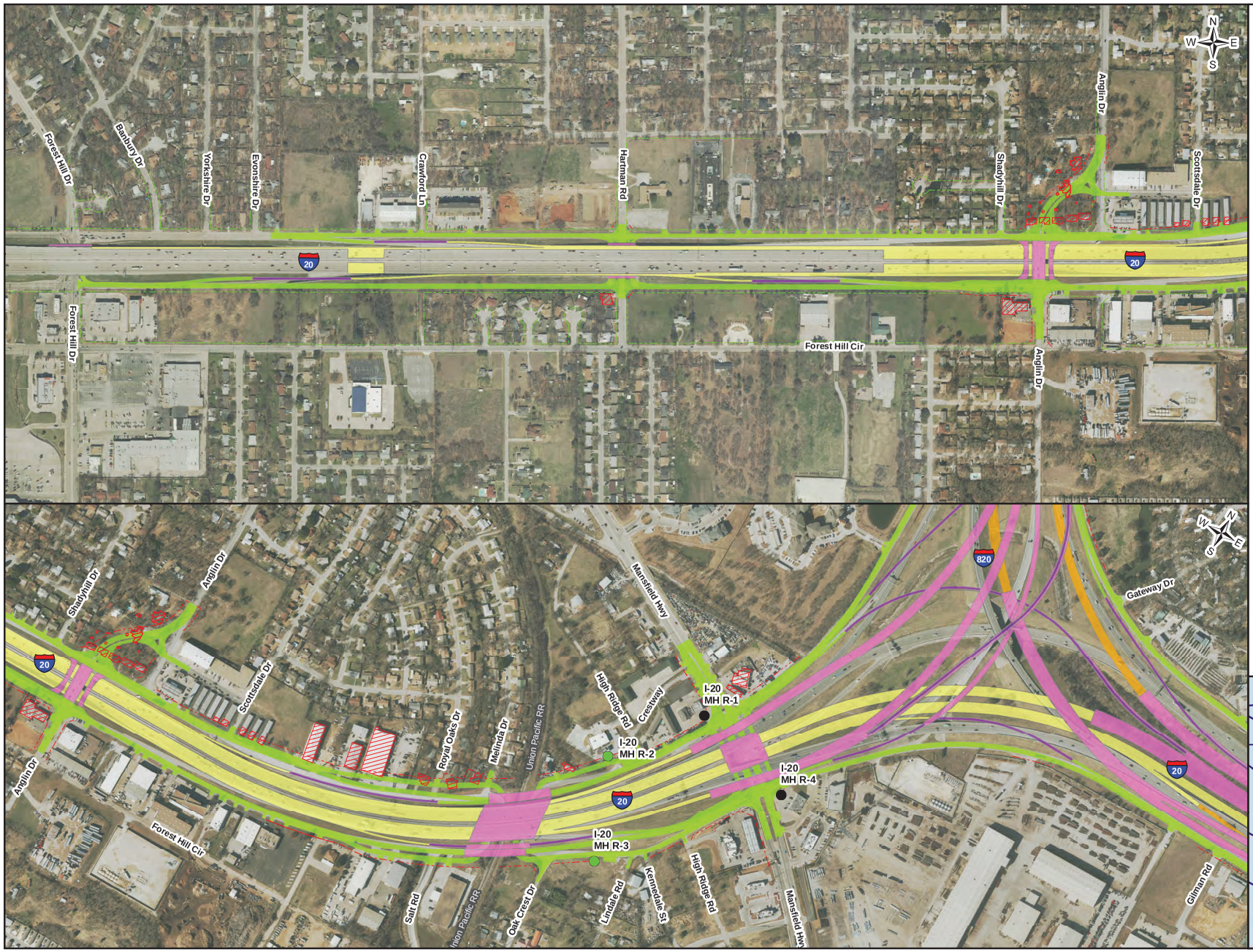
Appendix A:
Overview Map
CO Receptor Location Map



OVERVIEW MAP
SOUTHEAST CONNECTOR

I-20/I-820/US 287 Interchanges
I-20 from Forest Hill Drive to
Park Springs Boulevard
I-820 from I-20 to
Brentwood Stair Road
US 287 from Bishop Street
to Sublet Road

CSJ's:0008-13-125, ect.



CO RECEPTOR LOCATION MAP SOUTHEAST CONNECTOR

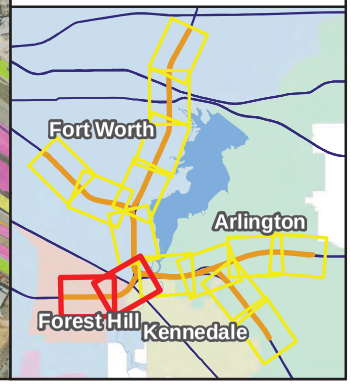
I-20/I-820/US 287 Interchanges
I-20 from Forest Hill Drive to
Park Springs Boulevard
I-820 from I-20 to
Brentwood Stair Road
US 287 from Bishop Street
to Sublett Road

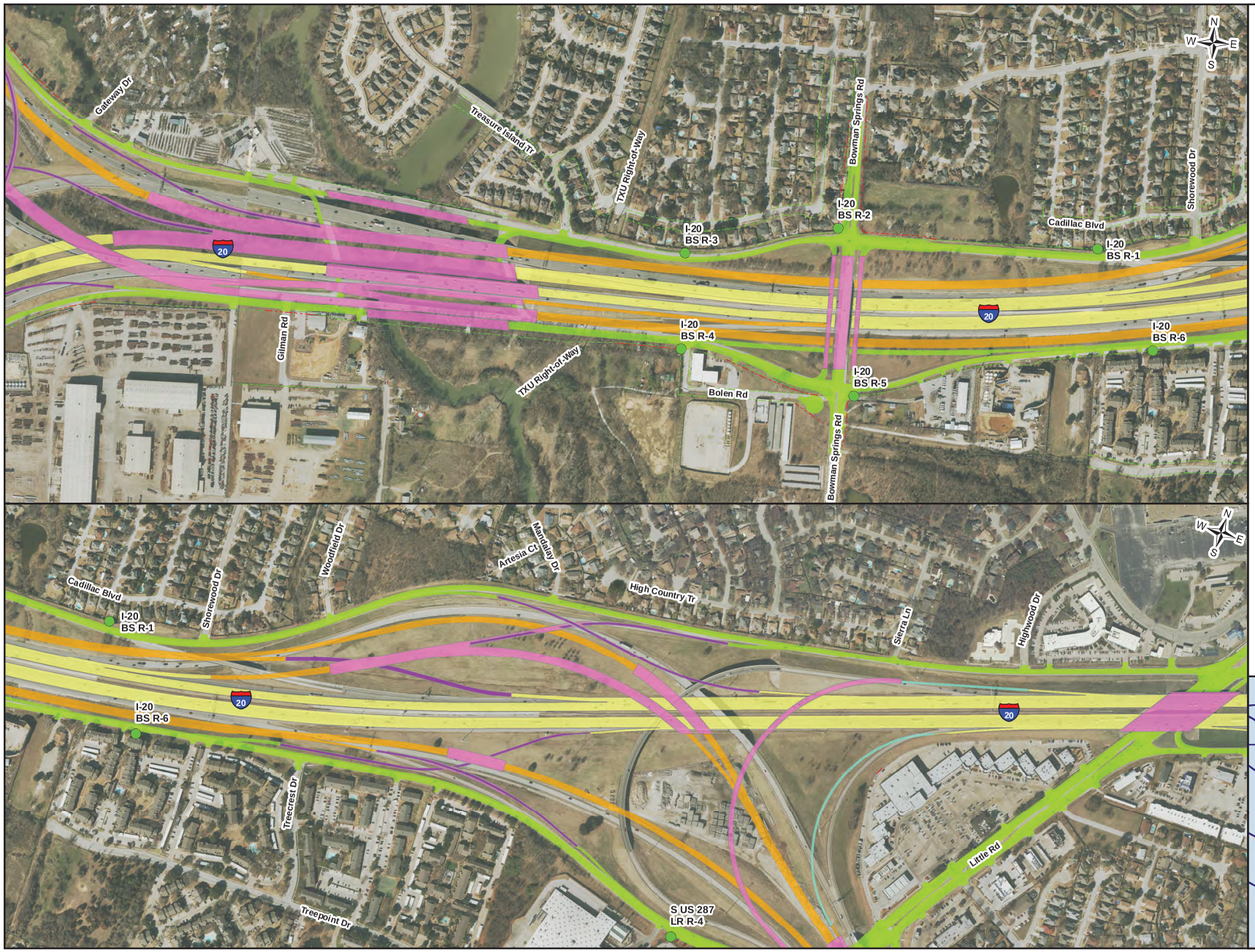
CSJ: 0008-13-125, ect.

LEGEND

- CO Receptor
- General Purpose Lanes (GP Lanes)
- Collector/Distributors (C-D)
- Frontage Roads/ U-Turns/City Streets
- Ramps
- Direct Connectors (DC)
- Bridge
- Existing Right-of-Way (R.O.W.)
- Proposed Right-of-Way (R.O.W.)
- Potential Displacements

0 250 500 Feet





CO RECEPTOR LOCATION MAP SOUTHEAST CONNECTOR

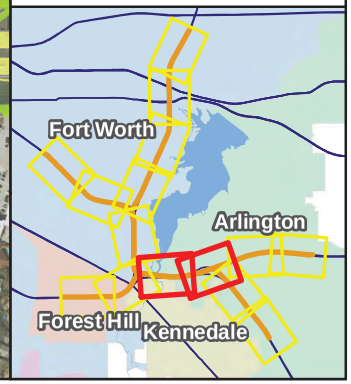
I-20/I-820/US 287 Interchanges
I-20 from Forest Hill Drive to
Park Springs Boulevard
I-820 from I-20 to
Brentwood Stair Road
US 287 from Bishop Street
to Sublett Road

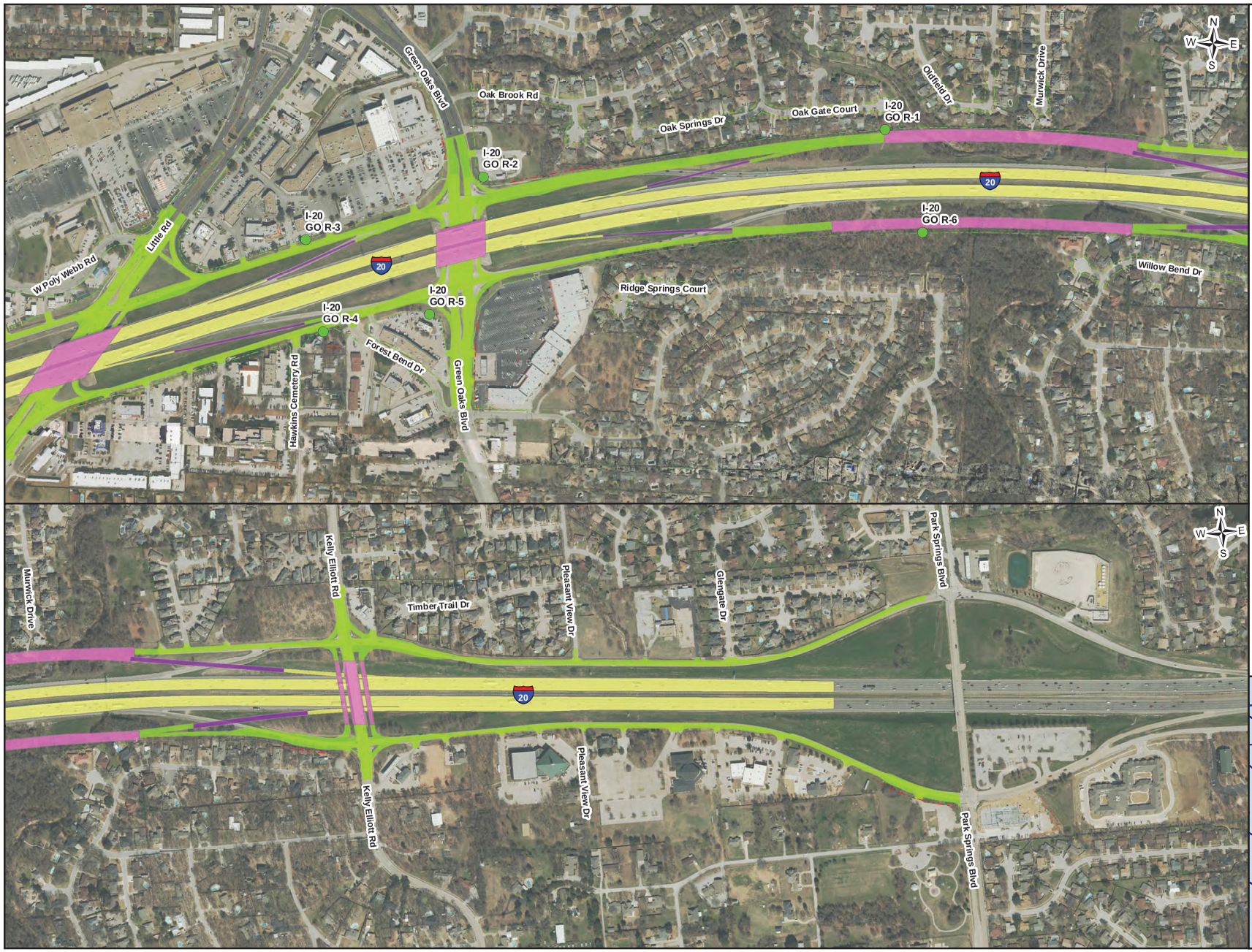
CSJ: 0008-13-125, ect.

LEGEND

- CO Receptor
- General Purpose Lanes (GP Lanes)
- Collector/Distributors (C-D)
- Frontage Roads/ U-Turns/City Streets
- Ramps
- Direct Connectors (DC)
- Bridge
- Existing Right-of-Way (R.O.W.)
- Proposed Right-of-Way (R.O.W.)
- Potential Displacements

0 250 500 Feet





CO RECEPTOR LOCATION MAP SOUTHEAST CONNECTOR

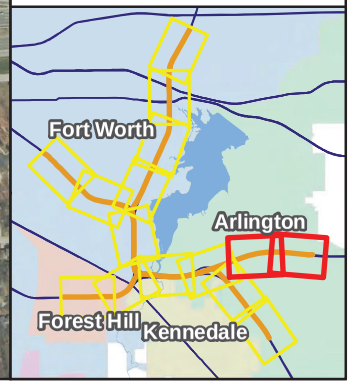
I-20/I-820/US 287 Interchanges
I-20 from Forest Hill Drive to
Park Springs Boulevard
I-820 from I-20 to
Brentwood Stair Road
US 287 from Bishop Street
to Sublett Road

CSJ: 0008-13-125, ect.

LEGEND

- CO Receptor
- General Purpose Lanes (GP Lanes)
- Collector/Distributors (C-D)
- Frontage Roads/ U-Turns/City Streets
- Ramps
- Direct Connectors (DC)
- Bridge
- Existing Right-of-Way (R.O.W.)
- Proposed Right-of-Way (R.O.W.)
- Potential Displacements

0 250 500 Feet



CO RECEPTOR LOCATION MAP SOUTHEAST CONNECTOR

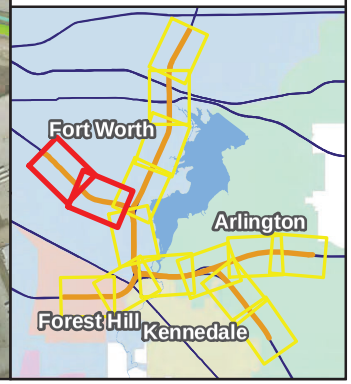
I-20/I-820/US 287 Interchanges
I-20 from Forest Hill Drive to
Park Springs Boulevard
I-820 from I-20 to
Brentwood Stair Road
US 287 from Bishop Street
to Sublett Road

CSJ: 0008-13-125, ect.

LEGEND

- CO Receptor
- General Purpose Lanes (GP Lanes)
- Collector/Distributors (C-D)
- Frontage Roads/ U-Turns/City Streets
- Ramps
- Direct Connectors (DC)
- Bridge
- Existing Right-of-Way (R.O.W.)
- Proposed Right-of-Way (R.O.W.)
- Potential Displacements

0 250 500 Feet



CO RECEPTOR LOCATION MAP SOUTHEAST CONNECTOR

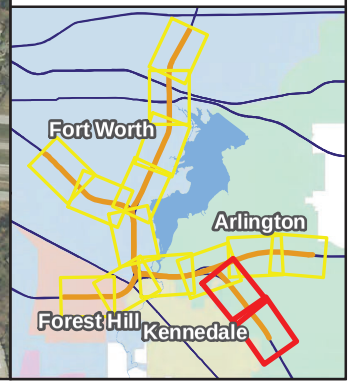
I-20/I-820/US 287 Interchanges
I-20 from Forest Hill Drive to
Park Springs Boulevard
I-820 from I-20 to
Brentwood Stair Road
US 287 from Bishop Street
to Sublett Road

CSJ: 0008-13-125, ect.

LEGEND

- CO Receptor
- General Purpose Lanes (GP Lanes)
- Collector/Distributors (C-D)
- Frontage Roads/ U-Turns/City Streets
- Ramps
- Direct Connectors (DC)
- Bridge
- Existing Right-of-Way (R.O.W.)
- Proposed Right-of-Way (R.O.W.)
- Potential Displacements

0 250 500 Feet



CO RECEPTOR LOCATION MAP SOUTHEAST CONNECTOR

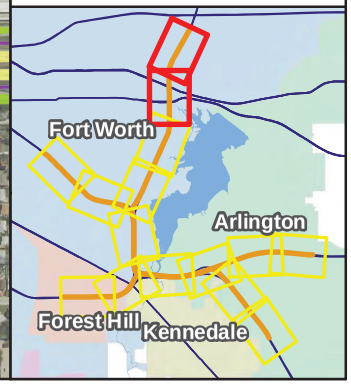
I-20/I-820/US 287 Interchanges
I-20 from Forest Hill Drive to
Park Springs Boulevard
I-820 from I-20 to
Brentwood Stair Road
US 287 from Bishop Street
to Sublett Road

CSJ: 0008-13-125, ect.

LEGEND

- CO Receptor
- General Purpose Lanes (GP Lanes)
- Collector/Distributors (C-D)
- Frontage Roads/ U-Turns/City Streets
- Ramps
- Direct Connectors (DC)
- Bridge
- Existing Right-of-Way (R.O.W.)
- Proposed Right-of-Way (R.O.W.)
- Potential Displacements

0 250 500 Feet



CO RECEPTOR LOCATION MAP SOUTHEAST CONNECTOR

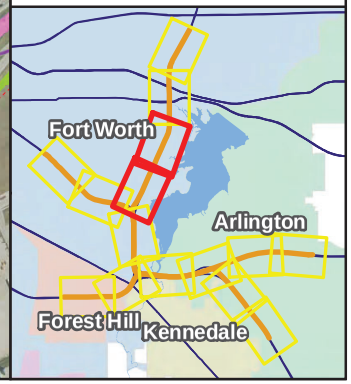
I-20/I-820/US 287 Interchanges
I-20 from Forest Hill Drive to
Park Springs Boulevard
I-820 from I-20 to
Brentwood Stair Road
US 287 from Bishop Street
to Sublett Road

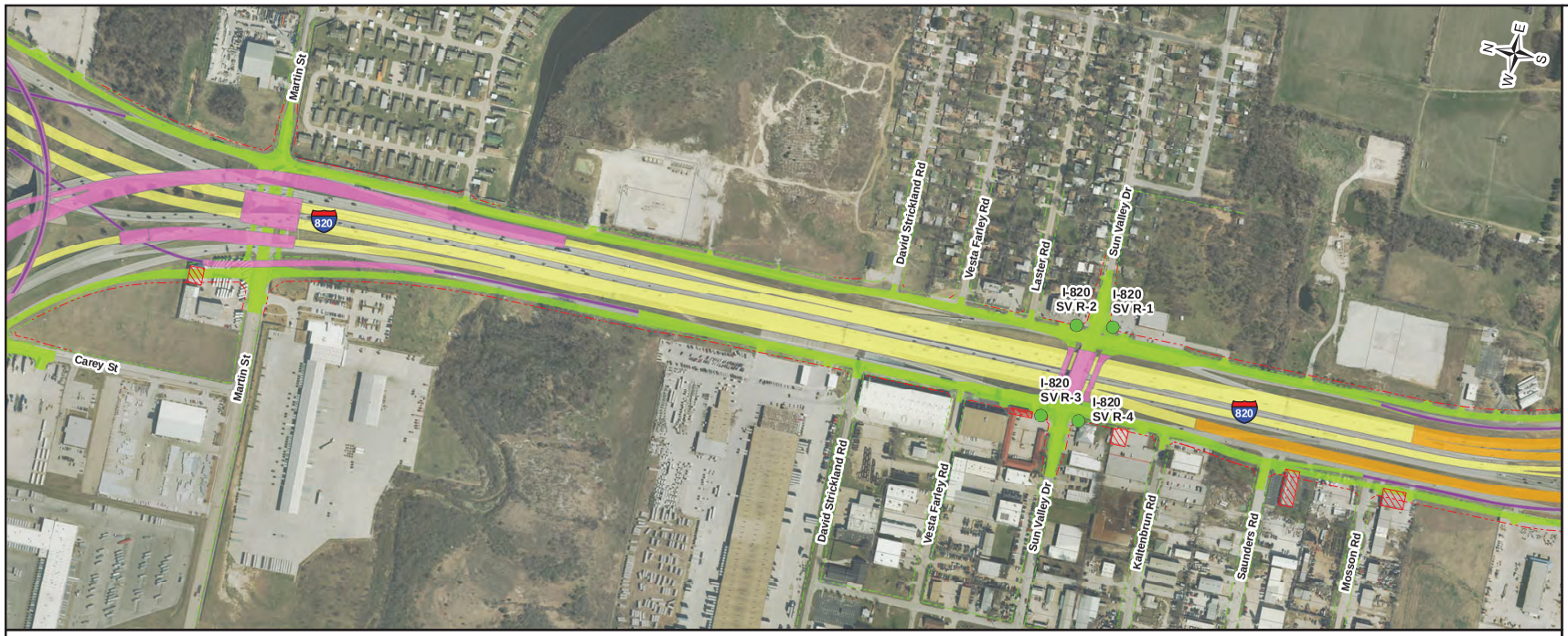
CSJ: 0008-13-125, ect.

LEGEND

- CO Receptor
- General Purpose Lanes (GP Lanes)
- Collector/Distributors (C-D)
- Frontage Roads/ U-Turns/City Streets
- Ramps
- Direct Connectors (DC)
- Bridge
- Existing Right-of-Way (R.O.W.)
- Proposed Right-of-Way (R.O.W.)
- Potential Displacements

0 250 500 Feet





CO RECEPTOR LOCATION MAP SOUTHEAST CONNECTOR

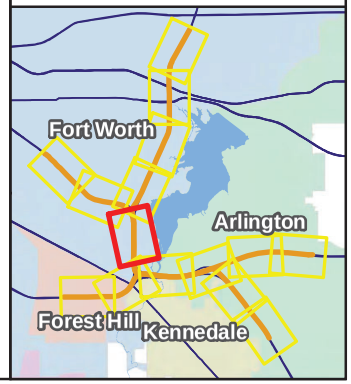
I-20/I-820/US 287 Interchanges
I-20 from Forest Hill Drive to
Park Springs Boulevard
I-820 from I-20 to
Brentwood Stair Road
US 287 from Bishop Street
to Sublett Road

CSJ: 0008-13-125, ect.

LEGEND

- CO Receptor
- General Purpose Lanes (GP Lanes)
- Collector/Distributors (C-D)
- Frontage Roads/ U-Turns/City Streets
- Ramps
- Direct Connectors (DC)
- Bridge
- Existing Right-of-Way (R.O.W.)
- Proposed Right-of-Way (R.O.W.)
- Potential Displacements

0 250 500 Feet



Appendix B:
TxDOT Transportation Planning and Programming Division Approved Traffic (August 2019)

Texas Department of Transportation

MEMO

August 20, 2019

To: Loyl C. Bussell, P.E., District Engineer
Attention: Ricardo Gonzalez, P.E., Director of TPD

Through: William E. Knowles, P.E.
Traffic Analysis Section Director, TPP

From: Gabe Contreras
Planner, TPP

Subject: Traffic Data
CSJ: 0008-13-125
I-820:
From I-20 to Brentwood Stair Rd.

CSJ: 2374-05-066
I-20:
From I-20/I-820 Interchange
To Park Springs Blvd.

CSJ: 0008-13-206
I-20:
From I-20/I-820 Interchange
To Forest Hill Dr.

CSJ: 0172-06-080
US 287:
From I-820
To Bishop St.

CSJ: 0172-09-028
US 287:
From I-20
To Sublett Rd.

Tarrant County

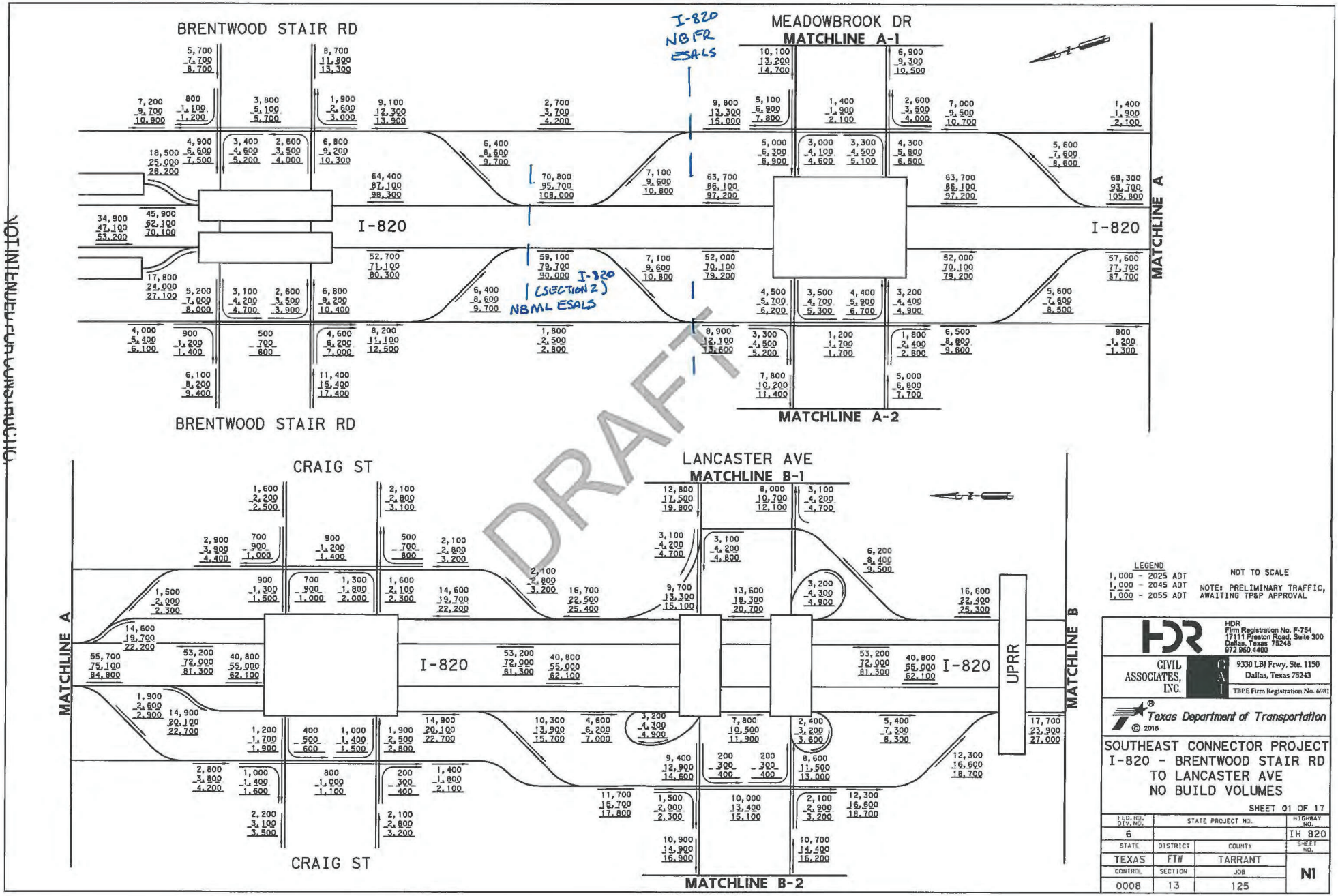
Attached are consultant provided diagrams depicting 2025, 2045 and 2055 average daily traffic volumes and turning movements on the Southeast Connector along I-820, I-20, and US 287 for no build and build conditions. Also attached are tabulations showing traffic analysis for highway design for the 2025 to 2045 twenty year period and 2025 to 2055 thirty year period for the described limits of the route. Also included are tabulations showing data for use in air and noise analysis.

Please refer to your original request dated January 16, 2019.

If you have any questions or need additional information, please contact Gabe Contreras at (512) 486-5180.

Attachments

CC: Curtis Loftis, P.E., Transportation Engineer, Fort Worth District
Design Division



LEGEND
1,000 - 2025 ADT
1,000 - 2045 ADT
1,000 - 2055 ADT

NOT TO SCALE

NOTE: PRELIMINARY TRAFFIC, AWAITING TP&P APPROVAL

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SOUTHEAST CONNECTOR PROJECT
I-820 - BRENTWOOD STAIR RD TO LANCASTER AVE
NO BUILD VOLUMES

SHEET 01 OF 17

FED. RD. DIV. NO.	STATE PROJECT NO.		HIGHWAY NO.
6			IH 820
STATE	DISTRICT	COUNTY	SHEET NO.
TEXAS	FTW	TARRANT	N1
CONTROL	SECTION	JOB	
0008	13	125	

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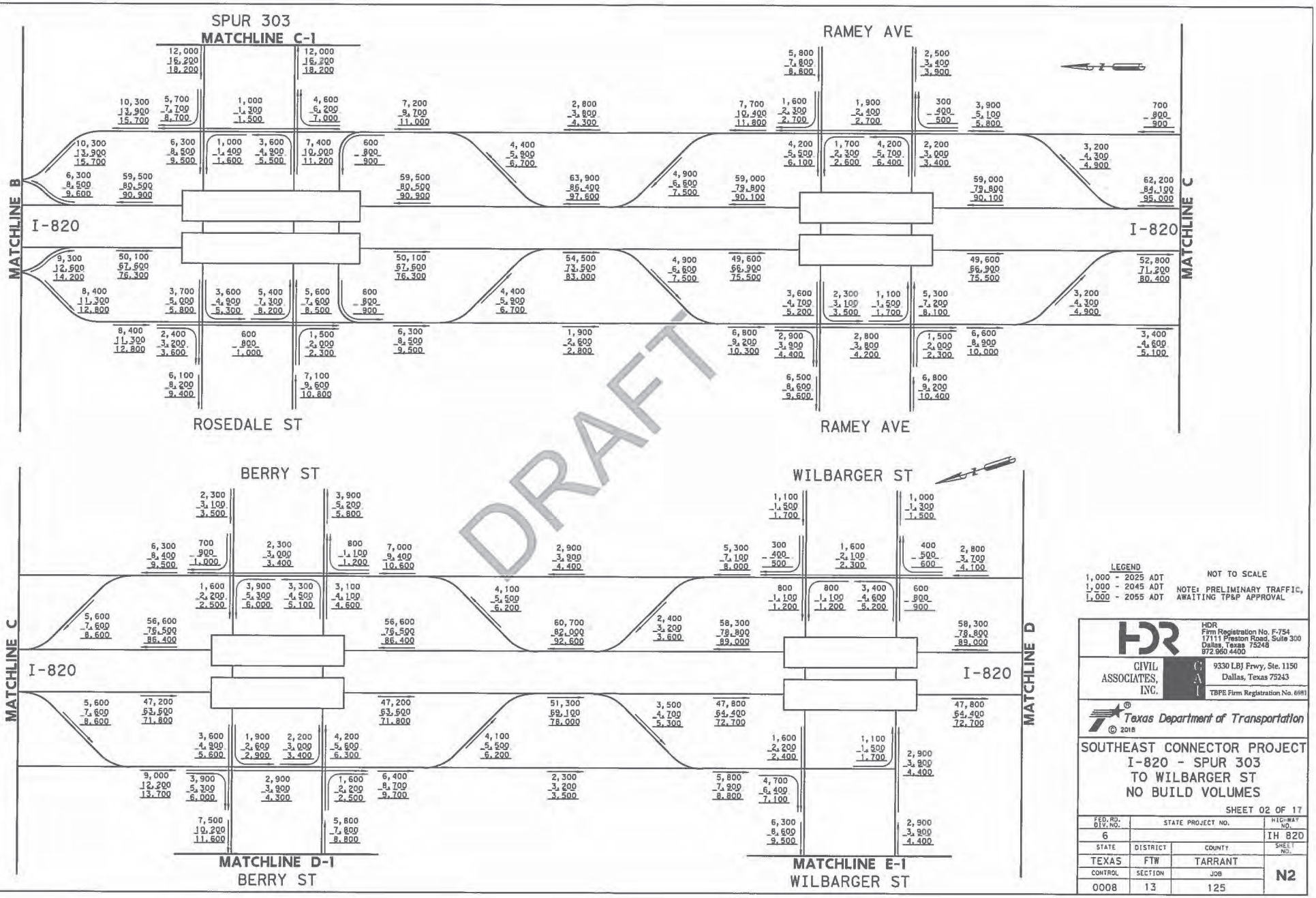
William Erick Knowles, P.E
Serial Number 84704



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Serial Number 84704

LEGEND

1,000 - 2025 ADT
1,000 - 2045 ADT
1,000 - 2055 ADT

NOT TO SCALE

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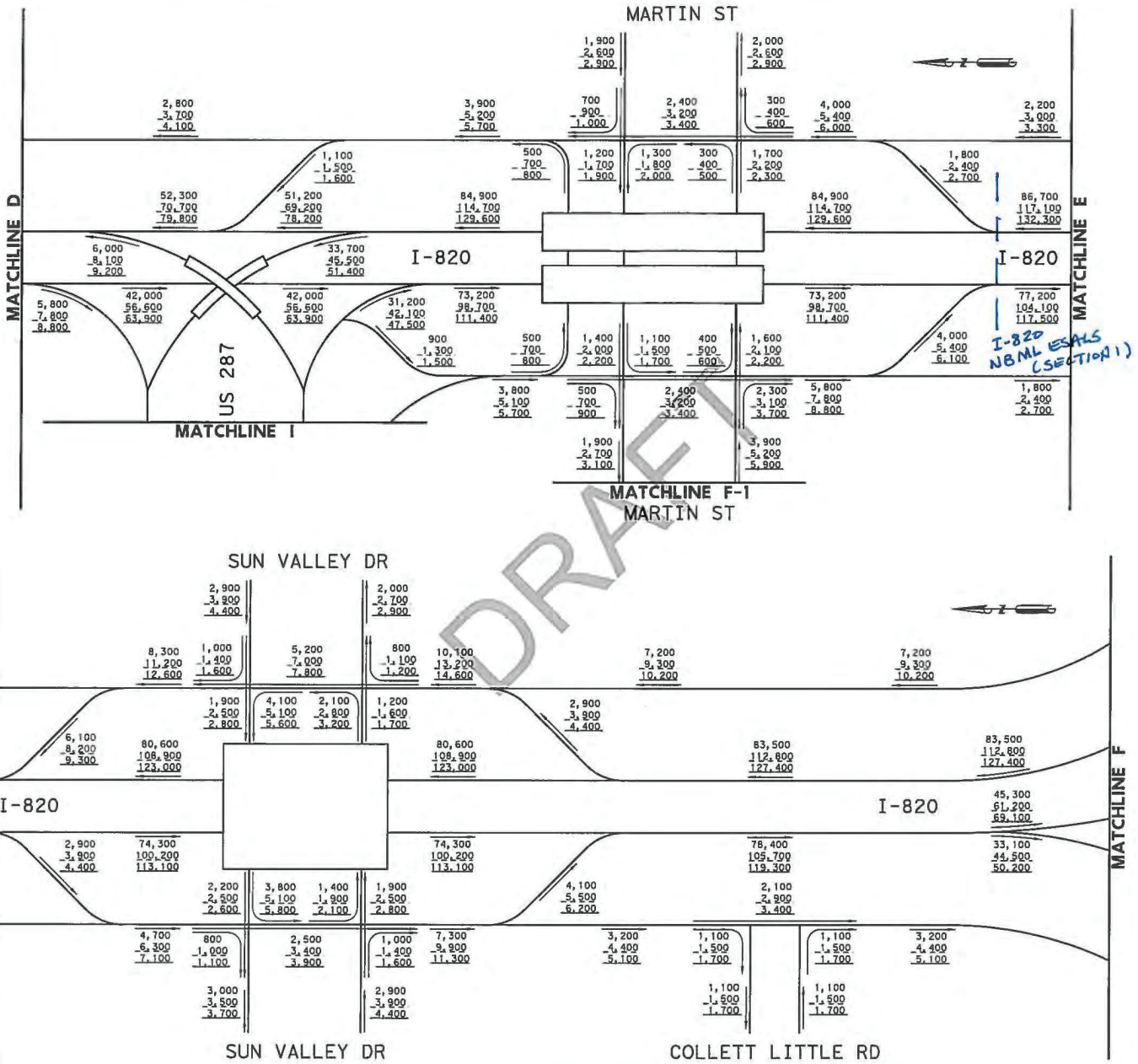
SOUTHEAST CONNECTOR PROJECT
I-820 - SPUR 303
TO WILBARGER ST
NO BUILD VOLUMES

SHEET 02 OF 17

FED. RD. DIV. NO.	STATE PROJECT NO.		HIGHWAY NO.
6			IH 820
STATE	DISTRICT	COUNTY	SHEET NO.
TEXAS	FTW	TARRANT	N2
CONTROL	SECTION	JOB	
0008	13	125	



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Serial Number 84704

LEGEND
1,000 - 2025 ADT
1,000 - 2045 ADT
1,000 - 2055 ADT

NOT TO SCALE

NOTE: PRELIMINARY TRAFFIC, AWAITING TP&P APPROVAL

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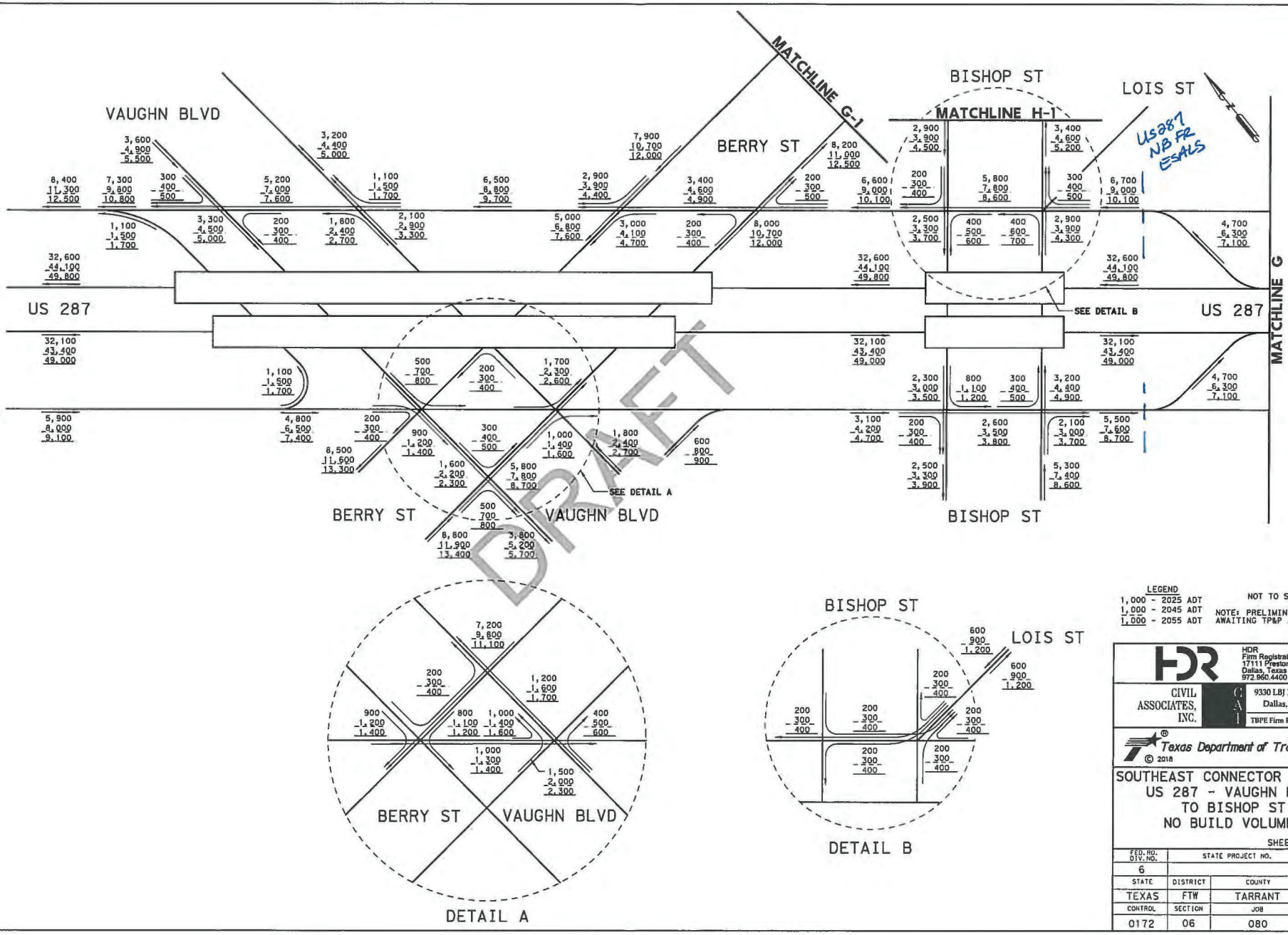
SOUTHEAST CONNECTOR PROJECT
I-820 - US 287 TO
TO I-20
NO BUILD VOLUMES

SHEET 03 OF 17

FED. RD. DIV. NO.	STATE PROJECT NO.		HIGHWAY NO.
6			IH 820
STATE	DISTRICT	COUNTY	SHEET NO.
TEXAS	FTW	TARRANT	N3
CONTROL	SECTION	JOB	
0008	13	125	



LEGEND
1,000 - 2025 ADT
1,000 - 2045 ADT
1,000 - 2055 ADT

NOT TO SCALE

NOTE: PRELIMINARY TRAFFIC, AWAITING TP&P APPROVAL

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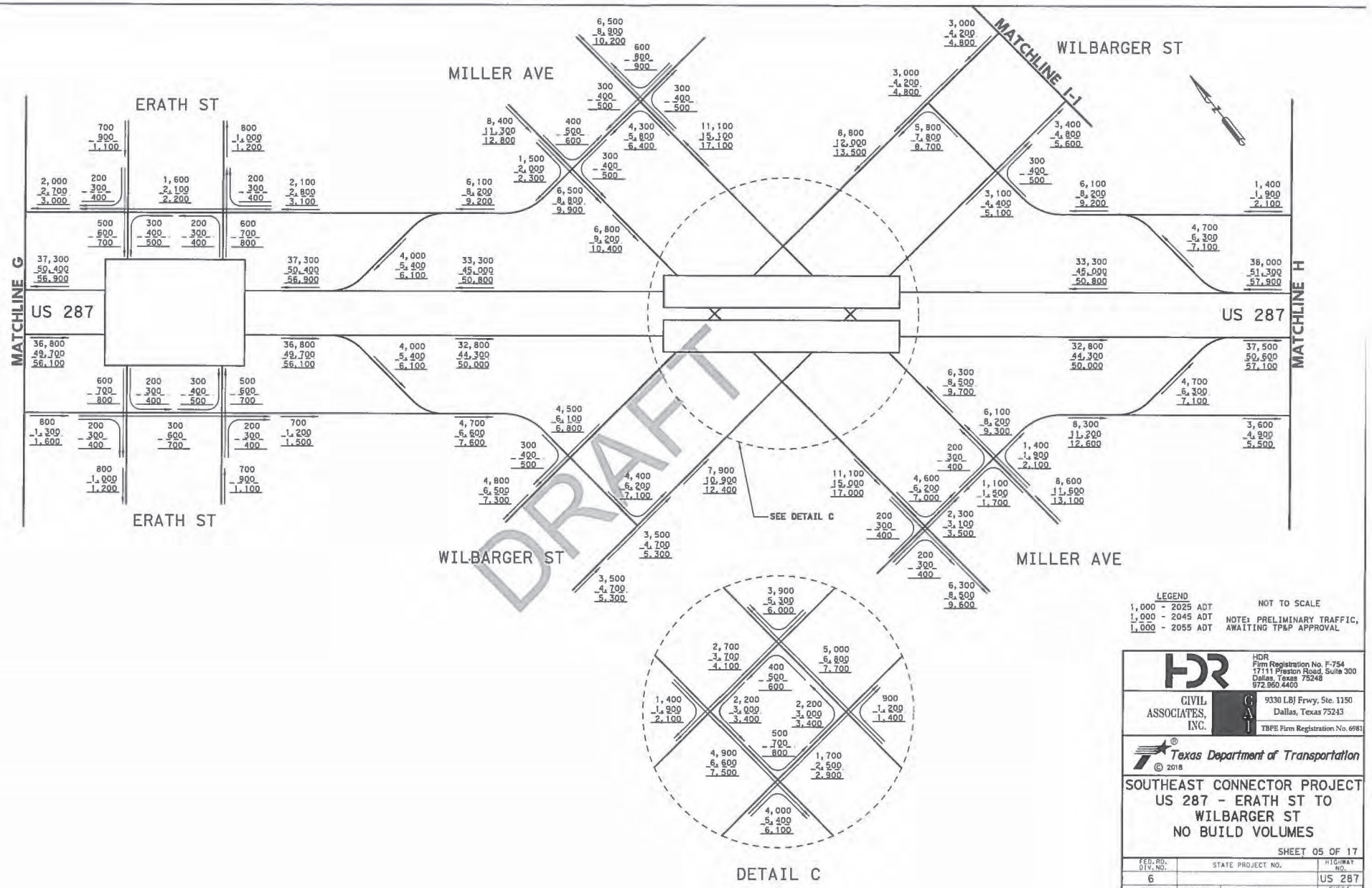
SOUTHEAST CONNECTOR PROJECT
US 287 - VAUGHN BLVD TO BISHOP ST
NO BUILD VOLUMES

SHEET 04 OF 17

FED. RD. DIV. NO.	STATE PROJECT NO.		HIGHWAY NO.
6			US 287
STATE	DISTRICT	COUNTY	SHEET NO.
TEXAS	FTW	TARRANT	N4
CONTROL	SECTION	JOB	
0172	06	080	



DETAIL C

LEGEND
1,000 - 2025 ADT
1,000 - 2045 ADT
1,000 - 2055 ADT

NOT TO SCALE

NOTE: PRELIMINARY TRAFFIC, AWAITING TP&P APPROVAL

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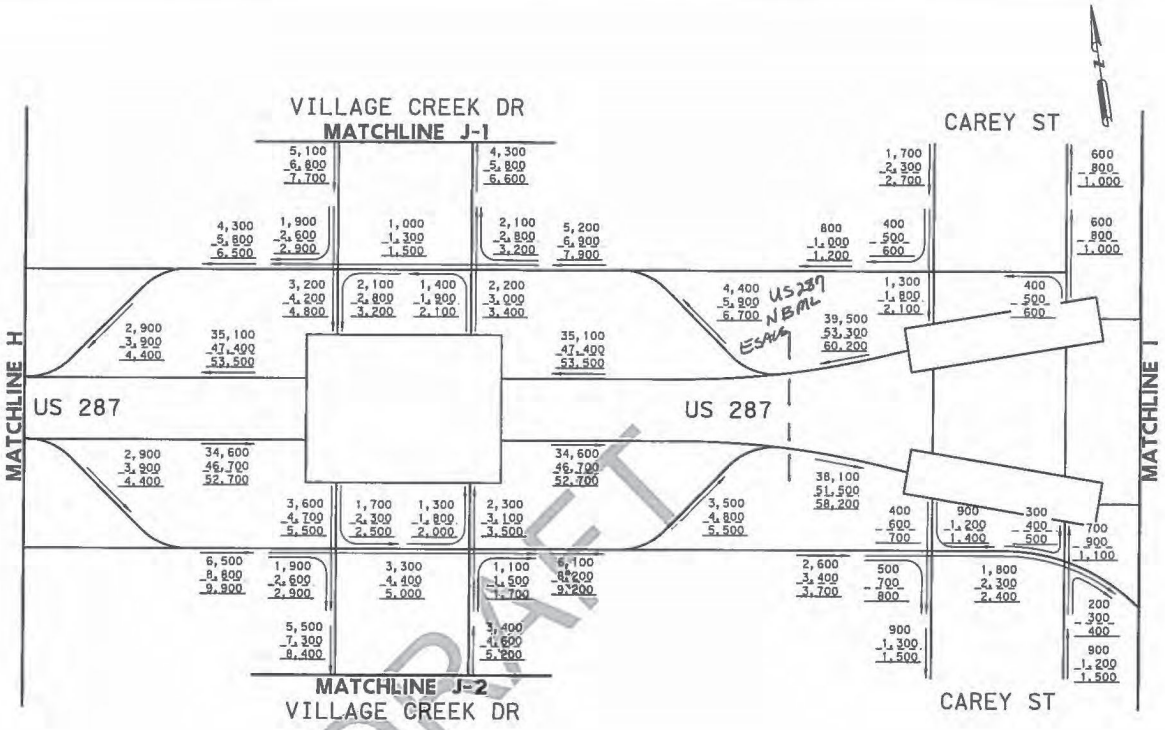
SOUTHEAST CONNECTOR PROJECT
US 287 - ERATH ST TO WILBARGER ST
NO BUILD VOLUMES

SHEET 05 OF 17

FED.RD. DIV.NO.	STATE PROJECT NO.		HIGHWAY NO.
6			US 287
STATE	DISTRICT	COUNTY	SHEET NO.
TEXAS	FTW	TARRANT	N5
CONTROL	SECTION	JOB	
0172	06	080	



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LEGEND
1,000 - 2025 ADT
1,000 - 2045 ADT
1,000 - 2055 ADT

NOT TO SCALE

NOTE: PRELIMINARY TRAFFIC, AWAITING TP&P APPROVAL

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SOUTHEAST CONNECTOR PROJECT
US 287 - VILLAGE CREEK DR TO CAREY ST
NO BUILD VOLUMES

SHEET 06 OF 17

FED. RD. DIV. NO.	STATE PROJECT NO.		HIGHWAY NO.
6			US 287
STATE	DISTRICT	COUNTY	SHEET NO.
TEXAS	FTW	TARRANT	N6
CONTROL	SECTION	JOB	
0172	06	080	

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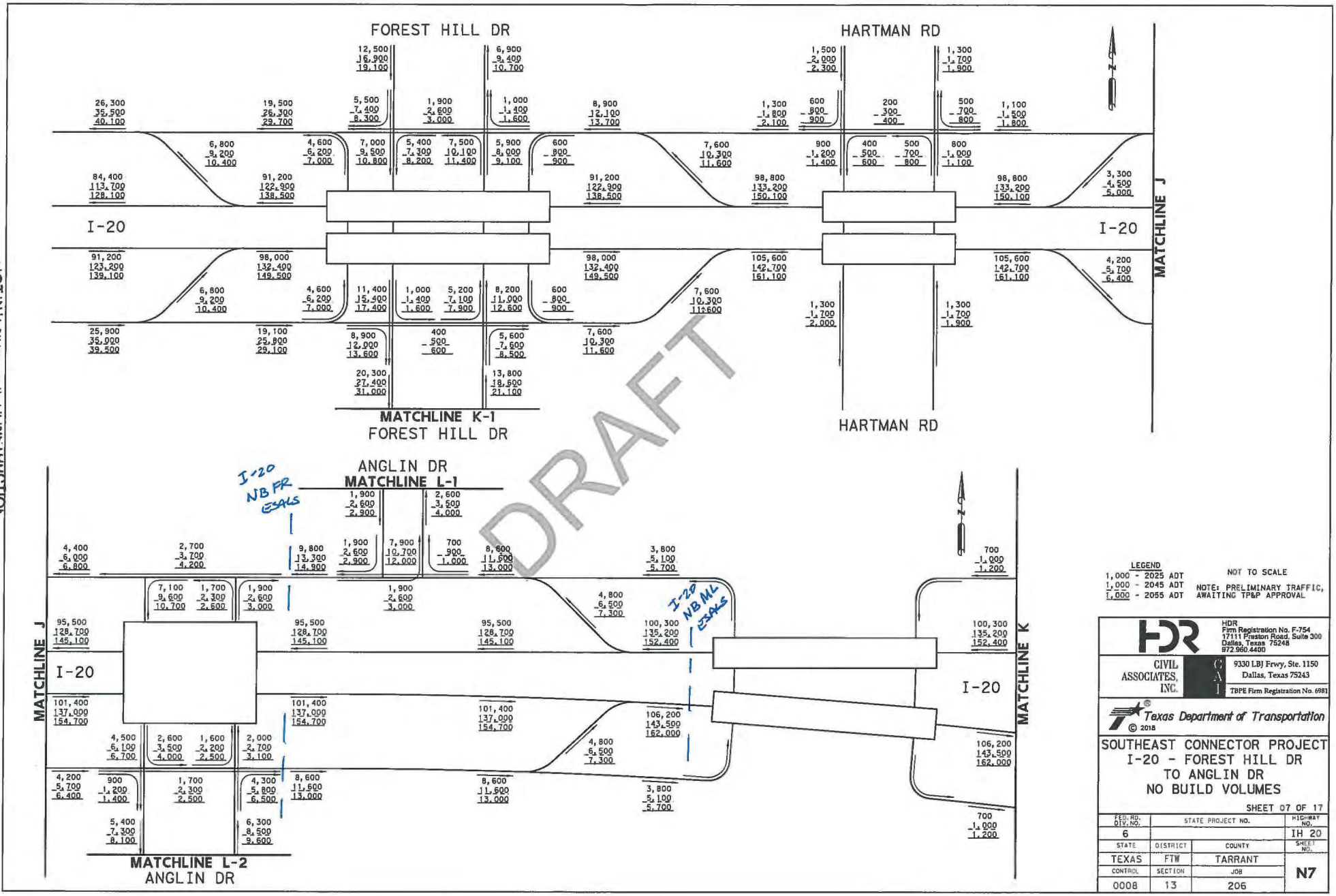

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BIDDING OR PERMIT PURPOSES
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Serial Number 84704

LEGEND	NOT TO SCALE
1,000 - 2025 ADT	
1,000 - 2045 ADT	NOTE: PRELIMINARY TRAFFIC, AWAITING TP&P APPROVAL
1,000 - 2055 ADT	

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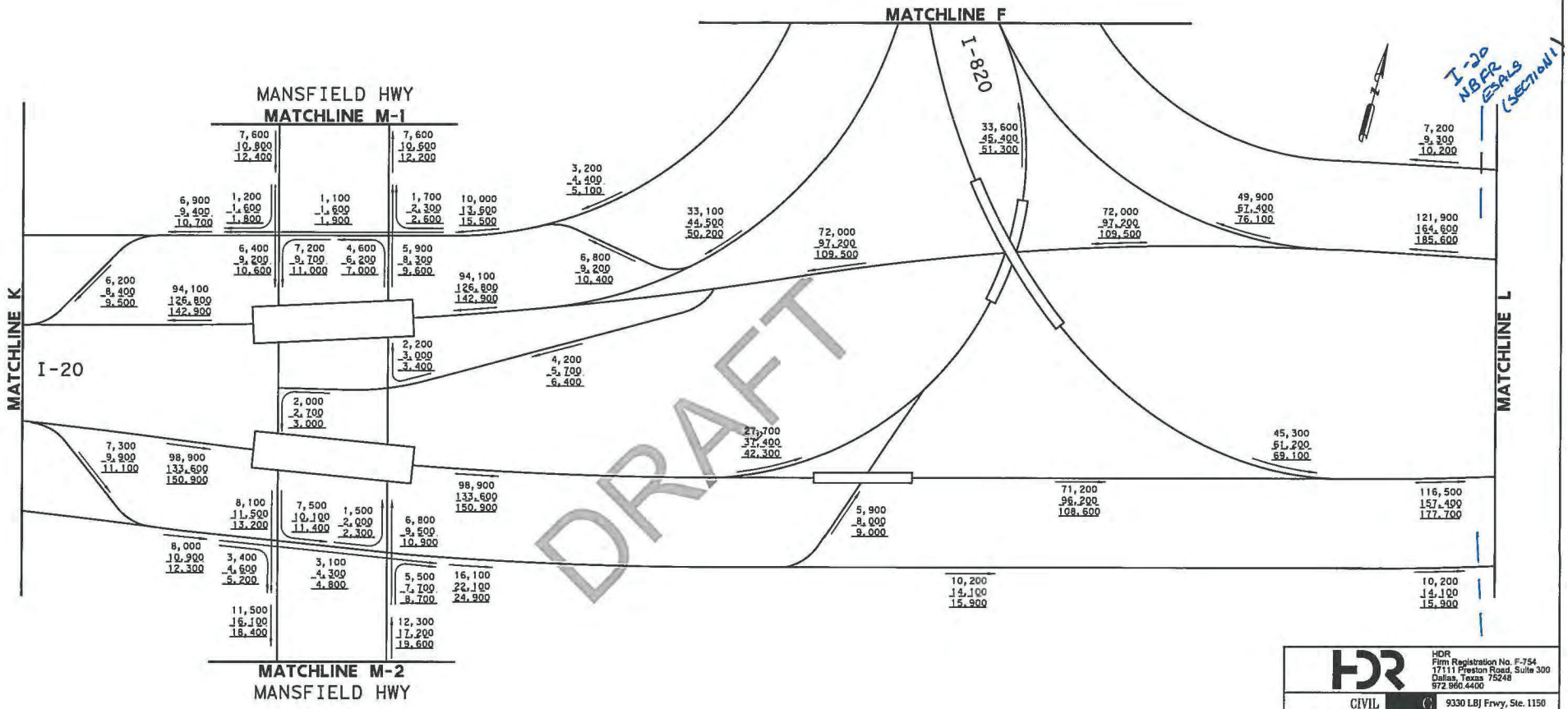
SOUTHEAST CONNECTOR PROJECT
I-20 - FOREST HILL DR TO ANGLIN DR
NO BUILD VOLUMES

SHEET 07 OF 17

FED. RD. DIV. NO.	STATE PROJECT NO.		HIGHWAY NO.
6			IH 20
STATE	DISTRICT	COUNTY	SHEET NO.
TEXAS	FTW	TARRANT	N7
CONTROL	SECTION	JOB	
0008	13	206	



LEGEND
1,000 - 2025 ADT
1,000 - 2045 ADT
1,000 - 2055 ADT

NOT TO SCALE

NOTE: PRELIMINARY TRAFFIC, AWAITING TP&P APPROVAL

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SOUTHEAST CONNECTOR PROJECT
I-20 - MANSFIELD HWY
TO I-820
NO BUILD VOLUMES

SHEET 08 OF 17

FED. RD. DIV. NO.	STATE PROJECT NO.		HIGHWAY NO.
6			IH 20
STATE	DISTRICT	COUNTY	SHEET NO.
TEXAS	FTW	TARRANT	N8
CONTROL	SECTION	JOB	
0008	13	206	

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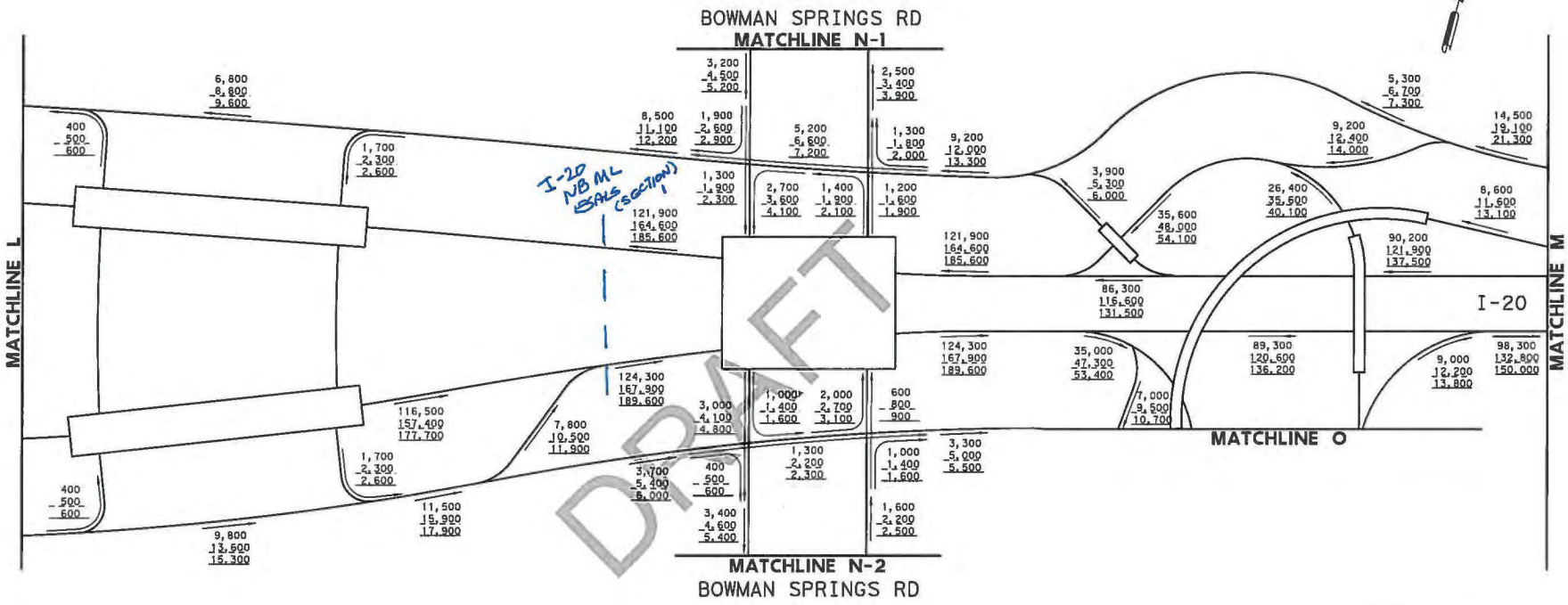

LEGEND
1,000 - 2025 ADT
1,000 - 2045 ADT
1,000 - 2055 ADT

NOT TO SCALE

NOTE: PRELIMINARY TRAFFIC, AWAITING TP&P APPROVAL

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SOUTHEAST CONNECTOR PROJECT
I-20 - I-820 TO
US 287
NO BUILD VOLUMES

SHEET 09 OF 17

FED. RD. DIV. NO.	STATE PROJECT NO.		HIGHWAY NO.
6			IH 20
STATE	DISTRICT	COUNTY	SHEET NO.
TEXAS	FTW	TARRANT	N9
CONTROL	SECTION	JOB	
2374	05	066	

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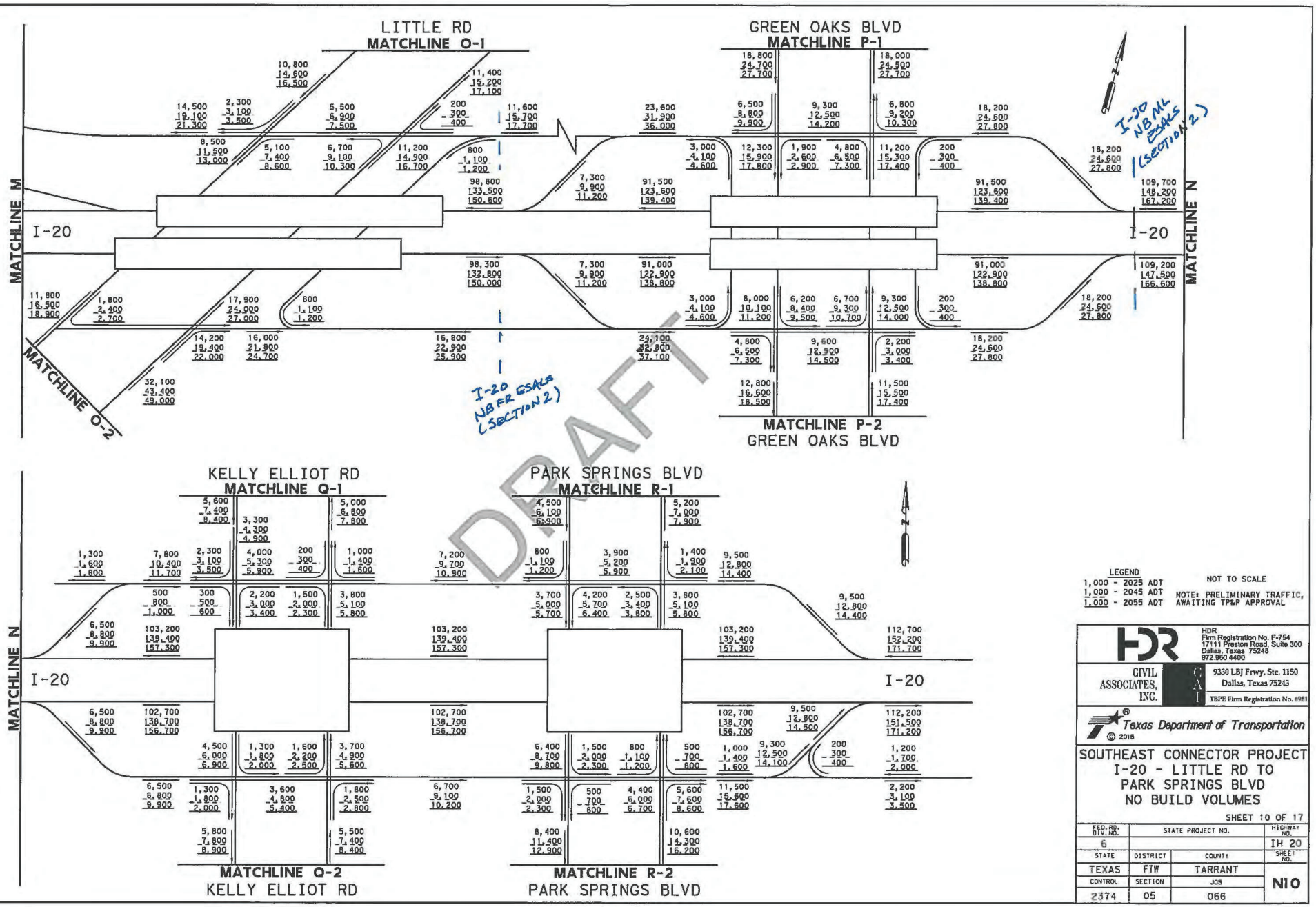
BIDDING OR PERMIT PURPOSES
William Erick Knowles, P.E.
Serial Number 84704



LEGEND
1,000 - 2025 ADT
1,000 - 2045 ADT
1,000 - 2055 ADT

NOT TO SCALE

NOTE: PRELIMINARY TRAFFIC, AWAITING TP&P APPROVAL

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SOUTHEAST CONNECTOR PROJECT
I-20 - LITTLE RD TO
PARK SPRINGS BLVD
NO BUILD VOLUMES

SHEET 10 OF 17

FED. RD. DIV. NO.	STATE PROJECT NO.		HIGHWAY NO.
6			IH 20
STATE	DISTRICT	COUNTY	SHEET NO.
TEXAS	FTW	TARRANT	N10
CONTROL	SECTION	JOB	
2374	05	066	

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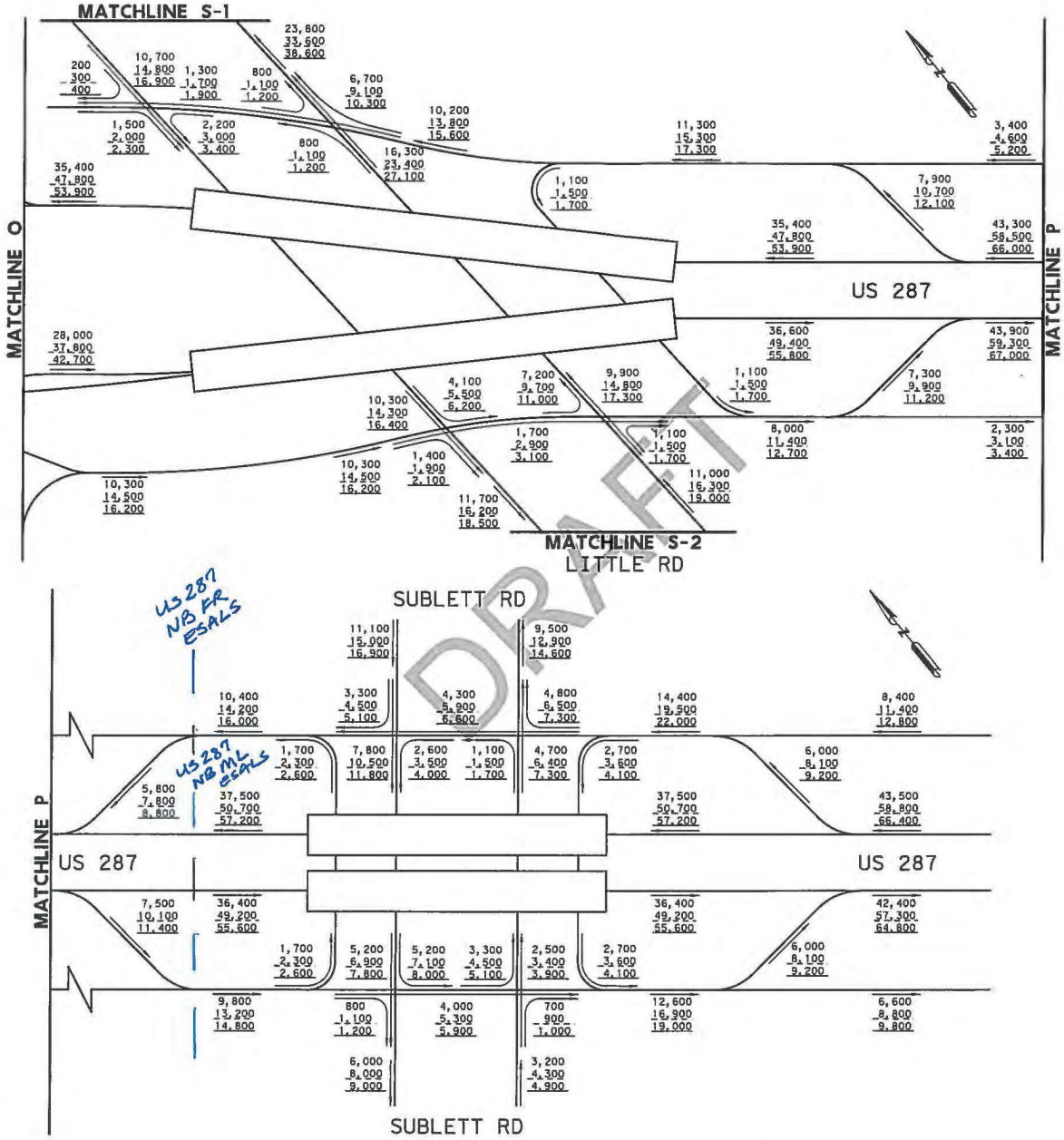
BIDDING OR PERMIT PURPOSES
William Erick Knowles, P.E.
Serial Number 84794



LEGEND	
1,000 - 2025 ADT	NOT TO SCALE
1,000 - 2045 ADT	NOTE: PRELIMINARY TRAFFIC, AWAITING TP&P APPROVAL
1,000 - 2055 ADT	

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SOUTHEAST CONNECTOR PROJECT
US 287 - FROM I-20 TO SUBLETT RD
NO BUILD VOLUMES

SHEET 11 OF 17

FED. RD. DIV. NO.	STATE PROJECT NO.		HIGHWAY NO.
6			US 287
STATE	DISTRICT	COUNTY	SHEET NO.
TEXAS	FTW	TARRANT	N11
CONTROL	SECTION	JOB	
0172	09	028	

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BIDDING OR PERMIT PURPOSES
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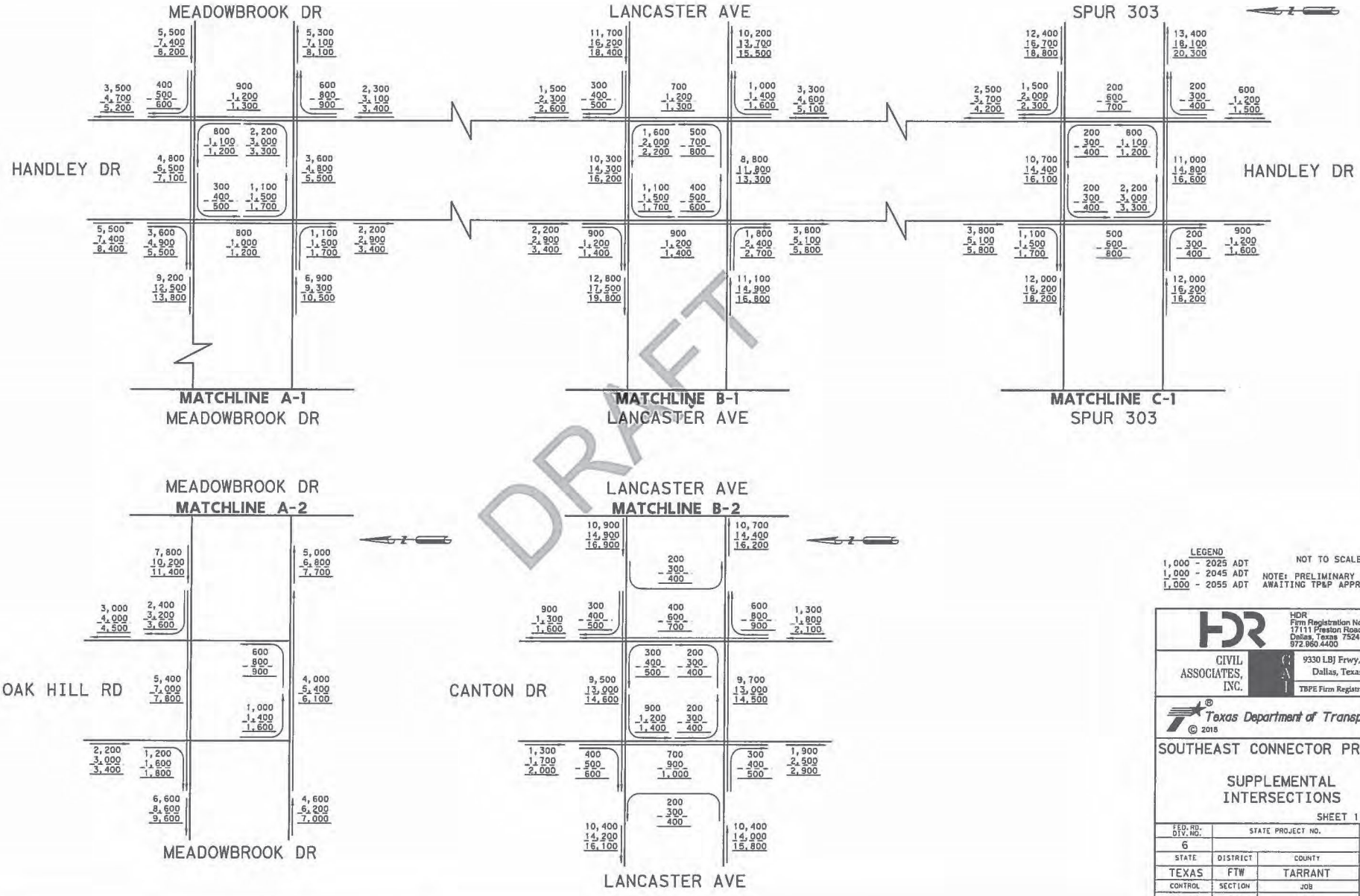
Serial Number 84704



DRAFT

LEGEND
1,000 - 2025 ADT
1,000 - 2045 ADT
1,000 - 2055 ADT

NOT TO SCALE

NOTE: PRELIMINARY TRAFFIC, AWAITING TP&P APPROVAL

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SOUTHEAST CONNECTOR PROJECT

SUPPLEMENTAL INTERSECTIONS

SHEET 12 OF 17

FED. RD. DIV. NO.	STATE PROJECT NO.		HIGHWAY NO.
6			IH 820
STATE	DISTRICT	COUNTY	SHEET NO.
TEXAS	FTW	TARRANT	
CONTROL	SECTION	JOB	N12
0008	13	125	

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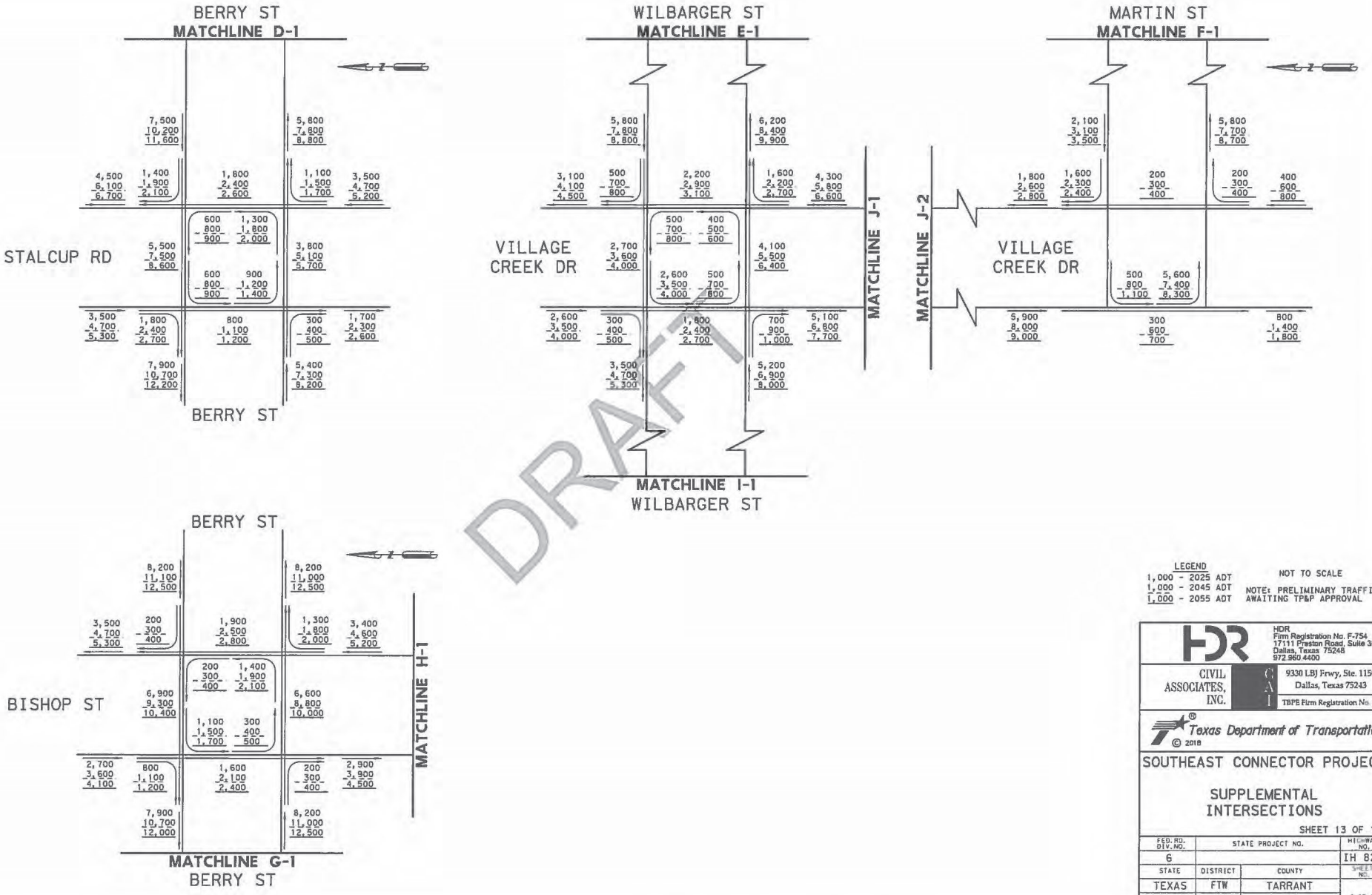
Texas License Number 94704



DRAFT

LEGEND
1,000 - 2025 ADT
1,000 - 2045 ADT
1,000 - 2055 ADT

NOT TO SCALE

NOTE: PRELIMINARY TRAFFIC, AWAITING TP&P APPROVAL

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SOUTHEAST CONNECTOR PROJECT

SUPPLEMENTAL INTERSECTIONS

SHEET 13 OF 17

FED. RD. DIV. NO.	STATE PROJECT NO.		HIGHWAY NO.
6			IH 820
STATE	DISTRICT	COUNTY	SHEET NO.
TEXAS	FTW	TARRANT	N13
CONTROL	SECTION	JOB	
0008	13	125	

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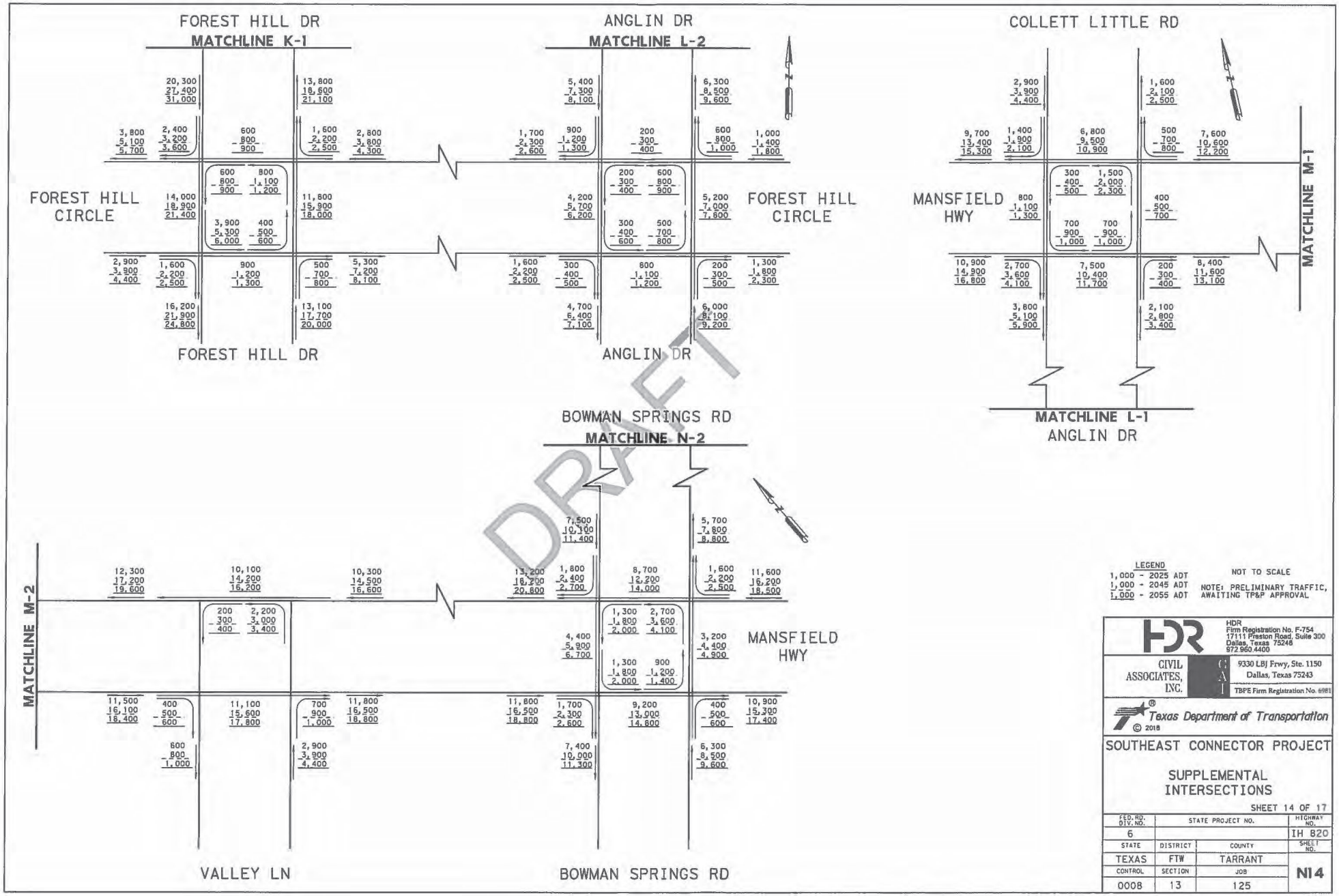

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William Erick Knowles, P.E.

LEGEND
1,000 - 2025 ADT
1,000 - 2045 ADT
1,000 - 2055 ADT

NOT TO SCALE

NOTE: PRELIMINARY TRAFFIC, AWAITING TP&P APPROVAL

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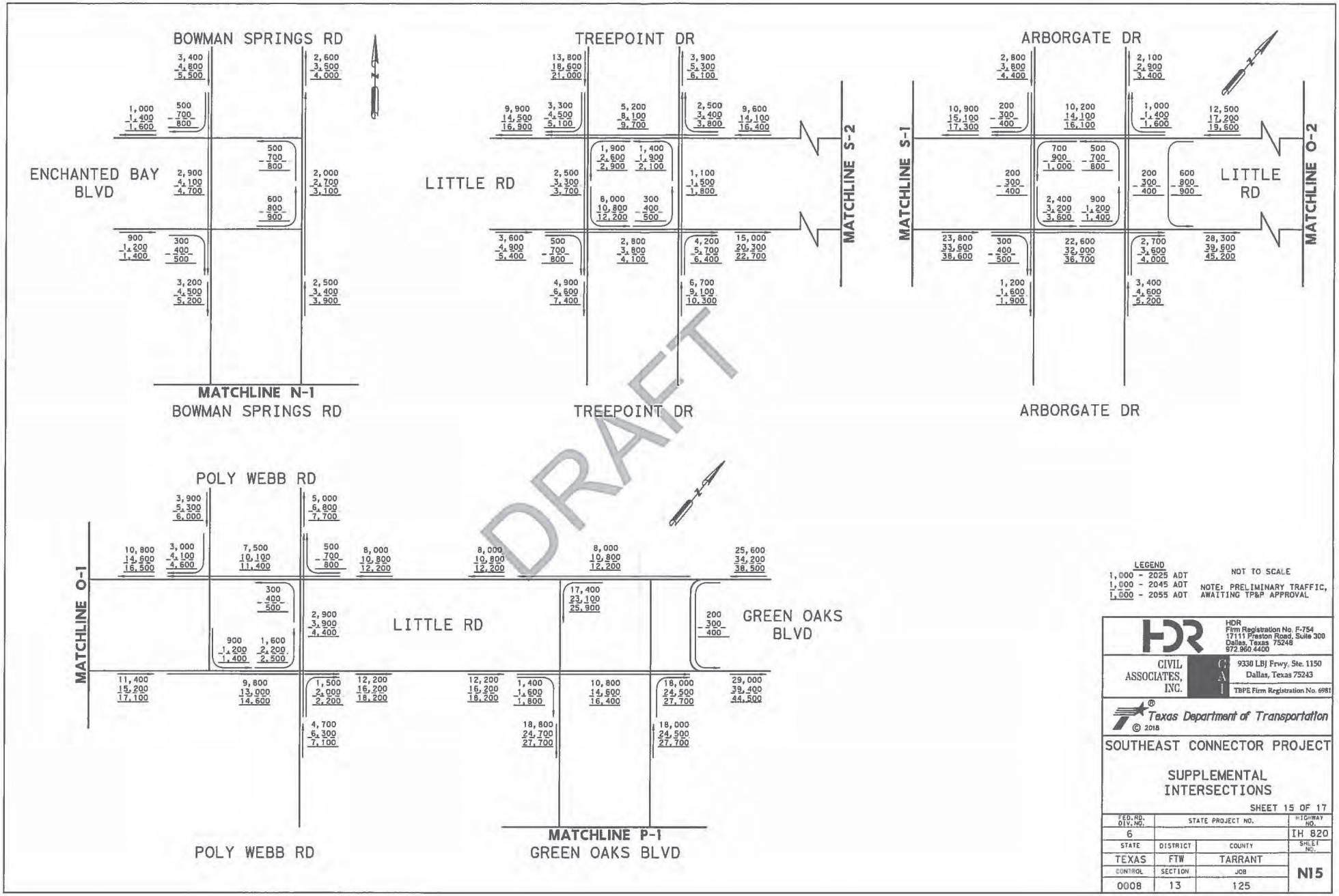
SOUTHEAST CONNECTOR PROJECT

SUPPLEMENTAL INTERSECTIONS

SHEET 14 OF 17

FED. RD. DIV. NO.	STATE PROJECT NO.		HIGHWAY NO.
6			IH 820
STATE	DISTRICT	COUNTY	SHEET NO.
TEXAS	FTW	TARRANT	N14
CONTROL	SECTION	JOB	
0008	13	125	



DRAFT

LEGEND
1,000 - 2025 ADT
1,000 - 2045 ADT
1,000 - 2055 ADT

NOT TO SCALE

NOTE: PRELIMINARY TRAFFIC, AWAITING TP&P APPROVAL

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SOUTHEAST CONNECTOR PROJECT

SUPPLEMENTAL INTERSECTIONS

SHEET 15 OF 17

FED.RD. DIV.NO.	STATE PROJECT NO.		HIGHWAY NO.
6			IH 820
STATE	DISTRICT	COUNTY	SHEET NO.
TEXAS	FTW	TARRANT	N15
CONTROL	SECTION	JOB	
0008	13	125	

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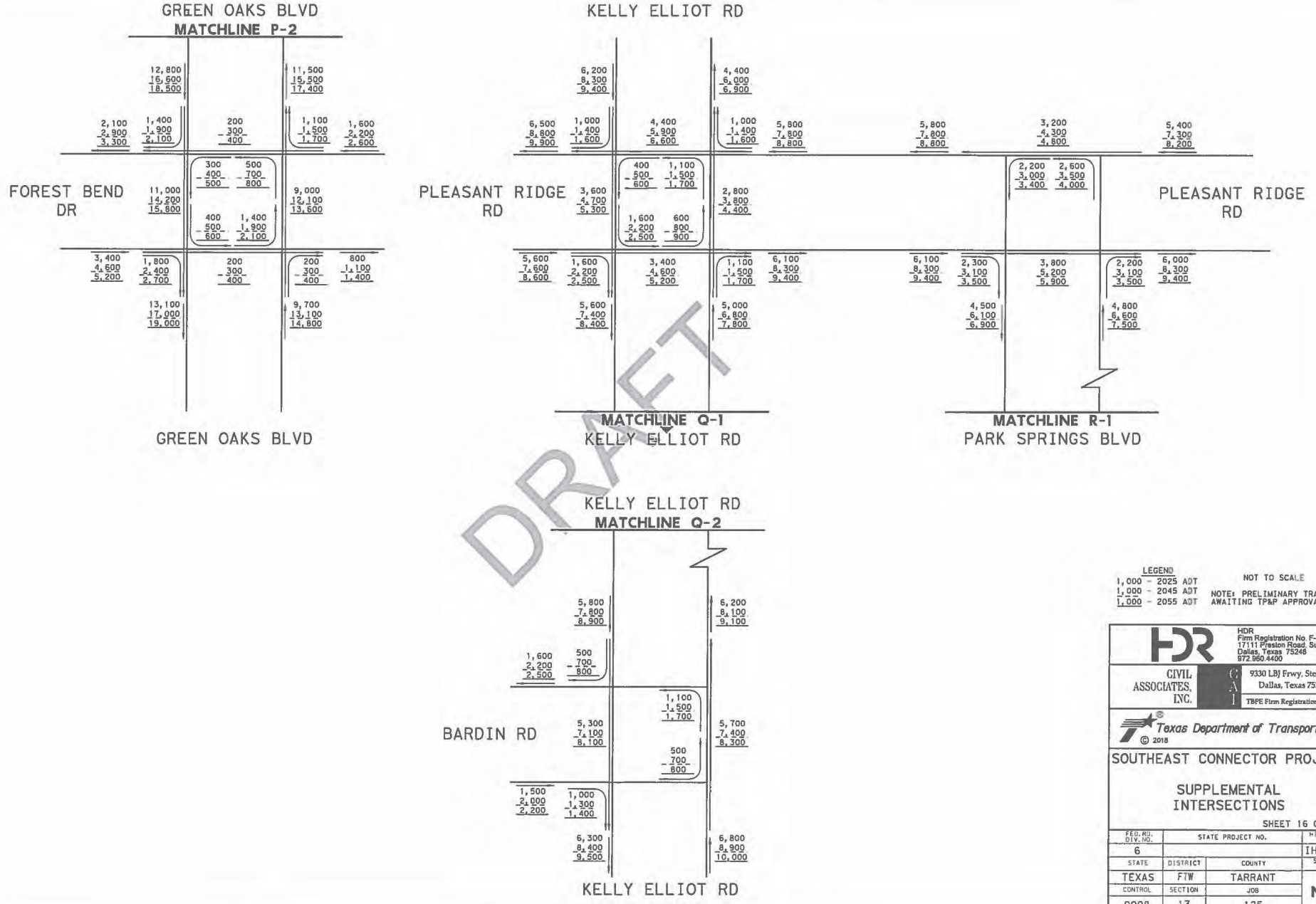
William Erick Knowles, P.E
Serial Number 84704



LEGEND
1,000 - 2025 ADT
1,000 - 2045 ADT
1,000 - 2055 ADT

NOT TO SCALE

NOTE: PRELIMINARY TRAFFIC, AWAITING TP&P APPROVAL

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SOUTHEAST CONNECTOR PROJECT

SUPPLEMENTAL INTERSECTIONS

SHEET 16 OF 17

FED. RD. DIV. NO.	STATE PROJECT NO.		HIGHWAY NO.
6			IH 820
STATE	DISTRICT	COUNTY	SHEET NO.
TEXAS	FTW	TARRANT	
CONTROL	SECTION	JOB	N16
0008	13	125	

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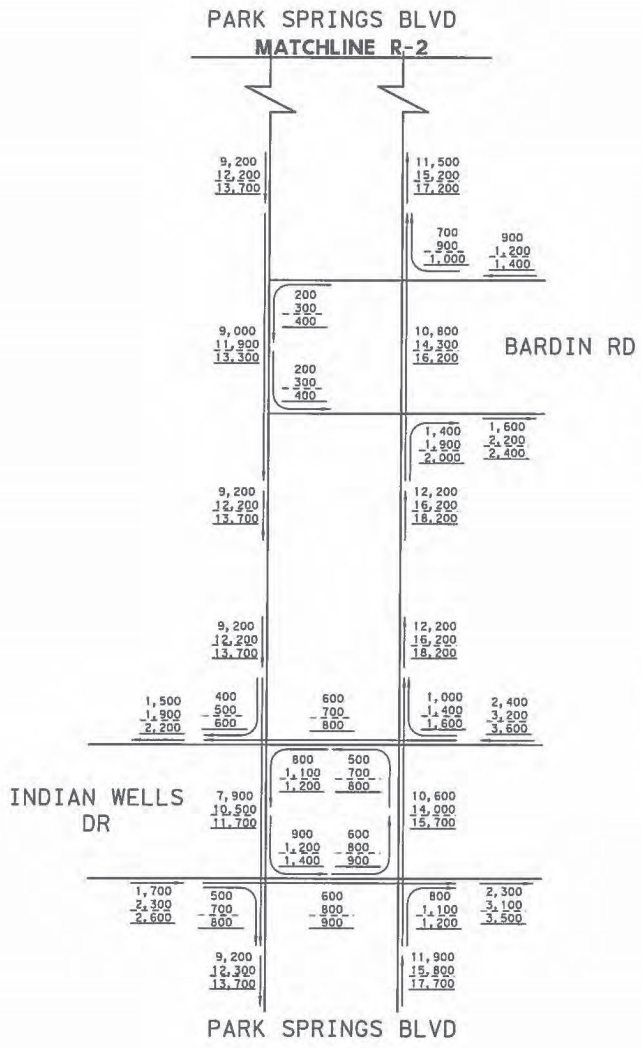
BIDDING OR PERMIT PURPOSES
William Erick Knowles, P.E
Serial Number 84704



DRAFT

LEGEND
1,000 - 2025 ADT
1,000 - 2045 ADT
1,000 - 2055 ADT

NOT TO SCALE

NOTE: PRELIMINARY TRAFFIC, AWAITING TP&P APPROVAL

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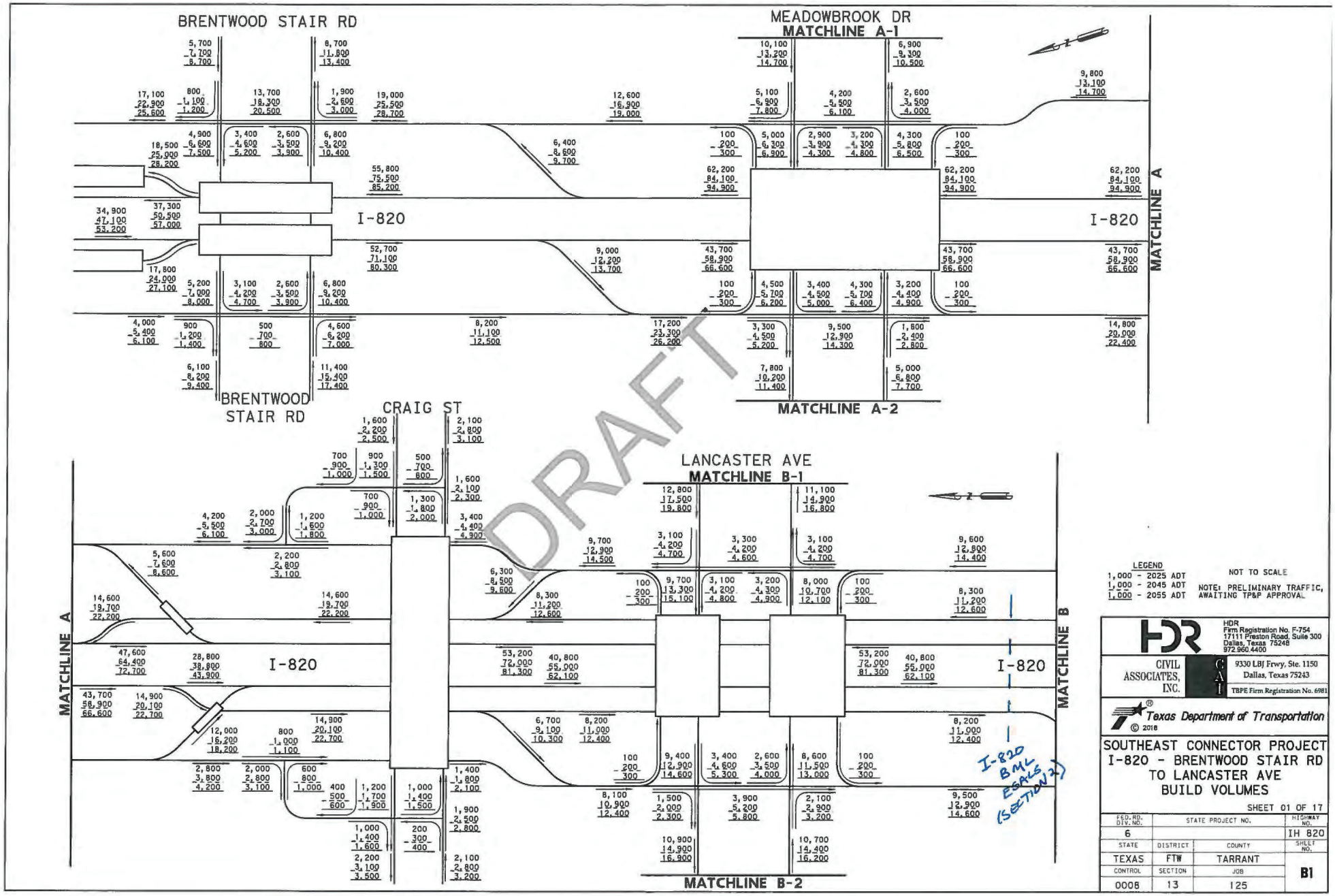
SOUTHEAST CONNECTOR PROJECT

SUPPLEMENTAL INTERSECTIONS

SHEET 17 OF 17

FED. RD. DIV. NO.	STATE PROJECT NO.		HIGHWAY NO.
6			IH 820
STATE	DISTRICT	COUNTY	SHEET NO.
TEXAS	FTW	TARRANT	
CONTROL	SECTION	JOB	N17
0008	13	125	

NOT INTENDED FOR CONSTRUCTION
BIDDING OR PERMIT PURPOSES
William Erick Knowles, P.E
Serial Number 84704



DRAFT

LEGEND
1,000 - 2025 ADT
1,000 - 2045 ADT
1,000 - 2055 ADT

NOT TO SCALE

NOTE: PRELIMINARY TRAFFIC, AWAITING TP&P APPROVAL

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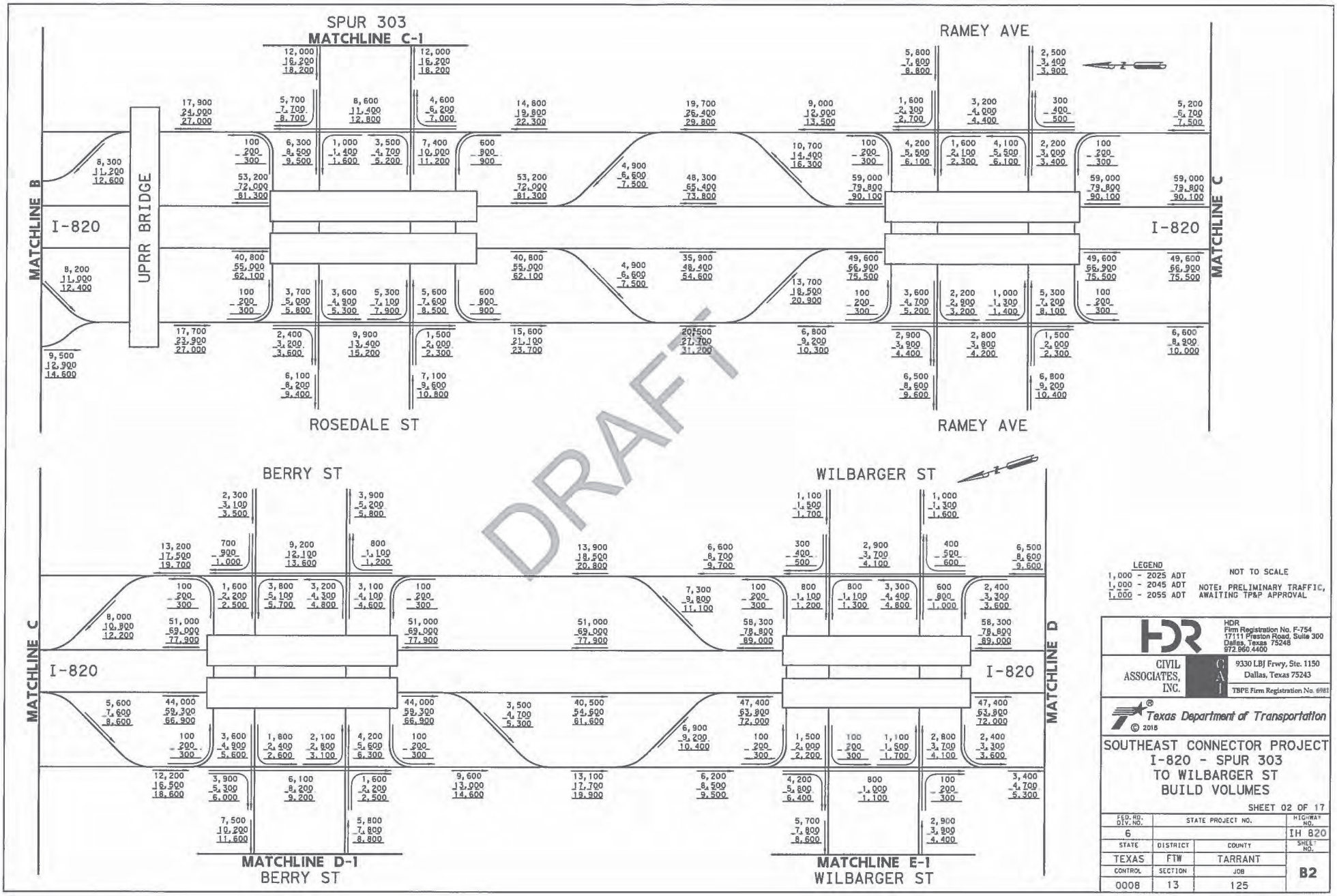
SOUTHEAST CONNECTOR PROJECT
I-820 - BRENTWOOD STAIR RD TO LANCASTER AVE
BUILD VOLUMES

SHEET 01 OF 17

FED. RD. DIV. NO.	STATE PROJECT NO.		HIGHWAY NO.
6			IH 820
STATE	DISTRICT	COUNTY	SHEET NO.
TEXAS	FTW	TARRANT	
CONTROL	SECTION	JOB	B1
0008	13	125	

NOT INTENDED FOR CONSTRUCTION
BIDDING OR PERMIT PURPOSES
William Erick Knowles, P.E
License Number 84704



LEGEND
1,000 - 2025 ADT
1,000 - 2045 ADT
1,000 - 2055 ADT

NOT TO SCALE

NOTE: PRELIMINARY TRAFFIC, AWAITING TP&P APPROVAL

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SOUTHEAST CONNECTOR PROJECT
I-820 - SPUR 303
TO WILBARGER ST
BUILD VOLUMES

SHEET 02 OF 17

FED. RD. DIV. NO.	STATE PROJECT NO.		HIGHWAY NO.
6			IH 820
STATE	DISTRICT	COUNTY	SHEET NO.
TEXAS	FTW	TARRANT	B2
CONTROL	SECTION	JOB	
0008	13	125	

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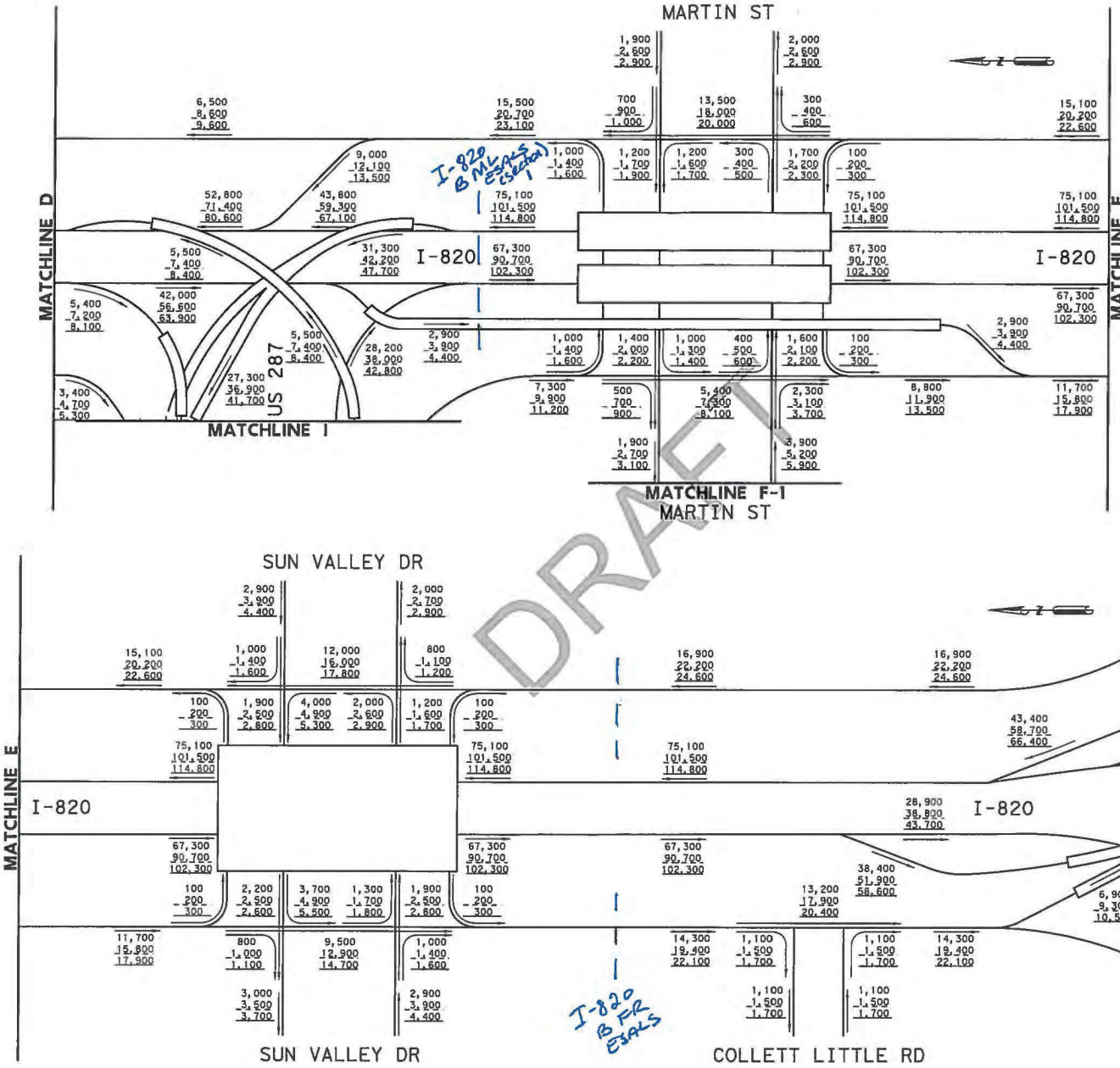
Serial Number 94707



LEGEND
1,000 - 2025 ADT
1,000 - 2045 ADT
1,000 - 2055 ADT

NOT TO SCALE
NOTE: PRELIMINARY TRAFFIC, AWAITING TP&P APPROVAL

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SOUTHEAST CONNECTOR PROJECT
I-820 - US 287 TO TO I-20
BUILD VOLUMES

SHEET 03 OF 17

FED. RD. DIV. NO.	STATE PROJECT NO.		HIGHWAY NO.
6			IH 820
STATE	DISTRICT	COUNTY	SHEET NO.
TEXAS	FTW	TARRANT	B3
CONTROL	SECTION	JOB	
0008	13	125	

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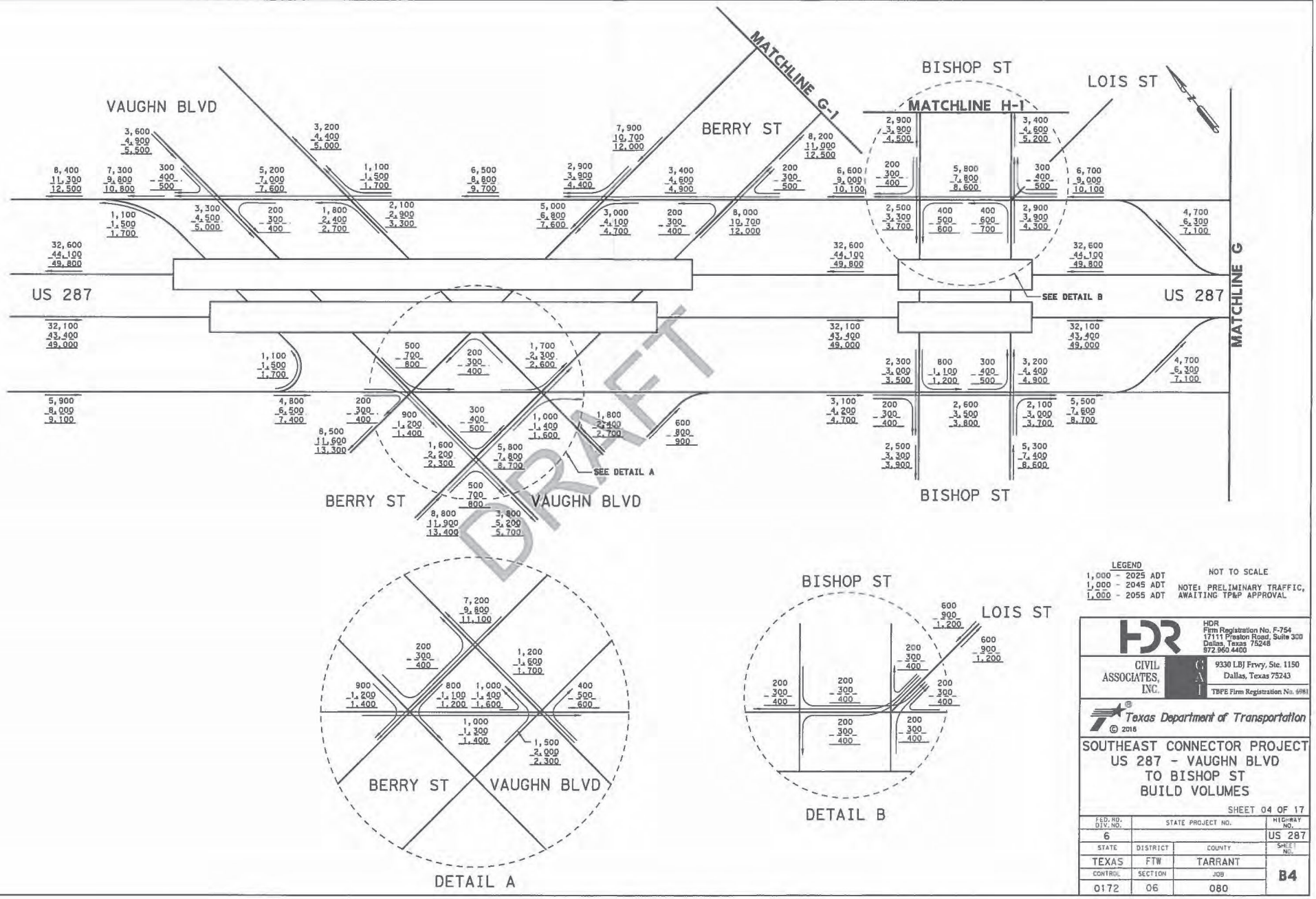
William Erick Knowles, P.E
Serial Number 84704



LEGEND
1,000 - 2025 ADT
1,000 - 2045 ADT
1,000 - 2055 ADT

NOT TO SCALE

NOTE: PRELIMINARY TRAFFIC, AWAITING TP&P APPROVAL

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SOUTHEAST CONNECTOR PROJECT
US 287 - VAUGHN BLVD TO BISHOP ST
BUILD VOLUMES

SHEET 04 OF 17

FED. NO. DIV. NO.	STATE PROJECT NO.		HIGHWAY NO.
6			US 287
STATE	DISTRICT	COUNTY	SHEET NO.
TEXAS	FTW	TARRANT	B4
CONTROL	SECTION	JOB	
0172	06	080	

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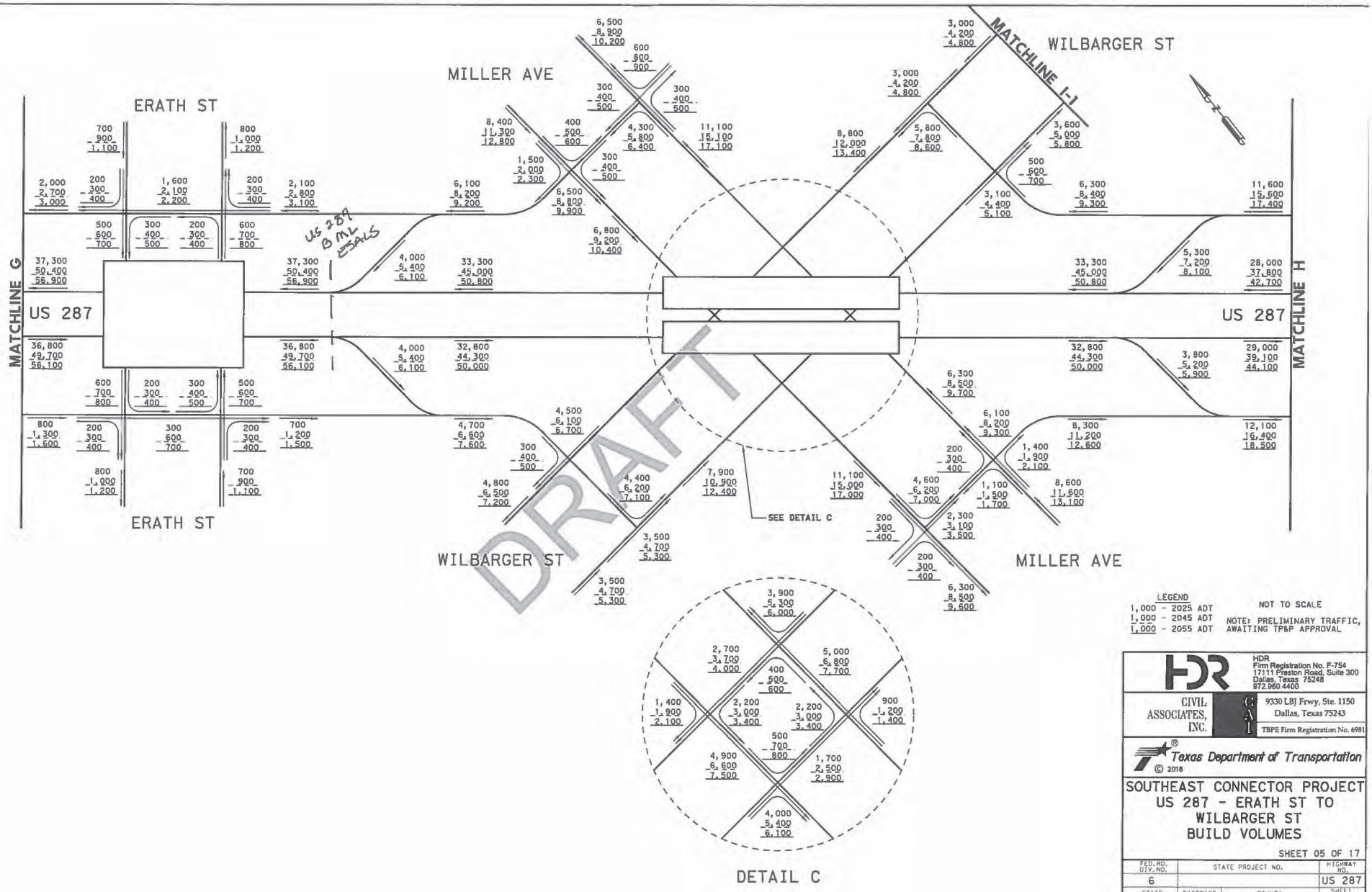
William Erick Knowles, P.E.
Serial Number 84704



LEGEND
1,000 - 2025 ADT
1,000 - 2045 ADT
1,000 - 2055 ADT

NOT TO SCALE

NOTE: PRELIMINARY TRAFFIC, AWAITING TP&P APPROVAL

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SOUTHEAST CONNECTOR PROJECT
US 287 - ERATH ST TO WILBARGER ST
BUILD VOLUMES

SHEET 05 OF 17

FED.RD. DIV.NO.	STATE PROJECT NO.		HIGHWAY NO.
6			US 287
STATE	DISTRICT	COUNTY	SHEET NO.
TEXAS	FTW	TARRANT	B5
CONTROL	SECTION	JOB	
0172	06	080	

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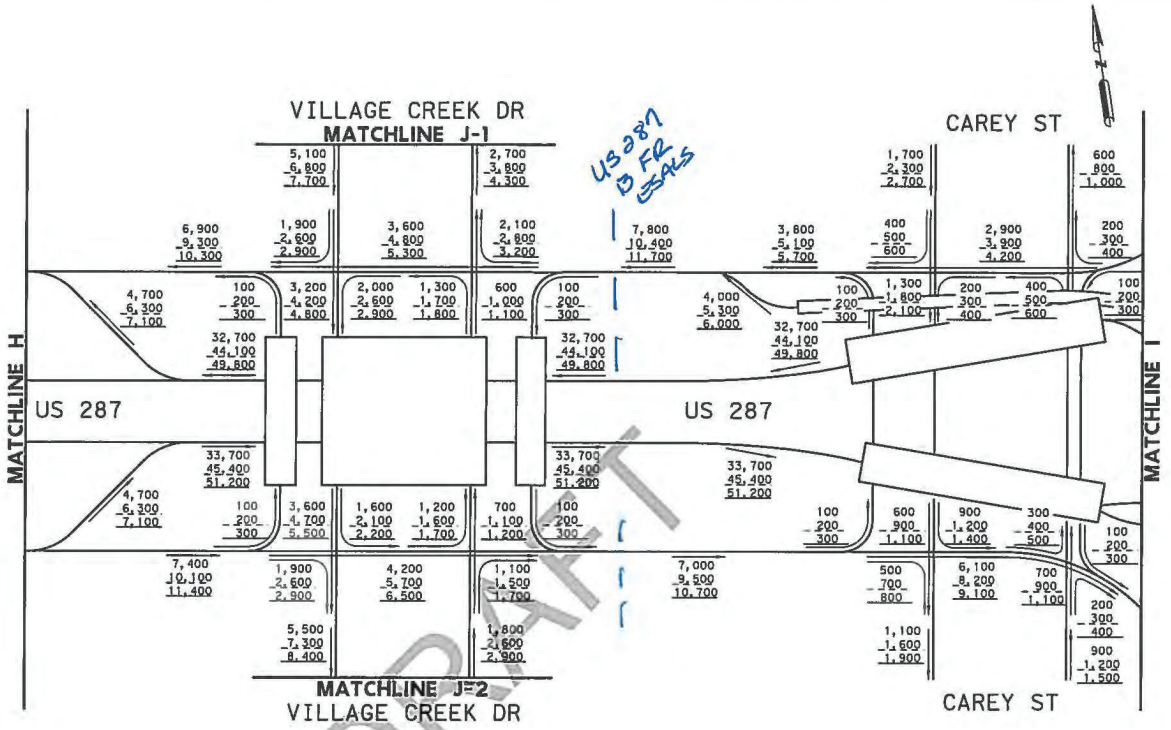
William Erick Knowles, P.E
Serial Number 84704



DRAFT

LEGEND
1,000 - 2025 ADT
1,000 - 2045 ADT
1,000 - 2055 ADT

NOT TO SCALE

NOTE: PRELIMINARY TRAFFIC, AWAITING TP&P APPROVAL

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SOUTHEAST CONNECTOR PROJECT
US 287 - VILLAGE CREEK DR TO CAREY ST
BUILD VOLUMES

SHEET 06 OF 17

FED. RD. DIV. NO.	STATE PROJECT NO.		HIGHWAY NO.
6			US 287
STATE	DISTRICT	COUNTY	SHEET NO.
TEXAS	FTW	TARRANT	B6
CONTROL	SECTION	JOB	
0172	06	080	

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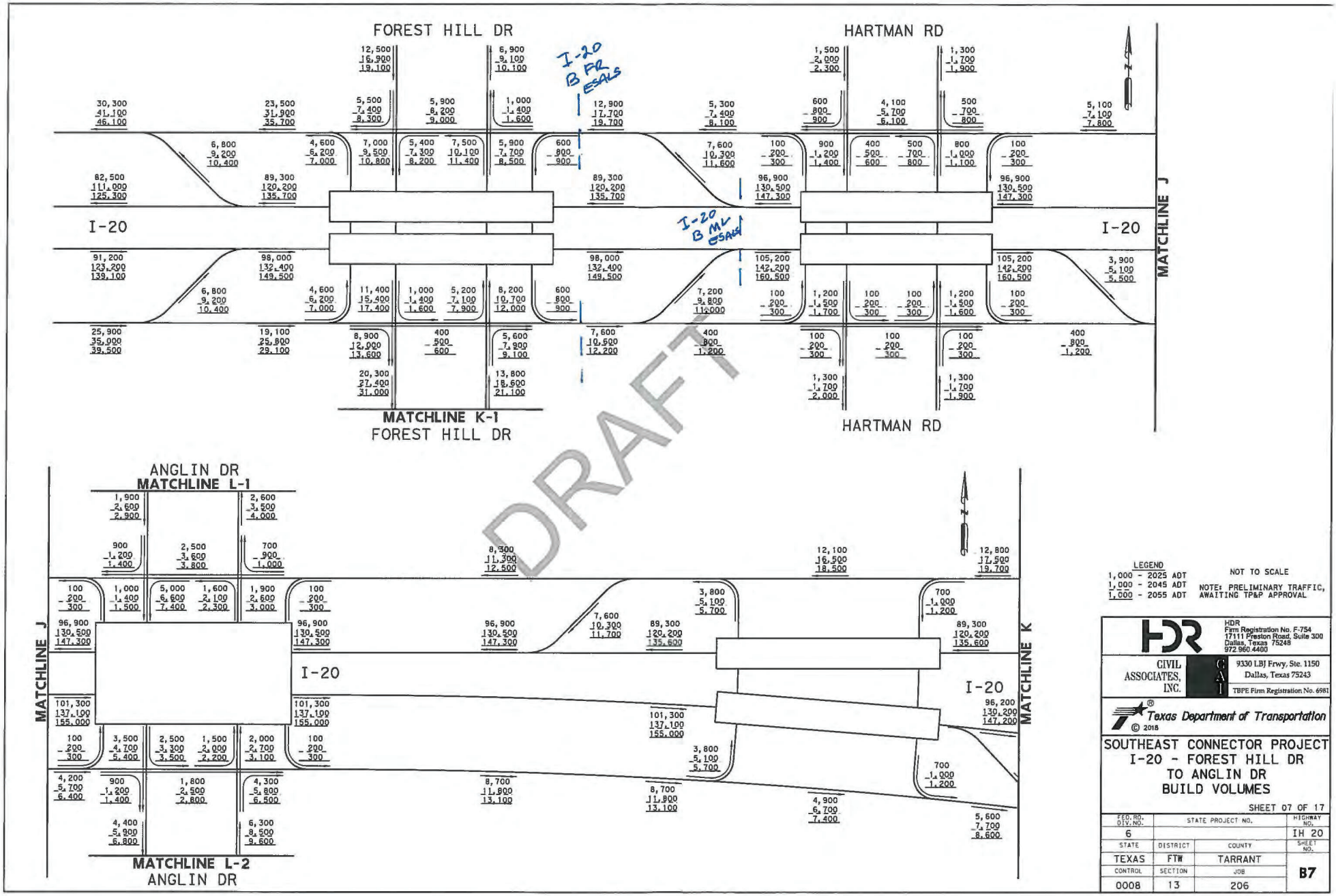
Serial Number 84704



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William Erick Knowles, P.E
Serial Number 84704

LEGEND
1,000 - 2025 ADT
1,000 - 2045 ADT
1,000 - 2055 ADT

NOT TO SCALE
NOTE: PRELIMINARY TRAFFIC, AWAITING TP&P APPROVAL

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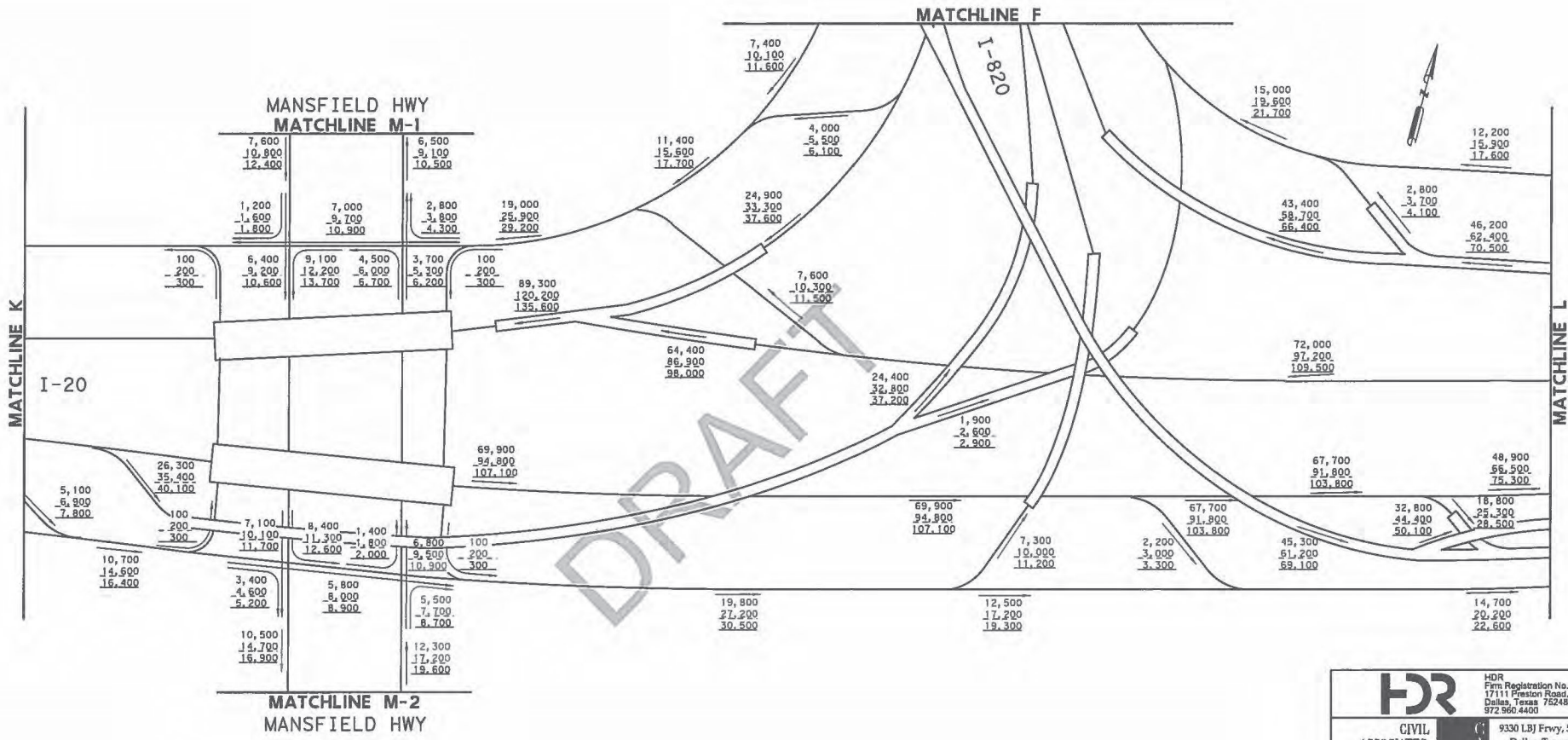
SOUTHEAST CONNECTOR PROJECT
I-20 - FOREST HILL DR TO ANGLIN DR
BUILD VOLUMES

SHEET 07 OF 17

FED. RD. DIV. NO.	STATE PROJECT NO.		HIGHWAY NO.
6			IH 20
STATE	DISTRICT	COUNTY	SHEET NO.
TEXAS	FTW	TARRANT	B7
CONTROL	SECTION	JOB	
0008	13	206	



DRAFT

LEGEND
1,000 - 2025 ADT
1,000 - 2045 ADT
1,000 - 2055 ADT

NOT TO SCALE

NOTE: PRELIMINARY TRAFFIC, AWAITING TP&P APPROVAL

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SOUTHEAST CONNECTOR PROJECT
I-20 - MANSFIELD HWY TO I-820
BUILD VOLUMES

SHEET 08 OF 17

FED. RD. DIV. NO.	STATE PROJECT NO.		HIGHWAY NO.
6			IH 20
STATE	DISTRICT	COUNTY	SHEET NO.
TEXAS	FTW	TARRANT	B8
CONTROL	SECTION	JOB	
0008	13	206	

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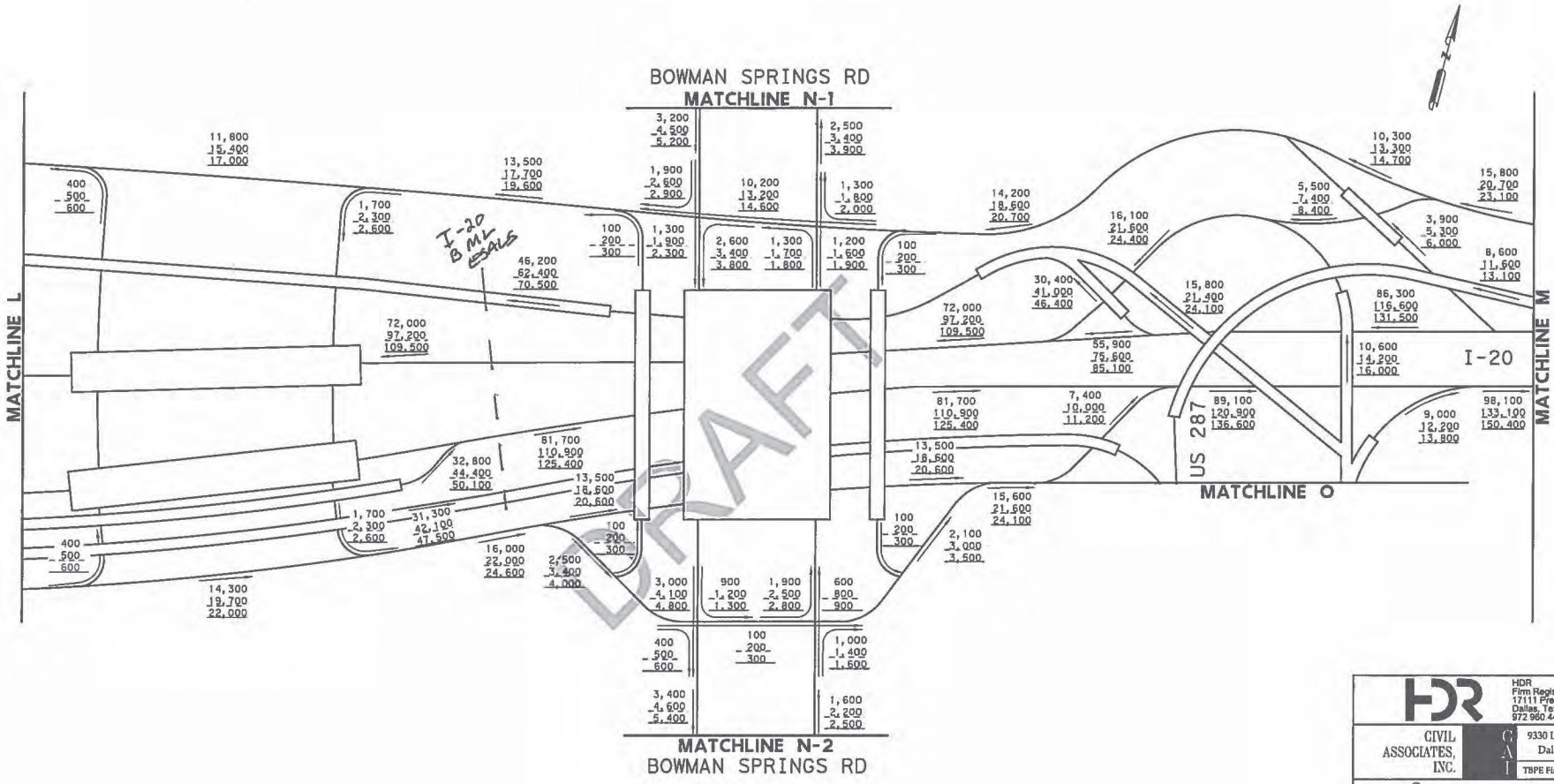
Serial Number 84704



LEGEND
1,000 - 2025 AOT
1,000 - 2045 AOT
1,000 - 2055 AOT

NOT TO SCALE

NOTE: PRELIMINARY TRAFFIC, AWAITING TP&P APPROVAL

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SOUTHEAST CONNECTOR PROJECT
I-20 - I-820 TO US 287
BUILD VOLUMES

SHEET 09 OF 17

FED. RD. DIV. NO.	STATE PROJECT NO.		HIGHWAY NO.
6			IH 20
STATE	DISTRICT	COUNTY	SHEET NO.
TEXAS	FTW	TARRANT	B9
CONTROL	SECTION	JOB	
2374	05	066	

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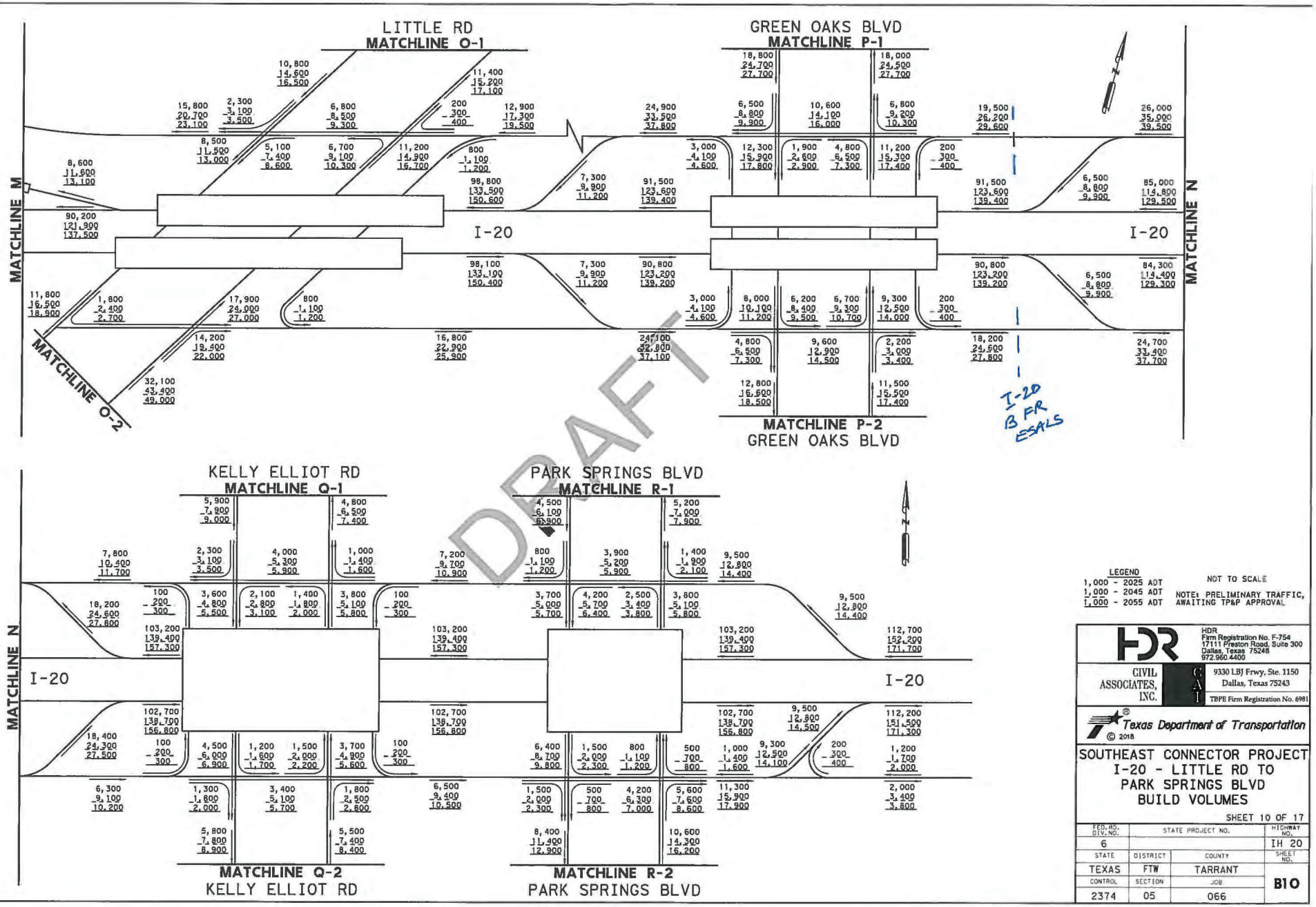
Serial Number 84704



DRAFT

LEGEND
1,000 - 2025 ADT
1,000 - 2045 ADT
1,000 - 2055 ADT

NOT TO SCALE

NOTE: PRELIMINARY TRAFFIC, AWAITING TP&P APPROVAL

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SOUTHEAST CONNECTOR PROJECT
I-20 - LITTLE RD TO
PARK SPRINGS BLVD
BUILD VOLUMES

SHEET 10 OF 17

FED. RD. DIV. NO.	STATE PROJECT NO.		HIGHWAY NO.
6			IH 20
STATE	DISTRICT	COUNTY	SHEET NO.
TEXAS	FTW	TARRANT	
CONTROL	SECTION	JOB	B10
2374	05	066	

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BIDDING OR PERMIT PURPOSES
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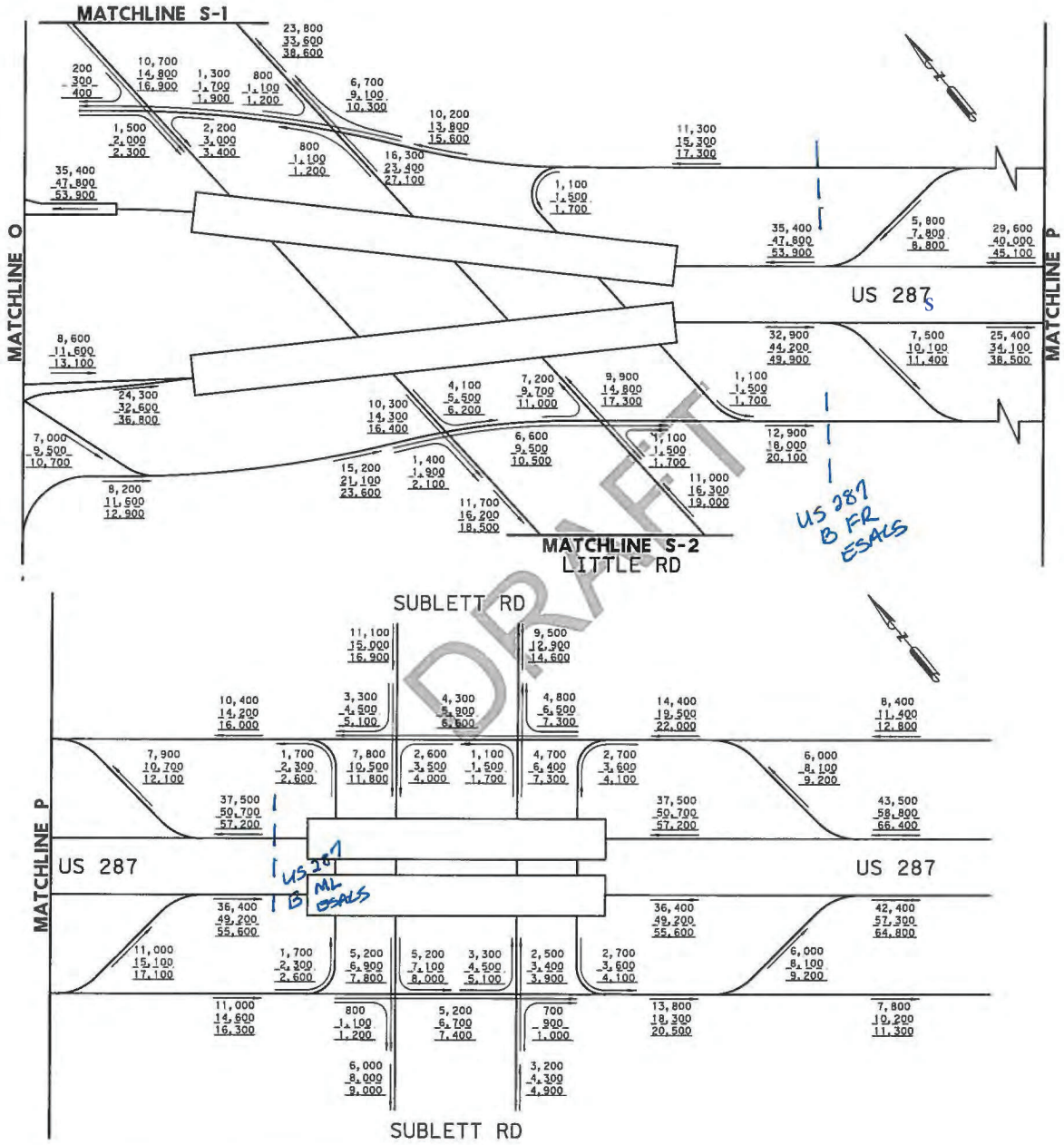
License Number 84704



LEGEND
1,000 - 2025 ADT
1,000 - 2045 ADT
1,000 - 2055 ADT

NOT TO SCALE

NOTE: PRELIMINARY TRAFFIC, AWAITING TP&P APPROVAL

NOT INTENDED FOR CONSTRUCTION BIDDING OR PERMIT PURPOSES

William Erick Knowles, P.E

Serial Number 84704

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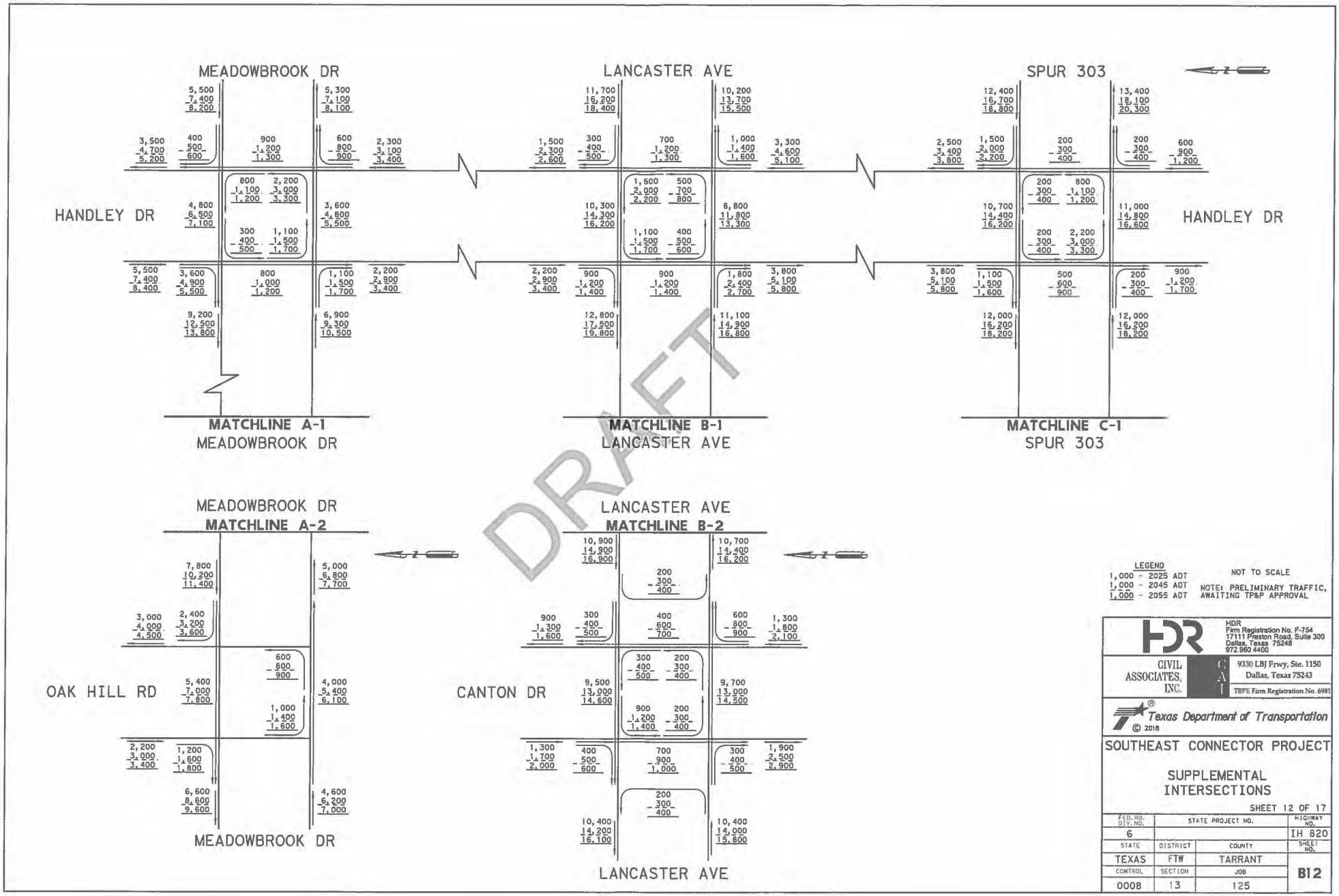
SOUTHEAST CONNECTOR PROJECT
US 287 - FROM I-20 TO SUBLETT RD
BUILD VOLUMES

SHEET 11 OF 17

FED. RD. DIV. NO.	STATE PROJECT NO.		HIGHWAY NO.
6			US 287
STATE	DISTRICT	COUNTY	SHEET NO.
TEXAS	FTW	TARRANT	
CONTROL	SECTION	JOB	B11
0172	09	028	



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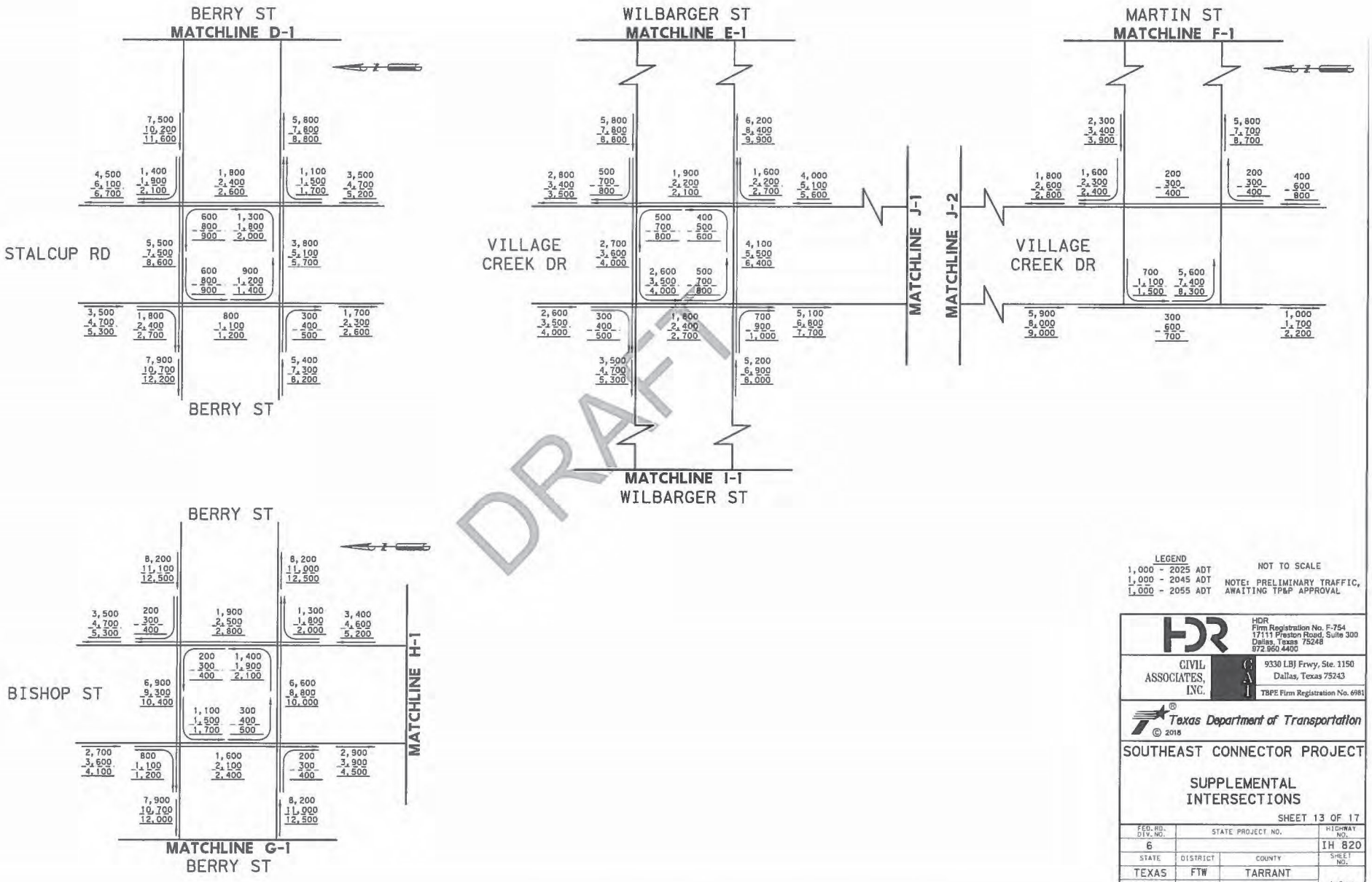
BIDDING OR PERMIT PURPOSES
William Erick Knowles, P.E.
Serial Number 84704



LEGEND
1,000 - 2025 ADT
1,000 - 2045 ADT
1,000 - 2055 ADT

NOT TO SCALE

NOTE: PRELIMINARY TRAFFIC, AWAITING TP&P APPROVAL

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SOUTHEAST CONNECTOR PROJECT

SUPPLEMENTAL INTERSECTIONS

SHEET 13 OF 17

FED. RD. DIV. NO.	STATE PROJECT NO.		HIGHWAY NO.
6			IH 820
STATE	DISTRICT	COUNTY	SHEET NO.
TEXAS	FTW	TARRANT	
CONTROL	SECTION	JOB	B13
0008	13	125	

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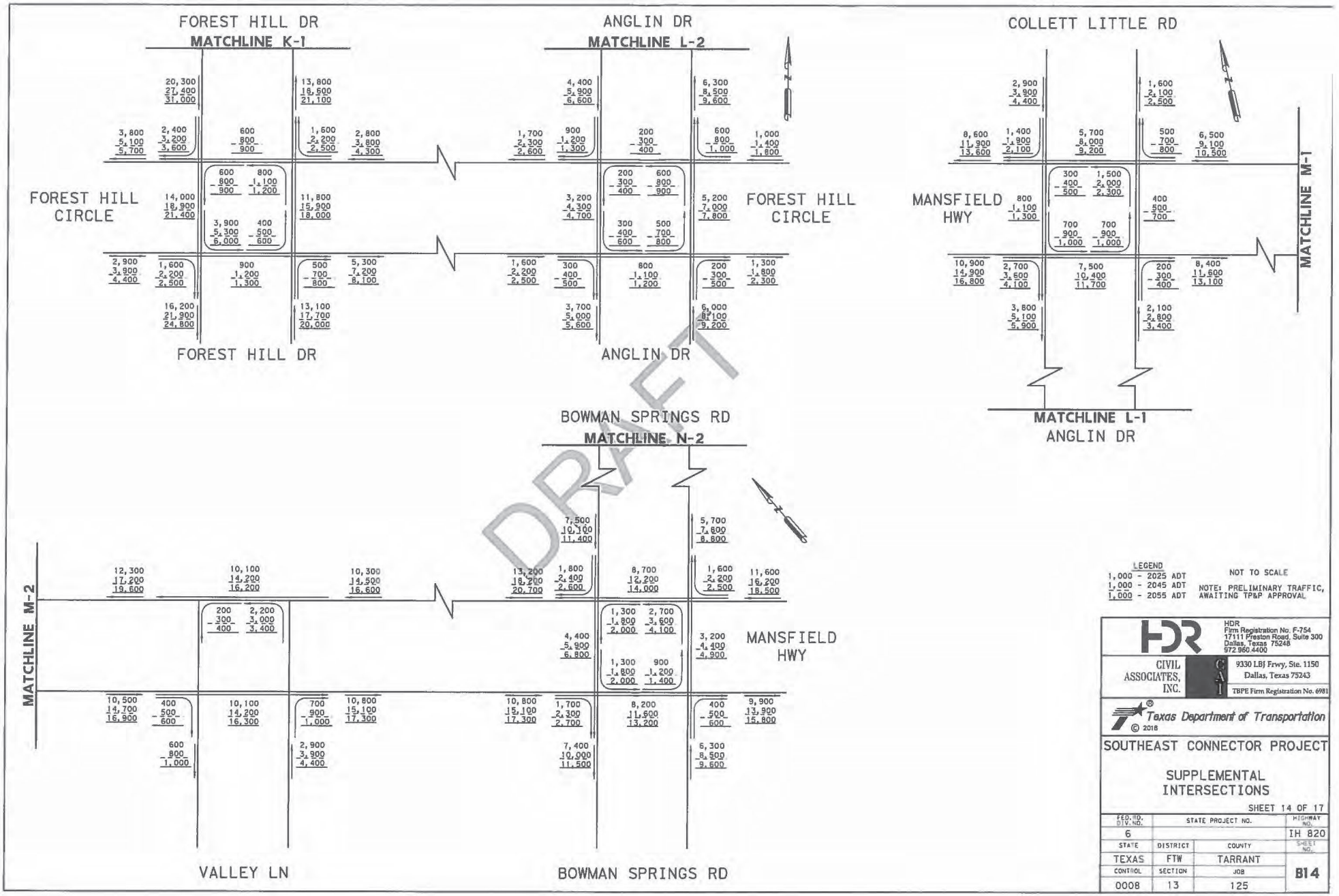

LEGEND
1,000 - 2025 ADT
1,000 - 2045 ADT
1,000 - 2055 ADT

NOT TO SCALE

NOTE: PRELIMINARY TRAFFIC, AWAITING TP&P APPROVAL

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SOUTHEAST CONNECTOR PROJECT

SUPPLEMENTAL INTERSECTIONS

SHEET 14 OF 17

FED. RD. DIV. NO.	STATE PROJECT NO.		HIGHWAY NO.
6			IH 820
STATE	DISTRICT	COUNTY	SHEET NO.
TEXAS	FTW	TARRANT	
CONTROL	SECTION	JOB	B14
0008	13	125	

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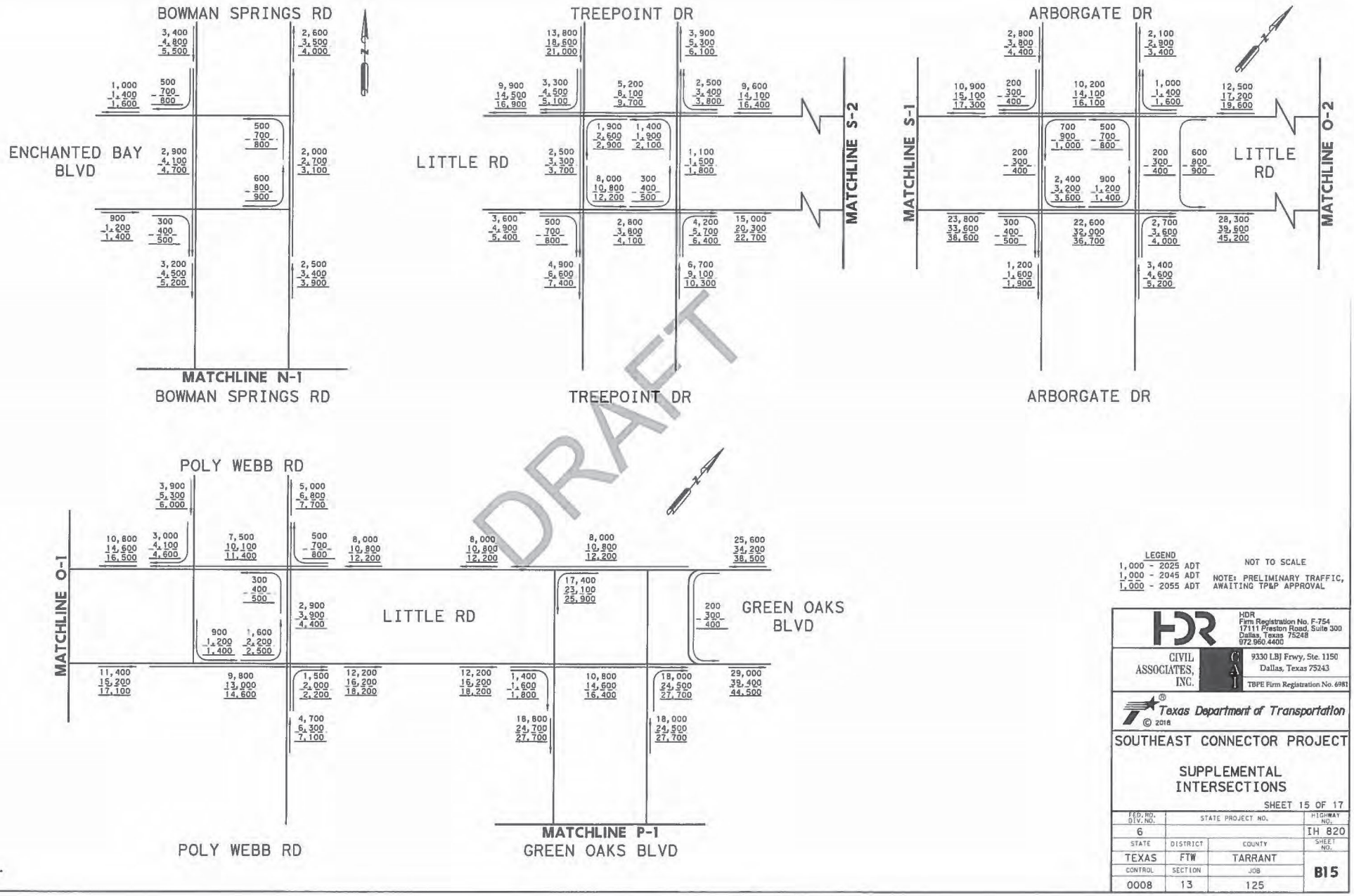
Serial Number 84704



LEGEND
1,000 - 2025 ADT
1,000 - 2045 ADT
1,000 - 2055 ADT

NOT TO SCALE

NOTE: PRELIMINARY TRAFFIC, AWAITING TP&P APPROVAL

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SOUTHEAST CONNECTOR PROJECT

SUPPLEMENTAL INTERSECTIONS

SHEET 15 OF 17

FED. RD. DIV. NO.	STATE PROJECT NO.		HIGHWAY NO.
6			IH 820
STATE	DISTRICT	COUNTY	SHEET NO.
TEXAS	FTW	TARRANT	B15
CONTROL	SECTION	JOB	
0008	13	125	

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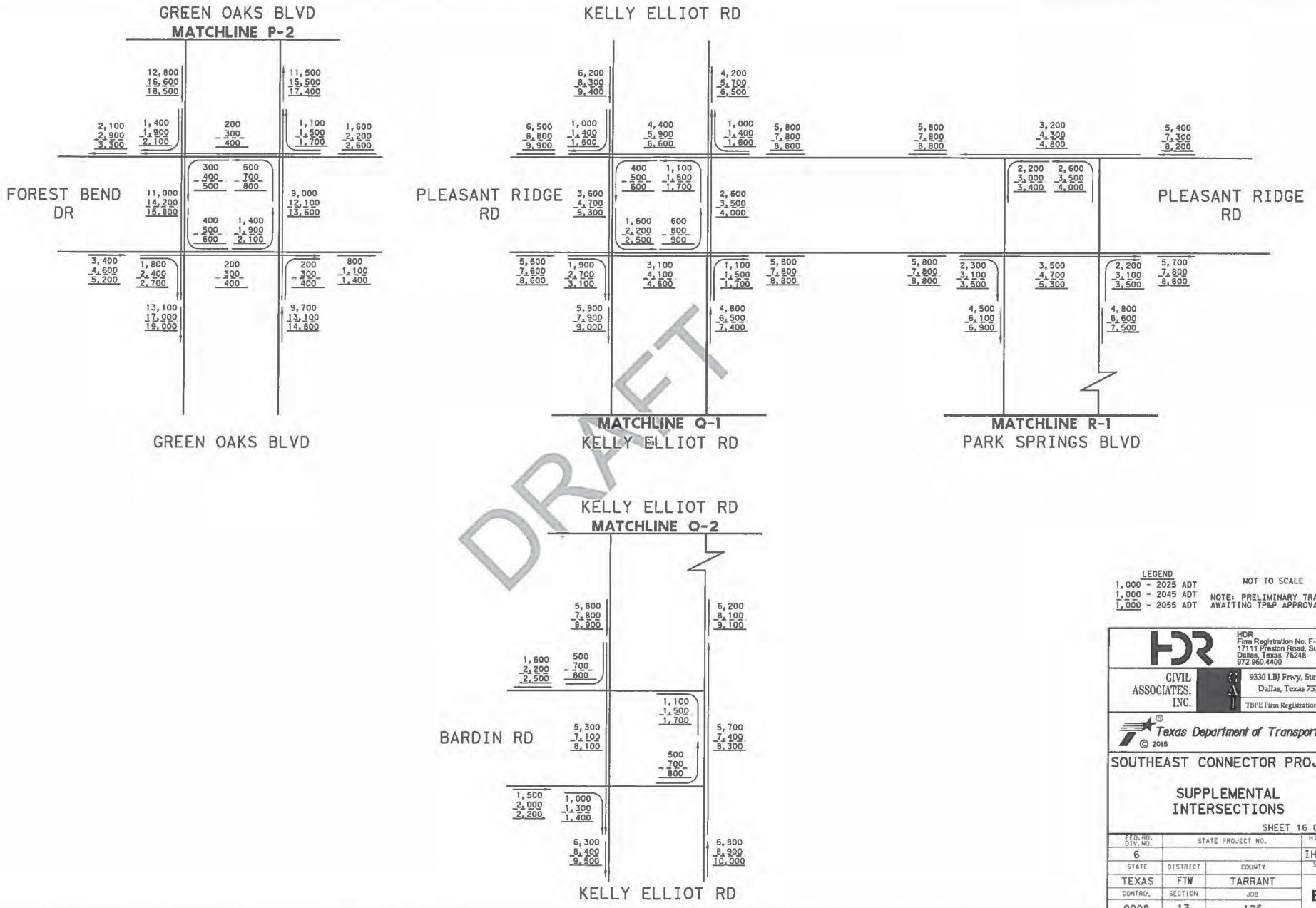
Serial Number 84704



DRAFT

LEGEND
1,000 - 2025 ADT
1,000 - 2045 ADT
1,000 - 2055 ADT

NOT TO SCALE

NOTE: PRELIMINARY TRAFFIC, AWAITING TP&P APPROVAL

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SOUTHEAST CONNECTOR PROJECT

SUPPLEMENTAL INTERSECTIONS

SHEET 16 OF 17

FED. RD. DIV. NO.	STATE PROJECT NO.		HIGHWAY NO.
6			IH 820
STATE	DISTRICT	COUNTY	SHEET NO.
TEXAS	FTW	TARRANT	B16
CONTROL	SECTION	JOB	
0008	13	125	

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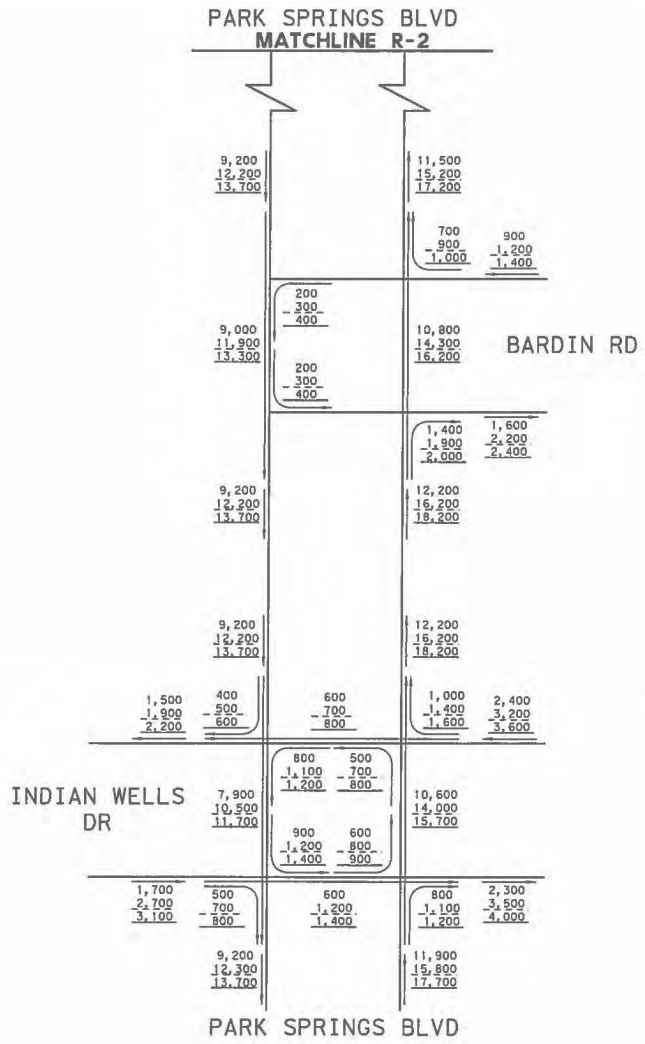
License Number 84704



DRAFT

LEGEND
1,000 - 2025 ADT
1,000 - 2045 ADT
1,000 - 2055 ADT

NOT TO SCALE

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SOUTHEAST CONNECTOR PROJECT

SUPPLEMENTAL INTERSECTIONS

SHEET 17 OF 17

FED. RD. DIV. NO.	STATE PROJECT NO.		HIGHWAY NO.
6			IH 820
STATE	DISTRICT	COUNTY	SHEET NO.
TEXAS	FTW	TARRANT	B17
CONTROL	SECTION	JOB	
0008	13	125	

NOT INTENDED FOR CONSTRUCTION, BIDDING OR PERMIT PURPOSES
William Erick Knowles, P.E
Serial Number 84704

TRAFFIC ANALYSIS FOR HIGHWAY DESIGN

Fort Worth District **August 13, 2019**

Description of Location	Average Daily Traffic 2025	Average Daily Traffic 2045	Base Year Dir Dist %	Base Year K Factor	Base Year Percent Trucks ADT	Base Year Percent Trucks DHV	ATHWLD	Percent Tandem Axles in ATHWLD	Total Number of Equivalent 18k Single Axle Load Applications One Direction Expected for a 20 Year Period (2025 to 2045) Flexible Pavement	S N	Rigid Pavement	SLAB
I-820 (No Build-Mainlanes Only) Section 1 From I-20 To US 287 Tarrant County	163,900	221,200	52 - 48	9.9	5.3	2.4	13,100	20	30,563,000	3	39,861,000	8"

Data for Use in Air & Noise Analysis

Vehicle Class	Base Year % of ADT	Base Year % of DHV
Light Duty	94.7	97.6
Medium Duty	2.2	1.0
Heavy Duty	3.1	1.4

Description of Location	Average Daily Traffic 2025	Average Daily Traffic 2055	Base Year Dir Dist %	Base Year K Factor	Base Year Percent Trucks ADT	Base Year Percent Trucks DHV	ATHWLD	Percent Tandem Axles in ATHWLD	Total Number of Equivalent 18k Single Axle Load Applications One Direction Expected for a 30 Year Period (2025 to 2055) Flexible Pavement	S N	Rigid Pavement	SLAB
I-820 (No Build-Mainlanes Only) Section 1 From I-20 To US 287 Tarrant County	163,900	249,800	52 - 48	9.9	5.3	2.4	13,100	20	49,249,000	3	64,232,000	8"

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TRAFFIC ANALYSIS FOR HIGHWAY DESIGN

Fort Worth District

August 13, 2019

Description of Location	Average Daily Traffic 2025	Average Daily Traffic 2045	Base Year Dir Dist %	Base Year K Factor	Base Year Percent Trucks ADT	Base Year Percent Trucks DHV	ATHWLD	Percent Tandem Axles in ATHWLD	Total Number of Equivalent 18k Single Axle Load Applications One Direction Expected for a 20 Year Period (2025 to 2045) Flexible Pavement	S N	Rigid Pavement	SLAB
I-820 (No Build-Mainlanes Only) Section 2 From US 287 To Brentwood Stair Rd. Tarrant County	129,900	175,400	52 - 48	9.9	5.8	2.6	13,000	20	26,482,000	3	34,559,000	8"

Data for Use in Air & Noise Analysis

Vehicle Class	Base Year % of ADT	Base Year % of DHV
Light Duty	94.2	97.4
Medium Duty	2.4	1.1
Heavy Duty	3.4	1.5

Description of Location	Average Daily Traffic 2025	Average Daily Traffic 2055	Base Year Dir Dist %	Base Year K Factor	Base Year Percent Trucks ADT	Base Year Percent Trucks DHV	ATHWLD	Percent Tandem Axles in ATHWLD	Total Number of Equivalent 18k Single Axle Load Applications One Direction Expected for a 30 Year Period (2025 to 2055) Flexible Pavement	S N	Rigid Pavement	SLAB
I-820 (No Build-Mainlanes Only) Section 2 From US 287 To Brentwood Stair Rd. Tarrant County	129,900	198,000	52 - 48	9.9	5.8	2.6	13,000	20	42,662,000	3	55,675,000	8"

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TRAFFIC ANALYSIS FOR HIGHWAY DESIGN

Fort Worth District **August 13, 2019**

Description of Location	Average Daily Traffic 2025	Average Daily Traffic 2045	Base Year Dir Dist %	Base Year K Factor	Base Year Percent Trucks ADT	Base Year Percent Trucks DHV	ATHWLD	Percent Tandem Axles in ATHWLD	Total Number of Equivalent 18k Single Axle Load Applications One Direction Expected for a 20 Year Period (2025 to 2045) Flexible Pavement	S N	Rigid Pavement	SLAB
I-820 (No Build-Frontage Roads Only) From I-20 To Brentwood Stair Rd. Tarrant County	18,700	25,400	52 - 48	9.9	10.7	8.0	12,000	40	7,717,000	3	10,103,000	8"

Data for Use in Air & Noise Analysis

Vehicle Class	Base Year % of ADT	Base Year % of DHV
Light Duty	89.3	92.0
Medium Duty	3.2	2.4
Heavy Duty	7.5	5.6

Description of Location	Average Daily Traffic 2025	Average Daily Traffic 2055	Base Year Dir Dist %	Base Year K Factor	Base Year Percent Trucks ADT	Base Year Percent Trucks DHV	ATHWLD	Percent Tandem Axles in ATHWLD	Total Number of Equivalent 18k Single Axle Load Applications One Direction Expected for a 30 Year Period (2025 to 2055) Flexible Pavement	S N	Rigid Pavement	SLAB
I-820 (No Build-Frontage Roads Only) From I-20 To Brentwood Stair Rd. Tarrant County	18,700	28,600	52 - 48	9.9	10.7	8.0	12,000	30	12,416,000	3	16,256,000	8"

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TRAFFIC ANALYSIS FOR HIGHWAY DESIGN

Fort Worth District

August 14, 2019

Description of Location	Average Daily Traffic 2025	Average Daily Traffic 2045	Base Year Dir Dist %	Base Year K Factor	Base Year Percent Trucks ADT	Base Year Percent Trucks DHV	ATHWLD	Percent Tandem Axles in ATHWLD	Total Number of Equivalent 18k Single Axle Load Applications One Direction Expected for a 20 Year Period (2025 to 2045) Flexible Pavement	S N	Rigid Pavement	SLAB
I-20 (No Build-Mainlanes Only) Section 1 From I-20/I-820 Interchange To US 287 Tarrant County	246,200	332,500	53 - 47	7.2	7.9	3.6	13,700	20	76,963,000	3	105,102,000	8"

Data for Use in Air & Noise Analysis

Vehicle Class	Base Year % of ADT	Base Year % of DHV
Light Duty	92.1	96.4
Medium Duty	2.3	1.0
Heavy Duty	5.6	2.6

Description of Location	Average Daily Traffic 2025	Average Daily Traffic 2055	Base Year Dir Dist %	Base Year K Factor	Base Year Percent Trucks ADT	Base Year Percent Trucks DHV	ATHWLD	Percent Tandem Axles in ATHWLD	Total Number of Equivalent 18k Single Axle Load Applications One Direction Expected for a 30 Year Period (2025 to 2055) Flexible Pavement	S N	Rigid Pavement	SLAB
I-20 (No Build-Mainlanes Only) Section 1 From I-20/I-820 Interchange To US 287 Tarrant County	246,200	375,200	53 - 47	7.2	7.9	3.6	13,700	20	123,966,000	3	169,290,000	8"

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TRAFFIC ANALYSIS FOR HIGHWAY DESIGN

Fort Worth District

August 14, 2019

Description of Location	Average Daily Traffic 2025	Average Daily Traffic 2045	Base Year Dir Dist %	Base Year K Factor	Base Year Percent Trucks ADT	Base Year Percent Trucks DHV	ATHWLD	Percent Tandem Axles in ATHWLD	Total Number of Equivalent 18k Single Axle Load Applications One Direction Expected for a 20 Year Period (2025 to 2045) Flexible Pavement	S N	Rigid Pavement	SLAB
I-20 (No Build-Mainlanes Only) Section 2 From US 287 To Park Springs Blvd. Tarrant County	218,900	295,700	53 - 47	7.2	8.3	3.7	13,600	20	71,870,000	3	98,168,000	8"

Data for Use in Air & Noise Analysis

Vehicle Class	Base Year % of ADT	Base Year % of DHV
Light Duty	91.7	96.3
Medium Duty	2.4	1.1
Heavy Duty	5.9	2.6

Description of Location	Average Daily Traffic 2025	Average Daily Traffic 2055	Base Year Dir Dist %	Base Year K Factor	Base Year Percent Trucks ADT	Base Year Percent Trucks DHV	ATHWLD	Percent Tandem Axles in ATHWLD	Total Number of Equivalent 18k Single Axle Load Applications One Direction Expected for a 30 Year Period (2025 to 2055) Flexible Pavement	S N	Rigid Pavement	SLAB
I-20 (No Build-Mainlanes Only) Section 2 From US 287 To Park Springs Blvd. Tarrant County	218,900	333,800	53 - 47	7.2	8.3	3.7	13,700	20	115,794,000	3	158,164,000	8"

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TRAFFIC ANALYSIS FOR HIGHWAY DESIGN

Fort Worth District **August 14, 2019**

Description of Location	Average Daily Traffic 2025	Average Daily Traffic 2045	Base Year Dir Dist %	Base Year K Factor	Base Year Percent Trucks ADT	Base Year Percent Trucks DHV	ATHWLD	Percent Tandem Axles in ATHWLD	Total Number of Equivalent 18k Single Axle Load Applications One Direction Expected for a 20 Year Period (2025 to 2045) Flexible Pavement	S N	Rigid Pavement	SLAB
I-20 (No Build-Frontage Roads Only) Section 1 From I-20/I-820 Interchange To US 287 Tarrant County	17,400	23,400	53 - 47	7.2	1.2	0.9	10,100	30	504,000	3	523,000	8"

Data for Use in Air & Noise Analysis

Vehicle Class	Base Year % of ADT	Base Year % of DHV
Light Duty	98.8	99.1
Medium Duty	1.0	0.8
Heavy Duty	0.2	0.1

Description of Location	Average Daily Traffic 2025	Average Daily Traffic 2055	Base Year Dir Dist %	Base Year K Factor	Base Year Percent Trucks ADT	Base Year Percent Trucks DHV	ATHWLD	Percent Tandem Axles in ATHWLD	Total Number of Equivalent 18k Single Axle Load Applications One Direction Expected for a 30 Year Period (2025 to 2055) Flexible Pavement	S N	Rigid Pavement	SLAB
I-20 (No Build-Frontage Roads Only) Section 1 From I-20/I-820 Interchange To US 287 Tarrant County	17,400	26,100	53 - 47	7.2	1.2	0.9	10,200	30	807,000	3	836,000	8"

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TRAFFIC ANALYSIS FOR HIGHWAY DESIGN

Fort Worth District

August 14, 2019

Description of Location	Average Daily Traffic 2025	Average Daily Traffic 2045	Base Year Dir Dist %	Base Year K Factor	Base Year Percent Trucks ADT	Base Year Percent Trucks DHV	ATHWLD	Percent Tandem Axles in ATHWLD	Total Number of Equivalent 18k Single Axle Load Applications One Direction Expected for a 20 Year Period (2025 to 2045) Flexible Pavement	S N	Rigid Pavement	SLAB
I-20 (No Build-Frontage Roads Only)												
Section 2												
From US 287 To Park Springs Blvd.	28,400	38,600	53 - 47	7.2	1.1	0.8	10,400	30	766,000	3	791,000	8"
Tarrant County												

Data for Use in Air & Noise Analysis

Vehicle Class	Base Year % of ADT	Base Year % of DHV
Light Duty	98.9	99.2
Medium Duty	0.9	0.7
Heavy Duty	0.2	0.1

Description of Location	Average Daily Traffic 2025	Average Daily Traffic 2055	Base Year Dir Dist %	Base Year K Factor	Base Year Percent Trucks ADT	Base Year Percent Trucks DHV	ATHWLD	Percent Tandem Axles in ATHWLD	Total Number of Equivalent 18k Single Axle Load Applications One Direction Expected for a 30 Year Period (2025 to 2055) Flexible Pavement	S N	Rigid Pavement	SLAB
I-20 (No Build-Frontage Roads Only)												
Section 2												
From US 287 To Park Springs Blvd.	28,400	43,600	53 - 47	7.2	1.1	0.8	10,500	30	1,234,000	3	1,276,000	8"
Tarrant County												

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TRAFFIC ANALYSIS FOR HIGHWAY DESIGN

Fort Worth District **August 14, 2019**

Description of Location	Average Daily Traffic 2025	Average Daily Traffic 2045	Base Year Dir Dist %	Base Year K Factor	Base Year Percent Trucks ADT	Base Year Percent Trucks DHV	ATHWLD	Percent Tandem Axles in ATHWLD	Total Number of Equivalent 18k Single Axle Load Applications One Direction Expected for a 20 Year Period (2025 to 2045) Flexible Pavement	S N	Rigid Pavement	SLAB
I-20 (No Build-Mainlanes Only) From I-20/I-820 Interchange To Forest Hill Drive Tarrant County	206,500	278,700	53 - 47	7.2	8.6	3.9	13,600	20	70,194,000	3	95,892,000	8"

Data for Use in Air & Noise Analysis

Vehicle Class	Base Year % of ADT	Base Year % of DHV
Light Duty	91.4	96.1
Medium Duty	2.5	1.1
Heavy Duty	6.1	2.8

Description of Location	Average Daily Traffic 2025	Average Daily Traffic 2055	Base Year Dir Dist %	Base Year K Factor	Base Year Percent Trucks ADT	Base Year Percent Trucks DHV	ATHWLD	Percent Tandem Axles in ATHWLD	Total Number of Equivalent 18k Single Axle Load Applications One Direction Expected for a 30 Year Period (2025 to 2055) Flexible Pavement	S N	Rigid Pavement	SLAB
I-20 (No Build-Mainlanes Only) From I-20/I-820 Interchange To Forest Hill Drive Tarrant County	206,500	314,400	53 - 47	7.2	8.6	3.9	13,700	20	113,043,000	3	154,429,000	8"

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TRAFFIC ANALYSIS FOR HIGHWAY DESIGN

Fort Worth District

August 14, 2019

Description of Location	Average Daily Traffic 2025	Average Daily Traffic 2045	Base Year Dir Dist %	Base Year K Factor	Base Year Percent Trucks ADT	Base Year Percent Trucks DHV	ATHWLD	Percent Tandem Axles in ATHWLD	Total Number of Equivalent 18k Single Axle Load Applications One Direction Expected for a 20 Year Period (2025 to 2045) Flexible Pavement	S N	Rigid Pavement	SLAB
I-20 (No Build-Frontage Roads Only) From I-20/I-820 Interchange To Forest Hill Drive Tarrant County	18,400	24,900	53 - 47	7.2	1.2	0.9	10,200	30	535,000	3	555,000	8"

Data for Use in Air & Noise Analysis

Vehicle Class	Base Year % of ADT	Base Year % of DHV
Light Duty	98.8	99.1
Medium Duty	1.0	0.8
Heavy Duty	0.2	0.1

Description of Location	Average Daily Traffic 2025	Average Daily Traffic 2055	Base Year Dir Dist %	Base Year K Factor	Base Year Percent Trucks ADT	Base Year Percent Trucks DHV	ATHWLD	Percent Tandem Axles in ATHWLD	Total Number of Equivalent 18k Single Axle Load Applications One Direction Expected for a 30 Year Period (2025 to 2055) Flexible Pavement	S N	Rigid Pavement	SLAB
I-20 (No Build-Frontage Roads Only) From I-20/I-820 Interchange To Forest Hill Drive Tarrant County	18,400	27,900	53 - 47	7.2	1.2	0.9	10,200	30	859,000	3	890,000	8"

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TRAFFIC ANALYSIS FOR HIGHWAY DESIGN

Fort Worth District

August 14, 2019

Description of Location	Average Daily Traffic 2025	Average Daily Traffic 2045	Base Year Dir Dist %	Base Year K Factor	Base Year Percent Trucks ADT	Base Year Percent Trucks DHV	ATHWLD	Percent Tandem Axles in ATHWLD	Total Number of Equivalent 18k Single Axle Load Applications One Direction Expected for a 20 Year Period (2025 to 2045) Flexible Pavement	S N	Rigid Pavement	SLAB
US 287 (No Build-Mainlanes Only)												
From I-820 To Bishop Street	77,600	104,800	54 - 46	9.7	7.1	4.3	12,700	30	21,187,000	3	28,914,000	8"
Tarrant County												

Data for Use in Air & Noise Analysis

Vehicle Class	Base Year % of ADT	Base Year % of DHV
Light Duty	92.9	95.7
Medium Duty	2.2	1.3
Heavy Duty	4.9	3.0

Description of Location	Average Daily Traffic 2025	Average Daily Traffic 2055	Base Year Dir Dist %	Base Year K Factor	Base Year Percent Trucks ADT	Base Year Percent Trucks DHV	ATHWLD	Percent Tandem Axles in ATHWLD	Total Number of Equivalent 18k Single Axle Load Applications One Direction Expected for a 30 Year Period (2025 to 2055) Flexible Pavement	S N	Rigid Pavement	SLAB
US 287 (No Build-Mainlanes Only)												
From I-820 To Bishop Street	77,600	118,400	54 - 46	9.7	7.1	4.3	12,800	30	34,150,000	3	46,606,000	8"
Tarrant County												

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TRAFFIC ANALYSIS FOR HIGHWAY DESIGN

Fort Worth District **August 14, 2019**

Description of Location	Base Year Average Daily Traffic 2025	Base Year Average Daily Traffic 2045	Dir Dist %	K Factor	Percent Trucks ADT	Percent Trucks DHV	ATHWLD	Percent Tandem Axles in ATHWLD	Total Number of Equivalent 18k Single Axle Load Applications One Direction Expected for a 20 Year Period (2025 to 2045) Flexible Pavement	S N	Rigid Pavement	SLAB
US 287 (No Build-Frontage Roads Only) From I-820 To Bishop Street Tarrant County	12,200	16,600	54 - 46	9.7	6.6	5.0	11,100	40	2,415,000	3	3,013,000	8"

Data for Use in Air & Noise Analysis

Vehicle Class	Base Year % of ADT	Base Year % of DHV
Light Duty	93.4	95.0
Medium Duty	2.0	1.5
Heavy Duty	4.6	3.5

Description of Location	Base Year Average Daily Traffic 2025	Base Year Average Daily Traffic 2055	Dir Dist %	K Factor	Percent Trucks ADT	Percent Trucks DHV	ATHWLD	Percent Tandem Axles in ATHWLD	Total Number of Equivalent 18k Single Axle Load Applications One Direction Expected for a 30 Year Period (2025 to 2055) Flexible Pavement	S N	Rigid Pavement	SLAB
US 287 (No Build-Frontage Roads Only) From I-820 To Bishop Street Tarrant County	12,200	18,800	54 - 46	9.7	6.6	5.0	11,200	40	3,900,000	3	4,864,000	8"

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TRAFFIC ANALYSIS FOR HIGHWAY DESIGN

Fort Worth District

August 14, 2019

Description of Location	Average Daily Traffic 2025	Average Daily Traffic 2045	Base Year Dir Dist %	Base Year K Factor	Base Year Percent Trucks ADT	Base Year Percent Trucks DHV	ATHWLD	Percent Tandem Axles in ATHWLD	Total Number of Equivalent 18k Single Axle Load Applications One Direction Expected for a 20 Year Period (2025 to 2045) Flexible Pavement	S N	Rigid Pavement	SLAB
US 287 (No Build-Mainlanes Only) From I-20 To Sublett Road Tarrant County	73,900	99,900	54 - 46	9.7	10.0	6.0	12,900	40	31,374,000	3	44,291,000	8"

Data for Use in Air & Noise Analysis

Vehicle Class	Base Year % of ADT	Base Year % of DHV
Light Duty	90.0	94.0
Medium Duty	2.3	1.4
Heavy Duty	7.7	4.6

Description of Location	Average Daily Traffic 2025	Average Daily Traffic 2055	Base Year Dir Dist %	Base Year K Factor	Base Year Percent Trucks ADT	Base Year Percent Trucks DHV	ATHWLD	Percent Tandem Axles in ATHWLD	Total Number of Equivalent 18k Single Axle Load Applications One Direction Expected for a 30 Year Period (2025 to 2055) Flexible Pavement	S N	Rigid Pavement	SLAB
US 287 (No Build-Mainlanes Only) From I-20 To Sublett Road Tarrant County	73,900	112,800	54 - 46	9.7	10.0	6.0	12,900	40	50,557,000	3	71,371,000	8"

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TRAFFIC ANALYSIS FOR HIGHWAY DESIGN

Fort Worth District

August 14, 2019

Description of Location	Average Daily Traffic 2025	Average Daily Traffic 2045	Base Year Dir Dist %	Base Year K Factor	Base Year Percent Trucks ADT	Base Year Percent Trucks DHV	ATHWLD	Percent Tandem Axles in ATHWLD	Total Number of Equivalent 18k Single Axle Load Applications One Direction Expected for a 20 Year Period (2025 to 2045) Flexible Pavement	S N	Rigid Pavement	SLAB
US 287 (No Build-Frontage Roads Only) From I-20 To Sublett Road Tarrant County	20,200	27,400	54 - 46	9.7	5.4	4.1	11,400	40	3,671,000	3	4,787,000	8"

Data for Use in Air & Noise Analysis

Vehicle Class	Base Year % of ADT	Base Year % of DHV
Light Duty	94.6	95.9
Medium Duty	1.2	0.9
Heavy Duty	4.2	3.2

Description of Location	Average Daily Traffic 2025	Average Daily Traffic 2055	Base Year Dir Dist %	Base Year K Factor	Base Year Percent Trucks ADT	Base Year Percent Trucks DHV	ATHWLD	Percent Tandem Axles in ATHWLD	Total Number of Equivalent 18k Single Axle Load Applications One Direction Expected for a 30 Year Period (2025 to 2055) Flexible Pavement	S N	Rigid Pavement	SLAB
US 287 (No Build-Frontage Roads Only) From I-20 To Sublett Road Tarrant County	20,200	30,800	54 - 46	9.7	5.4	4.1	11,500	40	5,900,000	3	7,694,000	8"

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TRAFFIC ANALYSIS FOR HIGHWAY DESIGN

Fort Worth District **August 14, 2019**

Description of Location	Average Daily Traffic 2025	Average Daily Traffic 2045	Base Year Dir Dist %	Base Year K Factor	Base Year Percent Trucks ADT	Base Year Percent Trucks DHV	ATHWLD	Percent Tandem Axles in ATHWLD	Total Number of Equivalent 18k Single Axle Load Applications One Direction Expected for a 20 Year Period (2025 to 2045) Flexible Pavement	S N	Rigid Pavement	SLAB
I-820 (Build-Mainlanes Only) Section 1 From I-20 To US 287 Tarrant County	145,300	196,100	52 - 48	9.9	5.5	2.5	13,000	20	28,102,000	3	36,661,000	8"

Data for Use in Air & Noise Analysis

Vehicle Class	Base Year % of ADT	Base Year % of DHV
Light Duty	94.5	97.5
Medium Duty	2.3	1.0
Heavy Duty	3.2	1.5

Description of Location	Average Daily Traffic 2025	Average Daily Traffic 2055	Base Year Dir Dist %	Base Year K Factor	Base Year Percent Trucks ADT	Base Year Percent Trucks DHV	ATHWLD	Percent Tandem Axles in ATHWLD	Total Number of Equivalent 18k Single Axle Load Applications One Direction Expected for a 30 Year Period (2025 to 2055) Flexible Pavement	S N	Rigid Pavement	SLAB
I-820 (Build-Mainlanes Only) Section 1 From I-20 To US 287 Tarrant County	145,300	221,500	52 - 48	9.9	5.5	2.5	13,000	20	45,289,000	3	59,083,000	8"

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TRAFFIC ANALYSIS FOR HIGHWAY DESIGN

Fort Worth District

August 14, 2019

Description of Location	Average Daily Traffic 2025	Average Daily Traffic 2045	Base Year Dir Dist %	Base Year K Factor	Base Year Percent Trucks ADT	Base Year Percent Trucks DHV	ATHWLD	Percent Tandem Axles in ATHWLD	Total Number of Equivalent 18k Single Axle Load Applications One Direction Expected for a 20 Year Period (2025 to 2045) Flexible Pavement	S N	Rigid Pavement	SLAB
I-820 (Build-Mainlanes Only) Section 2 From US 287 To Brentwood Stair Rd. Tarrant County	110,500	149,200	52 - 48	9.9	6.2	2.8	12,900	30	24,060,000	3	31,412,000	8"

Data for Use in Air & Noise Analysis

Vehicle Class	Base Year % of ADT	Base Year % of DHV
Light Duty	93.8	97.2
Medium Duty	2.5	1.1
Heavy Duty	3.7	1.7

Description of Location	Average Daily Traffic 2025	Average Daily Traffic 2055	Base Year Dir Dist %	Base Year K Factor	Base Year Percent Trucks ADT	Base Year Percent Trucks DHV	ATHWLD	Percent Tandem Axles in ATHWLD	Total Number of Equivalent 18k Single Axle Load Applications One Direction Expected for a 30 Year Period (2025 to 2055) Flexible Pavement	S N	Rigid Pavement	SLAB
I-820 (Build-Mainlanes Only) Section 2 From US 287 To Brentwood Stair Rd. Tarrant County	110,500	168,400	52 - 48	9.9	6.2	2.8	13,000	20	38,760,000	3	50,604,000	8"

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Serial Number 94784

TRAFFIC ANALYSIS FOR HIGHWAY DESIGN

Fort Worth District

August 14, 2019

Description of Location	Average Daily Traffic 2025	Average Daily Traffic 2045	Base Year Dir Dist %	Base Year K Factor	Base Year Percent Trucks ADT	Base Year Percent Trucks DHV	ATHWLD	Percent Tandem Axles in ATHWLD	Total Number of Equivalent 18k Single Axle Load Applications One Direction Expected for a 20 Year Period (2025 to 2045) Flexible Pavement	S N	Rigid Pavement	SLAB
I-820 (Build-Frontage Roads Only) From I-20 To Brentwood Stair Rd. Tarrant County	31,200	41,600	52 - 48	9.9	10.1	7.6	12,300	30	12,030,000	3	15,747,000	8"

Data for Use in Air & Noise Analysis

Vehicle Class	Base Year % of ADT	Base Year % of DHV
Light Duty	89.9	92.4
Medium Duty	3.0	2.3
Heavy Duty	7.1	5.3

Description of Location	Average Daily Traffic 2025	Average Daily Traffic 2055	Base Year Dir Dist %	Base Year K Factor	Base Year Percent Trucks ADT	Base Year Percent Trucks DHV	ATHWLD	Percent Tandem Axles in ATHWLD	Total Number of Equivalent 18k Single Axle Load Applications One Direction Expected for a 30 Year Period (2025 to 2055) Flexible Pavement	S N	Rigid Pavement	SLAB
I-820 (Build-Frontage Roads Only) From I-20 To Brentwood Stair Rd. Tarrant County	31,200	46,700	52 - 48	9.9	10.1	7.6	12,300	30	19,308,000	3	25,275,000	8"

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TRAFFIC ANALYSIS FOR HIGHWAY DESIGN

Fort Worth District

August 14, 2019

Description of Location	Average Daily Traffic 2025	Average Daily Traffic 2045	Base Year Dir Dist %	Base Year K Factor	Base Year Percent Trucks ADT	Base Year Percent Trucks DHV	ATHWLD	Percent Tandem Axles in ATHWLD	Total Number of Equivalent 18k Single Axle Load Applications One Direction Expected for a 20 Year Period (2025 to 2045) Flexible Pavement	S N	Rigid Pavement	SLAB
I-20 (Build-Mainlanes Only) From I-20/I-820 Interchange To Park Springs Blvd. Tarrant County	231,200	312,600	53 - 47	7.2	8.1	3.6	13,600	20	74,132,000	3	101,247,000	8"

Data for Use in Air & Noise Analysis

Vehicle Class	Base Year % of ADT	Base Year % of DHV
Light Duty	91.9	96.4
Medium Duty	2.4	1.1
Heavy Duty	5.7	2.5

Description of Location	Average Daily Traffic 2025	Average Daily Traffic 2055	Base Year Dir Dist %	Base Year K Factor	Base Year Percent Trucks ADT	Base Year Percent Trucks DHV	ATHWLD	Percent Tandem Axles in ATHWLD	Total Number of Equivalent 18k Single Axle Load Applications One Direction Expected for a 30 Year Period (2025 to 2055) Flexible Pavement	S N	Rigid Pavement	SLAB
I-20 (Build-Mainlanes Only) From I-20/I-820 Interchange To Park Springs Blvd. Tarrant County	231,200	352,900	53 - 47	7.2	8.1	3.6	13,700	20	119,449,000	3	163,138,000	8"

OT INTENDED FOR CONSTRUCTIOI
DDING OR PERMIT PURPOSES
illiam Erick Knowles, P.E
Serial Number 84704

TRAFFIC ANALYSIS FOR HIGHWAY DESIGN

Fort Worth District

August 14, 2019

Description of Location	Average Daily Traffic 2025	Average Daily Traffic 2045	Base Year Dir Dist %	Base Year K Factor	Base Year Percent Trucks ADT	Base Year Percent Trucks DHV	ATHWLD	Percent Tandem Axles in ATHWLD	Total Number of Equivalent 18k Single Axle Load Applications One Direction Expected for a 20 Year Period (2025 to 2045) Flexible Pavement	S N	Rigid Pavement	SLAB
I-20 (Build-Frontage Roads Only)												
From I-20/I-820 Interchange To Park Springs Blvd. Tarrant County	37,700	50,800	53 - 47	7.2	1.1	0.8	10,700	20	1,011,000	3	1,045,000	8"

Data for Use in Air & Noise Analysis

Vehicle Class	Base Year % of ADT	Base Year % of DHV
Light Duty	98.9	99.2
Medium Duty	0.9	0.7
Heavy Duty	0.2	0.1

Description of Location	Average Daily Traffic 2025	Average Daily Traffic 2055	Base Year Dir Dist %	Base Year K Factor	Base Year Percent Trucks ADT	Base Year Percent Trucks DHV	ATHWLD	Percent Tandem Axles in ATHWLD	Total Number of Equivalent 18k Single Axle Load Applications One Direction Expected for a 30 Year Period (2025 to 2055) Flexible Pavement	S N	Rigid Pavement	SLAB
I-20 (Build-Frontage Roads Only)												
From I-20/I-820 Interchange To Park Springs Blvd. Tarrant County	37,700	57,400	53 - 47	7.2	1.1	0.8	10,800	20	1,630,000	3	1,685,000	8"

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`IDDING OR PERMIT PURPOSES
William Erick Knowles, P.E
Serial Number 94704

TRAFFIC ANALYSIS FOR HIGHWAY DESIGN

Fort Worth District

August 14, 2019

Description of Location	Average Daily Traffic 2025	Average Daily Traffic 2045	Base Year Dir Dist %	Base Year K Factor	Base Year Percent Trucks ADT	Base Year Percent Trucks DHV	ATHWLD	Percent Tandem Axles in ATHWLD	Total Number of Equivalent 18k Single Axle Load Applications One Direction Expected for a 20 Year Period (2025 to 2045) Flexible Pavement	S N	Rigid Pavement	SLAB
I-20 (Build-Mainlanes Only) From I-20/I-820 Interchange To Forest Hill Drive Tarrant County	202,100	272,700	53 - 47	7.2	8.7	3.9	13,600	20	69,485,000	3	94,928,000	8"

Data for Use in Air & Noise Analysis

Vehicle Class	Base Year % of ADT	Base Year % of DHV
Light Duty	91.3	96.1
Medium Duty	2.5	1.1
Heavy Duty	6.2	2.8

Description of Location	Average Daily Traffic 2025	Average Daily Traffic 2055	Base Year Dir Dist %	Base Year K Factor	Base Year Percent Trucks ADT	Base Year Percent Trucks DHV	ATHWLD	Percent Tandem Axles in ATHWLD	Total Number of Equivalent 18k Single Axle Load Applications One Direction Expected for a 30 Year Period (2025 to 2055) Flexible Pavement	S N	Rigid Pavement	SLAB
I-20 (Build-Mainlanes Only) From I-20/I-820 Interchange To Forest Hill Drive Tarrant County	202,100	307,800	53 - 47	7.2	8.7	3.9	13,600	20	111,924,000	3	152,907,000	8"

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BIDDING OR PERMIT PURPOSES
William Erick Knowles, P.E
Serial Number 84704

TRAFFIC ANALYSIS FOR HIGHWAY DESIGN

Fort Worth District

August 14, 2019

Description of Location	Average Daily Traffic 2025	Average Daily Traffic 2045	Base Year Dir Dist %	Base Year K Factor	Base Year Percent Trucks ADT	Base Year Percent Trucks DHV	ATHWLD	Percent Tandem Axles in ATHWLD	Total Number of Equivalent 18k Single Axle Load Applications One Direction Expected for a 20 Year Period (2025 to 2045) Flexible Pavement	S N	Rigid Pavement	SLAB
I-20 (Build-Frontage Roads Only) From I-20/I-820 Interchange To Forest Hill Drive Tarrant County	20,500	28,300	53 - 47	7.2	1.2	0.9	10,200	30	603,000	3	625,000	8"

Data for Use in Air & Noise Analysis

Vehicle Class	Base Year % of ADT	Base Year % of DHV
Light Duty	98.8	99.1
Medium Duty	1.0	0.8
Heavy Duty	0.2	0.1

Description of Location	Average Daily Traffic 2025	Average Daily Traffic 2055	Base Year Dir Dist %	Base Year K Factor	Base Year Percent Trucks ADT	Base Year Percent Trucks DHV	ATHWLD	Percent Tandem Axles in ATHWLD	Total Number of Equivalent 18k Single Axle Load Applications One Direction Expected for a 30 Year Period (2025 to 2055) Flexible Pavement	S N	Rigid Pavement	SLAB
I-20 (Build-Frontage Roads Only) From I-20/I-820 Interchange To Forest Hill Drive Tarrant County	20,500	31,900	53 - 47	7.2	1.2	0.9	10,300	30	972,000	3	1,007,000	8"

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BIDDING OR PERMIT PURPOSES
William Erick Knowles, P.E
Serial Number 84704

TRAFFIC ANALYSIS FOR HIGHWAY DESIGN

Fort Worth District

August 14, 2019

Description of Location	Average Daily Traffic 2025	Average Daily Traffic 2045	Base Year Dir Dist %	Base Year K Factor	Base Year Percent Trucks ADT	Base Year Percent Trucks DHV	ATHWLD	Percent Tandem Axles in ATHWLD	Total Number of Equivalent 18k Single Axle Load Applications One Direction Expected for a 20 Year Period (2025 to 2045) Flexible Pavement	S N	Rigid Pavement	SLAB
US 287 (Build-Mainlanes Only) From I-820 To Bishop Street Tarrant County	74,100	100,100	54 - 46	9.7	7.2	4.3	12,700	30	20,515,000	3	28,000,000	8"

Data for Use in Air & Noise Analysis

Vehicle Class	Base Year % of ADT	Base Year % of DHV
Light Duty	92.8	95.7
Medium Duty	2.2	1.3
Heavy Duty	5.0	3.0

Description of Location	Average Daily Traffic 2025	Average Daily Traffic 2055	Base Year Dir Dist %	Base Year K Factor	Base Year Percent Trucks ADT	Base Year Percent Trucks DHV	ATHWLD	Percent Tandem Axles in ATHWLD	Total Number of Equivalent 18k Single Axle Load Applications One Direction Expected for a 30 Year Period (2025 to 2055) Flexible Pavement	S N	Rigid Pavement	SLAB
US 287 (Build-Mainlanes Only) From I-820 To Bishop Street Tarrant County	74,100	113,000	54 - 46	9.7	7.2	4.3	12,800	30	33,053,000	3	45,112,000	8"

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BIDDING OR PERMIT PURPOSES
William Erick Knowles, P.E
Serial Number 84704

TRAFFIC ANALYSIS FOR HIGHWAY DESIGN

Fort Worth District

August 14, 2019

Description of Location	Average Daily Traffic 2025	Average Daily Traffic 2045	Base Year Dir Dist %	Base Year K Factor	Base Year Percent Trucks ADT	Base Year Percent Trucks DHV	ATHWLD	Percent Tandem Axles in ATHWLD	Total Number of Equivalent 18k Single Axle Load Applications One Direction Expected for a 20 Year Period (2025 to 2045) Flexible Pavement	S N	Rigid Pavement	SLAB
US 287 (Build-Frontage Roads Only) From I-820 To Bishop Street Tarrant County	14,800	19,900	54 - 46	9.7	6.1	4.6	11,200	40	2,693,000	3	3,357,000	8"

Data for Use in Air & Noise Analysis

Vehicle Class	Base Year % of ADT	Base Year % of DHV
Light Duty	93.9	95.4
Medium Duty	1.9	1.4
Heavy Duty	4.2	3.2

Description of Location	Average Daily Traffic 2025	Average Daily Traffic 2055	Base Year Dir Dist %	Base Year K Factor	Base Year Percent Trucks ADT	Base Year Percent Trucks DHV	ATHWLD	Percent Tandem Axles in ATHWLD	Total Number of Equivalent 18k Single Axle Load Applications One Direction Expected for a 30 Year Period (2025 to 2055) Flexible Pavement	S N	Rigid Pavement	SLAB
US 287 (Build-Frontage Roads Only) From I-820 To Bishop Street Tarrant County	14,800	22,400	54 - 46	9.7	6.1	4.6	11,200	50	4,951,000	3	6,746,000	8"

IT IS INTENDED FOR CONSTRUCTION
BIDDING OR PERMIT PURPOSES
William Erick Knowles, P.E
Serial Number 84704

TRAFFIC ANALYSIS FOR HIGHWAY DESIGN

Fort Worth District

August 14, 2019

Description of Location	Average Daily Traffic 2025	Average Daily Traffic 2045	Base Year Dir Dist %	Base Year K Factor	Base Year Percent Trucks ADT	Base Year Percent Trucks DHV	ATHWLD	Percent Tandem Axles in ATHWLD	Total Number of Equivalent 18k Single Axle Load Applications One Direction Expected for a 20 Year Period (2025 to 2045) Flexible Pavement	S N	Rigid Pavement	SLAB
US 287 (Build-Mainlanes Only) From I-20 To Sublett Road Tarrant County	73,900	99,900	54 - 46	9.7	10.0	6.0	12,900	40	31,374,000	3	44,291,000	8"

Data for Use in Air & Noise Analysis

Vehicle Class	Base Year % of ADT	Base Year % of DHV
Light Duty	90.0	94.0
Medium Duty	2.3	1.4
Heavy Duty	7.7	4.6

Description of Location	Average Daily Traffic 2025	Average Daily Traffic 2055	Base Year Dir Dist %	Base Year K Factor	Base Year Percent Trucks ADT	Base Year Percent Trucks DHV	ATHWLD	Percent Tandem Axles in ATHWLD	Total Number of Equivalent 18k Single Axle Load Applications One Direction Expected for a 30 Year Period (2025 to 2055) Flexible Pavement	S N	Rigid Pavement	SLAB
US 287 (Build-Mainlanes Only) From I-20 To Sublett Road Tarrant County	73,900	112,800	54 - 46	9.7	10.0	6.0	12,900	40	50,557,000	3	71,371,000	8"

OT INTENDED FOR CONSTRUCTIO
IDDING OR PERMIT PURPOSES
William Erick Knowles, P.E
Serial Number 84704

TRAFFIC ANALYSIS FOR HIGHWAY DESIGN

Fort Worth District

August 14, 2019

Description of Location	Average Daily Traffic 2025	Average Daily Traffic 2045	Base Year Dir Dist %	Base Year K Factor	Base Year Percent Trucks ADT	Base Year Percent Trucks DHV	ATHWLD	Percent Tandem Axles in ATHWLD	Total Number of Equivalent 18k Single Axle Load Applications One Direction Expected for a 20 Year Period (2025 to 2045) Flexible Pavement	S N	Rigid Pavement	SLAB
US 287 (Build-Frontage Roads Only) From I-20 To Sublett Road Tarrant County	24,200	33,300	54 - 46	9.7	4.5	3.4	11,400	40	3,707,000	3	4,826,000	8"

Data for Use in Air & Noise Analysis

Vehicle Class	Base Year % of ADT	Base Year % of DHV
Light Duty	95.5	96.6
Medium Duty	1.0	0.8
Heavy Duty	3.5	2.6

Description of Location	Average Daily Traffic 2025	Average Daily Traffic 2055	Base Year Dir Dist %	Base Year K Factor	Base Year Percent Trucks ADT	Base Year Percent Trucks DHV	ATHWLD	Percent Tandem Axles in ATHWLD	Total Number of Equivalent 18k Single Axle Load Applications One Direction Expected for a 30 Year Period (2025 to 2055) Flexible Pavement	S N	Rigid Pavement	SLAB
US 287 (Build-Frontage Roads Only) From I-20 To Sublett Road Tarrant County	24,200	37,400	54 - 46	9.7	4.5	3.4	11,500	40	5,956,000	3	7,756,000	8"

OT INTENDED FOR CONSTRUCTION
DDING OR PERMIT PURPOSES
William Erick Knowles, P.E
Serial Number 84704

Appendix C
Project Schematic

TEXAS DEPARTMENT OF TRANSPORTATION
FORT WORTH DISTRICT

LOYD C. RUSSELL, P.E. - DISTRICT ENGINEER

DESIGN SCHEMATIC
SOUTHEAST CONNECTOR

TARRANT COUNTY

I-20 CSJ : 0008-13-208
FROM I-20/I-820 INTERCHANGE TO FOREST HILL DRIVE
CSJ : 2374-03-060

I-820 FROM I-20 TO FARM SPRINGS BLVD
CSJ : 0172-04-120

FROM 1270 E RANCHHOUSE ROAD TO
US 287 CSJ : 0172-05-083

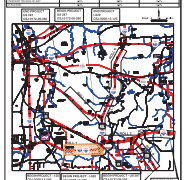
FROM I-20/I-820 INTERCHANGE TO BISHOP ST
CSJ : 0172-04-121

FROM I-20 INTERCHANGE TO MAGNOLIA

ROADWAY TYPE	CONTROLLING PLANS	DESIGN SHEET
I-20		
I-820		
US 287		

Design Speed	Posted Speed	Lane Width	Shoulder Width	Outside Shoulder Width

PROJECT LOCATION MAP/KEYMAP



SHEET NO.	DESCRIPTION
ROLL 01 OF 14	PLAN AND PROFILE
ROLL 02 OF 14	PLAN AND PROFILE
ROLL 03 OF 14	PLAN AND PROFILE
ROLL 04 OF 14	PLAN AND PROFILE
ROLL 05 OF 14	PLAN AND PROFILE
ROLL 06 OF 14	PLAN AND PROFILE
ROLL 07 OF 14	PLAN AND PROFILE
ROLL 08 OF 14	PLAN AND PROFILE
ROLL 09 OF 14	PLAN AND PROFILE
ROLL 10 OF 14	PLAN AND PROFILE
ROLL 11 OF 14	PLAN AND PROFILE
ROLL 12 OF 14	PLAN AND PROFILE
ROLL 13 OF 14	PLAN AND PROFILE
ROLL 14 OF 14	PLAN AND PROFILE

Southeast CONNECTOR
TARRANT COUNTY, TEXAS

PRELIMINARY
NOT FOR CONSTRUCTION, BIDDING OR PERMIT PURPOSES
Loyd C. Russell, P.E.
Texas No. 00000
Date: 00-00-0000

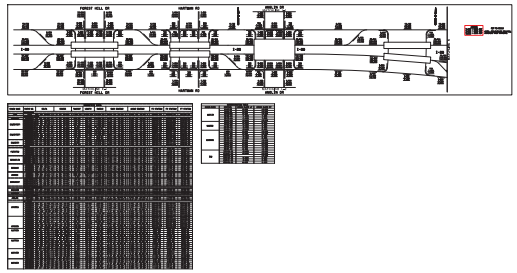
Texas Department of Transportation
Fort Worth District
Loyd C. Russell, P.E.
District Engineer

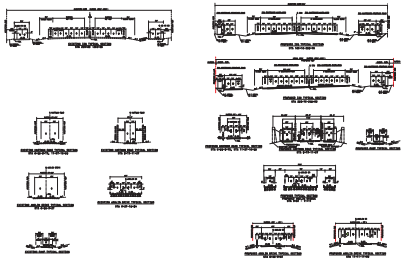
LEGEND

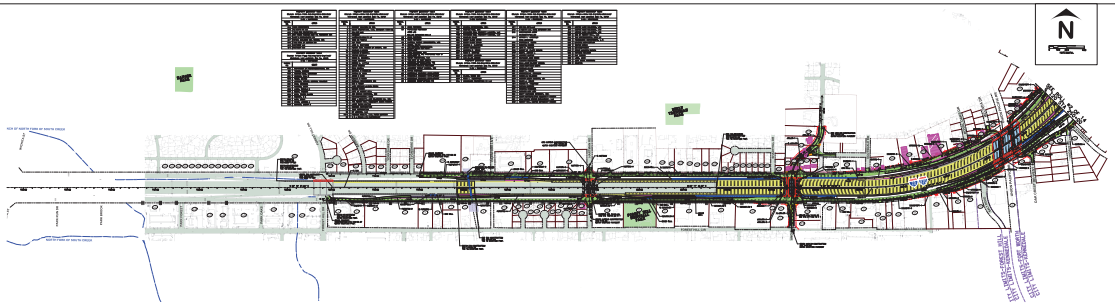
- GENERAL PURPOSE LANES OF LANES
- COLLECTOR/DISTRIBUTOR 2-C
- FRONTAGE ROADS/U-TURN/CITY STREETS
- RAMPS
- SHOULDERS
- DIRECT CONNECTORS DC
- SIDEWALKS
- SHARED USE PATH
- PROPOSED CURB AREA
- PROPOSED BRIDGE/CURVE/RETAINING
- PROPOSED RETAINING WALL
- EXISTING RIGHT-OF-WAY/R.O.W.
- EXISTING PROPERTY LINES
- PROPOSED RIGHT-OF-WAY/R.O.W.
- PROPOSED BRIDGE-OF-ABOVE
- EXISTING BRIDGE-OF-ABOVE
- CITY LIMITS
- EXISTING DRAINAGE EASEMENTS
- POTENTIAL DISPLACEMENTS
- PARKS
- CENTER HEIGHTS HISTORIC DISTRICT
- CREEKS AND TRIBUTARIES
- DIRECTION OF TRAFFIC
- EXISTING BRIDGE/RAMPS TO BE REMOVED
- EXISTING PAVEMENT TO BE REMOVED
- EXISTING STREETS TO REMAIN
- OTHER THOSE PROJECT
- TRANSIT STATION

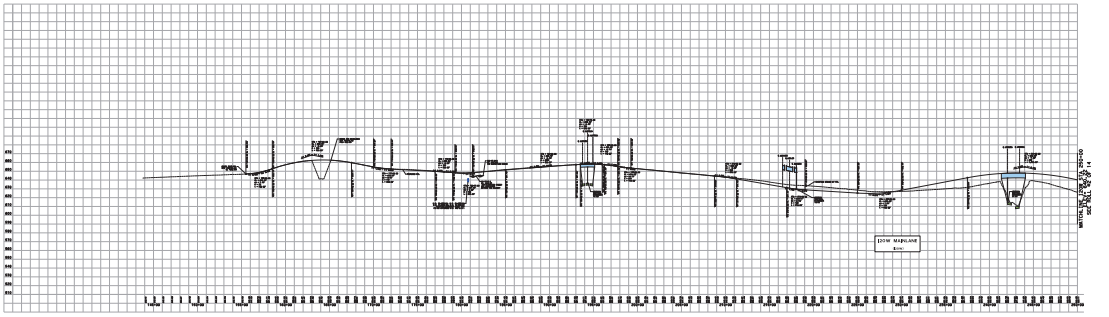
GENERAL NOTES:

1. THE ELEVATIONS SHOWN AT CROSS STREETS ARE APPROXIMATE AND ARE GIVEN FOR REFERENCE PURPOSES ONLY. ALIGNMENT DETAILS BETWEEN TIE-IN POINTS ARE SUBJECT TO CHANGE AS DESIGN IS REFINED.
2. FILL INDICATES PROFILE GRADE LINE.
3. SEE THE ALIGNMENT, GEOMETRIC DATA AND PROFILES FOR ADDITIONAL INFORMATION AS TO SUPERELEVATION. SUPERELEVATION RATES SHALL BE DETERMINED DURING FINAL DESIGN.
4. DESIGN HYDROLOGICS TO BE OF DESIGN VOLUME.
5. DESIGN BASED ON STATE PLANE COORDINATE SYSTEM.









ROLL 1 OF 14

PRELIMINARY DESIGN SCHEMATIC FOR SOUTHEAST CONNECTOR

COUNTY: TARRANT
DISTRICT: FORT WORTH (FW)

Texas Department of Transportation

TEXAS DEPARTMENT OF TRANSPORTATION
FORT WORTH DISTRICT

LOYD C. RUSSELL, P.E. - DISTRICT ENGINEER

DESIGN SCHEMATIC
SOUTHEAST CONNECTOR
TARRANT COUNTY

I-20 CSJ : 0008-13-265
FROM I-20/I-820 INTERCHANGE TO FOREST HILL DRIVE
CSJ : 2374-05-060
I-820 FROM I-820 TO FARM SPRINGS BLVD
CSJ : 0172-90-120
FROM I-20/I-820/HIGHWAYS 81/AB RD
US 287 CSJ : 0172-90-083
FROM I-20 INTERCHANGE TO MAGNOLIA RD

PROJECT LOCATION MAP/KEYMAP

PRELIMINARY
NOT FOR CONSTRUCTION, BIDDING OR PERMIT PURPOSES

Southeast CONNECTOR
TARRANT COUNTY, TEXAS

LEGEND

GENERAL PURPOSE LANES OR LANES
COLLECTOR/DISTRIBUTOR (C-D)
FRONTAGE ROADS/U-TURNS/CITY STREETS
RAMPS
SHOULDERS
DIRECT CONNECTORS DC
SIDEWALKS
SHARED USE PATH
PROPOSED CURB LINES
PROPOSED RETAINING WALL
EXISTING RIGHT-OF-WAY (R.O.W.)
EXISTING PROPERTY LINES
PROPOSED RIGHT-OF-WAY (R.O.W.)
PROPOSED BRIDGE/ OVERPASS
EXISTING BRIDGE/ OVERPASS
CITY LIMITS
EXISTING DRAINAGE EASEMENTS
POTENTIAL DISPLACEMENTS
PARKS
CAMPUS HEIGHTS HISTORIC DISTRICT
CREEKS AND TRIBUTARIES
DIRECTION OF TRAFFIC
EXISTING PAVEMENT TO BE REMOVED
EXISTING PAVEMENT TO BE REMOVED
EXISTING STREETS TO REMAIN
OTHER THAN PRIMARY
TRANSIT STATION

GENERAL NOTES

1. THE ALIGNMENT SHOWN AT RIGHT REPRESENTS THE CENTERLINE OF THE VERTICAL ALIGNMENT BETWEEN BOTTOM OF THE PAVEMENT AT THE CENTERLINE OF THE LOWER ROADWAY AT THE MEDIAN OF THE HIGHER ROADWAY.
2. FILL CROSS-HATCH PROFILE BEHIND LINE.
3. SEE THE ALIGNMENT, GEOMETRY AND PROFILES FOR THE ALIGNED CENTERLINE WITH SUPERELEVATION. RAMPS SHALL BE DETERMINED DURING FINAL DESIGN.
4. DESIGN HYDROLOGICS FOR 50-YR DESIGN VELOCITY.
5. DESIGN BASED ON STATE PLANE COORDINATE SYSTEM.

SEE ROLL 44 OF 14 - E 1820 STA 291+00

N

I-20/I-820 INTERCHANGE

SOUTHEAST CONNECTOR

SOUTHEAST CONNECTOR

I-20/I-820 INTERCHANGE

CITY OF FORT WORTH

CITY OF FORT WORTH

CITY OF FORT WORTH

TEXAS DEPARTMENT OF TRANSPORTATION
FORT WORTH DISTRICT

LOYD C. BUSKELL, P.E. - DISTRICT ENGINEER

DESIGN SCHEMATIC
SOUTHEAST CONNECTOR

TARRANT COUNTY

I-20 CSJ: 0008-13-295
FROM I-20/I-820 INTERCHANGE TO FOREST HILL DRIVE
CSJ: 2374-05-060
I-820 FROM I-820 TO PARK SPRINGS BLVD
CSJ: 0172-90-051
FROM I-20 TO WINSCHACKEE ROAD SE
US 287 CSJ: 0172-90-060
FROM I-20 INTERCHANGE TO MANSFIELD RD

PROJECT LIMITS MAP/KEYMAP

PRELIMINARY

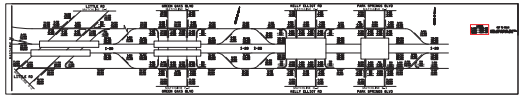
Southeast CONNECTOR

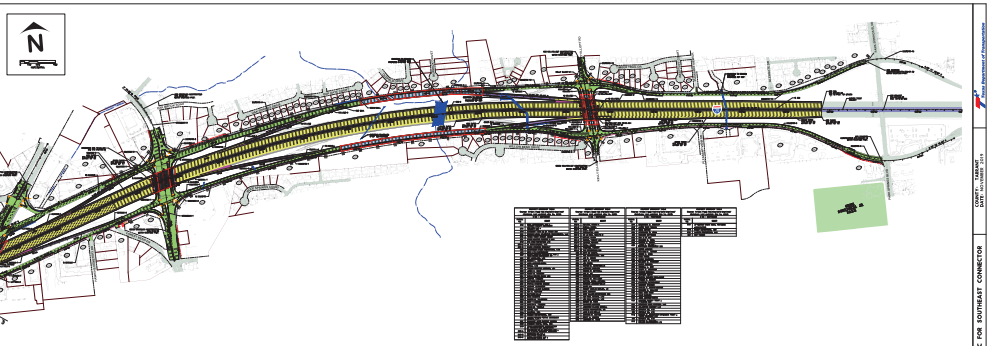
LEGEND

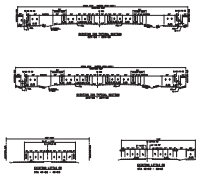
GENERAL PURPOSE LANES OF LANES
COLLECTOR/DISTRIBUTOR 2-G
FRONTAGE ROADS/U-TURN/CITY STREETS
RAMPS
SHOULDERS
DIRECT CONNECTORS DC
SIDEWALKS
SHARED USE PATH
PROPOSED BRIDGE EDGE/U-TURN/RAMPS
PROPOSED RETAINING WALL
EXISTING RIGHT-OF-WAY/R.O.W.'S
EXISTING PROPERTY LINES
PROPOSED RIGHT-OF-WAY/R.O.W.'S
PROPOSED BRIDGE/R.O.W.ACCESS
EXISTING BRIDGE/R.O.W.ACCESS
CITY LIMITS
EXISTING DRAINAGE EASEMENTS
POTENTIAL DISPLACEMENTS
PARKS
CENTER HEIGHTS HISTORIC DISTRICT
CREEKS AND TRIBUTARIES
DIRECTION OF TRAFFIC
EXISTING BRIDGE/RAMPS TO BE REMOVED
EXISTING PAVEMENT TO BE REMOVED
EXISTING STREETS TO REMAIN
OTHER THOSE PROJECT
TRANSIT STATION

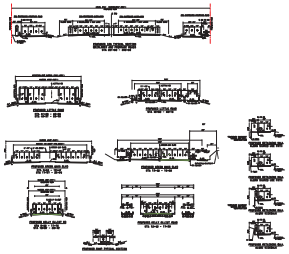
GENERAL NOTES:

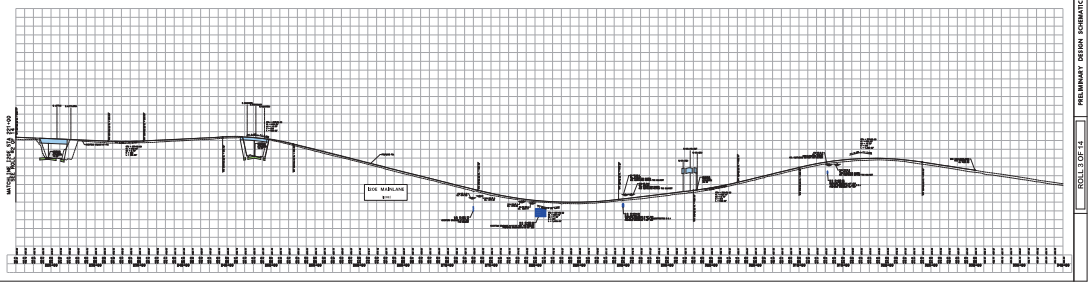
1. THE CLEARANCE SHOWN AT CROSS STREETS ARE MINIMUM VALUES AND MAY VARY. CLEARANCE DETAILS BETWEEN BOTTOM OF STRUCTURE AND TOP OF PAVEMENT SHALL BE TO THE LOWER BOUNDARY OF THE TELEVISION AND RADIO ANTENNA.
2. FILL INDICATED PROFILE GRADE LINE.
3. ALL TOP OF PAVEMENT GRADES ARE PROFILED AT THE OUTSIDE EDGE/GUTTER OF ALL SUPERELEVATED TRAFFIC LANES. SUPERELEVATION RATES SHALL BE DETERMINED AT A LATER DATE.
4. DESIGN HYDROLOGICS TO BE DESIGN VEHICLE.
5. DESIGN BASED ON STATE PLANE COORDINATE SYSTEM.









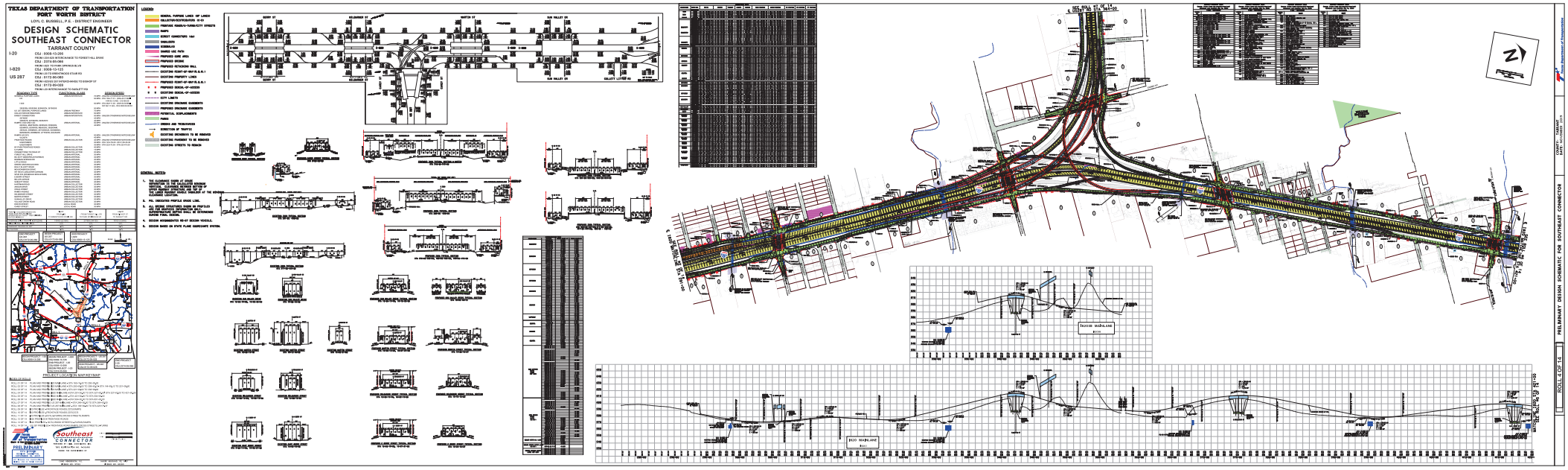


SHEET 3 OF F4

PRELIMINARY DESIGN SCHEMATIC FOR SOUTHEAST CONNECTOR

CSJ: 0008-13-295 TARRANT
CSJ: 2374-05-060 TARRANT
CSJ: 0172-90-051 TARRANT
CSJ: 0172-90-060 TARRANT

Texas Department of Transportation


TEXAS DEPARTMENT OF TRANSPORTATION
FORT WORTH DISTRICT
LOYL C. BUSSELL, P.E. - DISTRICT ENGINEER
DESIGN SCHEMATIC
SOUTHEAST CONNECTOR
TARRANT COUNTY
I-20
I-820
US 287
LEGEND:
GENERAL NOTES:
PROJECT LOCATION MAP/KEYMAP
PRELIMINARY
Southeast CONNECTOR
PRELIMINARY DESIGN SCHEMATIC FOR SOUTHEAST CONNECTOR
ROLL 4 OF 14

TEXAS DEPARTMENT OF TRANSPORTATION
FORT WORTH DISTRICT

LOYD C. BUSKELL, P.E. - DISTRICT ENGINEER

DESIGN SCHEMATIC
SOUTHEAST CONNECTOR

TARRANT COUNTY

I-20 CSJ : 0008-13-265
FROM I-20/I-820 INTERCHANGE TO FOREST HILL DRIVE
CSJ : 2374-05-060
I-820 FROM I-20 TO FARM TO MARKET 1187
CSJ : 0172-04-120
US 287 FROM I-20/I-820/CROSS FOUR RD
CSJ : 0172-05-083
FROM I-20/I-820/CROSS FOUR RD INTERCHANGE TO BISHOP ST
CSJ : 0172-04-029
FROM I-20/I-820 INTERCHANGE TO MANSFIELD RD

ROADWAY TYPE	CONTROLLING VALUES	DESIGN SPEED
I-20	URBAN FREEWAY	60 MPH
		55 MPH - EB RAMP FROM STA. 1000+00 TO STA. 1010+00
		50 MPH - EB RAMP FROM STA. 1010+00 TO STA. 1020+00
I-820	URBAN FREEWAY	60 MPH
US 287	URBAN ARTERIAL	50 MPH
		45 MPH - UNLESS OTHERWISE NOTED ON PLANS
		40 MPH
		35 MPH
		30 MPH
		25 MPH
		20 MPH
		15 MPH
		10 MPH
		5 MPH
		0 MPH
		0 MPH
		0

TEXAS DEPARTMENT OF TRANSPORTATION
FORT WORTH DISTRICT

LOYD C. BUSKELL, P.E. - DISTRICT ENGINEER

DESIGN SCHEMATIC
SOUTHEAST CONNECTOR

TARRANT COUNTY

I-20 CSJ : 0008-13-265
FROM I-20/I-820 INTERCHANGE TO FOREST HILL DRIVE
CSJ : 2374-03-063
I-820 FROM I-820 TO FARM SPRINGS BLVD
CSJ : 0172-90-063
FROM I-20/I-35W INTERCHANGE TO EDGEWOOD TERRACE RD
US 287 CSJ : 0172-90-083
FROM I-20/I-35W INTERCHANGE TO RANDOL MILL RD/HARRIS TO BISHOP ST
CSJ : 0172-90-220
FROM I-20/I-35W INTERCHANGE TO MANSFIELD RD

SHEET NO.	DESCRIPTION	CONSTRUCTION PLANS
1	TITLE SHEET	
2	GENERAL NOTES, ESTIMATED QUANTITIES, TYPICAL SECTIONS, SCHEMATIC LEGEND	
3	SCHEMATIC DRAWING	
4	SCHEMATIC DRAWING	
5	SCHEMATIC DRAWING	
6	SCHEMATIC DRAWING	
7	SCHEMATIC DRAWING	

TEXAS DEPARTMENT OF TRANSPORTATION
FORT WORTH DISTRICT

LOYD C. RUSSELL, P.E. - DISTRICT ENGINEER

DESIGN SCHEMATIC
SOUTHEAST CONNECTOR
TARRANT COUNTY

I-20 CSJ : 0008-13-249
FROM I-20/I-820 INTERCHANGE TO FOREST HILL DRIVE
CSJ : 2374-03-060

I-820 CSJ : 0172-04-029
FROM I-820 TO FARM SPRINGS BLVD

US 287 CSJ : 0172-05-060
FROM US 287/I-820 INTERCHANGE TO BISHOP ST
CSJ : 0172-04-029
FROM I-20 INTERCHANGE TO MAGNOLIA RD

PROJECT LOCATION MAP/KEYMAP

PRELIMINARY
NOT FOR CONSTRUCTION, BIDDING OR PERMIT PURPOSES
Date: 10/2/2014 8:37:00 AM

Southeast CONNECTOR

Texas Department of Transportation

SCALE: 1" = 1000'
DATE: NOVEMBER 2014

SHEET 1 OF 14

PRELIMINARY DESIGN SCHEMATIC FOR SOUTHEAST CONNECTOR

TEXAS DEPARTMENT OF TRANSPORTATION
FORT WORTH DISTRICT

LOYD C. RUSSELL, P.E. - DISTRICT ENGINEER

DESIGN SCHEMATIC
SOUTHEAST CONNECTOR

TARRANT COUNTY

I-20 CSJ : 0008-13-295
FROM I-20/I-820 INTERCHANGE TO FOREST HILL DRIVE
CSJ : 2374-03-063

I-820 FROM I-20 TO FARM SPRINGS BLVD
CSJ : 0172-90-123
FROM I-20/I-820/HODGES STUB RD

US 287 CSJ : 0172-90-083
FROM I-20/I-820/HODGES STUB RD TO BISHOP ST
CSJ : 0172-90-120
FROM I-20 INTERCHANGE TO SUBLETT RD

ROADWAY TYPE	DESIGN SPEED
I-20	
I-820	
US 287	

	Year 2015	Year 2025	Year 2035
I-20			
I-820			
US 287			

PROJECT LOCATION MAP/KEYMAP

ROLL PLOT SHEET	PLAN AND PROFILE	CROSS SECTIONS
ROLL 20 SP 14	PLAN AND PROFILE	CROSS SECTIONS
ROLL 20 SP 15	PLAN AND PROFILE	CROSS SECTIONS
ROLL 20 SP 16	PLAN AND PROFILE	CROSS SECTIONS
ROLL 20 SP

TEXAS DEPARTMENT OF TRANSPORTATION
FORT WORTH DISTRICT

LOYD C. RUSSELL, P.E. - DISTRICT ENGINEER

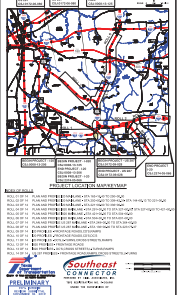
DESIGN SCHEMATIC
SOUTHEAST CONNECTOR

TARRANT COUNTY

I-20 CSJ : 0008-13-269
FROM I-20/I-820 INTERCHANGE TO FOREST HILL DRIVE
CSJ : 2374-05-069
I-820 FROM I-820 TO FARM SPRINGS BLVD.
CSJ : 0172-90-069
FROM I-20 TO BISHOP STREET
US 287 CSJ : 0172-90-080
FROM I-20/US 287 INTERCHANGE TO BISHOP ST
CSJ : 0172-90-029
FROM I-20/ INTERCHANGE TO MANSFIELD

ROADWAY TYPE	CONSTRUCTION CLASS	DESIGN SPEED
I-20	URBAN FREEWAY	60 MPH
		55 MPH
		50 MPH
		45 MPH
	URBAN ARTERIAL	60 MPH
		55 MPH
		50 MPH
		45 MPH
	URBAN ARTERIAL	60 MPH
		55 MPH
		50 MPH
		45 MPH
	URBAN COLLECTOR	55 MPH
		50 MPH
		45 MPH
	URBAN COLLECTOR	55 MPH
		50 MPH
		45 MPH
	URBAN ARTERIAL	55 MPH
		50 MPH
		45 MPH
	URBAN ARTERIAL	55 MPH
		50 MPH
		45 MPH
	URBAN ARTERIAL	55 MPH
		50 MPH
		45 MPH
	URBAN ARTERIAL	55 MPH
		50 MPH
		45 MPH
	URBAN ARTERIAL	55 MPH
		50 MPH
		45 MPH
	URBAN COLLECTOR	55 MPH
		50 MPH
		45 MPH
	URBAN COLLECTOR	55 MPH
		50 MPH
		45 MPH
	URBAN COLLECTOR	55 MPH
		50 MPH
		45 MPH
	URBAN COLLECTOR	55 MPH
		50 MPH
		45 MPH
	URBAN COLLECTOR	55 MPH
		50 MPH
		45 MPH
	URBAN COLLECTOR	55 MPH
		50 MPH
		45 MPH
	URBAN COLLECTOR	55 MPH
		50 MPH
		45 MPH
	URBAN COLLECTOR	55 MPH
		50 MPH
		45 MPH

	Year 2015	Year 2025	Year 2035
I-20 EAST OF I-820	120,000	150,000	170,000
I-20 WEST OF I-820	120,000	150,000	170,000
I-820 NORTH OF I-20	120,000	150,000	170,000
I-820 SOUTH OF I-20	120,000	150,000	170,000
US 287 NORTH OF I-20	120,000	150,000	170,000
US 287 SOUTH OF I-20	120,000	150,000	170,000



PROJECT LOCATION MAP/KEYMAP

Southeast CONNECTOR	
Existing Freeway	
Proposed Freeway	

PRELIMINARY

Not Approved for Construction

Date Released for Review

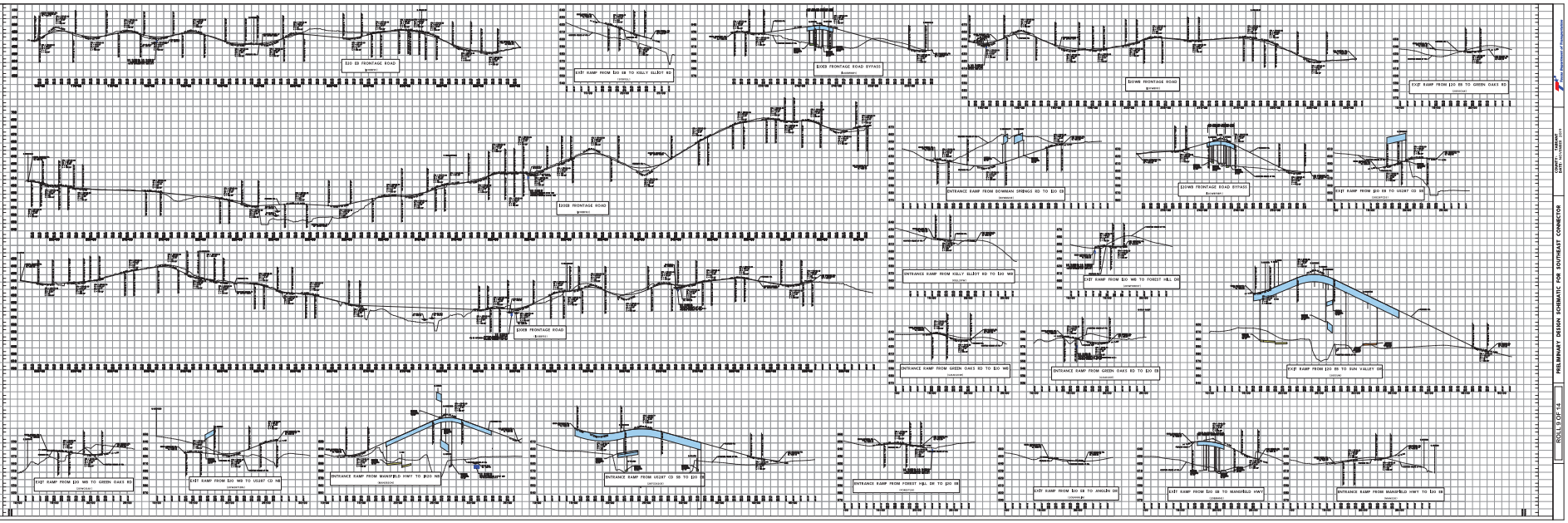
Loyd C. Russell, P.E.

Texas License Number

Date Approved

Loyd C. Russell, P.E.

Texas License Number



PRELIMINARY DESIGN SCHEMATIC FOR SOUTHEAST CONNECTOR

COUNTY : TARRANT
LIMITS : AS SHOWN ON PLAN

SCALE : 1" = 1000'

SHEET 1 OF 14

TEXAS DEPARTMENT OF TRANSPORTATION
FORT WORTH DISTRICT

LOYD C. RUSSELL, P.E. - DISTRICT ENGINEER

DESIGN SCHEMATIC
SOUTHEAST CONNECTOR

TARRANT COUNTY

I-20 CSJ : 0008-13-265
FROM I-20/I-820 INTERCHANGE TO FOREST HILL DRIVE
CSJ : 2374-03-060
I-820 FROM I-820 TO FARM SPRINGS BLVD.
CSJ : 0172-90-120
FROM I-20 TO BRIDGEPOINTE PKWY
US 287 CSJ : 0172-90-060
FROM I-20/I-820 INTERCHANGE TO BISHOP ST
CSJ : 0172-90-120
FROM I-20 INTERCHANGE TO MANSFIELD

ROADWAY TYPE	CONTROLLING ELEMENT	DESIGN SPEED
I-20	URBAN FREEWAY	60 MPH
I-820	URBAN FREEWAY	60 MPH
SOUTHEAST CONNECTOR	URBAN FREEWAY	60 MPH
SOUTHEAST CONNECTOR	URBAN ARTERIAL	45

TEXAS DEPARTMENT OF TRANSPORTATION
FORT WORTH DISTRICT

LOYD C. RUSSELL, P.E. - DISTRICT ENGINEER

DESIGN SCHEMATIC
SOUTHEAST CONNECTOR

TARRANT COUNTY

I-20 CSJ : 0008-13-208
FROM I-20/US 287 INTERCHANGE TO FOREST HILL DRIVE
CSJ : 2374-05-060

I-820 FROM I-820 TO FARM SPRINGS BLVD
CSJ : 0172-90-060

US 287 FROM 2373 E RANCHHOUSE ROAD TO
CSJ : 0172-90-080
CSJ : 0172-90-025
FROM I-20/ INTERCHANGE TO MAGNOLIA RD

ROADWAY TYPE	CONSTRUCTION YEAR	DESIGN SPEED
I-20	OPEN/CONSTRUCTION	70 MPH
		60 MPH
		50 MPH
		45 MPH
		40 MPH
		35 MPH
		30 MPH
		25 MPH
		20 MPH
I-820	OPEN/CONSTRUCTION	70 MPH
		60 MPH
		50 MPH
		45 MPH
		40 MPH
		35 MPH
		30 MPH
		25 MPH
		20 MPH
US 287	OPEN/CONSTRUCTION	70 MPH
		60 MPH
		50 MPH
		45 MPH
		40 MPH
		35 MPH
		30 MPH
		25 MPH
		20 MPH

	Year 2015	Year 2025	Year 2035
Average Daily Traffic (ADT)			
Peak Hour Volume			
Directional Distribution			
Truck Percentage			

DESIGN HOURLY VOLUME	
DESIGN SPEED	
NUMBER OF LANES	
FACILITY TYPE	
DESIGN FREEWAY LOS	
DESIGN FRONTAGE ROAD LOS	

PROJECT LOCATION MAP/KEYMAP

Southeast CONNECTOR

PRELIMINARY

Texas Department of Transportation
Fort Worth District

Approved for Public Release
Date: 12/19/2014
Control No. 70000

Loyd C. Russell, P.E.
District Engineer

Date: 12/19/2014

HARTMAN ROAD

DRIVEWAY U-TURN

ANGLIN DRIVE

LITTLE ROAD

GREEN OAKS ROAD

MANSFIELD HWY

YELLOWU U-TURN

DODSON MAINLANE

KELLY ELLIOT ROAD

EXIT RAMP FROM I20 EB TO BOWMAN SPRINGS RD

EXIT RAMP FROM US287 CD NB TO SUN VALLEY DR

ENTRANCE RAMP FROM I820 SB TO MANSFIELD HWY

ENTRANCE RAMP FROM LITTLE RD TO I20 WB

ANGLEWU U-TURN

HARTMAN EW U-TURN

YELWEU U-TURN

LITTLE WB U-TURN

KELLWU U-TURN

LEFTWU

BRYNDOW CD

EXIT RAMP FROM I20 WB TO BOWMAN SPRINGS RD

EXIT RAMP FROM 287 CD SB TO LITTLE RD

EXIT RAMP FROM EO WB TO MANSFIELD HWY

ENTRANCE RAMP FROM SUN VALLEY DR TO US 287 CD SB

MANSFIELD WB U-TURN

HARTMAN WB U-TURN

BOWMANWU U-TURN

BOWMANWBU U-TURN

GREEN OAKS WB U-TURN

GREEN OAKS EW U-TURN

KELLEWU U-TURN

MANSFIELD EW U-TURN

HOWARD BLVD

LOOP 820 FRONTAGE ROAD BYPASS

BOWMAN SPRINGS ROAD

RANDOM MAINLANE

LITTLE ROAD

PRELIMINARY DESIGN SCHEMATIC FOR SOUTHEAST CONNECTOR

TARRANT COUNTY
I-20 / I-820 / US 287

SHEET 1 OF 14

TEXAS DEPARTMENT OF TRANSPORTATION
FORT WORTH DISTRICT

LOYD C. RUSSELL, P.E. - DISTRICT ENGINEER

DESIGN SCHEMATIC
SOUTHEAST CONNECTOR

TARRANT COUNTY

I-20 CSJ : 0008-13-269
FROM I-20/I-820 INTERCHANGE TO FOREST HILL DRIVE
CSJ : 2374-03-060

I-820 FROM I-20 TO FARM SPRINGS BLVD.
CSJ : 0172-90-120

FROM 0.5 S WIMBLEDON ST/I-820 TO
US 287 CSJ : 0172-90-080
FROM I-20/I-820 INTERCHANGE TO BISHOP ST
CSJ : 0172-90-123
FROM I-20 INTERCHANGE TO MANSFIELD

ROADWAY TYPE — DESIGN SPEED

I-20	URBAN FREEWAY	60 MPH
	URBAN FREEWAY	60 MPH
	URBAN FREEWAY	60 MPH
I-820	URBAN FREEWAY	60 MPH
	URBAN FREEWAY	60 MPH
	URBAN FREEWAY	60 MPH
	URBAN ARTERIAL	50 MPH
	URBAN ARTERIAL	50 MPH
	URBAN ARTERIAL	50

TEXAS DEPARTMENT OF TRANSPORTATION
FORT WORTH DISTRICT

LOYD C. RUSSELL, P.E. - DISTRICT ENGINEER

DESIGN SCHEMATIC
SOUTHEAST CONNECTOR

TARRANT COUNTY

I-20 CSJ : 0008-13-269
FROM LOOP 820 INTERCHANGE TO FOREST HILL DRIVE
CSJ : 2374-03-060
I-820 FROM I-20 TO FARM SPRINGS BLVD.
CSJ : 0172-90-060
FROM I-20 TO BRENTWOOD STAIR RD.
US 287 CSJ : 0172-90-060
FROM LOOP 820 INTERCHANGE TO BISHOP ST.
CSJ : 0172-90-020
FROM LOOP 820 INTERCHANGE TO MANSFIELD

ROADWAY TYPE	CONSTRUCTION YEAR	DESIGN SPEED
I-20	URBAN FREEWAY	55 MPH
	URBAN INTERCHANGE	50 MPH
		45 MPH
		40 MPH
		35 MPH
	URBAN FREEWAY	55 MPH
	URBAN INTERCHANGE	50 MPH
		45 MPH
		40 MPH
		35 MPH
	URBAN ARTERIAL	45 MPH
		40 MPH
		35 MPH
		30 MPH
	URBAN COLLECTOR	45 MPH
		40 MPH
		35 MPH
		30

TEXAS DEPARTMENT OF TRANSPORTATION
FORT WORTH DISTRICT

LOYD C. RUSSELL, P.E. - DISTRICT ENGINEER

DESIGN SCHEMATIC
SOUTHEAST CONNECTOR

TARRANT COUNTY

I-20
CSJ : 0008-13-269
FROM LOOP 820 INTERCHANGE TO FOREST HILL DRIVE
CSJ : 2374-05-080

I-820
FROM IH 20 TO FARM TO MARKET 1187
CSJ : 0172-90-080

US 287
FROM LOOP 820 INTERCHANGE TO BISHOP ST
CSJ : 0172-90-031
FROM LOOP 820 INTERCHANGE TO SUBLETT RD
CSJ : 0172-90-029

ROADWAY TYPE	CONTROLLING ELEMENT	DESIGN SPEED
I-20	URBAN FREEWAY	60 MPH
I-820	URBAN FREEWAY	60 MPH
US 287	URBAN ARTERIAL	50 MPH
FRONTAGE ROADS	URBAN COLLECTOR	35 MPH
RAMPS	URBAN ARTERIAL	35 MPH
RAMPS	URBAN COLLECTOR	35 MPH
RAMPS	URBAN FREEWAY	35 MPH
RAMPS	URBAN FREEWAY	40 MPH
RAMPS	URBAN FREEWAY	45 MPH
RAMPS	URBAN FREEWAY	50 MPH
RAMPS	URBAN FREEWAY	60 MPH
RAMPS	URBAN ARTERIAL	35 MPH
RAMPS	URBAN ARTERIAL	40 MPH
RAMPS	URBAN ARTERIAL	45 MPH
RAMPS	URBAN ARTERIAL	50 MPH
RAMPS	URBAN COLLECTOR	35 MPH
RAMPS	URBAN COLLECTOR	40 MPH
RAMPS	URBAN COLLECTOR	45 MPH
RAMPS	URBAN COLLECTOR	50 MPH
RAMPS	URBAN COLLECTOR	60 MPH
CROSS STREETS	URBAN ARTERIAL	35 MPH
CROSS STREETS	URBAN ARTERIAL	40 MPH
CROSS STREETS	URBAN ARTERIAL	45 MPH
CROSS STREETS	URBAN ARTERIAL	50 MPH
CROSS STREETS	URBAN COLLECTOR	35 MPH
CROSS STREETS	URBAN COLLECTOR	40 MPH
CROSS STREETS	URBAN COLLECTOR	45 MPH
CROSS STREETS	URBAN COLLECTOR	50 MPH
CROSS STREETS	URBAN COLLECTOR	60 MPH

	Min. Radius	Max. Superelevation	Max. Grade
Mainlanes	1910'	6%	3%
Ramps	1910'	6%	3%
Frontage Roads	1910'	6%	3%

APPENDIX D
CO Model Output Files

```
'I-820 AT SUN VALLEY 2028' 60 108 0 0 4 0.3048 1 1
'R1 SE' 213360 55896 5.9
'R2 NE' 213356 56050 5.9
'R3 NW' 212920 56135 5.9
'R4 SW' 212933 55961 5.9
'2028' 27 36 1 'C' 1
1
'NBFR P1-P2' 'AG' 213268 57733  213301  56539   1571 0.78 0 56
1
'NBFR P2-P3' 'AG' 213301 56539  213304  55988   1571 0.78 0 56
2
'NBFR P3-P4 APP QUE' 'AG' 213304 55988  213314  55499 0 36 3
  135 100 2.0 1247 3.01 5085 2 1
2
'NBFR P3-P4 RT QUE' 'AG' 213337 55938 213333    55594 0 12 1
   135 100 2.0 84 3.01 2787 2 1
2
'NBFR P3-P4 LT QUE' 'AG' 213281 55951   213278  55597 0 12 1
   135 100 2.0 409 3.01 2787 2 1
1
'NBFR P4-P5' 'AG' 213314 55499  213320  54626   1752 0.78 0 56
1
'NBML P1-P2' 'AG' 213202 54623  213189  55827   7827 0.77 0 104
1
'NBML P2-P3' 'DP' 213189 55827  213192  56519   7827 0.77 -20 104
1
'NBML P3-P4' 'AG' 213192 56519  213173  57720   7827 0.77 0 104
1
'SBML P1-P2' 'AG' 213064 54626  213081  55833   7010 0.77 0 104
1
'SBML P2-P3' 'DP' 213081 55833  213077  56522   7010 0.77 -20 104
1
'SBML P3-P4' 'AG' 213077 56522  213061  57720   7010 0.77 0 104
1
'SBFR P1-P2' 'AG' 212943 54629  212979  55548   1491 0.78 0 56
1
'SBFR P2-P3' 'AG' 212979 55548  212976  56053   1491 0.78 0 56
2
'SBFR P3-P4 APP QUE' 'AG' 212976 56053  212972  56499 0 36 3
   120 56 2.0 991 3.01 5085 2 1
2
'SBFR P3-P4 RT Q' 'AG'  212946  56096   212946  56411 0 12 1
   120 56 2.0 82 3.01 1583 2 1
1
'SBFR P4-P5' 'AG' 212972 56499  212963  57730   1219 0.78 0 56
1
'EBSUN P1-P2' 'AG' 213740 55978 213333 55968    208 0.94 0 32
1
'EBSUN P2-P3' 'AG' 213333 55968 213271 55978    208 0.94 0 32
2
```

```
'EBSUN P3-P4 APP QUE' 'BR' 213271 55978 212940 56027 0 12 1
   120 42 2.0 125 3.01 3539 2 1
2
'EBSUN P3-P4 LT QUE' 'BR' 213268 55991  213002  56033 0 12 1
   120 75 2.0 207 3.01 1103 2 1
1
'EBSUN P4-P5' 'AG' 212940 56027 212533 56037    302 0.94 0 44
1
'WBSUN P1-P2' 'AG' 212530 56060 212936 56070    304 0.94 0 32
1
'WBSUN P2-P3' 'AG' 212936 56070 213002 56063    304 0.94 0 32
2
'WBSUN P3-P4 APP QUE' 'BR' 213002 56063 213333 56011    0 12 1
   120 70 2.0 222 3.01 1863 2 1
2
'WBSUN P3-P4 LT QUE' 'BR' 213005 56050  213281  56004   0 12 1
   120 75 2.0 384 3.01 1770 2 1
1
'WBSUN P4-P5' 'AG' 213333 56011 213740 55994    302 0.94 0 32
1 0 6 1000 1.7 'Y' 10 0 36
```

JOB: I-820 AT SUN VALLEY 2028 RUN: 2028

DATE : 11/17/19
TIME : 14:29: 5

The MODE flag has been set to C for calculating CO averages.

SITE & METEOROLOGICAL VARIABLES

VS = 0.0 CM/S VD = 0.0 CM/S Z0 = 108. CM
U = 1.0 M/S CLAS = 6 (F) ATIM = 60. MINUTES MIXH = 1000. M AMB = 1.7 PPM

LINK VARIABLES

LINK DESCRIPTION	*	LINK COORDINATES (FT)				*	LENGTH	BRG	TYPE	VPH	EF	H	W	V/C	QUEUE
	*	X1	Y1	X2	Y2	*	(FT)	(DEG)			(G/MI)	(FT)	(FT)		(VEH)
1. NBFR P1-P2	*	213268.0	57733.0	213301.0	56539.0	*	1194.	178.	AG	1571.	0.8	0.0	56.0		
2. NBFR P2-P3	*	213301.0	56539.0	213304.0	55988.0	*	551.	180.	AG	1571.	0.8	0.0	56.0		
3. NBFR P3-P4 APP QUE	*	213304.0	55988.0	213309.2	55733.4	*	255.	179.	AG	18.	100.0	0.0	36.0	0.36	12.9
4. NBFR P3-P4 RT QUE	*	213337.0	55938.0	213336.4	55888.2	*	50.	181.	AG	6.	100.0	0.0	12.0	0.13	2.5
5. NBFR P3-P4 LT QUE	*	213281.0	55951.0	213279.0	55711.0	*	240.	180.	AG	6.	100.0	0.0	12.0	0.64	12.2
6. NBFR P4-P5	*	213314.0	55499.0	213320.0	54626.0	*	873.	180.	AG	1752.	0.8	0.0	56.0		
7. NBML P1-P2	*	213202.0	54623.0	213189.0	55827.0	*	1204.	359.	AG	7827.	0.8	0.0	****		
8. NBML P2-P3	*	213189.0	55827.0	213192.0	56519.0	*	692.	0.	DP	7827.	0.8	-20.0	****		
9. NBML P3-P4	*	213192.0	56519.0	213173.0	57720.0	*	1201.	359.	AG	7827.	0.8	0.0	****		
10. SBML P1-P2	*	213064.0	54626.0	213081.0	55833.0	*	1207.	1.	AG	7010.	0.8	0.0	****		
11. SBML P2-P3	*	213081.0	55833.0	213077.0	56522.0	*	689.	360.	DP	7010.	0.8	-20.0	****		
12. SBML P3-P4	*	213077.0	56522.0	213061.0	57720.0	*	1198.	359.	AG	7010.	0.8	0.0	****		

```
      13. SBFR P1-P2          * 212943.0   54629.0  212979.0   55548.0 *     920.
  2. AG   1491.   0.8   0.0 56.0
      14. SBFR P2-P3          * 212979.0   55548.0  212976.0   56053.0 *     505.
360. AG   1491.   0.8   0.0 56.0
      15. SBFR P3-P4 APP QUE  * 212976.0   56053.0  212975.1   56154.0 *     101.
359. AG     11. 100.0   0.0 36.0 0.13   5.1
      16. SBFR P3-P4 RT Q     * 212946.0   56096.0  212946.0   56121.1 *      25.
360. AG      4. 100.0   0.0 12.0 0.10   1.3
      17. SBFR P4-P5          * 212972.0   56499.0  212963.0   57730.0 *    1231.
360. AG   1219.   0.8   0.0 56.0
      18. EBSUN P1-P2         * 213740.0   55978.0  213333.0   55968.0 *     407.
269. AG    208.   0.9   0.0 32.0
      19. EBSUN P2-P3         * 213333.0   55968.0  213271.0   55978.0 *      63.
279. AG    208.   0.9   0.0 32.0
      20. EBSUN P3-P4 APP QUE * 213271.0   55978.0  213242.6   55982.2 *      29.
278. BR      3. 100.0   0.0 12.0 0.06   1.5
      21. EBSUN P3-P4 LT QUE  * 213268.0   55991.0  213172.9   56006.0 *      96.
279. BR      5. 100.0   0.0 12.0 0.55   4.9
      22. EBSUN P4-P5         * 212940.0   56027.0  212533.0   56037.0 *     407.
271. AG    302.   0.9   0.0 44.0
      23. WBSUN P1-P2         * 212530.0   56060.0  212936.0   56070.0 *     406.
 89. AG    304.   0.9   0.0 32.0
      24. WBSUN P2-P3         * 212936.0   56070.0  213002.0   56063.0 *      66.
 96. AG    304.   0.9   0.0 32.0
      25. WBSUN P3-P4 APP QUE * 213002.0   56063.0  213087.0   56049.7 *      86.
 99. BR      5. 100.0   0.0 12.0 0.31   4.4
      26. WBSUN P3-P4 LT QUE  * 213005.0   56050.0  213166.7   56023.1 *     164.
 99. BR      5. 100.0   0.0 12.0 0.64   8.3
      27. WBSUN P4-P5         * 213333.0   56011.0  213740.0   55994.0 *     407.
 92. AG    302.   0.9   0.0 32.0
```


DATE : 11/17/19
TIME : 14:29: 5

ADDITIONAL QUEUE LINK PARAMETERS

LINK DESCRIPTION	*	CYCLE LENGTH (SEC)	RED TIME (SEC)	CLEARANCE LOST TIME (SEC)	APPROACH VOL (VPH)	SATURATION FLOW RATE (VPH)	IDLE EM FAC (gm/hr)	SIGNAL TYPE	ARRIVAL RATE
3. NBFR P3-P4 APP QUE	*	135	100	2.0	1247	5085			

```
 3.01      2        1
     4. NBFR P3-P4 RT QUE   *     135      100       2.0        84       2787
 3.01      2        1
     5. NBFR P3-P4 LT QUE   *     135      100       2.0       409       2787
 3.01      2        1
    15. SBFR P3-P4 APP QUE  *     120       56       2.0       991       5085
 3.01      2        1
    16. SBFR P3-P4 RT Q     *     120       56       2.0        82       1583
 3.01      2        1
    20. EBSUN P3-P4 APP QUE *     120       42       2.0       125       3539
 3.01      2        1
    21. EBSUN P3-P4 LT QUE  *     120       75       2.0       207       1103
 3.01      2        1
    25. WBSUN P3-P4 APP QUE *     120       70       2.0       222       1863
 3.01      2        1
    26. WBSUN P3-P4 LT QUE  *     120       75       2.0       384       1770
 3.01      2        1
```

RECEPTOR LOCATIONS

RECEPTOR	COORDINATES (FT) X	Y	Z
1. R1 SE	213360.0	55896.0	5.9
2. R2 NE	213356.0	56050.0	5.9
3. R3 NW	212920.0	56135.0	5.9
4. R4 SW	212933.0	55961.0	5.9

MODEL RESULTS

REMARKS : In search of the angle corresponding to the maximum concentration, only the first angle, of the angles with same maximum concentrations, is indicated as maximum.

WIND ANGLE RANGE: 0.-360.

WIND ANGLE (DEGR)	CONCENTRATION (PPM) REC1	REC2	REC3	REC4
0.	1.7	1.7	1.7	1.8
10.	1.7	1.7	2.0	1.9
20.	1.7	1.7	1.9	1.9
30.	1.7	1.7	1.9	1.9

40.	*	1.7	1.7	1.8	1.9
50.	*	1.7	1.7	1.9	1.9
60.	*	1.7	1.7	1.8	1.8
70.	*	1.7	1.7	1.8	1.8
80.	*	1.7	1.7	1.7	1.7
90.	*	1.7	1.7	1.7	1.7
100.	*	1.7	1.7	1.7	1.7
110.	*	1.7	1.7	1.8	1.8
120.	*	1.7	1.7	1.8	1.8
130.	*	1.7	1.7	1.8	1.8
140.	*	1.7	1.7	1.9	1.9
150.	*	1.7	1.7	1.8	1.9
160.	*	1.7	1.7	1.9	2.0
170.	*	1.7	1.7	2.1	2.1
180.	*	1.7	1.7	1.7	1.7
190.	*	1.8	2.1	1.7	1.7
200.	*	2.0	2.1	1.7	1.7
210.	*	2.0	1.9	1.7	1.7
220.	*	2.0	1.8	1.7	1.7
230.	*	1.9	1.8	1.7	1.7
240.	*	1.9	1.8	1.7	1.7
250.	*	1.8	1.8	1.7	1.7
260.	*	1.7	1.8	1.7	1.7
270.	*	1.8	1.8	1.7	1.7
280.	*	1.8	1.8	1.7	1.7
290.	*	1.8	1.8	1.7	1.7
300.	*	1.8	1.8	1.7	1.7
310.	*	1.8	1.8	1.7	1.7
320.	*	1.8	1.8	1.7	1.7
330.	*	1.8	1.8	1.7	1.7
340.	*	1.9	2.1	1.7	1.7
350.	*	2.0	2.1	1.7	1.7
360.	*	1.7	1.7	1.7	1.8
MAX	*	2.0	2.1	2.1	2.1
DEGR.	*	200	190	170	170

THE HIGHEST CONCENTRATION OF 2.10 PPM OCCURRED AT RECEPTOR REC3 .

DATE : 11/17/19
TIME : 14:29: 5

RECEPTOR - LINK MATRIX FOR THE ANGLE PRODUCING
THE MAXIMUM CONCENTRATION FOR EACH RECEPTOR

	*	CO/LINK (PPM)			
	*	ANGLE (DEGREES)			
	*	REC1	REC2	REC3	REC4
LINK #	*	200	190	170	170
1	*	0.0	0.0	0.0	0.0
2	*	0.0	0.0	0.0	0.0
3	*	0.0	0.1	0.0	0.0
4	*	0.0	0.0	0.0	0.0
5	*	0.0	0.0	0.0	0.0
6	*	0.0	0.0	0.0	0.0
7	*	0.2	0.2	0.1	0.1
8	*	0.0	0.0	0.0	0.0
9	*	0.0	0.0	0.0	0.0
10	*	0.1	0.1	0.2	0.2
11	*	0.0	0.0	0.0	0.0
12	*	0.0	0.0	0.0	0.0
13	*	0.0	0.0	0.0	0.0
14	*	0.0	0.0	0.1	0.1
15	*	0.0	0.0	0.0	0.0
16	*	0.0	0.0	0.0	0.0
17	*	0.0	0.0	0.0	0.0
18	*	0.0	0.0	0.0	0.0
19	*	0.0	0.0	0.0	0.0
20	*	0.0	0.0	0.0	0.0
21	*	0.0	0.0	0.0	0.0
22	*	0.0	0.0	0.0	0.0
23	*	0.0	0.0	0.0	0.0
24	*	0.0	0.0	0.0	0.0
25	*	0.0	0.0	0.0	0.0
26	*	0.0	0.0	0.0	0.0
27	*	0.0	0.0	0.0	0.0

```
'I-820 AT SUN VALLEY 2045' 60 108 0 0 4 0.3048 1 1
'R1 SE' 213360 55896 5.9
'R2 NE' 213356 56050 5.9
'R3 NW' 212920 56135 5.9
'R4 SW' 212933 55961 5.9
'2045' 27 36 1 'C' 1
1
'NBFR P1-P2' 'AG' 213268 57733  213301  56539   2000 0.43 0 56
1
'NBFR P2-P3' 'AG' 213301 56539  213304  55988   2000 0.43 0 56
2
'NBFR P3-P4 APP QUE' 'AG' 213304 55988  213314  55499 0 36 3
  135 100 2.0 1584 1.49 5085 2 1
2
'NBFR P3-P4 RT QUE' 'AG' 213337 55938 213333    55594 0 12 1
   135 100 2.0 109 1.49 2787 2 1
2
'NBFR P3-P4 LT QUE' 'AG' 213281 55951   213278  55597 0 12 1
   135 100 2.0 485 1.49 2787 2 1
1
'NBFR P4-P5' 'AG' 213314 55499  213320  54626   2198 0.43 0 56
1
'NBML P1-P2' 'AG' 213202 54623  213189  55827   10049 0.45 0 104
1
'NBML P2-P3' 'DP' 213189 55827  213192  56519   10049 0.45 -20 104
1
'NBML P3-P4' 'AG' 213192 56519  213173  57720   10049 0.45 0 104
1
'SBML P1-P2' 'AG' 213064 54626  213081  55833   8979 0.45 0 104
1
'SBML P2-P3' 'DP' 213081 55833  213077  56522   8979 0.45 -20 104
1
'SBML P3-P4' 'AG' 213077 56522  213061  57720   8979 0.45 0 104
1
'SBFR P1-P2' 'AG' 212943 54629  212979  55548   1921 0.43 0 56
1
'SBFR P2-P3' 'AG' 212979 55548  212976  56053   1921 0.43 0 56
2
'SBFR P3-P4 APP QUE' 'AG' 212976 56053  212972  56499 0 36 3
   120 56 2.0 1277 1.49 5085 2 1
2
'SBFR P3-P4 RT Q' 'AG'  212946  56096   212946  56411 0 12 1
   120 56 2.0 99 1.49 1583 2 1
1
'SBFR P4-P5' 'AG' 212972 56499  212963  57730   1564 0.43 0 56
1
'EBSUN P1-P2' 'AG' 213740 55978 213333 55968    267 0.51 0 32
1
'EBSUN P2-P3' 'AG' 213333 55968 213271 55978    267 0.51 0 32
2
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'EBSUN P3-P4 APP QUE' 'BR' 213271 55978 212940 56027 0 12 1
   120 42 2.0 158 1.49 3539 2 1
2
'EBSUN P3-P4 LT QUE' 'BR' 213268 55991  213002  56033 0 12 1
   120 75 2.0 257 1.49 1103 2 1
1
'EBSUN P4-P5' 'AG' 212940 56027 212533 56037    386 0.51 0 44
1
'WBSUN P1-P2' 'AG' 212530 56060 212936 56070    347 0.51 0 32
1
'WBSUN P2-P3' 'AG' 212936 56070 213002 56063    347 0.51 0 32
2
'WBSUN P3-P4 APP QUE' 'BR' 213002 56063 213333 56011    0 12 1
   120 70 2.0 248 1.49 1863 2 1
2
'WBSUN P3-P4 LT QUE' 'BR' 213005 56050  213281  56004   0 12 1
   120 75 2.0 485 1.49 1770 2 1
1
'WBSUN P4-P5' 'AG' 213333 56011 213740 55994    386 0.51 0 32
1 0 6 1000 1.7 'Y' 10 0 36
```

JOB: I-820 AT SUN VALLEY 2045 RUN: 2045

DATE : 11/17/19
TIME : 14:42: 5

The MODE flag has been set to C for calculating CO averages.

SITE & METEOROLOGICAL VARIABLES

VS = 0.0 CM/S VD = 0.0 CM/S Z0 = 108. CM
U = 1.0 M/S CLAS = 6 (F) ATIM = 60. MINUTES MIXH = 1000. M AMB = 1.7 PPM

LINK VARIABLES

LINK DESCRIPTION	*	LINK COORDINATES (FT)				*	LENGTH	BRG	TYPE	VPH	EF	H	W	V/C	QUEUE
	*	X1	Y1	X2	Y2	*	(FT)	(DEG)			(G/MI)	(FT)	(FT)		(VEH)
1. NBFR P1-P2	*	213268.0	57733.0	213301.0	56539.0	*	1194.	178.	AG	2000.	0.4	0.0	56.0		
2. NBFR P2-P3	*	213301.0	56539.0	213304.0	55988.0	*	551.	180.	AG	2000.	0.4	0.0	56.0		
3. NBFR P3-P4 APP QUE	*	213304.0	55988.0	213310.8	55658.2	*	330.	179.	AG	9.	100.0	0.0	36.0	0.45	16.8
4. NBFR P3-P4 RT QUE	*	213337.0	55938.0	213336.2	55873.0	*	65.	181.	AG	3.	100.0	0.0	12.0	0.17	3.3
5. NBFR P3-P4 LT QUE	*	213281.0	55951.0	213278.5	55651.7	*	299.	180.	AG	3.	100.0	0.0	12.0	0.76	15.2
6. NBFR P4-P5	*	213314.0	55499.0	213320.0	54626.0	*	873.	180.	AG	2198.	0.4	0.0	56.0		
7. NBML P1-P2	*	213202.0	54623.0	213189.0	55827.0	*	1204.	359.	AG	10049.	0.4	0.0	****		
8. NBML P2-P3	*	213189.0	55827.0	213192.0	56519.0	*	692.	0.	DP	10049.	0.4	-20.0	****		
9. NBML P3-P4	*	213192.0	56519.0	213173.0	57720.0	*	1201.	359.	AG	10049.	0.4	0.0	****		
10. SBML P1-P2	*	213064.0	54626.0	213081.0	55833.0	*	1207.	1.	AG	8979.	0.4	0.0	****		
11. SBML P2-P3	*	213081.0	55833.0	213077.0	56522.0	*	689.	360.	DP	8979.	0.4	-20.0	****		
12. SBML P3-P4	*	213077.0	56522.0	213061.0	57720.0	*	1198.	359.	AG	8979.	0.4	0.0	****		

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      13. SBFR P1-P2          * 212943.0   54629.0  212979.0   55548.0 *     920.
  2. AG   1921.   0.4   0.0 56.0
      14. SBFR P2-P3          * 212979.0   55548.0  212976.0   56053.0 *     505.
360. AG   1921.   0.4   0.0 56.0
      15. SBFR P3-P4 APP QUE  * 212976.0   56053.0  212974.8   56183.1 *     130.
359. AG      6. 100.0   0.0 36.0 0.17   6.6
      16. SBFR P3-P4 RT Q     * 212946.0   56096.0  212946.0   56126.3 *      30.
360. AG      2. 100.0   0.0 12.0 0.13   1.5
      17. SBFR P4-P5          * 212972.0   56499.0  212963.0   57730.0 *    1231.
360. AG   1564.   0.4   0.0 56.0
      18. EBSUN P1-P2         * 213740.0   55978.0  213333.0   55968.0 *     407.
269. AG    267.   0.5   0.0 32.0
      19. EBSUN P2-P3         * 213333.0   55968.0  213271.0   55978.0 *      63.
279. AG    267.   0.5   0.0 32.0
      20. EBSUN P3-P4 APP QUE * 213271.0   55978.0  213235.1   55983.3 *      36.
278. BR      1. 100.0   0.0 12.0 0.07   1.8
      21. EBSUN P3-P4 LT QUE  * 213268.0   55991.0  213154.1   56009.0 *     115.
279. BR      2. 100.0   0.0 12.0 0.68   5.9
      22. EBSUN P4-P5         * 212940.0   56027.0  212533.0   56037.0 *     407.
271. AG    386.   0.5   0.0 44.0
      23. WBSUN P1-P2         * 212530.0   56060.0  212936.0   56070.0 *     406.
 89. AG    347.   0.5   0.0 32.0
      24. WBSUN P2-P3         * 212936.0   56070.0  213002.0   56063.0 *      66.
 96. AG    347.   0.5   0.0 32.0
      25. WBSUN P3-P4 APP QUE * 213002.0   56063.0  213097.9   56047.9 *      97.
 99. BR      2. 100.0   0.0 12.0 0.35   4.9
      26. WBSUN P3-P4 LT QUE  * 213005.0   56050.0  213224.8   56013.4 *     223.
 99. BR      2. 100.0   0.0 12.0 0.80  11.3
      27. WBSUN P4-P5         * 213333.0   56011.0  213740.0   55994.0 *     407.
 92. AG    386.   0.5   0.0 32.0
```



```
      DATE : 11/17/19
      TIME : 14:42: 5

       ADDITIONAL QUEUE LINK PARAMETERS
       --------------------------------
         LINK DESCRIPTION     *    CYCLE    RED     CLEARANCE  APPROACH  SATURATION
  IDLE   SIGNAL   ARRIVAL
                              *    LENGTH   TIME    LOST TIME    VOL     FLOW RATE
 EM FAC   TYPE     RATE
                              *     (SEC)   (SEC)    (SEC)      (VPH)      (VPH)
(gm/hr)

------------------------*-------------------------------------------------------
----------------------
       3. NBFR P3-P4 APP QUE  *     135      100       2.0      1584       5085
```

```
 1.49      2        1
     4. NBFR P3-P4 RT QUE   *     135      100       2.0       109       2787
 1.49      2        1
     5. NBFR P3-P4 LT QUE   *     135      100       2.0       485       2787
 1.49      2        1
    15. SBFR P3-P4 APP QUE  *     120       56       2.0      1277       5085
 1.49      2        1
    16. SBFR P3-P4 RT Q     *     120       56       2.0        99       1583
 1.49      2        1
    20. EBSUN P3-P4 APP QUE *     120       42       2.0       158       3539
 1.49      2        1
    21. EBSUN P3-P4 LT QUE  *     120       75       2.0       257       1103
 1.49      2        1
    25. WBSUN P3-P4 APP QUE *     120       70       2.0       248       1863
 1.49      2        1
    26. WBSUN P3-P4 LT QUE  *     120       75       2.0       485       1770
 1.49      2        1

      RECEPTOR LOCATIONS
      ------------------
                             *           COORDINATES (FT)          *
        RECEPTOR             *      X          Y          Z        *
    -------------------------*-----------------------------------*
     1. R1 SE                *    213360.0    55896.0        5.9   *
     2. R2 NE                *    213356.0    56050.0        5.9   *
     3. R3 NW                *    212920.0    56135.0        5.9   *
     4. R4 SW                *    212933.0    55961.0        5.9   *
```


MODEL RESULTS

REMARKS : In search of the angle corresponding to the maximum concentration, only the first angle, of the angles with same maximum concentrations, is indicated as maximum.

WIND ANGLE RANGE: 0.-360.

WIND ANGLE (DEGR)	* CONCENTRATION (PPM) REC1	REC2	REC3	REC4
0.	* 1.7	1.7	1.7	1.7
10.	* 1.7	1.7	1.9	1.9
20.	* 1.7	1.7	1.9	1.9
30.	* 1.7	1.7	1.8	1.8

40.	*	1.7	1.7	1.7	1.7
50.	*	1.7	1.7	1.7	1.7
60.	*	1.7	1.7	1.7	1.7
70.	*	1.7	1.7	1.7	1.7
80.	*	1.7	1.7	1.7	1.7
90.	*	1.7	1.7	1.7	1.7
100.	*	1.7	1.7	1.7	1.7
110.	*	1.7	1.7	1.7	1.7
120.	*	1.7	1.7	1.7	1.7
130.	*	1.7	1.7	1.7	1.8
140.	*	1.7	1.7	1.7	1.9
150.	*	1.7	1.7	1.8	1.9
160.	*	1.7	1.7	1.9	1.9
170.	*	1.7	1.7	1.9	1.8
180.	*	1.7	1.7	1.7	1.7
190.	*	1.8	1.8	1.7	1.7
200.	*	1.9	1.9	1.7	1.7
210.	*	1.9	1.9	1.7	1.7
220.	*	1.9	1.8	1.7	1.7
230.	*	1.9	1.7	1.7	1.7
240.	*	1.8	1.7	1.7	1.7
250.	*	1.7	1.7	1.7	1.7
260.	*	1.7	1.7	1.7	1.7
270.	*	1.7	1.7	1.7	1.7
280.	*	1.7	1.7	1.7	1.7
290.	*	1.7	1.7	1.7	1.7
300.	*	1.7	1.7	1.7	1.7
310.	*	1.7	1.7	1.7	1.7
320.	*	1.8	1.8	1.7	1.7
330.	*	1.8	1.8	1.7	1.7
340.	*	1.9	1.9	1.7	1.7
350.	*	1.9	1.9	1.7	1.7
360.	*	1.7	1.7	1.7	1.7
MAX	*	1.9	1.9	1.9	1.9
DEGR.	*	200	200	10	10

THE HIGHEST CONCENTRATION OF 1.90 PPM OCCURRED AT RECEPTOR REC3 .

DATE : 11/17/19
TIME : 14:42: 5

RECEPTOR - LINK MATRIX FOR THE ANGLE PRODUCING
THE MAXIMUM CONCENTRATION FOR EACH RECEPTOR

	*	CO/LINK (PPM)			
	*	ANGLE (DEGREES)			
	*	REC1	REC2	REC3	REC4
LINK #	*	200	200	10	10
1	*	0.0	0.0	0.0	0.0
2	*	0.0	0.0	0.0	0.0
3	*	0.0	0.0	0.0	0.0
4	*	0.0	0.0	0.0	0.0
5	*	0.0	0.0	0.0	0.0
6	*	0.0	0.0	0.0	0.0
7	*	0.1	0.1	0.0	0.0
8	*	0.0	0.0	0.0	0.0
9	*	0.0	0.0	0.1	0.1
10	*	0.1	0.1	0.0	0.0
11	*	0.0	0.0	0.0	0.0
12	*	0.0	0.0	0.1	0.1
13	*	0.0	0.0	0.0	0.0
14	*	0.0	0.0	0.0	0.0
15	*	0.0	0.0	0.0	0.0
16	*	0.0	0.0	0.0	0.0
17	*	0.0	0.0	0.0	0.0
18	*	0.0	0.0	0.0	0.0
19	*	0.0	0.0	0.0	0.0
20	*	0.0	0.0	0.0	0.0
21	*	0.0	0.0	0.0	0.0
22	*	0.0	0.0	0.0	0.0
23	*	0.0	0.0	0.0	0.0
24	*	0.0	0.0	0.0	0.0
25	*	0.0	0.0	0.0	0.0
26	*	0.0	0.0	0.0	0.0
27	*	0.0	0.0	0.0	0.0

```
'I-820 AT SPUR 303 2028' 60 108 0 0 4 0.3048 1 1
'R1 SW' 217372 74370 5.9
'R2 NW' 217369 74541 5.9
'R3 NE' 217782 74551 5.9
'R4 SE' 217789 74373 5.9
'2028' 48 36 1 'C' 1
1
'NBFR P1-P2' 'AG' 217736 76306 217710 75702 1863 0.78 0 80
1
'NBFR P2-P3 DEP' 'AG' 217710 75702 217720 74491 1863 0.78 0 56
1
'NBFR P3-P4 DEP' 'AG' 217720 74491 217726 74429 1287 0.78 0 56
1
'NBFR P5-P6 APPR' 'AG' 217723 74370 217717 73842 2060 0.78 0 56
2
'NBFR P5-P6 APP QUE' 'AG' 217723 74370 217717 73842 0 36 3
  135 100 2.0 1060 3.01 5085 2 1
2
'NBFR P5-P6 RT QUE' 'AG' 217749 74370 217736 73839 0 12 1
   135 100 2.0 479 3.01 2787 2 1
1
'NBFR P6-P7' 'AG' 217717 73842 217713 73389 1539 0.78 0 80
1
'NBFR P7-P8' 'AG' 217713 73389 217733 72313 1539 0.78 0 56
1
'NBFR P8-P9' 'AG' 217733 72313 217736 71175 2050 0.78 0 56
1
'NBML P1-P2' 'DP' 217592 76355 217605 74954 5546 0.77 -20 80
1
'NBML P2-P3' 'FL' 217605 74954 217608 74606 5546 0.77 10 80
1
'NBML P3-P4' 'BR' 217608 74606 217608 74295 5546 0.77 20 80
1
'NBML P4-P5' 'FL' 217608 74295 217628 71161 5036 0.77 15 68
1
'SBML P1-P2' 'FL' 217556 71165 217536 73891 3740 0.77 15 68
1
'SBML P2-P3' 'FL' 217536 73891 217526 74311 4250 0.77 20 68
1
'SBML P3-P4' 'BR' 217526 74311 217526 74610 4250 0.77 10 80
1
'SBML P4-P5' 'DP' 217526 217507 74610 76394 4250 0.77 -20 80
1
'SBFR P1-P2' 'AG' 217454 71161 217461 71801 709 0.78 0 56
1
'SBFR P2-P3' 'AG' 217461 71801 217438 73045 2136 0.78 0 56
1
'SBFR P3-P4 DEP' 'AG' 217438 73045 217425 74429 1626 0.78 0 44
2
'SBFR P5-P6 APP QUE' 'AG' 217411 74895 217425 74531 0 24 2
```

```
   135 84 2.0 1327 3.01 5085 2 1
2
'SBFR P5-P6 LT QUE' 'AG' 217438 74888 217545 74528 0 24 2
   135 41 2.0 551 3.01 3433 2 1
2
'SBFR P5-P6 RT Q' 'AG'  217382  74888 217402 74531 0 12 1
   135 10 2.0 249 3.01 1583 2 1
1
'SBFR P5-P6 APPR' 'AG' 2217411 74888 217425 74531 1626 0.78 0 44
1
'SBFR P6-P7' 'AG' 217425 74531 217411 74888 1844 0.78 0 56
1
'SBFR P7-P8' 'AG' 217411 74888 217372 75814 1844 0.78 0 56
1
'SBFR P8-P9' 'AG' 217372 75814 217208 76503 991 0.78 0 44
1
'NBENTR1 P1-P2' 'AG' 217671 73389 217654 74304 510 0.78 0 34
1
'SBEXR1 P1-P2' 'AG' 217484 73891 217480 73048 510 0.78 0 34
1
'EB303 P1-P2' 'AG' 218688 74731 218028 74449 1250 0.86 0 44
1
'EB303 P2-P3' 'AG' 218028 74449 217726 74429 1250 0.86 0 44
1
'EB303 P3-P4' 'AG' 217726 74429 217690 74429 1136 0.86 0 35
2
'EB303 P4-P5 APP QUE' 'AG' 217690 74429 217425 74429 0 24 2
   135 42 2.0 771 3.01 3539 2 1
2
'EB303 P4-P5 LT QUE' 'AG' 217690 74442 217421 74446 0 12 1
   135 47 2.0 364 3.01 1770 2 1
1
'EB303 P4-P5 APPR' 'AG' 217690 74429 217425 74429 850 0.86 0 36
1
'EB303 P6-P7' 'AG' 217388 74429 215909 74423 554 0.86 0 56
1
'WB303 P1-P2' 'AG' 215906 74482 217421 74491 635 0.86 0 44
1
'WB303 P2-P3' 'AG' 217421 74491 217464 74488 761 0.86 0 42
2
'WB303 P3-P4 APP QUE' 'AG' 217464 74488 217720 74491 0 24 2
   135 56 2.0 386 3.01 3539 2 1
2
'WB303 P3-P4 LT QUE' 'AG' 217461 74469 217717 74472 0 24 2
   135 61 2.0 376 3.01 719 2 1
2
'WB303 P5-P6 APP QUE' 'AG' 217779 74491 218038 74514 0 48 4
   135 104 2.0 656 3.01 5788 2 1
2
'WB303 P5-P6 RT QUE' 'AG' 217779 74518 218038 74544 0 12 1
```

```
   135 104 2.0 594 3.01 1283 2 1
1
'WB303 P3-P4 APP' 'AG' 217464 74491 217720 74488 761 0.86 0 68
1
'WB303 P5-P6 APP' 'AG' 217779 74491 218038 74514 1250 0.86 0 56
1
'WB303 P3-P4' 'AG' 217464 74488 217720 74491 569 0.86 0 68
1
'WB303 P4-P5' 'AG' 217720 74491 217779 74491 936 0.86 0 58
1
'WB303 P5-P6' 'AG' 217779 74491 218038 74514 936 0.86 0 68
1
'WB303 P6-P7' 'AG' 218038 74514 218671 74774 1250 0.86 0 56
1 0 6 1000 1.7 'Y' 10 0 36
```

JOB: I-820 AT SPUR 303 2028 RUN: 2028

DATE : 11/17/19
TIME : 14:22:42

The MODE flag has been set to C for calculating CO averages.

SITE & METEOROLOGICAL VARIABLES

VS = 0.0 CM/S VD = 0.0 CM/S Z0 = 108. CM
U = 1.0 M/S CLAS = 6 (F) ATIM = 60. MINUTES MIXH = 1000. M AMB = 1.7 PPM

LINK VARIABLES

	LINK DESCRIPTION	*	LINK COORDINATES (FT) X1	Y1	X2	Y2	*	LENGTH (FT)	BRG (DEG)	TYPE	VPH	EF (G/MI)	H (FT)	W (FT)	V/C	QUEUE (VEH)
1.	NBFR P1-P2	*	217736.0	76306.0	217710.0	75702.0	*	605.	182.	AG	1863.	0.8	0.0	80.0		
2.	NBFR P2-P3 DEP	*	217710.0	75702.0	217720.0	74491.0	*	1211.	180.	AG	1863.	0.8	0.0	56.0		
3.	NBFR P3-P4 DEP	*	217720.0	74491.0	217726.0	74429.0	*	62.	174.	AG	1287.	0.8	0.0	56.0		
4.	NBFR P5-P6 APPR	*	217723.0	74370.0	217717.0	73842.0	*	528.	181.	AG	2060.	0.8	0.0	56.0		
5.	NBFR P5-P6 APP QUE	*	217723.0	74370.0	217720.6	74155.3	*	215.	181.	AG	18.	100.0	0.0	36.0	0.30	10.9
6.	NBFR P5-P6 RT QUE	*	217749.0	74370.0	217741.8	74075.9	*	294.	181.	AG	6.	100.0	0.0	12.0	0.75	14.9
7.	NBFR P6-P7	*	217717.0	73842.0	217713.0	73389.0	*	453.	181.	AG	1539.	0.8	0.0	80.0		
8.	NBFR P7-P8	*	217713.0	73389.0	217733.0	72313.0	*	1076.	179.	AG	1539.	0.8	0.0	56.0		
9.	NBFR P8-P9	*	217733.0	72313.0	217736.0	71175.0	*	1138.	180.	AG	2050.	0.8	0.0	56.0		
10.	NBML P1-P2	*	217592.0	76355.0	217605.0	74954.0	*	1401.	179.	DP	5546.	0.8	-20.0	80.0		
11.	NBML P2-P3	*	217605.0	74954.0	217608.0	74606.0	*	348.	180.	FL	5546.	0.8	10.0	80.0		
12.	NBML P3-P4	*	217608.0	74606.0	217608.0	74295.0	*	311.	180.	BR	5546.	0.8	20.0	80.0		

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     13. NBML P4-P5          * 217608.0   74295.0  217628.0   71161.0 *    3134.
180. FL   5036.   0.8  15.0 68.0
     14. SBML P1-P2          * 217556.0   71165.0  217536.0   73891.0 *    2726.
360. FL   3740.   0.8  15.0 68.0
     15. SBML P2-P3          * 217536.0   73891.0  217526.0   74311.0 *     420.
359. FL   4250.   0.8  20.0 68.0
     16. SBML P3-P4          * 217526.0   74311.0  217526.0   74610.0 *     299.
360. BR   4250.   0.8  10.0 80.0
     17. SBML P4-P5          * 217526.0  217507.0   74610.0   76394.0 *    *****
225. DP   4250.   0.8 -20.0 80.0
     18. SBFR P1-P2          * 217454.0   71161.0  217461.0   71801.0 *     640.
  1. AG    709.   0.8   0.0 56.0
     19. SBFR P2-P3          * 217461.0   71801.0  217438.0   73045.0 *    1244.
359. AG   2136.   0.8   0.0 56.0
     20. SBFR P3-P4 DEP      * 217438.0   73045.0  217425.0   74429.0 *    1384.
359. AG   1626.   0.8   0.0 44.0
     21. SBFR P5-P6 APP QUE  * 217411.0   74895.0  217423.3   74574.6 *     321.
178. AG     10. 100.0   0.0 24.0 0.37  16.3
     22. SBFR P5-P6 LT QUE   * 217438.0   74888.0  217455.6   74828.9 *      62.
163. AG      5. 100.0   0.0 24.0 0.12   3.1
     23. SBFR P5-P6 RT Q     * 217382.0   74888.0  217382.8   74874.4 *      14.
177. AG      1. 100.0   0.0 12.0 0.18   0.7
     24. SBFR P5-P6 APPR     * ********   74888.0  217425.0   74531.0 *    *****
270. AG   1626.   0.8   0.0 44.0
     25. SBFR P6-P7          * 217425.0   74531.0  217411.0   74888.0 *     357.
358. AG   1844.   0.8   0.0 56.0
     26. SBFR P7-P8          * 217411.0   74888.0  217372.0   75814.0 *     927.
358. AG   1844.   0.8   0.0 56.0
     27. SBFR P8-P9          * 217372.0   75814.0  217208.0   76503.0 *     708.
347. AG    991.   0.8   0.0 44.0
     28. NBENTR1 P1-P2       * 217671.0   73389.0  217654.0   74304.0 *     915.
359. AG    510.   0.8   0.0 34.0
     29. SBEXR1 P1-P2        * 217484.0   73891.0  217480.0   73048.0 *     843.
180. AG    510.   0.8   0.0 34.0
     30. EB303 P1-P2         * 218688.0   74731.0  218028.0   74449.0 *     718.
247. AG   1250.   0.9   0.0 44.0
     31. EB303 P2-P3         * 218028.0   74449.0  217726.0   74429.0 *     303.
266. AG   1250.   0.9   0.0 44.0
     32. EB303 P3-P4         * 217726.0   74429.0  217690.0   74429.0 *      36.
270. AG   1136.   0.9   0.0 35.0
     33. EB303 P4-P5 APP QUE * 217690.0   74429.0  217601.6   74429.0 *      88.
270. AG      5. 100.0   0.0 24.0 0.17   4.5
     34. EB303 P4-P5 LT QUE  * 217690.0   74442.0  217596.5   74443.4 *      94.
271. AG      3. 100.0   0.0 12.0 0.33   4.8
     35. EB303 P4-P5 APPR    * 217690.0   74429.0  217425.0   74429.0 *     265.
270. AG    850.   0.9   0.0 36.0
     36. EB303 P6-P7         * 217388.0   74429.0  215909.0   74423.0 *    1479.
270. AG    554.   0.9   0.0 56.0
     37. WB303 P1-P2         * 215906.0   74482.0  217421.0   74491.0 *    1515.
 90. AG    635.   0.9   0.0 44.0
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     38. WB303 P2-P3         * 217421.0   74491.0  217464.0   74488.0 *      43.
 94. AG    761.   0.9   0.0 42.0
     39. WB303 P3-P4 APP QUE * 217464.0   74488.0  217523.1   74488.7 *      59.
 90. AG      7. 100.0   0.0 24.0 0.10   3.0
     40. WB303 P3-P4 LT QUE  * 217461.0   74469.0  217524.1   74469.7 *      63.
 90. AG      7. 100.0   0.0 24.0 0.51   3.2
     41. WB303 P5-P6 APP QUE * 217779.0   74491.0  217881.7   74500.1 *     103.
 85. AG     25. 100.0   0.0 48.0 0.14   5.2
     42. WB303 P5-P6 RT QUE  * 217779.0   74518.0  221660.6   74907.7 *    3901.
 84. AG      6. 100.0   0.0 12.0 2.32 198.2
     43. WB303 P3-P4 APP     * 217464.0   74491.0  217720.0   74488.0 *     256.
 91. AG    761.   0.9   0.0 68.0
     44. WB303 P5-P6 APP     * 217779.0   74491.0  218038.0   74514.0 *     260.
 85. AG   1250.   0.9   0.0 56.0
```



```
      DATE : 11/17/19
      TIME : 14:22:42

       LINK VARIABLES
       --------------
         LINK DESCRIPTION     *         LINK COORDINATES (FT)          *    LENGTH
BRG TYPE   VPH    EF      H   W    V/C QUEUE
                               *   X1        Y1        X2        Y2     *     (FT)
(DEG)           (G/MI)  (FT) (FT)       (VEH)

------------------------*-----------------------------------------*----------------
----------------------------------------
     45. WB303 P3-P4         * 217464.0   74488.0  217720.0   74491.0 *     256.
 89. AG    569.   0.9   0.0 68.0
     46. WB303 P4-P5         * 217720.0   74491.0  217779.0   74491.0 *      59.
 90. AG    936.   0.9   0.0 58.0
     47. WB303 P5-P6         * 217779.0   74491.0  218038.0   74514.0 *     260.
 85. AG    936.   0.9   0.0 68.0
     48. WB303 P6-P7         * 218038.0   74514.0  218671.0   74774.0 *     684.
 68. AG   1250.   0.9   0.0 56.0
```



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      DATE : 11/17/19
      TIME : 14:22:42

       ADDITIONAL QUEUE LINK PARAMETERS
       --------------------------------
         LINK DESCRIPTION     *    CYCLE    RED     CLEARANCE  APPROACH  SATURATION
```

		IDLE EM FAC	SIGNAL TYPE	ARRIVAL RATE
	* LENGTH (SEC)	TIME (SEC)	LOST TIME (SEC)	VOL (VPH)	FLOW RATE (VPH)	(gm/hr)		
5. NBFR P5-P6 APP QUE	* 135	100	2.0	1060	5085	3.01	2	1
6. NBFR P5-P6 RT QUE	* 135	100	2.0	479	2787	3.01	2	1
21. SBFR P5-P6 APP QUE	* 135	84	2.0	1327	5085	3.01	2	1
22. SBFR P5-P6 LT QUE	* 135	41	2.0	551	3433	3.01	2	1
23. SBFR P5-P6 RT Q	* 135	10	2.0	249	1583	3.01	2	1
33. EB303 P4-P5 APP QUE	* 135	42	2.0	771	3539	3.01	2	1
34. EB303 P4-P5 LT QUE	* 135	47	2.0	364	1770	3.01	2	1
39. WB303 P3-P4 APP QUE	* 135	56	2.0	386	3539	3.01	2	1
40. WB303 P3-P4 LT QUE	* 135	61	2.0	376	719	3.01	2	1
41. WB303 P5-P6 APP QUE	* 135	104	2.0	656	5788	3.01	2	1
42. WB303 P5-P6 RT QUE	* 135	104	2.0	594	1283	3.01	2	1

RECEPTOR LOCATIONS

RECEPTOR	COORDINATES (FT) X	Y	Z
1. R1 SW	217372.0	74370.0	5.9
2. R2 NW	217369.0	74541.0	5.9
3. R3 NE	217782.0	74551.0	5.9
4. R4 SE	217789.0	74373.0	5.9

MODEL RESULTS

REMARKS : In search of the angle corresponding to
the maximum concentration, only the first

angle, of the angles with same maximum
concentrations, is indicated as maximum.

WIND ANGLE RANGE: 0.-360.

WIND ANGLE (DEGR)	* CONCENTRATION (PPM) REC1	REC2	REC3	REC4
0.	1.7	1.7	1.7	1.7
10.	1.9	1.9	1.7	1.7
20.	1.7	1.9	1.7	1.7
30.	1.8	1.8	1.7	1.7
40.	1.9	1.8	1.7	1.7
50.	1.8	1.8	1.7	1.7
60.	1.8	1.8	1.7	1.7
70.	1.8	1.7	1.7	1.7
80.	1.7	1.7	1.7	1.7
90.	1.8	1.9	1.9	1.8
100.	1.7	1.8	1.8	1.7
110.	1.7	1.8	1.8	1.7
120.	1.8	1.7	1.9	1.7
130.	1.9	1.8	1.9	1.7
140.	1.9	1.8	1.9	1.7
150.	1.9	1.9	1.8	1.7
160.	2.0	1.9	1.8	1.7
170.	2.0	2.0	1.8	1.7
180.	1.7	1.7	1.8	1.8
190.	1.7	1.7	2.0	2.0
200.	1.7	1.7	1.8	2.0
210.	1.7	1.7	1.9	2.0
220.	1.7	1.7	1.9	1.8
230.	1.7	1.7	1.9	1.8
240.	1.7	1.7	1.9	1.7
250.	1.7	1.7	1.9	1.7
260.	1.7	1.7	1.8	1.7
270.	1.7	1.7	1.8	1.7
280.	1.7	1.7	1.7	1.7
290.	1.7	1.7	1.7	1.8
300.	1.7	1.7	1.8	1.8
310.	1.7	1.7	1.8	1.8
320.	1.7	1.7	1.8	1.7
330.	1.7	1.7	1.8	1.8
340.	1.7	1.7	1.9	1.9
350.	1.7	1.7	1.9	1.9
360.	1.7	1.7	1.7	1.7
MAX	2.0	2.0	2.0	2.0
DEGR.	160	170	190	190

THE HIGHEST CONCENTRATION OF 2.00 PPM OCCURRED AT RECEPTOR REC1 .

DATE : 11/17/19
TIME : 14:22:42

RECEPTOR - LINK MATRIX FOR THE ANGLE PRODUCING
THE MAXIMUM CONCENTRATION FOR EACH RECEPTOR

LINK #	CO/LINK (PPM) ANGLE (DEGREES) REC1 160	REC2 170	REC3 190	REC4 190
1	0.0	0.0	0.0	0.0
2	0.0	0.0	0.0	0.0
3	0.0	0.0	0.0	0.0
4	0.0	0.0	0.1	0.1
5	0.0	0.0	0.0	0.0
6	0.0	0.0	0.0	0.0
7	0.0	0.0	0.0	0.0
8	0.0	0.0	0.0	0.0
9	0.0	0.0	0.0	0.0
10	0.0	0.0	0.0	0.0
11	0.0	0.0	0.0	0.0
12	0.0	0.0	0.0	0.0
13	0.1	0.1	0.1	0.1
14	0.0	0.1	0.1	0.1
15	0.1	0.0	0.0	0.0
16	0.0	0.0	0.0	0.0
17	0.0	0.0	0.0	0.0
18	0.0	0.0	0.0	0.0
19	0.0	0.0	0.0	0.0
20	0.1	0.1	0.0	0.0
21	0.0	0.0	0.0	0.0
22	0.0	0.0	0.0	0.0
23	0.0	0.0	0.0	0.0
24	0.0	0.0	0.0	0.0
25	0.0	0.0	0.0	0.0
26	0.0	0.0	0.0	0.0
27	0.0	0.0	0.0	0.0
28	0.0	0.0	0.0	0.0
29	0.0	0.0	0.0	0.0
30	0.0	0.0	0.0	0.0
31	0.0	0.0	0.0	0.0
32	0.0	0.0	0.0	0.0

33	*	0.0	0.0	0.0	0.0
34	*	0.0	0.0	0.0	0.0
35	*	0.0	0.0	0.0	0.0
36	*	0.0	0.0	0.0	0.0
37	*	0.0	0.0	0.0	0.0
38	*	0.0	0.0	0.0	0.0
39	*	0.0	0.0	0.0	0.0
40	*	0.0	0.0	0.0	0.0
41	*	0.0	0.0	0.0	0.0
42	*	0.0	0.0	0.0	0.0
43	*	0.0	0.0	0.0	0.0
44	*	0.0	0.0	0.0	0.0
45	*	0.0	0.0	0.0	0.0

		CO/LINK (PPM) ANGLE (DEGREES)			
	*	REC1	REC2	REC3	REC4
LINK #	*	160	170	190	190
46	*	0.0	0.0	0.0	0.0
47	*	0.0	0.0	0.0	0.0
48	*	0.0	0.0	0.0	0.0

```
'I-820 AT SPUR 303 2045
' 60 108 0 0 4 0.3048 1 1
'R1 SW' 217372 74370 5.9
'R2 NW' 217369 74541 5.9
'R3 NE' 217782 74551 5.9
'R4 SE' 217789 74373 5.9
'2045' 48 36 1 'C' 1
1
'NBFR P1-P2' 'AG' 217736 76306 217710 75702 2376 0.43 0 80
1
'NBFR P2-P3 DEP' 'AG' 217710 75702 217720 74491 2376 0.43 0 56
1
'NBFR P3-P4 DEP' 'AG' 217720 74491 217726 74429 1733 0.43 0 56
1
'NBFR P5-P6 APPR' 'AG' 217723 74370 217717 73842 3074 0.43 0 56
2
'NBFR P5-P6 APP QUE' 'AG' 217723 74370 217717 73842 0 36 3
  135 100 2.0 1346 1.49 5085 2 1
2
'NBFR P5-P6 RT QUE' 'AG' 217749 74370 217736 73839 0 12 1
  135 100 2.0 614 1.49 2787 2 1
1
'NBFR P6-P7' 'AG' 217717 73842 217713 73389 1960 0.43 0 80
1
'NBFR P7-P8' 'AG' 217713 73389 217733 72313 1960 0.43 0 56
1
'NBFR P8-P9' 'AG' 217733 72313 217736 71175 2614 0.43 0 56
1
'NBML P1-P2' 'DP' 217592 76355 217605 74954 7128 0.45 -20 80
1
'NBML P2-P3' 'FL' 217605 74954 217608 74606 7128 0.45 10 80
1
'NBML P3-P4' 'BR' 217608 74606 217608 74295 7128 0.45 20 80
1
'NBML P4-P5' 'FL' 217608 74295 217628 71161 6475 0.45 15 68
1
'SBML P1-P2' 'FL' 217556 71165 217536 73891 4792 0.45 15 68
1
'SBML P2-P3' 'FL' 217536 73891 217526 74311 5445 0.45 20 68
1
'SBML P3-P4' 'BR' 217526 74311 217526 74610 5445 0.45 10 80
1
'SBML P4-P5' 'DP' 217526 217507 74610 76394 5445 0.45 -20 80
1
'SBFR P1-P2' 'AG' 217454 71161 217461 71801 911 0.43 0 56
1
'SBFR P2-P3' 'AG' 217461 71801 217438 73045 2742 0.43 0 56
1
'SBFR P3-P4 DEP' 'AG' 217438 73045 217425 74429 2089 0.43 0 44
2
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'SBFR P5-P6 APP QUE' 'AG' 217411 74895 217425 74531 0 24 2
   135 84 2.0 2515 1.49 5085 2 1
2
'SBFR P5-P6 LT QUE' 'AG'  217438 74888 217454 74528 0 24 2
   135 41 2.0 703 1.49 3433 2 1
2
'SBFR P5-P6 RT Q' 'AG'  217382  74888 217402 74531 0 12 1
   135 10 2.0 317 1.49 1583 2 1
1
'SBFR P5-P6 APPR' 'AG' 2217411 74888 217425 74531 2089 0.43 0 44
1
'SBFR P6-P7' 'AG' 217425 74531 217411 74888 2366 0.43 0 56
1
'SBFR P7-P8' 'AG' 217411 74888 217372 75814 2366 0.43 0 56
1
'SBFR P8-P9' 'AG' 217372 75814 217208 76503 1277 0.43 0 44
1
'NBENTR1 P1-P2' 'AG' 217671 73389 217654 74304 653 0.43 0 34
1
'SBEXR1 P1-P2' 'AG' 217484 73891 217480 73048 653 0.43 0 34
1
'EB303 P1-P2' 'AG' 218688 74731 218028 74449 1604 0.47 0 44
1
'EB303 P2-P3' 'AG' 218028 74449 217726 74429 1604 0.47 0 44
1
'EB303 P3-P4' 'AG' 217726 74429 217690 74429 1455 0.47 0 35
2
'EB303 P4-P5 APP QUE' 'AG' 217690 74429 217425 74429 0 24 2
   135 42 2.0 990 1.49 3539 2 1
2
'EB303 P4-P5 LT QUE' 'AG' 217690 74442 217421 74446 0 12 1
   135 47 2.0 465 1.49 1770 2 1
1
'EB303 P4-P5 APPR' 'AG' 217690  74429   217425  74429 1455 0.47 0 36
1
'EB303 P6-P7' 'AG' 217388 74429 215909 74423 950 0.47 0 56
1
'WB303 P1-P2' 'AG' 215906 74482 217421 74491 812 0.47 0 44
1
'WB303 P2-P3' 'AG' 217421 74491 217464 74488 980 0.47 0 42
2
'WB303 P3-P4 APP QUE' 'AG'      217464  74488   217720  74491 0 24 2
   135 56 2.0 495 1.49 3539 2 1
2
'WB303 P3-P4 LT QUE' 'AG'       217461  74469   217717  74472 0 24 2
   135 61 2.0 485 1.49 719 2 1
2
'WB303 P5-P6 APP QUE' 'AG'      217779  74491   218038  74514 0 48 4
   135 104 2.0 842 1.49 5788 2 1
2
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'WB303 P5-P6 RT QUE' 'AG'       217779  74518   218038  74544 0 12 1
   135 104 2.0 762 1.49 1283 2 1
1
'WB303 P3-P4 APP' 'AG' 217464 74491 217720      74488   761 0.47 0 68
1
'WB303 P5-P6 APP' 'AG' 217779 74491     218038  74514 1604 0.47 0 56
1
'WB303 P3-P4' 'AG' 217464 74488 217720 74491 980 0.47 0 68
1
'WB303 P4-P5' 'AG' 217720 74491 217779 74491 1604 0.47 0 58
1
'WB303 P5-P6' 'AG' 217779 74491 218038 74514 1604 0.47 0 68
1
'WB303 P6-P7' 'AG' 218038 74514 218671 74774 1604 0.47 0 56
1 0 6 1000 1.7 'Y' 10 0 36
```

JOB: I-820 AT SPUR 303 2045 RUN: 2045

DATE : 11/17/19
TIME : 14:37:59

The MODE flag has been set to C for calculating CO averages.

SITE & METEOROLOGICAL VARIABLES

VS = 0.0 CM/S VD = 0.0 CM/S Z0 = 108. CM
U = 1.0 M/S CLAS = 6 (F) ATIM = 60. MINUTES MIXH = 1000. M AMB = 1.7 PPM

LINK VARIABLES

LINK DESCRIPTION	*	LINK COORDINATES (FT)				*	LENGTH	BRG	TYPE	VPH	EF	H	W	V/C	QUEUE
	*	X1	Y1	X2	Y2	*	(FT)	(DEG)			(G/MI)	(FT)	(FT)		(VEH)
1. NBFR P1-P2	*	217736.0	76306.0	217710.0	75702.0	*	605.	182.	AG	2376.	0.4	0.0	80.0		
2. NBFR P2-P3 DEP	*	217710.0	75702.0	217720.0	74491.0	*	1211.	180.	AG	2376.	0.4	0.0	56.0		
3. NBFR P3-P4 DEP	*	217720.0	74491.0	217726.0	74429.0	*	62.	174.	AG	1733.	0.4	0.0	56.0		
4. NBFR P5-P6 APPR	*	217723.0	74370.0	217717.0	73842.0	*	528.	181.	AG	3074.	0.4	0.0	56.0		
5. NBFR P5-P6 APP QUE	*	217723.0	74370.0	217719.9	74093.7	*	276.	181.	AG	9.	100.0	0.0	36.0	0.38	14.0
6. NBFR P5-P6 RT QUE	*	217749.0	74370.0	217737.9	73914.7	*	455.	181.	AG	3.	100.0	0.0	12.0	0.96	23.1
7. NBFR P6-P7	*	217717.0	73842.0	217713.0	73389.0	*	453.	181.	AG	1960.	0.4	0.0	80.0		
8. NBFR P7-P8	*	217713.0	73389.0	217733.0	72313.0	*	1076.	179.	AG	1960.	0.4	0.0	56.0		
9. NBFR P8-P9	*	217733.0	72313.0	217736.0	71175.0	*	1138.	180.	AG	2614.	0.4	0.0	56.0		
10. NBML P1-P2	*	217592.0	76355.0	217605.0	74954.0	*	1401.	179.	DP	7128.	0.4	-20.0	80.0		
11. NBML P2-P3	*	217605.0	74954.0	217608.0	74606.0	*	348.	180.	FL	7128.	0.4	10.0	80.0		
12. NBML P3-P4	*	217608.0	74606.0	217608.0	74295.0	*	311.	180.	BR	7128.	0.4	20.0	80.0		

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     13. NBML P4-P5          * 217608.0   74295.0  217628.0   71161.0 *    3134.
180. FL   6475.   0.4  15.0 68.0
     14. SBML P1-P2          * 217556.0   71165.0  217536.0   73891.0 *    2726.
360. FL   4792.   0.4  15.0 68.0
     15. SBML P2-P3          * 217536.0   73891.0  217526.0   74311.0 *     420.
359. FL   5445.   0.4  20.0 68.0
     16. SBML P3-P4          * 217526.0   74311.0  217526.0   74610.0 *     299.
360. BR   5445.   0.4  10.0 80.0
     17. SBML P4-P5          * 217526.0  217507.0   74610.0   76394.0 *    *****
225. DP   5445.   0.4 -20.0 80.0
     18. SBFR P1-P2          * 217454.0   71161.0  217461.0   71801.0 *     640.
  1. AG    911.   0.4   0.0 56.0
     19. SBFR P2-P3          * 217461.0   71801.0  217438.0   73045.0 *    1244.
359. AG   2742.   0.4   0.0 56.0
     20. SBFR P3-P4 DEP      * 217438.0   73045.0  217425.0   74429.0 *    1384.
359. AG   2089.   0.4   0.0 44.0
     21. SBFR P5-P6 APP QUE  * 217411.0   74895.0  217434.2   74293.0 *     602.
178. AG      5. 100.0   0.0 24.0 0.71  30.6
     22. SBFR P5-P6 LT QUE   * 217438.0   74888.0  217441.5   74809.4 *      79.
177. AG      2. 100.0   0.0 24.0 0.15   4.0
     23. SBFR P5-P6 RT Q     * 217382.0   74888.0  217383.0   74870.7 *      17.
177. AG      0. 100.0   0.0 12.0 0.22   0.9
     24. SBFR P5-P6 APPR     * ********   74888.0  217425.0   74531.0 *    *****
270. AG   2089.   0.4   0.0 44.0
     25. SBFR P6-P7          * 217425.0   74531.0  217411.0   74888.0 *     357.
358. AG   2366.   0.4   0.0 56.0
     26. SBFR P7-P8          * 217411.0   74888.0  217372.0   75814.0 *     927.
358. AG   2366.   0.4   0.0 56.0
     27. SBFR P8-P9          * 217372.0   75814.0  217208.0   76503.0 *     708.
347. AG   1277.   0.4   0.0 44.0
     28. NBENTR1 P1-P2       * 217671.0   73389.0  217654.0   74304.0 *     915.
359. AG    653.   0.4   0.0 34.0
     29. SBEXR1 P1-P2        * 217484.0   73891.0  217480.0   73048.0 *     843.
180. AG    653.   0.4   0.0 34.0
     30. EB303 P1-P2         * 218688.0   74731.0  218028.0   74449.0 *     718.
247. AG   1604.   0.5   0.0 44.0
     31. EB303 P2-P3         * 218028.0   74449.0  217726.0   74429.0 *     303.
266. AG   1604.   0.5   0.0 44.0
     32. EB303 P3-P4         * 217726.0   74429.0  217690.0   74429.0 *      36.
270. AG   1455.   0.5   0.0 35.0
     33. EB303 P4-P5 APP QUE * 217690.0   74429.0  217576.3   74429.0 *     114.
269. AG      2. 100.0   0.0 24.0 0.21   5.8
     34. EB303 P4-P5 LT QUE  * 217690.0   74442.0  217570.5   74443.8 *     120.
271. AG      1. 100.0   0.0 12.0 0.42   6.1
     35. EB303 P4-P5 APPR    * 217690.0   74429.0  217425.0   74429.0 *     265.
270. AG   1455.   0.5   0.0 36.0
     36. EB303 P6-P7         * 217388.0   74429.0  215909.0   74423.0 *    1479.
270. AG    950.   0.5   0.0 56.0
     37. WB303 P1-P2         * 215906.0   74482.0  217421.0   74491.0 *    1515.
 90. AG    812.   0.5   0.0 44.0
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     38. WB303 P2-P3         * 217421.0   74491.0  217464.0   74488.0 *      43.
 94. AG    980.   0.5   0.0 42.0
     39. WB303 P3-P4 APP QUE * 217464.0   74488.0  217539.7   74488.9 *      76.
 90. AG      3. 100.0   0.0 24.0 0.13   3.8
     40. WB303 P3-P4 LT QUE  * 217461.0   74469.0  217542.3   74470.0 *      81.
 89. AG      4. 100.0   0.0 24.0 0.65   4.1
     41. WB303 P5-P6 APP QUE * 217779.0   74491.0  217911.2   74502.7 *     133.
 85. AG     12. 100.0   0.0 48.0 0.18   6.7
     42. WB303 P5-P6 RT QUE  * 217779.0   74518.0  223467.5   75089.1 *    5717.
 84. AG      3. 100.0   0.0 12.0 2.98 290.4
     43. WB303 P3-P4 APP     * 217464.0   74491.0  217720.0   74488.0 *     256.
 91. AG    761.   0.5   0.0 68.0
     44. WB303 P5-P6 APP     * 217779.0   74491.0  218038.0   74514.0 *     260.
 85. AG   1604.   0.5   0.0 56.0
```



```
      DATE : 11/17/19
      TIME : 14:37:59

       LINK VARIABLES
       --------------
         LINK DESCRIPTION     *         LINK COORDINATES (FT)          *    LENGTH
BRG TYPE   VPH    EF      H   W    V/C QUEUE
                               *   X1        Y1        X2        Y2     *     (FT)
(DEG)           (G/MI)  (FT) (FT)       (VEH)

-----------------------*----------------------------------------*----------------
----------------------------------------
     45. WB303 P3-P4         * 217464.0   74488.0  217720.0   74491.0 *     256.
 89. AG    980.   0.5   0.0 68.0
     46. WB303 P4-P5         * 217720.0   74491.0  217779.0   74491.0 *      59.
 90. AG   1604.   0.5   0.0 58.0
     47. WB303 P5-P6         * 217779.0   74491.0  218038.0   74514.0 *     260.
 85. AG   1604.   0.5   0.0 68.0
     48. WB303 P6-P7         * 218038.0   74514.0  218671.0   74774.0 *     684.
 68. AG   1604.   0.5   0.0 56.0
```



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      DATE : 11/17/19
      TIME : 14:37:59

       ADDITIONAL QUEUE LINK PARAMETERS
       --------------------------------
         LINK DESCRIPTION     *    CYCLE    RED     CLEARANCE  APPROACH  SATURATION
```

		IDLE EM FAC	SIGNAL TYPE	ARRIVAL RATE
	LENGTH (SEC)	TIME (SEC)	LOST TIME (SEC)	VOL (VPH)	FLOW RATE (VPH)	(gm/hr)		
5. NBFR P5-P6 APP QUE	135	100	2.0	1346	5085	1.49	2	1
6. NBFR P5-P6 RT QUE	135	100	2.0	614	2787	1.49	2	1
21. SBFR P5-P6 APP QUE	135	84	2.0	2515	5085	1.49	2	1
22. SBFR P5-P6 LT QUE	135	41	2.0	703	3433	1.49	2	1
23. SBFR P5-P6 RT Q	135	10	2.0	317	1583	1.49	2	1
33. EB303 P4-P5 APP QUE	135	42	2.0	990	3539	1.49	2	1
34. EB303 P4-P5 LT QUE	135	47	2.0	465	1770	1.49	2	1
39. WB303 P3-P4 APP QUE	135	56	2.0	495	3539	1.49	2	1
40. WB303 P3-P4 LT QUE	135	61	2.0	485	719	1.49	2	1
41. WB303 P5-P6 APP QUE	135	104	2.0	842	5788	1.49	2	1
42. WB303 P5-P6 RT QUE	135	104	2.0	762	1283	1.49	2	1

RECEPTOR LOCATIONS

RECEPTOR	COORDINATES (FT) X	Y	Z
1. R1 SW	217372.0	74370.0	5.9
2. R2 NW	217369.0	74541.0	5.9
3. R3 NE	217782.0	74551.0	5.9
4. R4 SE	217789.0	74373.0	5.9

MODEL RESULTS

REMARKS : In search of the angle corresponding to
the maximum concentration, only the first

angle, of the angles with same maximum
concentrations, is indicated as maximum.

WIND ANGLE RANGE: 0.-360.

WIND ANGLE (DEGR)	* CONCENTRATION (PPM) REC1	REC2	REC3	REC4
0.	1.7	1.7	1.7	1.7
10.	1.8	1.7	1.7	1.7
20.	1.7	1.7	1.7	1.7
30.	1.8	1.7	1.7	1.7
40.	1.7	1.7	1.7	1.7
50.	1.7	1.7	1.7	1.7
60.	1.7	1.7	1.7	1.7
70.	1.7	1.7	1.7	1.7
80.	1.7	1.7	1.7	1.7
90.	1.8	1.8	1.9	1.8
100.	1.7	1.8	1.8	1.7
110.	1.7	1.7	1.8	1.7
120.	1.7	1.7	1.7	1.7
130.	1.7	1.7	1.7	1.7
140.	1.7	1.7	1.7	1.7
150.	1.9	1.8	1.7	1.7
160.	1.8	1.9	1.7	1.7
170.	2.0	2.0	1.7	1.7
180.	1.7	1.7	1.7	1.7
190.	1.7	1.7	2.0	1.9
200.	1.7	1.7	1.8	1.9
210.	1.7	1.7	1.7	1.8
220.	1.7	1.7	1.7	1.8
230.	1.7	1.7	1.7	1.7
240.	1.7	1.7	1.7	1.7
250.	1.7	1.7	1.8	1.7
260.	1.7	1.7	1.8	1.7
270.	1.7	1.7	1.8	1.7
280.	1.7	1.7	1.7	1.7
290.	1.7	1.7	1.7	1.7
300.	1.7	1.7	1.7	1.7
310.	1.7	1.7	1.8	1.7
320.	1.7	1.7	1.8	1.7
330.	1.7	1.7	1.8	1.8
340.	1.7	1.7	1.7	1.8
350.	1.7	1.7	1.9	1.9
360.	1.7	1.7	1.7	1.7
MAX	2.0	2.0	2.0	1.9
DEGR.	170	170	190	190

THE HIGHEST CONCENTRATION OF 2.00 PPM OCCURRED AT RECEPTOR REC1 .

DATE : 11/17/19
TIME : 14:37:59

RECEPTOR - LINK MATRIX FOR THE ANGLE PRODUCING
THE MAXIMUM CONCENTRATION FOR EACH RECEPTOR

	* CO/LINK (PPM) ANGLE (DEGREES)			
	* REC1	REC2	REC3	REC4
LINK #	* 170	170	190	190
1	* 0.0	0.0	0.0	0.0
2	* 0.0	0.0	0.0	0.0
3	* 0.0	0.0	0.0	0.0
4	* 0.0	0.0	0.1	0.0
5	* 0.0	0.0	0.0	0.0
6	* 0.0	0.0	0.0	0.0
7	* 0.0	0.0	0.0	0.0
8	* 0.0	0.0	0.0	0.0
9	* 0.0	0.0	0.0	0.0
10	* 0.0	0.0	0.0	0.0
11	* 0.0	0.0	0.0	0.0
12	* 0.0	0.0	0.0	0.0
13	* 0.1	0.1	0.1	0.1
14	* 0.1	0.1	0.1	0.1
15	* 0.0	0.0	0.0	0.0
16	* 0.0	0.0	0.0	0.0
17	* 0.0	0.0	0.0	0.0
18	* 0.0	0.0	0.0	0.0
19	* 0.0	0.0	0.0	0.0
20	* 0.1	0.1	0.0	0.0
21	* 0.0	0.0	0.0	0.0
22	* 0.0	0.0	0.0	0.0
23	* 0.0	0.0	0.0	0.0
24	* 0.0	0.0	0.0	0.0
25	* 0.0	0.0	0.0	0.0
26	* 0.0	0.0	0.0	0.0
27	* 0.0	0.0	0.0	0.0
28	* 0.0	0.0	0.0	0.0
29	* 0.0	0.0	0.0	0.0
30	* 0.0	0.0	0.0	0.0
31	* 0.0	0.0	0.0	0.0
32	* 0.0	0.0	0.0	0.0

33	*	0.0	0.0	0.0	0.0
34	*	0.0	0.0	0.0	0.0
35	*	0.0	0.0	0.0	0.0
36	*	0.0	0.0	0.0	0.0
37	*	0.0	0.0	0.0	0.0
38	*	0.0	0.0	0.0	0.0
39	*	0.0	0.0	0.0	0.0
40	*	0.0	0.0	0.0	0.0
41	*	0.0	0.0	0.0	0.0
42	*	0.0	0.0	0.0	0.0
43	*	0.0	0.0	0.0	0.0
44	*	0.0	0.0	0.0	0.0
45	*	0.0	0.0	0.0	0.0

		CO/LINK (PPM) ANGLE (DEGREES)			
	*	REC1	REC2	REC3	REC4
LINK #	*	170	170	190	190
46	*	0.0	0.0	0.0	0.0
47	*	0.0	0.0	0.0	0.0
48	*	0.0	0.0	0.0	0.0

```
'I-820 MEADOWBROOK TO BSR 2028' 60 108 0 0 3 0.3048 1 1
'R1' 218458 81024 5.9
'R2' 219718 82598 5.9
'R3' 218894 82123 5.9
'2028' 15 36 1 'C' 1
1
'NBFR P1-P2' 'AG' 220171 83560 219091 81535 2044 0.78 0 56
1
'NBFR P2-P3' 'AG' 219091 81535 218848 81093 2044 0.78 0 56
1
'NBFR P3-P4' 'FL' 218848 81093 218511 80466 2044 0.78 10 56
1
'NBML P1-P2' 'BR' 220135 83720 219800 83048 3889 0.77 20 58
1
'NBML P2-P3' 'FL' 219800 83048 219016 81604 5817 0.77 20 70
1
'NBML P3-P4' 'AG' 219016 81604 218376 80449 5817 0.77 0 68
1
'SBML P1-P2' 'BR' 220079 83760 219209 82119 5491 0.77 20 94
1
'SBML P2-P3' 'FL' 219209 82119 218803 81378 4552 0.77 20 94
1
'SBML P3-P4' 'AG' 218803 81378 218304 80459 4552 0.77 0 82
1
'SBFR P1-P2' 'AG' 219944 83717 219117 82162 855 0.78 0 44
1
'SBFR P2-P3' 'AG' 219117 82162 218727 81453 855 0.78 0 44
1
'SBFR P3-P4' 'FL' 218727 81453 218189 80453 1793 0.78 10 56
1
'NBENTR1 P1-P2' 'AG' 219052 81568 218812 81119 939 0.78 0 34
1
'NBEXR1 P1-P2' 'AG' 220194 83701 219829 83022 1928 0.78 0 48
1
'SBEXR1 P1-P2' 'AG' 219160 82146 218760 81417 939 0.78 0 34
1 0 6 1000 1.7 'Y' 10 0 36
```

JOB: I-820 MEADOWBROOK TO BSR 2028 RUN: 2028

DATE : 11/17/19
TIME : 14: 6: 0

The MODE flag has been set to C for calculating CO averages.

SITE & METEOROLOGICAL VARIABLES

VS = 0.0 CM/S VD = 0.0 CM/S Z0 = 108. CM
U = 1.0 M/S CLAS = 6 (F) ATIM = 60. MINUTES MIXH = 1000. M AMB = 1.7 PPM

LINK VARIABLES

	LINK DESCRIPTION	*	LINK COORDINATES (FT)				*	LENGTH	BRG	TYPE	VPH	EF	H	W	V/C	QUEUE
		*	X1	Y1	X2	Y2	*	(FT)	(DEG)			(G/MI)	(FT)	(FT)		(VEH)
1.	NBFR P1-P2	*	220171.0	83560.0	219091.0	81535.0	*	2295.	208.	AG	2044.	0.8	0.0	56.0		
2.	NBFR P2-P3	*	219091.0	81535.0	218848.0	81093.0	*	504.	209.	AG	2044.	0.8	0.0	56.0		
3.	NBFR P3-P4	*	218848.0	81093.0	218511.0	80466.0	*	712.	208.	FL	2044.	0.8	10.0	56.0		
4.	NBML P1-P2	*	220135.0	83720.0	219800.0	83048.0	*	751.	206.	BR	3889.	0.8	20.0	58.0		
5.	NBML P2-P3	*	219800.0	83048.0	219016.0	81604.0	*	1643.	208.	FL	5817.	0.8	20.0	70.0		
6.	NBML P3-P4	*	219016.0	81604.0	218376.0	80449.0	*	1320.	209.	AG	5817.	0.8	0.0	68.0		
7.	SBML P1-P2	*	220079.0	83760.0	219209.0	82119.0	*	1857.	208.	BR	5491.	0.8	20.0	94.0		
8.	SBML P2-P3	*	219209.0	82119.0	218803.0	81378.0	*	845.	209.	FL	4552.	0.8	20.0	94.0		
9.	SBML P3-P4	*	218803.0	81378.0	218304.0	80459.0	*	1046.	209.	AG	4552.	0.8	0.0	82.0		
10.	SBFR P1-P2	*	219944.0	83717.0	219117.0	82162.0	*	1761.	208.	AG	855.	0.8	0.0	44.0		
11.	SBFR P2-P3	*	219117.0	82162.0	218727.0	81453.0	*	809.	209.	AG	855.	0.8	0.0	44.0		
12.	SBFR P3-P4	*	218727.0	81453.0	218189.0	80453.0	*	1136.	208.	FL	1793.	0.8	10.0	56.0		

```
     13. NBENTR1 P1-P2       * 219052.0   81568.0  218812.0   81119.0 *     509.
208. AG    939.   0.8   0.0 34.0
     14. NBEXR1 P1-P2        * 220194.0   83701.0  219829.0   83022.0 *     771.
208. AG   1928.   0.8   0.0 48.0
     15. SBEXR1 P1-P2        * 219160.0   82146.0  218760.0   81417.0 *     832.
209. AG    939.   0.8   0.0 34.0
```



```
      DATE : 11/17/19
      TIME : 14: 6: 0

       ADDITIONAL QUEUE LINK PARAMETERS
       --------------------------------
         LINK DESCRIPTION     *    CYCLE    RED     CLEARANCE  APPROACH  SATURATION
  IDLE   SIGNAL   ARRIVAL
                              *    LENGTH   TIME    LOST TIME    VOL     FLOW RATE
 EM FAC   TYPE     RATE
                              *     (SEC)   (SEC)    (SEC)      (VPH)      (VPH)
(gm/hr)

-------------------------*------------------------------------------------------------
----------------------

       RECEPTOR LOCATIONS
       ------------------
                              *           COORDINATES (FT)          *
         RECEPTOR             *      X          Y          Z        *
     ------------------------*-------------------------------------*
      1. R1                   *    218458.0    81024.0        5.9   *
      2. R2                   *    219718.0    82598.0        5.9   *
      3. R3                   *    218894.0    82123.0        5.9   *
```



```
       MODEL RESULTS
       -------------

       REMARKS : In search of the angle corresponding to
                 the maximum concentration, only the first
                 angle, of the angles with same maximum
                 concentrations, is indicated as maximum.

 WIND ANGLE RANGE:   0.-360.

 WIND  * CONCENTRATION
```

ANGLE (DEGR)	*	(PPM) REC1	REC2	REC3
0.	*	1.7	2.0	1.7
10.	*	1.7	2.0	1.7
20.	*	1.7	1.9	1.7
30.	*	1.9	1.7	1.7
40.	*	2.0	1.7	1.8
50.	*	2.0	1.7	1.9
60.	*	2.0	1.7	1.9
70.	*	2.0	1.7	1.9
80.	*	2.0	1.7	1.7
90.	*	1.9	1.7	1.8
100.	*	1.9	1.7	1.7
110.	*	1.9	1.7	1.7
120.	*	1.9	1.7	1.7
130.	*	1.9	1.7	1.7
140.	*	1.9	1.7	1.7
150.	*	1.9	1.7	1.7
160.	*	2.0	1.7	1.7
170.	*	2.0	1.7	1.8
180.	*	2.0	1.7	1.9
190.	*	1.9	1.7	1.9
200.	*	1.8	1.7	1.7
210.	*	1.8	1.9	1.7
220.	*	1.7	2.0	1.7
230.	*	1.7	2.0	1.7
240.	*	1.7	2.0	1.7
250.	*	1.7	2.0	1.7
260.	*	1.7	1.9	1.7
270.	*	1.7	1.8	1.7
280.	*	1.7	1.8	1.7
290.	*	1.7	1.8	1.7
300.	*	1.7	1.8	1.7
310.	*	1.7	1.8	1.7
320.	*	1.7	1.8	1.7
330.	*	1.7	1.8	1.7
340.	*	1.7	1.9	1.7
350.	*	1.7	2.0	1.7
360.	*	1.7	2.0	1.7
MAX	*	2.0	2.0	1.9
DEGR.	*	40	0	50

THE HIGHEST CONCENTRATION OF 2.00 PPM OCCURRED AT RECEPTOR REC2 .

DATE : 11/17/19
TIME : 14: 6: 0

RECEPTOR - LINK MATRIX FOR THE ANGLE PRODUCING
THE MAXIMUM CONCENTRATION FOR EACH RECEPTOR

LINK #	* CO/LINK (PPM) ANGLE (DEGREES) REC1	REC2	REC3
	* 40	0	50
1	* 0.0	0.1	0.0
2	* 0.0	0.0	0.0
3	* 0.0	0.0	0.0
4	* 0.0	0.0	0.0
5	* 0.1	0.1	0.1
6	* 0.0	0.0	0.0
7	* 0.0	0.1	0.1
8	* 0.1	0.0	0.0
9	* 0.0	0.0	0.0
10	* 0.0	0.0	0.0
11	* 0.0	0.0	0.0
12	* 0.1	0.0	0.0
13	* 0.0	0.0	0.0
14	* 0.0	0.0	0.0
15	* 0.0	0.0	0.0

```
'I-820 MEADOWBROOK TO BSR 2045' 60 108 0 0 3 0.3048 1 1
'R1' 218458 81024 5.9
'R2' 219718 82598 5.9
'R3' 218894 82123 5.9
'2045' 15 36 1 'C' 1
1
'NBFR P1-P2' 'AG' 220171 83560 219091 81535 2965 0.43 0 56
1
'NBFR P2-P3' 'AG' 219091 81535 218848 81093 2965 0.43 0 56
1
'NBFR P3-P4' 'FL' 218848 81093 218511 80466 2965 0.43 10 56
1
'NBML P1-P2' 'BR' 220135 83720 219800 83048 5000 0.45 20 58
1
'NBML P2-P3' 'FL' 219800 83048 219016 81604 7475 0.45 20 70
1
'NBML P3-P4' 'AG' 219016 81604 218376 80449 7475 0.45 0 68
1
'SBML P1-P2' 'BR' 220079 83760 219209 82119 7039 0.45 20 94
1
'SBML P2-P3' 'FL' 219209 82119 218803 81378 5831 0.45 20 94
1
'SBML P3-P4' 'AG' 218803 81378 218304 80459 5831 0.45 0 82
1
'SBFR P1-P2' 'AG' 219944 83717 219117 82162 1099 0.43 0 44
1
'SBFR P2-P3' 'AG' 219117 82162 218727 81453 1099 0.43 0 44
1
'SBFR P3-P4' 'FL' 218727 81453 218189 80453 2307 0.43 10 56
1
'NBENTR1 P1-P2' 'AG' 219052 81568 218812 81119 1208 0.43 0 34
1
'NBEXR1 P1-P2' 'AG' 220194 83701 219829 83022 2475 0.43 0 48
1
'SBEXR1 P1-P2' 'AG' 219160 82146 218760 81417 1208 0.43 0 34
1 0 6 1000 1.7 'Y' 10 0 36
```

JOB: I-820 MEADOWBROOK TO BSR 2045 RUN: 2045

DATE : 11/17/19
TIME : 14:32:52

The MODE flag has been set to C for calculating CO averages.

SITE & METEOROLOGICAL VARIABLES

VS = 0.0 CM/S VD = 0.0 CM/S Z0 = 108. CM
U = 1.0 M/S CLAS = 6 (F) ATIM = 60. MINUTES MIXH = 1000. M AMB = 1.7 PPM

LINK VARIABLES

	LINK DESCRIPTION	*	LINK COORDINATES (FT) X1	Y1	X2	Y2	*	LENGTH (FT)	BRG (DEG)	TYPE	VPH	EF (G/MI)	H (FT)	W (FT)	V/C	QUEUE (VEH)
1.	NBFR P1-P2	*	220171.0	83560.0	219091.0	81535.0	*	2295.	208.	AG	2965.	0.4	0.0	56.0		
2.	NBFR P2-P3	*	219091.0	81535.0	218848.0	81093.0	*	504.	209.	AG	2965.	0.4	0.0	56.0		
3.	NBFR P3-P4	*	218848.0	81093.0	218511.0	80466.0	*	712.	208.	FL	2965.	0.4	10.0	56.0		
4.	NBML P1-P2	*	220135.0	83720.0	219800.0	83048.0	*	751.	206.	BR	5000.	0.4	20.0	58.0		
5.	NBML P2-P3	*	219800.0	83048.0	219016.0	81604.0	*	1643.	208.	FL	7475.	0.4	20.0	70.0		
6.	NBML P3-P4	*	219016.0	81604.0	218376.0	80449.0	*	1320.	209.	AG	7475.	0.4	0.0	68.0		
7.	SBML P1-P2	*	220079.0	83760.0	219209.0	82119.0	*	1857.	208.	BR	7039.	0.4	20.0	94.0		
8.	SBML P2-P3	*	219209.0	82119.0	218803.0	81378.0	*	845.	209.	FL	5831.	0.4	20.0	94.0		
9.	SBML P3-P4	*	218803.0	81378.0	218304.0	80459.0	*	1046.	209.	AG	5831.	0.4	0.0	82.0		
10.	SBFR P1-P2	*	219944.0	83717.0	219117.0	82162.0	*	1761.	208.	AG	1099.	0.4	0.0	44.0		
11.	SBFR P2-P3	*	219117.0	82162.0	218727.0	81453.0	*	809.	209.	AG	1099.	0.4	0.0	44.0		
12.	SBFR P3-P4	*	218727.0	81453.0	218189.0	80453.0	*	1136.	208.	FL	2307.	0.4	10.0	56.0		

```
     13. NBENTR1 P1-P2       * 219052.0   81568.0  218812.0   81119.0 *     509.
208. AG   1208.   0.4   0.0 34.0
     14. NBEXR1 P1-P2        * 220194.0   83701.0  219829.0   83022.0 *     771.
208. AG   2475.   0.4   0.0 48.0
     15. SBEXR1 P1-P2        * 219160.0   82146.0  218760.0   81417.0 *     832.
209. AG   1208.   0.4   0.0 34.0
```



```
      DATE : 11/17/19
      TIME : 14:32:52

       ADDITIONAL QUEUE LINK PARAMETERS
       --------------------------------
         LINK DESCRIPTION     *    CYCLE    RED     CLEARANCE  APPROACH  SATURATION
  IDLE   SIGNAL   ARRIVAL
                              *    LENGTH   TIME    LOST TIME    VOL     FLOW RATE
 EM FAC   TYPE     RATE
                              *     (SEC)   (SEC)    (SEC)      (VPH)      (VPH)
(gm/hr)

-------------------------*------------------------------------------------------------
----------------------

       RECEPTOR LOCATIONS
       ------------------
                              *           COORDINATES (FT)          *
         RECEPTOR             *      X          Y          Z        *
     ------------------------*-------------------------------------*
      1. R1                   *    218458.0    81024.0        5.9   *
      2. R2                   *    219718.0    82598.0        5.9   *
      3. R3                   *    218894.0    82123.0        5.9   *
```



```
       MODEL RESULTS
       -------------

       REMARKS : In search of the angle corresponding to
                 the maximum concentration, only the first
                 angle, of the angles with same maximum
                 concentrations, is indicated as maximum.

 WIND ANGLE RANGE:   0.-360.

 WIND  * CONCENTRATION
```

ANGLE (DEGR)	*	(PPM) REC1	REC2	REC3
0.	*	1.7	1.9	1.7
10.	*	1.7	1.9	1.7
20.	*	1.7	1.8	1.7
30.	*	1.8	1.7	1.7
40.	*	2.0	1.7	1.8
50.	*	2.0	1.7	1.9
60.	*	1.9	1.7	1.7
70.	*	1.9	1.7	1.7
80.	*	1.8	1.7	1.7
90.	*	1.7	1.7	1.7
100.	*	1.7	1.7	1.7
110.	*	1.7	1.7	1.7
120.	*	1.7	1.7	1.7
130.	*	1.7	1.7	1.7
140.	*	1.7	1.7	1.7
150.	*	1.7	1.7	1.7
160.	*	1.9	1.7	1.7
170.	*	1.9	1.7	1.7
180.	*	2.0	1.7	1.7
190.	*	1.9	1.7	1.8
200.	*	1.8	1.7	1.7
210.	*	1.7	1.8	1.7
220.	*	1.7	1.9	1.7
230.	*	1.7	1.9	1.7
240.	*	1.7	1.9	1.7
250.	*	1.7	1.8	1.7
260.	*	1.7	1.8	1.7
270.	*	1.7	1.8	1.7
280.	*	1.7	1.8	1.7
290.	*	1.7	1.8	1.7
300.	*	1.7	1.8	1.7
310.	*	1.7	1.8	1.7
320.	*	1.7	1.8	1.7
330.	*	1.7	1.8	1.7
340.	*	1.7	1.8	1.7
350.	*	1.7	1.8	1.7
360.	*	1.7	1.9	1.7
MAX	*	2.0	1.9	1.9
DEGR.	*	40	0	50

THE HIGHEST CONCENTRATION OF 2.00 PPM OCCURRED AT RECEPTOR REC1 .

DATE : 11/17/19
TIME : 14:32:52

RECEPTOR - LINK MATRIX FOR THE ANGLE PRODUCING
THE MAXIMUM CONCENTRATION FOR EACH RECEPTOR

LINK #	* CO/LINK (PPM) ANGLE (DEGREES) REC1 40	REC2 0	REC3 50
1	0.0	0.0	0.0
2	0.0	0.0	0.0
3	0.0	0.0	0.0
4	0.0	0.0	0.0
5	0.1	0.1	0.1
6	0.0	0.0	0.0
7	0.0	0.1	0.1
8	0.1	0.0	0.0
9	0.0	0.0	0.0
10	0.0	0.0	0.0
11	0.0	0.0	0.0
12	0.1	0.0	0.0
13	0.0	0.0	0.0
14	0.0	0.0	0.0
15	0.0	0.0	0.0

```
'I-20 at Mansfield Hwy 2028' 60 108 0 0 4 0.3048 1 1
'R1' 1069 62021 5.9
'R2' 718 61558 5.9
'R3' 928 61007 5.9
'R4' 1666 61853 5.9
'2028' 82 36 1 'C'
1
'WBFRP1-WBFRP2' 'AG' 1469 62831 1407 62552 870 0.78 0 58
1
'WBFRP2-WBFRP3' 'AG' 1407 62552 1315 62329 870 0.78 0 58
1
'WBFR P3-WBFRP4' 'AG' 1315 62329 1285 62250 1450 0.78 0 70
2
'WBFRAPP4-WBFRAPP5' 'AG' 1285 62250 1220 62132 0 36 3
115 71.5 2.0 1230 3.01 5085 2 1
1
'WBFRAPP5-WBFRP6' 'AG' 1220 62132 1111 61955 970 0.78 0 56
1
'WBFRP6-WBFRP7' 'AG' 1111 61955 888 61633 980 0.78 0 56
1
'WBFRP7-WBFRP8' 'AG' 888 61633 842 61548 920 0.78 0 56
1
'WBFRP8-WBFRP9' 'FL' 842 61548 573 61246 920 0.78 16 46
1
'WBFRP9-WBFRP10' 'BR' 573 61246 275 61027 920 0.78 16 46
2
'WBFRRTP1-WBFRRTP2' 'AG' 1253 62254 1210 62185 0 12 1
115 71.5 2.0 220 3.01 1583 2 1
2
'WBFRRTP2-WBFRRTP3' 'AG' 1210    62185 1177 62165 0 12 1
115 71.5 2.0 220 3.01 1583 2 1
1
'WBDCP1-WBDCP2' 'AG' 1554 62785 1440 62532 580 0.78 0 34
1
'WBDCP2-WBDCP3' 'AG' 1440 62532 1335 62316 580 0.78 0 34
1
'SBDCP1-SBDCP2' 'BR' 1617 62729 1440 62388 1890 0.78 16 44
1
'SBDCP2-SBDCP3' 'BR' 1440 62388 1197 61948 1890 0.78 16 44
1
'SBDCP3-SBDCP4' 'BR' 1197 61948 892 61538 1890 0.78 16 44
1
'SBDCP4-SBDCP5' 'FL' 892 61538 580 61200 1890 0.78 16 44
1
'SBDCP5-SBDCP6' 'BR' 580 61200 278 60977 1890 0.78 16 44
1
'WBMLP1-WBMLP2' 'FL' 1797 62542 1659 62398 4880 0.77 16 80
1
'WBMLP2-WBMLP3' 'FL' 1659 62398 1407 62076 4880 0.77 16 80
1
```

'WBMLP3-WBMLP4' 'BR' 1407 62076 1266 61896 4880 0.77 16 80
1
'WBMLP4-WBMLP5' 'FL' 1266 61896 938 61486 4880 0.77 16 80
1
'WBMLP5-WBMLP6' 'FL' 938 61486 587 61132 4880 0.77 16 80
1
'WBMLP6-WBMLP7' 'BR' 587 61132 288 60918 4880 0.77 16 80
1
'WBFRP7-WBRRUTRP1' 'AG' 888 61633 803 61574 60 0.78 0 46
1
'WBRRUTRP1-WBRRUTRP2' 'AG' 803 61574 491 61253 60 0.78 0 46
1
'WBRRUTRP2-WBRRUTRP3' 'AG' 491 61253 557 60820 60 0.78 0 46
1
'WBRRUTRP3-WBRRUTRP4' 'AG' 557 60820 639 60846 60 0.78 0 46
1
'WBRRUTRP4-WBRRUTRP5' 'AG' 639 60846 849 61017 60 0.78 0 46
1
'WBRRUTRP5-WBRRUTRP6' 'AG' 849 61017 1102 61158 60 0.78 0 46
1
'WBRRUTRP6-WBRRUTRP7' 'AG' 1102 61158 1187 61240 60 0.78 0 46
1
'WBRRUTRP7-WBRRUTRP8' 'AG' 1187 61240 1390 61545 60 0.78 0 46
1
'WBEBUTRP1-WBEBUTRP2' 'AG' 1298 62240 1272 62158 10 1.34 0 38
1
'WBEBUTRP2-WBEBUTRP3' 'AG' 1272 62158 1305 62103 10 1.34 0 38
1
'WBEBUTRP3-WBEBUTRP4' 'AG' 1305 62103 1587 61925 10 1.34 0 38
1
'EBMLP1-EBMLP2' 'BR' 298 60820 600 61030 7300 0.77 16 92
1
'EBMLP2-EBMLP3' 'FL' 600 61030 1003 61433 5310 0.77 16 68
1
'EBMLP3-EBMLP4' 'FL' 1003 61433 1331 61847 5310 0.77 16 80
1
'EBMLP4-EBMLP5' 'BR' 1331 61847 1472 62024 5310 0.77 16 80
1
'EBMLP5-EBMLP6' 'FL' 1472 62024 1735 62349 5310 0.77 16 80
1
'EBMLP6-EBMLP7' 'FL' 1735 62349 1866 62477 5310 0.77 16 80
1
'NBDCP1-NBDCP2' 'FL' 603 61000 1003 61322 2000 0.78 16 44
1
'NBDCP2-NBDCP3' 'FL' 1003 61322 1417 61771 2000 0.78 16 44
1
'NBDCP3-NBDCP4' 'BR' 1417 61771 1613 61991 2000 0.78 16 44
1
'NBDCP4-NBDCP5' 'BR' 1613 61991 1810 62290 1850 0.78 24 44
1

'NBDCP5-NBDCP6' 'BR' 1810 62290 1892 62454 1850 0.78 32 44
1
'NBDCP4-NBDC2P1' 'BR' 1613 61991 1709 62093 150 0.78 21 34
1
'NBDC2P1-NBDC2P2' 'BR' 1709 62093 1836 62267 150 0.78 24 34
1
'NBDC2P2-NBDC2P3' 'BR' 1836 62267 1925 62424 150 0.78 32 34
1
'EBEXRP1-EBEXRP2' 'BR' 304 60738 606 60948 390 0.78 16 34
1
'EBEXRP2-EBEXRP3' 'FL' 606 60948 957 61207 390 0.78 12 34
1
'EBEXRP3-EBEXRP4' 'FL' 957 61207 1197 61394 390 0.78 6 34
1
'EBEXRP4-EBFRAPP4' 'AG' 1197 61394 1371 61558 390 0.78 0 34
1
'EBFRP1-EBFRP2' 'BR' 311 60708 616 60895 380 0.78 16 48
1
'EBFRP2-EBFRP3' 'FL' 616 60895 1207 61378 390 0.78 12 48
1
'EBFRP3-EBFRAPP4' 'AG' 1207 61378 1371 61558 390 0.78 0 48
2
'EBFRAPP4-EBFRAPP5' 'AG' 1371 61558 1508 61788 0 36 3
115 82.5 2.0 450 3.01 5085 2 1
1
'EBFRAPP5-EBFRP6' 'AG' 1508 61788 1669 61971 1510 0.78 0 58
1
'EBFRP6-EBFRP7' 'AG' 1669 61971 2017 62329 1510 0.78 0 58
1
'EBWBUTRP1-EBWBUTRP2' 'AG' 1341 61578 1446 61748 10 1.34 0 38
1
'EBWBUTRP2-EBWBUTRP3' 'AG' 1446 61748 1423 61807 10 1.34 0 38
1
'EBWBUTRP3-EBWBUTRP4' 'AG' 1423 61807 1180 61965 10 1.34 0 38
1
'EBWBUTRP4-WBFRP6' 'AG' 1180 61965 1111 61955 10 1.34 0 38
2
'EBFRMHRP1-EBFRMHRP2' 'AG' 1423 61591 1505 61712 0 12 1
115 82.5 2.0 260 3.01 1583 2 1
2
'EBFRMHRP2-EBFRMHRP3' 'AG' 1505 61712 1581 61725 0 12 1
115 82.5 2.0 260 3.01 1583 2 1
2
'EBFRMHLTP1-EBFRMHLTP2' 'AG' 1423 61683 1489 61794 0 12 1
115 82.5 2.0 110 3.01 1770 2 1
1
'NBDC3P1-NBDC3P2' 'AG' 1656 61988 1791 62155 560 0.78 0 34
1
'NBDC3P2-NBDC3P3' 'FL' 1791 62155 1987 62359 560 0.78 32 34
1

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'NBMHP1-NBMHP2' 'AG' 1791 61640 1600 61820 940 0.78 0 58
1
'NBMHP2-NBMHAPP3' 'AG' 1600 61820 1489 61912 630 0.78 0 58
2
'NBMHAPP3-NBMHAPP4' 'AG' 1489 61912 1230 62096 0 26 2
115 56 2.0 290 3.01 3312 2 1
1
'NBMHAPP4-NBMHP5' 'AG' 1230 62096 1164 62135 290 0.78 0 46
1
'NBMHP5-NBMHP6' 'AG' 1164 62135 970 62240 500 0.78 0 46
2
'NBMHLTP1-NBMHLTP2' 'AG' 1354 61994 1226 62080 0 12 1
115 56 2.0 350 3.01 1610 2 1
2
'SBMHAPP1-SBMHAPP2' 'AG' 947 62198 1144 62080 0 38 3
115 93.5 2.0 500 3.01 5085 2 1
1
'SBMHAPP2-SBMHP3' 'AG' 1144 62080 1203 62037 1180 0.78 0 58
1
'SBMHP3-SBMHAPP4' 'AG' 1203 62037 1259 61994 1180 0.78 0 58
2
'SBMHAPP4-SBMHAPP5' 'AG' 1259 61994 1472 61837 0 26 2
115 45 2.0 550 3.01 3343 2 1
1
'SBMHAPP5-SBMHP6' 'AG' 1472 61837 1590 61742 550 0.78 0 46
1
'SBMHP6-SBMHP7' 'AG' 1590 61742 1751 61594 810 0.78 0 46
2
'SBMHRTP1-SBMHRTP2' 'AG' 1259 61994 1472 61837 0 12 1
115 93.5 2.0 100 3.01 1583 2 1
2
'SBMHLTP1-SBMHLTP2' 'AG' 1308 61981 1459 61866 0 12 1
115 45 2.0 640 3.01 1610 2 1
1 0 6 1000 1.7 'Y' 10 0 36
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JOB: I-20 at Mansfield Hwy 2028 RUN: 2028

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The MODE flag has been set to C for calculating CO averages.

SITE & METEOROLOGICAL VARIABLES

VS = 0.0 CM/S VD = 0.0 CM/S Z0 = 108. CM
U = 1.0 M/S CLAS = 6 (F) ATIM = 60. MINUTES MIXH = 1000. M AMB = 1.7 PPM

LINK VARIABLES

LINK DESCRIPTION	*	LINK COORDINATES (FT)				*	LENGTH	BRG	TYPE	VPH	EF	H	W	V/C	QUEUE
	*	X1	Y1	X2	Y2	*	(FT)	(DEG)			(G/MI)	(FT)	(FT)		(VEH)
1. WBFRP1-WBFRP2	*	1469.0	62831.0	1407.0	62552.0	*	286.	193.	AG	870.	0.8	0.0	58.0		
2. WBFRP2-WBFRP3	*	1407.0	62552.0	1315.0	62329.0	*	241.	202.	AG	870.	0.8	0.0	58.0		
3. WBFR P3-WBFRP4	*	1315.0	62329.0	1285.0	62250.0	*	85.	201.	AG	1450.	0.8	0.0	70.0		
4. WBFRAPP4-WBFRAPP5	*	1285.0	62250.0	1207.0	62108.4	*	162.	209.	AG	15.	100.0	0.0	36.0	0.23	8.2
5. WBFRAPP5-WBFRP6	*	1220.0	62132.0	1111.0	61955.0	*	208.	212.	AG	970.	0.8	0.0	56.0		
6. WBFRP6-WBFRP7	*	1111.0	61955.0	888.0	61633.0	*	392.	215.	AG	980.	0.8	0.0	56.0		
7. WBFRP7-WBFRP8	*	888.0	61633.0	842.0	61548.0	*	97.	208.	AG	920.	0.8	0.0	56.0		
8. WBFRP8-WBFRP9	*	842.0	61548.0	573.0	61246.0	*	404.	222.	FL	920.	0.8	16.0	46.0		
9. WBFRP9-WBFRP10	*	573.0	61246.0	275.0	61027.0	*	370.	234.	BR	920.	0.8	16.0	46.0		
10. WBFRRTP1-WBFRRTP2	*	1253.0	62254.0	1205.0	62177.0	*	91.	212.	AG	5.	100.0	0.0	12.0	0.40	4.6
11. WBFRRTP2-WBFRRTP3	*	1210.0	62185.0	1132.4	62138.0	*	91.	239.	AG	5.	100.0	0.0	12.0	0.40	4.6
12. WBDCP1-WBDCP2	*	1554.0	62785.0	1440.0	62532.0	*	278.	204.	AG	580.	0.8	0.0	34.0		

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     13. WBDCP2-WBDCP3       *   1440.0   62532.0    1335.0   62316.0 *     240.
206. AG    580.   0.8   0.0 34.0
     14. SBDCP1-SBDCP2       *   1617.0   62729.0    1440.0   62388.0 *     384.
207. BR   1890.   0.8  16.0 44.0
     15. SBDCP2-SBDCP3       *   1440.0   62388.0    1197.0   61948.0 *     503.
209. BR   1890.   0.8  16.0 44.0
     16. SBDCP3-SBDCP4       *   1197.0   61948.0     892.0   61538.0 *     511.
217. BR   1890.   0.8  16.0 44.0
     17. SBDCP4-SBDCP5       *    892.0   61538.0     580.0   61200.0 *     460.
223. FL   1890.   0.8  16.0 44.0
     18. SBDCP5-SBDCP6       *    580.0   61200.0     278.0   60977.0 *     375.
234. BR   1890.   0.8  16.0 44.0
     19. WBMLP1-WBMLP2       *   1797.0   62542.0    1659.0   62398.0 *     199.
224. FL   4880.   0.8  16.0 80.0
     20. WBMLP2-WBMLP3       *   1659.0   62398.0    1407.0   62076.0 *     409.
218. FL   4880.   0.8  16.0 80.0
     21. WBMLP3-WBMLP4       *   1407.0   62076.0    1266.0   61896.0 *     229.
218. BR   4880.   0.8  16.0 80.0
     22. WBMLP4-WBMLP5       *   1266.0   61896.0     938.0   61486.0 *     525.
219. FL   4880.   0.8  16.0 80.0
     23. WBMLP5-WBMLP6       *    938.0   61486.0     587.0   61132.0 *     499.
225. FL   4880.   0.8  16.0 80.0
     24. WBMLP6-WBMLP7       *    587.0   61132.0     288.0   60918.0 *     368.
234. BR   4880.   0.8  16.0 80.0
     25. WBFRP7-WBRRUTRP1    *    888.0   61633.0     803.0   61574.0 *     103.
235. AG     60.   0.8   0.0 46.0
     26. WBRRUTRP1-WBRRUTRP2 *    803.0   61574.0     491.0   61253.0 *     448.
224. AG     60.   0.8   0.0 46.0
     27. WBRRUTRP2-WBRRUTRP3 *    491.0   61253.0     557.0   60820.0 *     438.
171. AG     60.   0.8   0.0 46.0
     28. WBRRUTRP3-WBRRUTRP4 *    557.0   60820.0     639.0   60846.0 *      86.
 72. AG     60.   0.8   0.0 46.0
     29. WBRRUTRP4-WBRRUTRP5 *    639.0   60846.0     849.0   61017.0 *     271.
 51. AG     60.   0.8   0.0 46.0
     30. WBRRUTRP5-WBRRUTRP6 *    849.0   61017.0    1102.0   61158.0 *     290.
 61. AG     60.   0.8   0.0 46.0
     31. WBRRUTRP6-WBRRUTRP7 *   1102.0   61158.0    1187.0   61240.0 *     118.
 46. AG     60.   0.8   0.0 46.0
     32. WBRRUTRP7-WBRRUTRP8 *   1187.0   61240.0    1390.0   61545.0 *     366.
 34. AG     60.   0.8   0.0 46.0
     33. WBEBUTRP1-WBEBUTRP2 *   1298.0   62240.0    1272.0   62158.0 *      86.
198. AG     10.   1.3   0.0 38.0
     34. WBEBUTRP2-WBEBUTRP3 *   1272.0   62158.0    1305.0   62103.0 *      64.
149. AG     10.   1.3   0.0 38.0
     35. WBEBUTRP3-WBEBUTRP4 *   1305.0   62103.0    1587.0   61925.0 *     333.
122. AG     10.   1.3   0.0 38.0
     36. EBMLP1-EBMLP2       *    298.0   60820.0     600.0   61030.0 *     368.
 55. BR   7300.   0.8  16.0 92.0
     37. EBMLP2-EBMLP3       *    600.0   61030.0    1003.0   61433.0 *     570.
 45. FL   5310.   0.8  16.0 68.0
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     38. EBMLP3-EBMLP4       *   1003.0   61433.0    1331.0   61847.0 *     528.
 38. FL   5310.   0.8  16.0 80.0
     39. EBMLP4-EBMLP5       *   1331.0   61847.0    1472.0   62024.0 *     226.
 39. BR   5310.   0.8  16.0 80.0
     40. EBMLP5-EBMLP6       *   1472.0   62024.0    1735.0   62349.0 *     418.
 39. FL   5310.   0.8  16.0 80.0
     41. EBMLP6-EBMLP7       *   1735.0   62349.0    1866.0   62477.0 *     183.
 46. FL   5310.   0.8  16.0 80.0
     42. NBDCP1-NBDCP2       *    603.0   61000.0    1003.0   61322.0 *     513.
 51. FL   2000.   0.8  16.0 44.0
     43. NBDCP2-NBDCP3       *   1003.0   61322.0    1417.0   61771.0 *     611.
 43. FL   2000.   0.8  16.0 44.0
     44. NBDCP3-NBDCP4       *   1417.0   61771.0    1613.0   61991.0 *     295.
 42. BR   2000.   0.8  16.0 44.0
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LINK VARIABLES

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       LINK DESCRIPTION     *         LINK COORDINATES (FT)          *    LENGTH
BRG TYPE   VPH    EF      H   W    V/C QUEUE
                              *   X1        Y1        X2        Y2     *     (FT)
(DEG)           (G/MI)  (FT) (FT)       (VEH)

-----------------------*----------------------------------------*----------------
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     45. NBDCP4-NBDCP5       *   1613.0   61991.0    1810.0   62290.0 *     358.
 33. BR   1850.   0.8  24.0 44.0
     46. NBDCP5-NBDCP6       *   1810.0   62290.0    1892.0   62454.0 *     183.
 27. BR   1850.   0.8  32.0 44.0
     47. NBDCP4-NBDC2P1      *   1613.0   61991.0    1709.0   62093.0 *     140.
 43. BR    150.   0.8  21.0 34.0
     48. NBDC2P1-NBDC2P2     *   1709.0   62093.0    1836.0   62267.0 *     215.
 36. BR    150.   0.8  24.0 34.0
     49. NBDC2P2-NBDC2P3     *   1836.0   62267.0    1925.0   62424.0 *     180.
 30. BR    150.   0.8  32.0 34.0
     50. EBEXRP1-EBEXRP2     *    304.0   60738.0     606.0   60948.0 *     368.
 55. BR    390.   0.8  16.0 34.0
     51. EBEXRP2-EBEXRP3     *    606.0   60948.0     957.0   61207.0 *     436.
 54. FL    390.   0.8  12.0 34.0
     52. EBEXRP3-EBEXRP4     *    957.0   61207.0    1197.0   61394.0 *     304.
 52. FL    390.   0.8   6.0 34.0
     53. EBEXRP4-EBFRAPP4    *   1197.0   61394.0    1371.0   61558.0 *     239.
 47. AG    390.   0.8   0.0 34.0
     54. EBFRP1-EBFRP2       *    311.0   60708.0     616.0   60895.0 *     358.
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 58. BR    380.   0.8  16.0 48.0
      55. EBFRP2-EBFRP3       *    616.0   60895.0    1207.0   61378.0 *     763.
 51. FL    390.   0.8  12.0 48.0
      56. EBFRP3-EBFRAPP4     *   1207.0   61378.0    1371.0   61558.0 *     244.
 42. AG    390.   0.8   0.0 48.0
      57. EBFRAPP4-EBFRAPP5   *   1371.0   61558.0    1407.5   61619.3 *      71.
 31. AG     17. 100.0   0.0 36.0 0.12   3.6
      58. EBFRAPP5-EBFRP6     *   1508.0   61788.0    1669.0   61971.0 *     244.
 41. AG   1510.   0.8   0.0 58.0
      59. EBFRP6-EBFRP7       *   1669.0   61971.0    2017.0   62329.0 *     499.
 44. AG   1510.   0.8   0.0 58.0
      60. EBWBUTRP1-EBWBUTRP2 *   1341.0   61578.0    1446.0   61748.0 *     200.
 32. AG     10.   1.3   0.0 38.0
      61. EBWBUTRP2-EBWBUTRP3 *   1446.0   61748.0    1423.0   61807.0 *      63.
339. AG     10.   1.3   0.0 38.0
      62. EBWBUTRP3-EBWBUTRP4 *   1423.0   61807.0    1180.0   61965.0 *     290.
303. AG     10.   1.3   0.0 38.0
      63. EBWBUTRP4-WBFRP6    *   1180.0   61965.0    1111.0   61955.0 *      70.
262. AG     10.   1.3   0.0 38.0
      64. EBFRMHRP1-EBFRMHRP2 *   1423.0   61591.0    1494.5   61696.5 *     127.
 34. AG      6. 100.0   0.0 12.0 0.65   6.5
      65. EBFRMHRP2-EBFRMHRP3 *   1505.0   61712.0    1630.7   61733.5 *     127.
 80. AG      6. 100.0   0.0 12.0 0.65   6.5
      66. EBFRMHLTP1-EBFRMHLTP*   1423.0   61683.0    1450.4   61729.0 *      54.
 31. AG      6. 100.0   0.0 12.0 0.25   2.7
      67. NBDC3P1-NBDC3P2     *   1656.0   61988.0    1791.0   62155.0 *     215.
 39. AG    560.   0.8   0.0 34.0
      68. NBDC3P2-NBDC3P3     *   1791.0   62155.0    1987.0   62359.0 *     283.
 44. FL    560.   0.8  32.0 34.0
      69. NBMHP1-NBMHP2       *   1791.0   61640.0    1600.0   61820.0 *     262.
313. AG    940.   0.8   0.0 58.0
      70. NBMHP2-NBMHAPP3     *   1600.0   61820.0    1489.0   61912.0 *     144.
310. AG    630.   0.8   0.0 58.0
      71. NBMHAPP3-NBMHAPP4   *   1489.0   61912.0    1452.8   61937.7 *      44.
305. AG      8. 100.0   0.0 26.0 0.09   2.3
      72. NBMHAPP4-NBMHP5     *   1230.0   62096.0    1164.0   62135.0 *      77.
301. AG    290.   0.8   0.0 46.0
      73. NBMHP5-NBMHP6       *   1164.0   62135.0     970.0   62240.0 *     221.
298. AG    500.   0.8   0.0 46.0
      74. NBMHLTP1-NBMHLTP2   *   1354.0   61994.0    1265.0   62053.8 *     107.
304. AG      4. 100.0   0.0 12.0 0.45   5.4
      75. SBMHAPP1-SBMHAPP2   *    947.0   62198.0    1029.6   62148.5 *      96.
121. AG     20. 100.0   0.0 38.0 0.21   4.9
      76. SBMHAPP2-SBMHP3     *   1144.0   62080.0    1203.0   62037.0 *      73.
126. AG   1180.   0.8   0.0 58.0
      77. SBMHP3-SBMHAPP4     *   1203.0   62037.0    1259.0   61994.0 *      71.
128. AG   1180.   0.8   0.0 58.0
      78. SBMHAPP4-SBMHAPP5   *   1259.0   61994.0    1313.5   61953.8 *      68.
126. AG      6. 100.0   0.0 26.0 0.14   3.4
      79. SBMHAPP5-SBMHP6     *   1472.0   61837.0    1590.0   61742.0 *     151.
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129. AG    550.   0.8   0.0 46.0
      80. SBMHP6-SBMHP7       *   1590.0   61742.0    1751.0   61594.0 *     219.
133. AG    810.   0.8   0.0 46.0
      81. SBMHRTP1-SBMHRTP2   *   1259.0   61994.0    1307.3   61958.4 *      60.
126. AG      7. 100.0   0.0 12.0 0.40   3.0
      82. SBMHLTP1-SBMHLTP2   *   1308.0   61981.0    1433.3   61885.6 *     157.
127. AG      3. 100.0   0.0 12.0 0.69   8.0
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ADDITIONAL QUEUE LINK PARAMETERS

LINK DESCRIPTION	*	CYCLE LENGTH (SEC)	RED TIME (SEC)	CLEARANCE LOST TIME (SEC)	APPROACH VOL (VPH)	SATURATION FLOW RATE (VPH)	IDLE EM FAC (gm/hr)	SIGNAL TYPE	ARRIVAL RATE
4. WBFRAPP4-WBFRAPP5	*	115	71	2.0	1230	5085	3.01	2	1
10. WBFRRTP1-WBFRRTP2	*	115	71	2.0	220	1583	3.01	2	1
11. WBFRRTP2-WBFRRTP3	*	115	71	2.0	220	1583	3.01	2	1
57. EBFRAPP4-EBFRAPP5	*	115	82	2.0	450	5085	3.01	2	1
64. EBFRMHRP1-EBFRMHRP2	*	115	82	2.0	260	1583	3.01	2	1
65. EBFRMHRP2-EBFRMHRP3	*	115	82	2.0	260	1583	3.01	2	1
66. EBFRMHLTP1-EBFRMHLTP	*	115	82	2.0	110	1770	3.01	2	1
71. NBMHAPP3-NBMHAPP4	*	115	56	2.0	290	3312	3.01	2	1
74. NBMHLTP1-NBMHLTP2	*	115	56	2.0	350	1610	3.01	2	1
75. SBMHAPP1-SBMHAPP2	*	115	93	2.0	500	5085	3.01	2	1
78. SBMHAPP4-SBMHAPP5	*	115	45	2.0	550	3343	3.01	2	1
81. SBMHRTP1-SBMHRTP2	*	115	93	2.0	100	1583	3.01	2	1

82. SBMHLTP1-SBMHLTP2 * 115 45 2.0 640 1610
3.01 2 1

RECEPTOR LOCATIONS

RECEPTOR	COORDINATES (FT) X	Y	Z
1. R1	1069.0	62021.0	5.9
2. R2	718.0	61558.0	5.9
3. R3	928.0	61007.0	5.9
4. R4	1666.0	61853.0	5.9

MODEL RESULTS

REMARKS : In search of the angle corresponding to the maximum concentration, only the first angle, of the angles with same maximum concentrations, is indicated as maximum.

WIND ANGLE RANGE: 0.-360.

WIND ANGLE (DEGR)	CONCENTRATION (PPM) REC1	REC2	REC3	REC4
0.	1.7	1.7	1.8	1.8
10.	1.7	1.7	1.8	1.7
20.	1.7	1.7	1.8	1.7
30.	1.7	1.7	1.7	1.7
40.	1.7	1.7	1.7	1.7
50.	1.7	1.7	1.7	1.7
60.	1.8	1.8	1.7	1.7
70.	1.9	1.9	1.7	1.7
80.	1.8	1.9	1.7	1.7
90.	1.7	1.9	1.7	1.7
100.	1.7	1.8	1.7	1.7
110.	1.7	1.7	1.7	1.7
120.	1.7	1.8	1.7	1.7
130.	1.7	1.8	1.7	1.7
140.	1.8	1.8	1.7	1.7
150.	1.7	1.8	1.7	1.7
160.	1.9	1.8	1.7	1.7
170.	1.9	1.9	1.7	1.7
180.	1.9	1.9	1.7	1.7

190.	*	1.8	1.8	1.7	1.7
200.	*	1.9	1.8	1.7	1.7
210.	*	1.7	1.7	1.7	1.7
220.	*	1.7	1.7	1.7	1.7
230.	*	1.7	1.7	1.7	1.7
240.	*	1.7	1.7	1.7	1.8
250.	*	1.7	1.7	1.7	1.9
260.	*	1.7	1.7	1.8	1.8
270.	*	1.7	1.7	1.8	1.7
280.	*	1.7	1.7	1.7	1.7
290.	*	1.7	1.7	1.8	1.7
300.	*	1.7	1.7	1.8	1.7
310.	*	1.7	1.7	1.8	1.7
320.	*	1.7	1.7	1.8	1.7
330.	*	1.7	1.7	1.8	1.8
340.	*	1.7	1.7	1.8	1.8
350.	*	1.7	1.7	1.8	1.8
360.	*	1.7	1.7	1.8	1.8
MAX	*	1.9	1.9	1.8	1.9
DEGR.	*	70	70	0	250

THE HIGHEST CONCENTRATION OF 1.90 PPM OCCURRED AT RECEPTOR REC1 .

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RECEPTOR - LINK MATRIX FOR THE ANGLE PRODUCING
THE MAXIMUM CONCENTRATION FOR EACH RECEPTOR

	CO/LINK (PPM) ANGLE (DEGREES)			
LINK #	REC1 70	REC2 70	REC3 0	REC4 250
1	0.0	0.0	0.0	0.0
2	0.0	0.0	0.0	0.0
3	0.0	0.0	0.0	0.0
4	0.0	0.0	0.0	0.0
5	0.0	0.0	0.0	0.0
6	0.0	0.0	0.0	0.0
7	0.0	0.0	0.0	0.0
8	0.0	0.0	0.0	0.0
9	0.0	0.0	0.0	0.0
10	0.0	0.0	0.0	0.0

11	*	0.0	0.0	0.0	0.0
12	*	0.0	0.0	0.0	0.0
13	*	0.0	0.0	0.0	0.0
14	*	0.0	0.0	0.0	0.0
15	*	0.0	0.0	0.0	0.0
16	*	0.0	0.0	0.0	0.0
17	*	0.0	0.0	0.0	0.0
18	*	0.0	0.0	0.0	0.0
19	*	0.0	0.0	0.0	0.0
20	*	0.1	0.0	0.0	0.0
21	*	0.0	0.0	0.0	0.0
22	*	0.0	0.1	0.0	0.1
23	*	0.0	0.0	0.0	0.0
24	*	0.0	0.0	0.0	0.0
25	*	0.0	0.0	0.0	0.0
26	*	0.0	0.0	0.0	0.0
27	*	0.0	0.0	0.0	0.0
28	*	0.0	0.0	0.0	0.0
29	*	0.0	0.0	0.0	0.0
30	*	0.0	0.0	0.0	0.0
31	*	0.0	0.0	0.0	0.0
32	*	0.0	0.0	0.0	0.0
33	*	0.0	0.0	0.0	0.0
34	*	0.0	0.0	0.0	0.0
35	*	0.0	0.0	0.0	0.0
36	*	0.0	0.0	0.0	0.0
37	*	0.0	0.0	0.1	0.0
38	*	0.0	0.1	0.0	0.1
39	*	0.0	0.0	0.0	0.0
40	*	0.1	0.0	0.0	0.0
41	*	0.0	0.0	0.0	0.0
42	*	0.0	0.0	0.0	0.0
43	*	0.0	0.0	0.0	0.0
44	*	0.0	0.0	0.0	0.0
45	*	0.0	0.0	0.0	0.0

		CO/LINK (PPM) ANGLE (DEGREES)			
	*	REC1	REC2	REC3	REC4
LINK #	*	70	70	0	250
46	*	0.0	0.0	0.0	0.0
47	*	0.0	0.0	0.0	0.0
48	*	0.0	0.0	0.0	0.0
49	*	0.0	0.0	0.0	0.0
50	*	0.0	0.0	0.0	0.0

51	*	0.0	0.0	0.0	0.0
52	*	0.0	0.0	0.0	0.0
53	*	0.0	0.0	0.0	0.0
54	*	0.0	0.0	0.0	0.0
55	*	0.0	0.0	0.0	0.0
56	*	0.0	0.0	0.0	0.0
57	*	0.0	0.0	0.0	0.0
58	*	0.0	0.0	0.0	0.0
59	*	0.0	0.0	0.0	0.0
60	*	0.0	0.0	0.0	0.0
61	*	0.0	0.0	0.0	0.0
62	*	0.0	0.0	0.0	0.0
63	*	0.0	0.0	0.0	0.0
64	*	0.0	0.0	0.0	0.0
65	*	0.0	0.0	0.0	0.0
66	*	0.0	0.0	0.0	0.0
67	*	0.0	0.0	0.0	0.0
68	*	0.0	0.0	0.0	0.0
69	*	0.0	0.0	0.0	0.0
70	*	0.0	0.0	0.0	0.0
71	*	0.0	0.0	0.0	0.0
72	*	0.0	0.0	0.0	0.0
73	*	0.0	0.0	0.0	0.0
74	*	0.0	0.0	0.0	0.0
75	*	0.0	0.0	0.0	0.0
76	*	0.0	0.0	0.0	0.0
77	*	0.0	0.0	0.0	0.0
78	*	0.0	0.0	0.0	0.0
79	*	0.0	0.0	0.0	0.0
80	*	0.0	0.0	0.0	0.0
81	*	0.0	0.0	0.0	0.0
82	*	0.0	0.0	0.0	0.0

'I-20 at Mansfield Hwy 2045' 60 108 0 0 4 0.3048 1 1
'R1' 1069 62021 5.9
'R2' 718 61558 5.9
'R3' 928 61007 5.9
'R4' 1666 61853 5.9
'2045' 82 36 1 'C'
1
'WBFRP1-WBFRP2' 'AG' 1469 62831 1407 62552 1130 0.43 0 58
1
'WBFRP2-WBFRP3' 'AG' 1407 62552 1315 62329 1130 0.43 0 58
1
'WBFR P3-WBFRP4' 'AG' 1315 62329 1285 62250 1870 0.43 0 70
2
'WBFRAPP4-WBFRAPP5' 'AG' 1285 62250 1220 62132 0 36 3
115 71.5 2.0 1600 1.49 5085 2 1
1
'WBFRAPP5-WBFRP6' 'AG' 1220 62132 1111 61955 1250 0.43 0 56
1
'WBFRP6-WBFRP7' 'AG' 1111 61955 888 61633 1260 0.43 0 56
1
'WBFRP7-WBFRP8' 'AG' 888 61633 842 61548 1190 0.43 0 56
1
'WBFRP8-WBFRP9' 'FL' 842 61548 573 61246 1190 0.43 16 46
1
'WBFRP9-WBFRP10' 'BR' 573 61246 275 61027 1190 0.43 16 46
2
'WBFRRTP1-WBFRRTP2' 'AG' 1253 62254 1210 62185 0 12 1
115 71.5 2.0 280 1.49 1583 2 1
2
'WBFRRTP2-WBFRRTP3' 'AG' 1210   62185 1177 62165 0 12 1
115 71.5 2.0 280 1.49 1583 2 1
1
'WBDCP1-WBDCP2' 'AG' 1554 62785 1440 62532 750 0.43 0 34
1
'WBDCP2-WBDCP3' 'AG' 1440 62532 1335 62316 750 0.43 0 34
1
'SBDCP1-SBDCP2' 'BR' 1617 62729 1440 62388 2400 0.43 16 44
1
'SBDCP2-SBDCP3' 'BR' 1440 62388 1197 61948 2400 0.43 16 44
1
'SBDCP3-SBDCP4' 'BR' 1197 61948 892 61538 2400 0.43 16 44
1
'SBDCP4-SBDCP5' 'FL' 892 61538 580 61200 2400 0.43 16 44
1
'SBDCP5-SBDCP6' 'BR' 580 61200 278 60977 2400 0.43 16 44
1
'WBMLP1-WBMLP2' 'FL' 1797 62542 1659 62398 6260 0.45 16 80
1
'WBMLP2-WBMLP3' 'FL' 1659 62398 1407 62076 6260 0.45 16 80
1

'WBMLP3-WBMLP4' 'BR' 1407 62076 1266 61896 6260 0.45 16 80
1
'WBMLP4-WBMLP5' 'FL' 1266 61896 938 61486 6260 0.45 16 80
1
'WBMLP5-WBMLP6' 'FL' 938 61486 587 61132 6260 0.45 16 80
1
'WBMLP6-WBMLP7' 'BR' 587 61132 288 60918 6260 0.45 16 80
1
'WBFRP7-WBRRUTRP1' 'AG' 888 61633 803 61574 80 0.43 0 46
1
'WBRRUTRP1-WBRRUTRP2' 'AG' 803 61574 491 61253 80 0.43 0 46
1
'WBRRUTRP2-WBRRUTRP3' 'AG' 491 61253 557 60820 80 0.43 0 46
1
'WBRRUTRP3-WBRRUTRP4' 'AG' 557 60820 639 60846 80 0.43 0 46
1
'WBRRUTRP4-WBRRUTRP5' 'AG' 639 60846 849 61017 80 0.43 0 46
1
'WBRRUTRP5-WBRRUTRP6' 'AG' 849 61017 1102 61158 80 0.43 0 46
1
'WBRRUTRP6-WBRRUTRP7' 'AG' 1102 61158 1187 61240 80 0.43 0 46
1
'WBRRUTRP7-WBRRUTRP8' 'AG' 1187 61240 1390 61545 80 0.43 0 46
1
'WBEBUTRP1-WBEBUTRP2' 'AG' 1298 62240 1272 62158 20 0.72 0 38
1
'WBEBUTRP2-WBEBUTRP3' 'AG' 1272 62158 1305 62103 20 0.72 0 38
1
'WBEBUTRP3-WBEBUTRP4' 'AG' 1305 62103 1587 61925 20 0.72 0 38
1
'EBMLP1-EBMLP2' 'BR' 298 60820 600 61030 9380 0.45 16 92
1
'EBMLP2-EBMLP3' 'FL' 600 61030 1003 61433 6830 0.45 16 68
1
'EBMLP3-EBMLP4' 'FL' 1003 61433 1331 61847 6830 0.45 16 80
1
'EBMLP4-EBMLP5' 'BR' 1331 61847 1472 62024 6830 0.45 16 80
1
'EBMLP5-EBMLP6' 'FL' 1472 62024 1735 62349 6830 0.45 16 80
1
'EBMLP6-EBMLP7' 'FL' 1735 62349 1866 62477 6830 0.45 16 80
1
'NBDCP1-NBDCP2' 'FL' 603 61000 1003 61322 2550 0.43 16 44
1
'NBDCP2-NBDCP3' 'FL' 1003 61322 1417 61771 2550 0.43 16 44
1
'NBDCP3-NBDCP4' 'BR' 1417 61771 1613 61991 2550 0.43 16 44
1
'NBDCP4-NBDCP5' 'BR' 1613 61991 1810 62290 2370 0.43 24 44
1

'NBDCP5-NBDCP6' 'BR' 1810 62290 1892 62454 2370 0.43 32 44
1
'NBDCP4-NBDC2P1' 'BR' 1613 61991 1709 62093 190 0.43 21 34
1
'NBDC2P1-NBDC2P2' 'BR' 1709 62093 1836 62267 190 0.43 24 34
1
'NBDC2P2-NBDC2P3' 'BR' 1836 62267 1925 62424 190 0.43 32 34
1
'EBEXRP1-EBEXRP2' 'BR' 304 60738 606 60948 500 0.43 16 34
1
'EBEXRP2-EBEXRP3' 'FL' 606 60948 957 61207 500 0.43 12 34
1
'EBEXRP3-EBEXRP4' 'FL' 957 61207 1197 61394 500 0.43 6 34
1
'EBEXRP4-EBFRAPP4' 'AG' 1197 61394 1371 61558 500 0.43 0 34
1
'EBFRP1-EBFRP2' 'BR' 311 60708 616 60895 490 0.43 16 48
1
'EBFRP2-EBFRP3' 'FL' 616 60895 1207 61378 490 0.43 12 48
1
'EBFRP3-EBFRAPP4' 'AG' 1207 61378 1371 61558 490 0.43 0 48
2
'EBFRAPP4-EBFRAPP5' 'AG' 1371 61558 1508 61788 0 36 3
115 82.5 2.0 580 1.49 5085 2 1
1
'EBFRAPP5-EBFRP6' 'AG' 1508 61788 1669 61971 1960 0.43 0 58
1
'EBFRP6-EBFRP7' 'AG' 1669 61971 2017 62329 1950 0.43 0 58
1
'EBWBUTRP1-EBWBUTRP2' 'AG' 1341 61578 1446 61748 20 0.72 0 38
1
'EBWBUTRP2-EBWBUTRP3' 'AG' 1446 61748 1423 61807 20 0.72 0 38
1
'EBWBUTRP3-EBWBUTRP4' 'AG' 1423 61807 1180 61965 20 0.72 0 38
1
'EBWBUTRP4-WBFRP6' 'AG' 1180 61965 1111 61955 20 0.72 0 38
2
'EBFRMHRP1-EBFRMHRP2' 'AG' 1423 61591 1505 61712 0 12 1
115 82.5 2.0 340 1.49 1583 2 1
2
'EBFRMHRP2-EBFRMHRP3' 'AG' 1505 61712 1581 61725 0 12 1
115 82.5 2.0 340 1.49 1583 2 1
2
'EBFRMHLTP1-EBFRMHLTP2' 'AG' 1423 61683 1489 61794 0 12 1
115 82.5 2.0 130 1.49 1770 2 1
1
'NBDC3P1-NBDC3P2' 'AG' 1656 61988 1791 62155 720 0.43 0 34
1
'NBDC3P2-NBDC3P3' 'FL' 1791 62155 1987 62359 720 0.43 32 34
1

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'NBMHP1-NBMHP2' 'AG' 1791 61640 1600 61820 1240 0.43 0 58
1
'NBMHP2-NBMHAPP3' 'AG' 1600 61820 1489 61912 820 0.43 0 58
2
'NBMHAPP3-NBMHAPP4' 'AG' 1489 61912 1230 62096 0 26 2
115 56 2.0 390 1.49 3312 2 1
1
'NBMHAPP4-NBMHP5' 'AG' 1230 62096 1164 62135 390 0.43 0 46
1
'NBMHP5-NBMHP6' 'AG' 1164 62135 970 62240 660 0.43 0 46
2
'NBMHLTP1-NBMHLTP2' 'AG' 1354 61994 1226 62080 0 12 1
115 56 2.0 440 1.49 1610 2 1
2
'SBMHAPP1-SBMHAPP2' 'AG' 947 62198 1144 62080 0 38 3
115 93.5 2.0 670 1.49 5085 2 1
1
'SBMHAPP2-SBMHP3' 'AG' 1144 62080 1203 62037 1550 0.43 0 58
1
'SBMHP3-SBMHAPP4' 'AG' 1203 62037 1259 61994 1550 0.43 0 58
2
'SBMHAPP4-SBMHAPP5' 'AG' 1259 61994 1472 61837 0 26 2
115 45 2.0 730 1.49 3343 2 1
1
'SBMHAPP5-SBMHP6' 'AG' 1472 61837 1590 61742 730 0.43 0 46
1
'SBMHP6-SBMHP7' 'AG' 1590 61742 1751 61594 1060 0.43 0 46
2
'SBMHRTP1-SBMHRTP2' 'AG' 1259 61994 1472 61837 0 12 1
115 93.5 2.0 120 1.49 1583 2 1
2
'SBMHLTP1-SBMHLTP2' 'AG' 1308 61981 1459 61866 0 12 1
115 45 2.0 820 1.49 1610 2 1
1 0 6 1000 1.7 'Y' 10 0 36
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JOB: I-20 at Mansfield Hwy 2045 RUN: 2045

DATE : 11/18/19
TIME : 16: 4:57

The MODE flag has been set to C for calculating CO averages.

SITE & METEOROLOGICAL VARIABLES

VS = 0.0 CM/S VD = 0.0 CM/S Z0 = 108. CM
U = 1.0 M/S CLAS = 6 (F) ATIM = 60. MINUTES MIXH = 1000. M AMB = 1.7 PPM

LINK VARIABLES

LINK DESCRIPTION	*	LINK COORDINATES (FT)				*	LENGTH	BRG	TYPE	VPH	EF	H	W	V/C	QUEUE
	*	X1	Y1	X2	Y2	*	(FT)	(DEG)			(G/MI)	(FT)	(FT)		(VEH)
1. WBFRP1-WBFRP2	*	1469.0	62831.0	1407.0	62552.0	*	286.	193.	AG	1130.	0.4	0.0	58.0		
2. WBFRP2-WBFRP3	*	1407.0	62552.0	1315.0	62329.0	*	241.	202.	AG	1130.	0.4	0.0	58.0		
3. WBFR P3-WBFRP4	*	1315.0	62329.0	1285.0	62250.0	*	85.	201.	AG	1870.	0.4	0.0	70.0		
4. WBFRAPP4-WBFRAPP5	*	1285.0	62250.0	1182.0	62063.0	*	214.	209.	AG	7.	100.0	0.0	36.0	0.30	10.8
5. WBFRAPP5-WBFRP6	*	1220.0	62132.0	1111.0	61955.0	*	208.	212.	AG	1250.	0.4	0.0	56.0		
6. WBFRP6-WBFRP7	*	1111.0	61955.0	888.0	61633.0	*	392.	215.	AG	1260.	0.4	0.0	56.0		
7. WBFRP7-WBFRP8	*	888.0	61633.0	842.0	61548.0	*	97.	208.	AG	1190.	0.4	0.0	56.0		
8. WBFRP8-WBFRP9	*	842.0	61548.0	573.0	61246.0	*	404.	222.	FL	1190.	0.4	16.0	46.0		
9. WBFRP9-WBFRP10	*	573.0	61246.0	275.0	61027.0	*	370.	234.	BR	1190.	0.4	16.0	46.0		
10. WBFRRTP1-WBFRRTP2	*	1253.0	62254.0	1189.6	62152.3	*	120.	212.	AG	2.	100.0	0.0	12.0	0.51	6.1
11. WBFRRTP2-WBFRRTP3	*	1210.0	62185.0	1107.5	62122.9	*	120.	239.	AG	2.	100.0	0.0	12.0	0.51	6.1
12. WBDCP1-WBDCP2	*	1554.0	62785.0	1440.0	62532.0	*	278.	204.	AG	750.	0.4	0.0	34.0		

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     13. WBDCP2-WBDCP3       *   1440.0   62532.0    1335.0   62316.0 *     240.
206. AG    750.   0.4   0.0 34.0
     14. SBDCP1-SBDCP2       *   1617.0   62729.0    1440.0   62388.0 *     384.
207. BR   2400.   0.4  16.0 44.0
     15. SBDCP2-SBDCP3       *   1440.0   62388.0    1197.0   61948.0 *     503.
209. BR   2400.   0.4  16.0 44.0
     16. SBDCP3-SBDCP4       *   1197.0   61948.0     892.0   61538.0 *     511.
217. BR   2400.   0.4  16.0 44.0
     17. SBDCP4-SBDCP5       *    892.0   61538.0     580.0   61200.0 *     460.
223. FL   2400.   0.4  16.0 44.0
     18. SBDCP5-SBDCP6       *    580.0   61200.0     278.0   60977.0 *     375.
234. BR   2400.   0.4  16.0 44.0
     19. WBMLP1-WBMLP2       *   1797.0   62542.0    1659.0   62398.0 *     199.
224. FL   6260.   0.4  16.0 80.0
     20. WBMLP2-WBMLP3       *   1659.0   62398.0    1407.0   62076.0 *     409.
218. FL   6260.   0.4  16.0 80.0
     21. WBMLP3-WBMLP4       *   1407.0   62076.0    1266.0   61896.0 *     229.
218. BR   6260.   0.4  16.0 80.0
     22. WBMLP4-WBMLP5       *   1266.0   61896.0     938.0   61486.0 *     525.
219. FL   6260.   0.4  16.0 80.0
     23. WBMLP5-WBMLP6       *    938.0   61486.0     587.0   61132.0 *     499.
225. FL   6260.   0.4  16.0 80.0
     24. WBMLP6-WBMLP7       *    587.0   61132.0     288.0   60918.0 *     368.
234. BR   6260.   0.4  16.0 80.0
     25. WBFRP7-WBRRUTRP1    *    888.0   61633.0     803.0   61574.0 *     103.
235. AG     80.   0.4   0.0 46.0
     26. WBRRUTRP1-WBRRUTRP2 *    803.0   61574.0     491.0   61253.0 *     448.
224. AG     80.   0.4   0.0 46.0
     27. WBRRUTRP2-WBRRUTRP3 *    491.0   61253.0     557.0   60820.0 *     438.
171. AG     80.   0.4   0.0 46.0
     28. WBRRUTRP3-WBRRUTRP4 *    557.0   60820.0     639.0   60846.0 *      86.
 72. AG     80.   0.4   0.0 46.0
     29. WBRRUTRP4-WBRRUTRP5 *    639.0   60846.0     849.0   61017.0 *     271.
 51. AG     80.   0.4   0.0 46.0
     30. WBRRUTRP5-WBRRUTRP6 *    849.0   61017.0    1102.0   61158.0 *     290.
 61. AG     80.   0.4   0.0 46.0
     31. WBRRUTRP6-WBRRUTRP7 *   1102.0   61158.0    1187.0   61240.0 *     118.
 46. AG     80.   0.4   0.0 46.0
     32. WBRRUTRP7-WBRRUTRP8 *   1187.0   61240.0    1390.0   61545.0 *     366.
 34. AG     80.   0.4   0.0 46.0
     33. WBEBUTRP1-WBEBUTRP2 *   1298.0   62240.0    1272.0   62158.0 *      86.
198. AG     20.   0.7   0.0 38.0
     34. WBEBUTRP2-WBEBUTRP3 *   1272.0   62158.0    1305.0   62103.0 *      64.
149. AG     20.   0.7   0.0 38.0
     35. WBEBUTRP3-WBEBUTRP4 *   1305.0   62103.0    1587.0   61925.0 *     333.
122. AG     20.   0.7   0.0 38.0
     36. EBMLP1-EBMLP2       *    298.0   60820.0     600.0   61030.0 *     368.
 55. BR   9380.   0.4  16.0 92.0
     37. EBMLP2-EBMLP3       *    600.0   61030.0    1003.0   61433.0 *     570.
 45. FL   6830.   0.4  16.0 68.0
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     38. EBMLP3-EBMLP4       *   1003.0   61433.0    1331.0   61847.0 *     528.
 38. FL   6830.   0.4  16.0 80.0
     39. EBMLP4-EBMLP5       *   1331.0   61847.0    1472.0   62024.0 *     226.
 39. BR   6830.   0.4  16.0 80.0
     40. EBMLP5-EBMLP6       *   1472.0   62024.0    1735.0   62349.0 *     418.
 39. FL   6830.   0.4  16.0 80.0
     41. EBMLP6-EBMLP7       *   1735.0   62349.0    1866.0   62477.0 *     183.
 46. FL   6830.   0.4  16.0 80.0
     42. NBDCP1-NBDCP2       *    603.0   61000.0    1003.0   61322.0 *     513.
 51. FL   2550.   0.4  16.0 44.0
     43. NBDCP2-NBDCP3       *   1003.0   61322.0    1417.0   61771.0 *     611.
 43. FL   2550.   0.4  16.0 44.0
     44. NBDCP3-NBDCP4       *   1417.0   61771.0    1613.0   61991.0 *     295.
 42. BR   2550.   0.4  16.0 44.0
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DATE : 11/18/19
TIME : 16: 4:57

LINK VARIABLES

```
       LINK DESCRIPTION     *         LINK COORDINATES (FT)          *    LENGTH
BRG TYPE   VPH    EF      H   W    V/C QUEUE
                              *   X1        Y1        X2        Y2     *     (FT)
(DEG)           (G/MI)  (FT) (FT)       (VEH)

-----------------------*----------------------------------------*----------------
----------------------------------------
     45. NBDCP4-NBDCP5       *   1613.0   61991.0    1810.0   62290.0 *     358.
 33. BR   2370.   0.4  24.0 44.0
     46. NBDCP5-NBDCP6       *   1810.0   62290.0    1892.0   62454.0 *     183.
 27. BR   2370.   0.4  32.0 44.0
     47. NBDCP4-NBDC2P1      *   1613.0   61991.0    1709.0   62093.0 *     140.
 43. BR    190.   0.4  21.0 34.0
     48. NBDC2P1-NBDC2P2     *   1709.0   62093.0    1836.0   62267.0 *     215.
 36. BR    190.   0.4  24.0 34.0
     49. NBDC2P2-NBDC2P3     *   1836.0   62267.0    1925.0   62424.0 *     180.
 30. BR    190.   0.4  32.0 34.0
     50. EBEXRP1-EBEXRP2     *    304.0   60738.0     606.0   60948.0 *     368.
 55. BR    500.   0.4  16.0 34.0
     51. EBEXRP2-EBEXRP3     *    606.0   60948.0     957.0   61207.0 *     436.
 54. FL    500.   0.4  12.0 34.0
     52. EBEXRP3-EBEXRP4     *    957.0   61207.0    1197.0   61394.0 *     304.
 52. FL    500.   0.4   6.0 34.0
     53. EBEXRP4-EBFRAPP4    *   1197.0   61394.0    1371.0   61558.0 *     239.
 47. AG    500.   0.4   0.0 34.0
     54. EBFRP1-EBFRP2       *    311.0   60708.0     616.0   60895.0 *     358.
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 58. BR    490.   0.4  16.0 48.0
      55. EBFRP2-EBFRP3       *    616.0   60895.0    1207.0   61378.0 *     763.
 51. FL    490.   0.4  12.0 48.0
      56. EBFRP3-EBFRAPP4     *   1207.0   61378.0    1371.0   61558.0 *     244.
 42. AG    490.   0.4   0.0 48.0
      57. EBFRAPP4-EBFRAPP5   *   1371.0   61558.0    1418.3   61637.3 *      92.
 31. AG      9. 100.0   0.0 36.0 0.15   4.7
      58. EBFRAPP5-EBFRP6     *   1508.0   61788.0    1669.0   61971.0 *     244.
 41. AG   1960.   0.4   0.0 58.0
      59. EBFRP6-EBFRP7       *   1669.0   61971.0    2017.0   62329.0 *     499.
 44. AG   1950.   0.4   0.0 58.0
      60. EBWBUTRP1-EBWBUTRP2 *   1341.0   61578.0    1446.0   61748.0 *     200.
 32. AG     20.   0.7   0.0 38.0
      61. EBWBUTRP2-EBWBUTRP3 *   1446.0   61748.0    1423.0   61807.0 *      63.
339. AG     20.   0.7   0.0 38.0
      62. EBWBUTRP3-EBWBUTRP4 *   1423.0   61807.0    1180.0   61965.0 *     290.
303. AG     20.   0.7   0.0 38.0
      63. EBWBUTRP4-WBFRP6    *   1180.0   61965.0    1111.0   61955.0 *      70.
262. AG     20.   0.7   0.0 38.0
      64. EBFRMHRP1-EBFRMHRP2 *   1423.0   61591.0    1529.6   61748.3 *     190.
 34. AG      3. 100.0   0.0 12.0 0.85   9.7
      65. EBFRMHRP2-EBFRMHRP3 *   1505.0   61712.0    1692.3   61744.0 *     190.
 80. AG      3. 100.0   0.0 12.0 0.85   9.7
      66. EBFRMHLTP1-EBFRMHLTP*   1423.0   61683.0    1455.6   61737.8 *      64.
 31. AG      3. 100.0   0.0 12.0 0.29   3.2
      67. NBDC3P1-NBDC3P2     *   1656.0   61988.0    1791.0   62155.0 *     215.
 39. AG    720.   0.4   0.0 34.0
      68. NBDC3P2-NBDC3P3     *   1791.0   62155.0    1987.0   62359.0 *     283.
 44. FL    720.   0.4  32.0 34.0
      69. NBMHP1-NBMHP2       *   1791.0   61640.0    1600.0   61820.0 *     262.
313. AG   1240.   0.4   0.0 58.0
      70. NBMHP2-NBMHAPP3     *   1600.0   61820.0    1489.0   61912.0 *     144.
310. AG    820.   0.4   0.0 58.0
      71. NBMHAPP3-NBMHAPP4   *   1489.0   61912.0    1440.3   61946.6 *      60.
305. AG      4. 100.0   0.0 26.0 0.12   3.0
      72. NBMHAPP4-NBMHP5     *   1230.0   62096.0    1164.0   62135.0 *      77.
301. AG    390.   0.4   0.0 46.0
      73. NBMHP5-NBMHP6       *   1164.0   62135.0     970.0   62240.0 *     221.
298. AG    660.   0.4   0.0 46.0
      74. NBMHLTP1-NBMHLTP2   *   1354.0   61994.0    1236.4   62073.0 *     142.
304. AG      2. 100.0   0.0 12.0 0.57   7.2
      75. SBMHAPP1-SBMHAPP2   *    947.0   62198.0    1059.0   62130.9 *     131.
121. AG     10. 100.0   0.0 38.0 0.28   6.6
      76. SBMHAPP2-SBMHP3     *   1144.0   62080.0    1203.0   62037.0 *      73.
126. AG   1550.   0.4   0.0 58.0
      77. SBMHP3-SBMHAPP4     *   1203.0   62037.0    1259.0   61994.0 *      71.
128. AG   1550.   0.4   0.0 58.0
      78. SBMHAPP4-SBMHAPP5   *   1259.0   61994.0    1331.3   61940.7 *      90.
126. AG      3. 100.0   0.0 26.0 0.19   4.6
      79. SBMHAPP5-SBMHP6     *   1472.0   61837.0    1590.0   61742.0 *     151.
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129. AG   730.   0.4   0.0 46.0
      80. SBMHP6-SBMHP7   *   1590.0   61742.0   1751.0   61594.0 *   219.
133. AG   1060.   0.4   0.0 46.0
      81. SBMHRTP1-SBMHRTP2   *   1259.0   61994.0   1318.2   61950.4 *   73.
126. AG   3. 100.0   0.0 12.0 0.49   3.7
      82. SBMHLTP1-SBMHLTP2   *   1308.0   61981.0   1506.8   61829.6 *   250.
127. AG   2. 100.0   0.0 12.0 0.89 12.7

DATE : 11/18/19
TIME : 16: 4:57

ADDITIONAL QUEUE LINK PARAMETERS

LINK DESCRIPTION	*	CYCLE LENGTH (SEC)	RED TIME (SEC)	CLEARANCE LOST TIME (SEC)	APPROACH VOL (VPH)	SATURATION FLOW RATE (VPH)	IDLE EM FAC (gm/hr)	SIGNAL TYPE	ARRIVAL RATE
4. WBFRAPP4-WBFRAPP5	*	115	71	2.0	1600	5085	1.49	2	1
10. WBFRRTP1-WBFRRTP2	*	115	71	2.0	280	1583	1.49	2	1
11. WBFRRTP2-WBFRRTP3	*	115	71	2.0	280	1583	1.49	2	1
57. EBFRAPP4-EBFRAPP5	*	115	82	2.0	580	5085	1.49	2	1
64. EBFRMHRP1-EBFRMHRP2	*	115	82	2.0	340	1583	1.49	2	1
65. EBFRMHRP2-EBFRMHRP3	*	115	82	2.0	340	1583	1.49	2	1
66. EBFRMHLTP1-EBFRMHLTP	*	115	82	2.0	130	1770	1.49	2	1
71. NBMHAPP3-NBMHAPP4	*	115	56	2.0	390	3312	1.49	2	1
74. NBMHLTP1-NBMHLTP2	*	115	56	2.0	440	1610	1.49	2	1
75. SBMHAPP1-SBMHAPP2	*	115	93	2.0	670	5085	1.49	2	1
78. SBMHAPP4-SBMHAPP5	*	115	45	2.0	730	3343	1.49	2	1
81. SBMHRTP1-SBMHRTP2	*	115	93	2.0	120	1583	1.49	2	1

82. SBMHLTP1-SBMHLTP2 * 115 45 2.0 820 1610
1.49 2 1

RECEPTOR LOCATIONS

RECEPTOR	COORDINATES (FT) X	Y	Z
1. R1	1069.0	62021.0	5.9
2. R2	718.0	61558.0	5.9
3. R3	928.0	61007.0	5.9
4. R4	1666.0	61853.0	5.9

MODEL RESULTS

REMARKS : In search of the angle corresponding to the maximum concentration, only the first angle, of the angles with same maximum concentrations, is indicated as maximum.

WIND ANGLE RANGE: 0.-360.

WIND ANGLE (DEGR)	CONCENTRATION (PPM) REC1	REC2	REC3	REC4
0.	1.7	1.7	1.7	1.7
10.	1.7	1.7	1.7	1.7
20.	1.7	1.7	1.8	1.7
30.	1.7	1.7	1.7	1.7
40.	1.7	1.7	1.7	1.7
50.	1.7	1.7	1.7	1.7
60.	1.7	1.7	1.7	1.7
70.	1.7	1.8	1.7	1.7
80.	1.7	1.7	1.7	1.7
90.	1.7	1.7	1.7	1.7
100.	1.7	1.7	1.7	1.7
110.	1.7	1.7	1.7	1.7
120.	1.7	1.7	1.7	1.7
130.	1.7	1.7	1.7	1.7
140.	1.7	1.7	1.7	1.7
150.	1.7	1.7	1.7	1.7
160.	1.7	1.7	1.7	1.7
170.	1.7	1.7	1.7	1.7
180.	1.7	1.7	1.7	1.7

190.	*	1.7	1.7	1.7	1.7
200.	*	1.7	1.7	1.7	1.7
210.	*	1.7	1.7	1.7	1.7
220.	*	1.7	1.7	1.7	1.7
230.	*	1.7	1.7	1.7	1.7
240.	*	1.7	1.7	1.7	1.7
250.	*	1.7	1.7	1.7	1.7
260.	*	1.7	1.7	1.8	1.7
270.	*	1.7	1.7	1.7	1.7
280.	*	1.7	1.7	1.7	1.7
290.	*	1.7	1.7	1.7	1.7
300.	*	1.7	1.7	1.7	1.7
310.	*	1.7	1.7	1.7	1.7
320.	*	1.7	1.7	1.7	1.7
330.	*	1.7	1.7	1.7	1.7
340.	*	1.7	1.7	1.7	1.7
350.	*	1.7	1.7	1.7	1.7
360.	*	1.7	1.7	1.7	1.7
MAX	*	1.7	1.8	1.8	1.7
DEGR.	*	0	70	20	0

THE HIGHEST CONCENTRATION OF 1.80 PPM OCCURRED AT RECEPTOR REC3 .

DATE : 11/18/19
TIME : 16: 4:57

RECEPTOR - LINK MATRIX FOR THE ANGLE PRODUCING
THE MAXIMUM CONCENTRATION FOR EACH RECEPTOR

		CO/LINK (PPM) ANGLE (DEGREES)			
		REC1	REC2	REC3	REC4
LINK #	*	0	70	20	0
1	*	0.0	0.0	0.0	0.0
2	*	0.0	0.0	0.0	0.0
3	*	0.0	0.0	0.0	0.0
4	*	0.0	0.0	0.0	0.0
5	*	0.0	0.0	0.0	0.0
6	*	0.0	0.0	0.0	0.0
7	*	0.0	0.0	0.0	0.0
8	*	0.0	0.0	0.0	0.0
9	*	0.0	0.0	0.0	0.0
10	*	0.0	0.0	0.0	0.0

11	*	0.0	0.0	0.0	0.0
12	*	0.0	0.0	0.0	0.0
13	*	0.0	0.0	0.0	0.0
14	*	0.0	0.0	0.0	0.0
15	*	0.0	0.0	0.0	0.0
16	*	0.0	0.0	0.0	0.0
17	*	0.0	0.0	0.0	0.0
18	*	0.0	0.0	0.0	0.0
19	*	0.0	0.0	0.0	0.0
20	*	0.0	0.0	0.0	0.0
21	*	0.0	0.0	0.0	0.0
22	*	0.0	0.1	0.0	0.0
23	*	0.0	0.0	0.0	0.0
24	*	0.0	0.0	0.0	0.0
25	*	0.0	0.0	0.0	0.0
26	*	0.0	0.0	0.0	0.0
27	*	0.0	0.0	0.0	0.0
28	*	0.0	0.0	0.0	0.0
29	*	0.0	0.0	0.0	0.0
30	*	0.0	0.0	0.0	0.0
31	*	0.0	0.0	0.0	0.0
32	*	0.0	0.0	0.0	0.0
33	*	0.0	0.0	0.0	0.0
34	*	0.0	0.0	0.0	0.0
35	*	0.0	0.0	0.0	0.0
36	*	0.0	0.0	0.0	0.0
37	*	0.0	0.0	0.0	0.0
38	*	0.0	0.0	0.1	0.0
39	*	0.0	0.0	0.0	0.0
40	*	0.0	0.0	0.0	0.0
41	*	0.0	0.0	0.0	0.0
42	*	0.0	0.0	0.0	0.0
43	*	0.0	0.0	0.0	0.0
44	*	0.0	0.0	0.0	0.0
45	*	0.0	0.0	0.0	0.0

		CO/LINK (PPM) ANGLE (DEGREES)			
	*	REC1	REC2	REC3	REC4
LINK #	*	0	70	20	0
46	*	0.0	0.0	0.0	0.0
47	*	0.0	0.0	0.0	0.0
48	*	0.0	0.0	0.0	0.0
49	*	0.0	0.0	0.0	0.0
50	*	0.0	0.0	0.0	0.0

51	*	0.0	0.0	0.0	0.0
52	*	0.0	0.0	0.0	0.0
53	*	0.0	0.0	0.0	0.0
54	*	0.0	0.0	0.0	0.0
55	*	0.0	0.0	0.0	0.0
56	*	0.0	0.0	0.0	0.0
57	*	0.0	0.0	0.0	0.0
58	*	0.0	0.0	0.0	0.0
59	*	0.0	0.0	0.0	0.0
60	*	0.0	0.0	0.0	0.0
61	*	0.0	0.0	0.0	0.0
62	*	0.0	0.0	0.0	0.0
63	*	0.0	0.0	0.0	0.0
64	*	0.0	0.0	0.0	0.0
65	*	0.0	0.0	0.0	0.0
66	*	0.0	0.0	0.0	0.0
67	*	0.0	0.0	0.0	0.0
68	*	0.0	0.0	0.0	0.0
69	*	0.0	0.0	0.0	0.0
70	*	0.0	0.0	0.0	0.0
71	*	0.0	0.0	0.0	0.0
72	*	0.0	0.0	0.0	0.0
73	*	0.0	0.0	0.0	0.0
74	*	0.0	0.0	0.0	0.0
75	*	0.0	0.0	0.0	0.0
76	*	0.0	0.0	0.0	0.0
77	*	0.0	0.0	0.0	0.0
78	*	0.0	0.0	0.0	0.0
79	*	0.0	0.0	0.0	0.0
80	*	0.0	0.0	0.0	0.0
81	*	0.0	0.0	0.0	0.0
82	*	0.0	0.0	0.0	0.0

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'I-20 at Bowman Springs 2028' 60 108 0 0 6 0.3048 1 1
'R1' 8332 63467 5.9
'R2' 6886 63454 5.9
'R3' 6069 63274 5.9
'R4' 6079 62726 5.9
'R5' 7056 62546 5.9
'R6' 8690 62916 5.9
'2028' 74 36 1 'C'
1
'WBFRP1-P2' 'AG' 9061 63602 8667 63461 1070 0.78 0 58
1
'WBFRP2-P3' 'AG' 8667 63461 8349 63415 1070 0.78 0 58
1
'WBFRP3-WBFRP4' 'AG' 8349 63415 7424 63399 1070 0.78 0 58
1
'WBFRP4-WBFRAPP5' 'AG' 7424 63399 7325 63399 1070 0.78 0 58
2
'WBFRAPP5-WBFRAPP6' 'AG' 7325 63399 7010 63408 0 24 2
80 36.5 2.0 770 3.01 3539 2 1
1
'WBFRAPP6-WBFRP7' 'AG' 7325      63399 7010 63408 1010 0.78 0 44
1
'WBFRP7-WBFRP8' 'AG' 6886 63402 6745 63382 1020 0.78 0 46
1
'WBFRP8-WBFRP9' 'AG' 6745 63382 6416 63287 1020 0.78 0 46
1
'WBFRP9-WBFRP10' 'AG' 6416 63287 6059 63231 1020 0.78 0 46
1
'WBFRP10-WBFRP11' 'AG' 6059 63231 5262 63303 1020 0.78 0 46
1
'WBEBUTRP1-WBEBUTRP2' 'AG' 7420 63376 7082 63369 10 1.34 0 38
1
'WBEBUTRP2-WBEBUTRP3' 'BR' 7082 63369 7050 63320 10 1.34 20 38
1
'WBEBUTRP3-WBEBUTRP4' 'BR' 7050 63320 7046 62664 10 1.34 20 38
1
'WBEBUTRP4-EBFRP7' 'BR' 7046 62664 7086  62591 10 1.34 20 38
2
'WBFRRTP1-WBFRRTP2' 'AG' 7283 63428 7020 63428 0 12 1
80 36.5 2.0 100 3.01 1583 2 1
2
'WBFRLTP1-WBFRLTP2' 'AG' 7286 63389 7020 63389 0 12 1
80 36.5 2.0 100 3 1770 2 1
1
'WBCDP1-WBCDP2' 'FL' 9080 63520 8575 63359 3510 0.78 16 68
1
'WBCDP2-WBCDP3' 'DP' 8575 63359 7935 63241 3510 0.78 -10 68
1
'WBCDP3-WBCDP4' 'DP' 7935 63241 6859 63159 3510 0.78 -20 68
1
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'WBCDP4-WBCDP5' 'FL' 6859 63159 5262 63192 3510 0.78 20 68
1
'WBMLP1-WBMLP2' 'DP' 9103 63339 7949 63130 5460 0.77 -10 92
1
'WBMLP2-WBMLP3' 'DP' 7949 63130 6859 63044 5460 0.77 -20 92
1
'WBMLP3-WBMLP4' 'FL' 6859 63044 5262 63077 5460 0.77 20 92
1
'EBMLP1-EBMLP2' 'FL' 5262 62988 6873 62965 3720 0.77 20 68
1
'EBMLP2-EBMLP3' 'DP' 6873 62965 7972 63028 6200 0.77 -20 80
1
'EBMLP3-EBMLP4' 'DP' 7972 63028 9130 63235 6200 0.77 -10 80
1
'EBDCP1-EBDCP2' 'FL' 5262 62933 5757 62916 2490 0.78 20 44
1
'EBDCP2-EBDCP3' 'FL' 5757 62916 6472 62906 2490 0.78 10 44
1
'EBDCP3-EBDCP4' 'DP' 6472 62906 6876 62923 2490 0.78 -20 44
1
'EBCDP1-EBCDP2' 'FL' 5271 62854 5764 62847 2380 0.78 20 68
1
'EBCDP2-EBCDP3' 'FL' 5764 62847 6476 62838 2380 0.78 10 68
1
'EBCDP3-EBCDP4' 'DP' 6476 62838 6873 62838 2380 0.78 -20 68
1
'EBCDP4-EBCDP5' 'DP' 6873 62838 7981 62920 2380 0.78 -10 68
1
'EBCDP5-EBCDP6' 'DP' 7981 62920 9153 63130 2380 0.78 -10 68
1
'EBFRP1-EBFRP2' 'AG' 5271 62788 6161 62769 1220 0.78 0 58
1
'EBFRP2-EBFRP3' 'AG' 6161 62769 6439 62713 190 0.78 0 58
1
'EBFRP3-EBFRP4' 'AG' 6439 62713 6567 62664 190 0.78 0 58
1
'EBFRP4-EBFRAPP5' 'AG' 6567 62664 6656 62631 190 0.78 0 58
2
'EBFRAPP5-EBFRAPP6' 'AG' 6656 62631 6922 62578 0 24 2
80 36.5 2.0 10 3.01 3539 2 1
1
'EBFRAPP6-EBFRP7' 'AG' 6922 62578 7086 62591 160 0.78 0 44
1
'EBFRP7-EBFRP8' 'AG' 7086 62591 7338 62654 170 0.78 0 46
1
'EBFRP8-EBFRP9' 'AG' 7338 62654 7696 62792 170 0.78 0 46
1
'EBFRP9-EBFRP10' 'AG' 7696 62792 8306 62906 170 0.78 0 46
1
'EBFRP10-EBFRP11' 'AG' 8306 62906 9169 63048 1190 0.78 0 58

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2
'EBFRLTP1-EBFRLTP2' 'AG' 6672 62644 6827 62608 0 12 1
80 36.5 2.0 150 3.01 1770 2 1
2
'EBFRLTP2-EBFRLTP3' 'AG' 6827 62608 6915 62598 0 12 1
80 36.5 2.0 150 3.01 1770 2 1
2
'EBFRRTP1-EBFRRTP2' 'AG' 6663 62608 6774 62578 0 12 1
80 36.5 2.0 30 3.01 1583 2 1
2
'EBFRRTP2-EBFRRTP3' 'AG' 6774 62578 6915 62559 0 12 1
80 36.5 2.0 30 3.01 1583 2 1
1
'EBFRBPP1-EBFRBPP2' 'AG' 6157 62792 7073 62667 1030 0.78 0 32
1
'EBFRBPP2-EBFRBPP3' 'AG' 7073 62667 7758 62851 1030 0.78 0 32
1
'EBFRBPP3-EBFRP10' 'AG' 7758 62851 8306 62906 1030 0.78 0 32
1
'EBWBUTRP1-EBWBUTRP2' 'AG' 6446 62736 6827 62621 10 1.34 0 38
1
'EBWBUTRP2-EBWBUTRP3' 'BR' 6827 62621 6886 62664 10 1.34 20 38
1
'EBWBUTRP3-EBWBUTRP4' 'BR' 6886 62664 6886 63336 10 1.34 20 38
1
'EBWBUTRP4-EBWBUTRP5' 'BR' 6886 63336 6836 63376 10 1.34 20 38
1
'EBWBUTRP5-WBFRP8' 'AG' 6836 63376 6745 63382 10 1.34 0 38
1
'NBBSP1-NBBSAPP2' 'AG' 6991 62175 6994 62306 130 0.94 0 44
2
'NBBSAPP2-NBBSAPP3' 'AG' 6994 62306 6987 62546 0 24 2
80 48.5 2.0 50 3.01 3539 2 1
1
'NBBSAPP3-NBBSP4' 'BR' 6987 62546 6987 62733 190 0.94 20 44
1
'NBBSP4-NBBSAPP5' 'BR' 6987 62733 6991 63130 190 0.94 20 44
2
'NBBSAPP5-NBBSAPP6' 'BR' 6991 63130 6991 63369 20 12 1
80 57.5 2.0 100 3.01 1863 2 1
1
'NBBSAPP6-NBBSP7' 'AG' 6991 63369 6987 63474 190 0.94 0 44
1
'NBBSP7-NBBSP8' 'AG' 6987 63474 6984 63766 190 0.94 0 44
2
'NBBSLTP1-NBBSLTP2' 'BR' 6977 63189 6981 63362 20 12 1
80 53.0 2.0 100 3.01 1770 2 1
2
'NBBSRTP1-NBBSRTP2' 'AG' 7014 62349 7004 62539 0 12 1
80 48.5 2.0 80 3.01 1583 2 1
```

```
1
'SBBSP1-SBBSAPP2' 'AG' 6945 63766 6945 63661 250 0.94 0 44
2
'SBBSAPP2-SBBSAPP3' 'AG' 6945 63661 6951 63431 0 24 2
80 77.5 2.0 110 3.01 3539 2 1
1
'SBBSAPP3-SBBSP4' 'BR' 6951 63431 6948 63353 300 0.94 20 44
1
'SBBSP4-SBBSAPP5' 'BR' 6948 63353 6948 62801 300 0.94 20 44
2
'SBBSAPP5-SBBSAPP6' 'BR' 6948 62801 6945 62614 20 24 2
80 48.5 2.0 230 3.01 3518 2 1
1
'SBBSAPP6-SBBSP7' 'AG' 6945 62614 6945 62529 260 0.94 0 44
1
'SBBSP7-SBBSP8' 'AG' 6945 62529 6958 62303 260 0.94 0 44
1
'SBBSP8-SBBSP9' 'AG' 6958 62303 6964 62175 260 0.94 0 44
2
'SBBSRTP1-SBBSRTP2' 'AG' 6928 63648 6925 63438 0 12 1
80 57.5 2.0 150 3.01 1583 2 1
1 0 6 1000 1.7 'Y' 10 0 36
```

JOB: I-20 at Bowman Springs 2028 RUN: 2028

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The MODE flag has been set to C for calculating CO averages.

SITE & METEOROLOGICAL VARIABLES

VS = 0.0 CM/S VD = 0.0 CM/S Z0 = 108. CM
U = 1.0 M/S CLAS = 6 (F) ATIM = 60. MINUTES MIXH = 1000. M AMB = 1.7 PPM

LINK VARIABLES

LINK DESCRIPTION	*	LINK COORDINATES (FT)				*	LENGTH	BRG	TYPE	VPH	EF	H	W	V/C	QUEUE
	*	X1	Y1	X2	Y2	*	(FT)	(DEG)			(G/MI)	(FT)	(FT)		(VEH)
1. WBFRP1-P2	*	9061.0	63602.0	8667.0	63461.0	*	418.	250.	AG	1070.	0.8	0.0	58.0		
2. WBFRP2-P3	*	8667.0	63461.0	8349.0	63415.0	*	321.	262.	AG	1070.	0.8	0.0	58.0		
3. WBFRP3-WBFRP4	*	8349.0	63415.0	7424.0	63399.0	*	925.	269.	AG	1070.	0.8	0.0	58.0		
4. WBFRP4-WBFRAPP5	*	7424.0	63399.0	7325.0	63399.0	*	99.	270.	AG	1070.	0.8	0.0	58.0		
5. WBFRAPP5-WBFRAPP6	*	7325.0	63399.0	7249.2	63401.2	*	76.	272.	AG	7.	100.0	0.0	24.0	0.22	3.8
6. WBFRAPP6-WBFRP7	*	7325.0	63399.0	7010.0	63408.0	*	315.	272.	AG	1010.	0.8	0.0	44.0		
7. WBFRP7-WBFRP8	*	6886.0	63402.0	6745.0	63382.0	*	142.	262.	AG	1020.	0.8	0.0	46.0		
8. WBFRP8-WBFRP9	*	6745.0	63382.0	6416.0	63287.0	*	342.	254.	AG	1020.	0.8	0.0	46.0		
9. WBFRP9-WBFRP10	*	6416.0	63287.0	6059.0	63231.0	*	361.	261.	AG	1020.	0.8	0.0	46.0		
10. WBFRP10-WBFRP11	*	6059.0	63231.0	5262.0	63303.0	*	800.	275.	AG	1020.	0.8	0.0	46.0		
11. WBEBUTRP1-WBEBUTRP2	*	7420.0	63376.0	7082.0	63369.0	*	338.	269.	AG	10.	1.3	0.0	38.0		
12. WBEBUTRP2-WBEBUTRP3	*	7082.0	63369.0	7050.0	63320.0	*	59.	213.	BR	10.	1.3	20.0	38.0		

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     13. WBEBUTRP3-WBEBUTRP4 *   7050.0   63320.0    7046.0   62664.0 *     656.
180. BR     10.   1.3  20.0 38.0
     14. WBEBUTRP4-EBFRP7    *   7046.0   62664.0    7086.0   62591.0 *      83.
151. BR     10.   1.3  20.0 38.0
     15. WBFRRTP1-WBFRRTP2   *   7283.0   63428.0    7263.3   63428.0 *      20.
270. AG      4. 100.0   0.0 12.0 0.13   1.0
     16. WBFRLTP1-WBFRLTP2   *   7286.0   63389.0    7266.3   63389.0 *      20.
270. AG      4. 100.0   0.0 12.0 0.11   1.0
     17. WBCDP1-WBCDP2       *   9080.0   63520.0    8575.0   63359.0 *     530.
252. FL   3510.   0.8  16.0 68.0
     18. WBCDP2-WBCDP3       *   8575.0   63359.0    7935.0   63241.0 *     651.
260. DP   3510.   0.8 -10.0 68.0
     19. WBCDP3-WBCDP4       *   7935.0   63241.0    6859.0   63159.0 *    1079.
266. DP   3510.   0.8 -20.0 68.0
     20. WBCDP4-WBCDP5       *   6859.0   63159.0    5262.0   63192.0 *    1597.
271. FL   3510.   0.8  20.0 68.0
     21. WBMLP1-WBMLP2       *   9103.0   63339.0    7949.0   63130.0 *    1173.
260. DP   5460.   0.8 -10.0 92.0
     22. WBMLP2-WBMLP3       *   7949.0   63130.0    6859.0   63044.0 *    1093.
265. DP   5460.   0.8 -20.0 92.0
     23. WBMLP3-WBMLP4       *   6859.0   63044.0    5262.0   63077.0 *    1597.
271. FL   5460.   0.8  20.0 92.0
     24. EBMLP1-EBMLP2       *   5262.0   62988.0    6873.0   62965.0 *    1611.
 91. FL   3720.   0.8  20.0 68.0
     25. EBMLP2-EBMLP3       *   6873.0   62965.0    7972.0   63028.0 *    1101.
 87. DP   6200.   0.8 -20.0 80.0
     26. EBMLP3-EBMLP4       *   7972.0   63028.0    9130.0   63235.0 *    1176.
 80. DP   6200.   0.8 -10.0 80.0
     27. EBDCP1-EBDCP2       *   5262.0   62933.0    5757.0   62916.0 *     495.
 92. FL   2490.   0.8  20.0 44.0
     28. EBDCP2-EBDCP3       *   5757.0   62916.0    6472.0   62906.0 *     715.
 91. FL   2490.   0.8  10.0 44.0
     29. EBDCP3-EBDCP4       *   6472.0   62906.0    6876.0   62923.0 *     404.
 88. DP   2490.   0.8 -20.0 44.0
     30. EBCDP1-EBCDP2       *   5271.0   62854.0    5764.0   62847.0 *     493.
 91. FL   2380.   0.8  20.0 68.0
     31. EBCDP2-EBCDP3       *   5764.0   62847.0    6476.0   62838.0 *     712.
 91. FL   2380.   0.8  10.0 68.0
     32. EBCDP3-EBCDP4       *   6476.0   62838.0    6873.0   62838.0 *     397.
 90. DP   2380.   0.8 -20.0 68.0
     33. EBCDP4-EBCDP5       *   6873.0   62838.0    7981.0   62920.0 *    1111.
 86. DP   2380.   0.8 -10.0 68.0
     34. EBCDP5-EBCDP6       *   7981.0   62920.0    9153.0   63130.0 *    1191.
 80. DP   2380.   0.8 -10.0 68.0
     35. EBFRP1-EBFRP2       *   5271.0   62788.0    6161.0   62769.0 *     890.
 91. AG   1220.   0.8   0.0 58.0
     36. EBFRP2-EBFRP3       *   6161.0   62769.0    6439.0   62713.0 *     284.
101. AG    190.   0.8   0.0 58.0
     37. EBFRP3-EBFRP4       *   6439.0   62713.0    6567.0   62664.0 *     137.
111. AG    190.   0.8   0.0 58.0
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      38. EBFRP4-EBFRAPP5     *   6567.0   62664.0    6656.0   62631.0 *      95.
110. AG    190.   0.8   0.0 58.0
      39. EBFRAPP5-EBFRAPP6   *   6656.0   62631.0    6657.0   62630.8 *       1.
101. AG      7. 100.0   0.0 24.0 0.00   0.1
      40. EBFRAPP6-EBFRP7     *   6922.0   62578.0    7086.0   62591.0 *     165.
 85. AG    160.   0.8   0.0 44.0
      41. EBFRP7-EBFRP8       *   7086.0   62591.0    7338.0   62654.0 *     260.
 76. AG    170.   0.8   0.0 46.0
      42. EBFRP8-EBFRP9       *   7338.0   62654.0    7696.0   62792.0 *     384.
 69. AG    170.   0.8   0.0 46.0
      43. EBFRP9-EBFRP10      *   7696.0   62792.0    8306.0   62906.0 *     621.
 79. AG    170.   0.8   0.0 46.0
      44. EBFRP10-EBFRP11     *   8306.0   62906.0    9169.0   63048.0 *     875.
 81. AG   1190.   0.8   0.0 58.0
```



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      DATE : 11/16/19
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       LINK VARIABLES
       --------------
         LINK DESCRIPTION     *         LINK COORDINATES (FT)          *    LENGTH
BRG TYPE   VPH    EF      H   W    V/C QUEUE
                               *   X1        Y1        X2        Y2     *     (FT)
(DEG)           (G/MI)  (FT) (FT)       (VEH)

-----------------------*----------------------------------------*----------------
----------------------------------------
      45. EBFRLTP1-EBFRLTP2   *   6672.0   62644.0    6700.8   62637.3 *      30.
103. AG      4. 100.0   0.0 12.0 0.17   1.5
      46. EBFRLTP2-EBFRLTP3   *   6827.0   62608.0    6856.3   62604.7 *      30.
 96. AG      4. 100.0   0.0 12.0 0.17   1.5
      47. EBFRRTP1-EBFRRTP2   *   6663.0   62608.0    6668.7   62606.5 *       6.
105. AG      4. 100.0   0.0 12.0 0.04   0.3
      48. EBFRRTP2-EBFRRTP3   *   6774.0   62578.0    6779.9   62577.2 *       6.
 98. AG      4. 100.0   0.0 12.0 0.04   0.3
      49. EBFRBPP1-EBFRBPP2   *   6157.0   62792.0    7073.0   62667.0 *     924.
 98. AG   1030.   0.8   0.0 32.0
      50. EBFRBPP2-EBFRBPP3   *   7073.0   62667.0    7758.0   62851.0 *     709.
 75. AG   1030.   0.8   0.0 32.0
      51. EBFRBPP3-EBFRP10    *   7758.0   62851.0    8306.0   62906.0 *     551.
 84. AG   1030.   0.8   0.0 32.0
      52. EBWBUTRP1-EBWBUTRP2 *   6446.0   62736.0    6827.0   62621.0 *     398.
107. AG     10.   1.3   0.0 38.0
      53. EBWBUTRP2-EBWBUTRP3 *   6827.0   62621.0    6886.0   62664.0 *      73.
 54. BR     10.   1.3  20.0 38.0
      54. EBWBUTRP3-EBWBUTRP4 *   6886.0   62664.0    6886.0   63336.0 *     672.
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360. BR     10.   1.3  20.0 38.0
      55. EBWBUTRP4-EBWBUTRP5 *   6886.0   63336.0    6836.0   63376.0 *      64.
309. BR     10.   1.3  20.0 38.0
      56. EBWBUTRP5-WBFRP8    *   6836.0   63376.0    6745.0   63382.0 *      91.
274. AG     10.   1.3   0.0 38.0
      57. NBBSP1-NBBSAPP2     *   6991.0   62175.0    6994.0   62306.0 *     131.
  1. AG    130.   0.9   0.0 44.0
      58. NBBSAPP2-NBBSAPP3   *   6994.0   62306.0    6993.8   62312.6 *       7.
358. AG     10. 100.0   0.0 24.0 0.02   0.3
      59. NBBSAPP3-NBBSP4     *   6987.0   62546.0    6987.0   62733.0 *     187.
360. BR    190.   0.9  20.0 44.0
      60. NBBSP4-NBBSAPP5     *   6987.0   62733.0    6991.0   63130.0 *     397.
  1. BR    190.   0.9  20.0 44.0
      61. NBBSAPP5-NBBSAPP6   *   6991.0   63130.0    6991.0   63163.7 *      34.
360. BR      6. 100.0  20.0 12.0 0.23   1.7
      62. NBBSAPP6-NBBSP7     *   6991.0   63369.0    6987.0   63474.0 *     105.
358. AG    190.   0.9   0.0 44.0
      63. NBBSP7-NBBSP8       *   6987.0   63474.0    6984.0   63766.0 *     292.
359. AG    190.   0.9   0.0 44.0
      64. NBBSLTP1-NBBSLTP2   *   6977.0   63189.0    6977.7   63219.2 *      30.
  1. BR      5. 100.0  20.0 12.0 0.20   1.5
      65. NBBSRTP1-NBBSRTP2   *   7014.0   62349.0    7012.9   62370.0 *      21.
357. AG      5. 100.0   0.0 12.0 0.14   1.1
      66. SBBSP1-SBBSAPP2     *   6945.0   63766.0    6945.0   63661.0 *     105.
180. AG    250.   0.9   0.0 44.0
      67. SBBSAPP2-SBBSAPP3   *   6945.0   63661.0    6946.1   63617.2 *      44.
179. AG     16. 100.0   0.0 24.0 ****   2.2
      68. SBBSAPP3-SBBSP4     *   6951.0   63431.0    6948.0   63353.0 *      78.
182. BR    300.   0.9  20.0 44.0
      69. SBBSP4-SBBSAPP5     *   6948.0   63353.0    6948.0   62801.0 *     552.
180. BR    300.   0.9  20.0 44.0
      70. SBBSAPP5-SBBSAPP6   *   6948.0   62801.0    6947.5   62770.8 *      30.
181. BR     10. 100.0  20.0 24.0 0.09   1.5
      71. SBBSAPP6-SBBSP7     *   6945.0   62614.0    6945.0   62529.0 *      85.
180. AG    260.   0.9   0.0 44.0
      72. SBBSP7-SBBSP8       *   6945.0   62529.0    6958.0   62303.0 *     226.
177. AG    260.   0.9   0.0 44.0
      73. SBBSP8-SBBSP9       *   6958.0   62303.0    6964.0   62175.0 *     128.
177. AG    260.   0.9   0.0 44.0
      74. SBBSRTP1-SBBSRTP2   *   6928.0   63648.0    6927.2   63595.4 *      53.
181. AG      6. 100.0   0.0 12.0 0.40   2.7
```


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ADDITIONAL QUEUE LINK PARAMETERS

LINK DESCRIPTION	*	CYCLE LENGTH (SEC)	RED TIME (SEC)	CLEARANCE LOST TIME (SEC)	APPROACH VOL (VPH)	SATURATION FLOW RATE (VPH)	IDLE EM FAC (gm/hr)	SIGNAL TYPE	ARRIVAL RATE
5. WBFRAPP5-WBFRAPP6	*	80	36	2.0	770	3539	3.01	2	1
15. WBFRRTP1-WBFRRTP2	*	80	36	2.0	100	1583	3.01	2	1
16. WBFRLTP1-WBFRLTP2	*	80	36	2.0	100	1770	3.00	2	1
39. EBFRAPP5-EBFRAPP6	*	80	36	2.0	10	3539	3.01	2	1
45. EBFRLTP1-EBFRLTP2	*	80	36	2.0	150	1770	3.01	2	1
46. EBFRLTP2-EBFRLTP3	*	80	36	2.0	150	1770	3.01	2	1
47. EBFRRTP1-EBFRRTP2	*	80	36	2.0	30	1583	3.01	2	1
48. EBFRRTP2-EBFRRTP3	*	80	36	2.0	30	1583	3.01	2	1
58. NBBSAPP2-NBBSAPP3	*	80	48	2.0	50	3539	3.01	2	1
61. NBBSAPP5-NBBSAPP6	*	80	57	2.0	100	1863	3.01	2	1
64. NBBSLTP1-NBBSLTP2	*	80	53	2.0	100	1770	3.01	2	1
65. NBBSRTP1-NBBSRTP2	*	80	48	2.0	80	1583	3.01	2	1
67. SBBSAPP2-SBBSAPP3	*	80	77	2.0	110	3539	3.01	2	1
70. SBBSAPP5-SBBSAPP6	*	80	48	2.0	230	3518	3.01	2	1
74. SBBSRTP1-SBBSRTP2	*	80	57	2.0	150	1583	3.01	2	1

RECEPTOR LOCATIONS

RECEPTOR	*	COORDINATES (FT) X	Y	Z
1. R1	*	8332.0	63467.0	5.9
2. R2	*	6886.0	63454.0	5.9
3. R3	*	6069.0	63274.0	5.9
4. R4	*	6079.0	62726.0	5.9

5. R5	*	7056.0	62546.0	5.9	*
6. R6	*	8690.0	62916.0	5.9	*

MODEL RESULTS

REMARKS : In search of the angle corresponding to the maximum concentration, only the first angle, of the angles with same maximum concentrations, is indicated as maximum.

WIND ANGLE RANGE: 0.-360.

WIND ANGLE (DEGR)	* CONCENTRATION (PPM) REC1	REC2	REC3	REC4	REC5	REC6
0.	* 1.7	1.7	1.7	1.7	1.7	1.8
10.	* 1.7	1.7	1.7	1.7	1.7	1.8
20.	* 1.7	1.7	1.7	1.7	1.7	1.8
30.	* 1.7	1.7	1.7	1.7	1.7	1.8
40.	* 1.7	1.7	1.7	1.8	1.7	1.8
50.	* 1.7	1.7	1.7	1.8	1.7	1.8
60.	* 1.7	1.7	1.7	1.8	1.7	1.7
70.	* 1.7	1.7	1.7	1.7	1.8	1.7
80.	* 1.7	1.7	1.7	1.9	1.7	1.7
90.	* 1.8	1.7	1.7	1.7	1.7	1.7
100.	* 1.8	1.7	1.9	1.7	1.7	1.7
110.	* 1.8	1.7	1.9	1.7	1.7	1.7
120.	* 1.8	1.7	1.9	1.7	1.7	1.7
130.	* 1.8	1.7	1.9	1.7	1.7	1.7
140.	* 1.7	1.7	1.9	1.7	1.7	1.7
150.	* 1.7	1.7	1.9	1.7	1.7	1.7
160.	* 1.7	1.7	1.9	1.7	1.7	1.7
170.	* 1.7	1.7	1.9	1.7	1.7	1.7
180.	* 1.7	1.7	1.9	1.7	1.7	1.7
190.	* 1.7	1.7	1.9	1.7	1.7	1.7
200.	* 1.7	1.7	1.9	1.7	1.7	1.7
210.	* 1.7	1.7	1.9	1.7	1.7	1.7
220.	* 1.7	1.7	1.9	1.7	1.7	1.7
230.	* 1.7	1.7	1.9	1.7	1.7	1.7
240.	* 1.7	1.8	1.9	1.7	1.7	1.7
250.	* 1.7	1.9	1.9	1.7	1.7	1.7
260.	* 1.8	1.7	1.8	1.7	1.7	1.7
270.	* 1.7	1.7	1.7	1.7	1.7	1.8
280.	* 1.7	1.7	1.7	1.8	1.7	1.9

290.	*	1.7	1.7	1.7	1.8	1.7	1.8
300.	*	1.7	1.7	1.7	1.8	1.8	1.8
310.	*	1.7	1.7	1.7	1.8	1.7	1.8
320.	*	1.7	1.7	1.7	1.8	1.7	1.8
330.	*	1.7	1.7	1.7	1.8	1.7	1.7
340.	*	1.7	1.7	1.7	1.7	1.7	1.8
350.	*	1.7	1.7	1.7	1.7	1.7	1.7
360.	*	1.7	1.7	1.7	1.7	1.7	1.8
MAX	*	1.8	1.9	1.9	1.9	1.8	1.9
DEGR.	*	90	250	100	80	70	280

THE HIGHEST CONCENTRATION OF 1.90 PPM OCCURRED AT RECEPTOR REC4 .

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RECEPTOR - LINK MATRIX FOR THE ANGLE PRODUCING
THE MAXIMUM CONCENTRATION FOR EACH RECEPTOR

	CO/LINK (PPM) ANGLE (DEGREES)					
LINK #	REC1 90	REC2 250	REC3 100	REC4 80	REC5 70	REC6 280
1	0.0	0.0	0.0	0.0	0.0	0.0
2	0.0	0.0	0.0	0.0	0.0	0.0
3	0.0	0.0	0.0	0.0	0.0	0.0
4	0.0	0.0	0.0	0.0	0.0	0.0
5	0.0	0.0	0.0	0.0	0.0	0.0
6	0.0	0.0	0.0	0.0	0.0	0.0
7	0.0	0.0	0.0	0.0	0.0	0.0
8	0.0	0.0	0.0	0.0	0.0	0.0
9	0.0	0.0	0.0	0.0	0.0	0.0
10	0.0	0.0	0.0	0.0	0.0	0.0
11	0.0	0.0	0.0	0.0	0.0	0.0
12	0.0	0.0	0.0	0.0	0.0	0.0
13	0.0	0.0	0.0	0.0	0.0	0.0
14	0.0	0.0	0.0	0.0	0.0	0.0
15	0.0	0.0	0.0	0.0	0.0	0.0
16	0.0	0.0	0.0	0.0	0.0	0.0
17	0.1	0.0	0.0	0.0	0.0	0.0
18	0.0	0.0	0.0	0.0	0.0	0.0
19	0.0	0.0	0.0	0.0	0.0	0.0
20	0.0	0.1	0.1	0.0	0.0	0.0

21	*	0.0	0.0	0.0	0.0	0.0	0.0
22	*	0.0	0.0	0.1	0.0	0.0	0.1
23	*	0.0	0.1	0.0	0.0	0.0	0.0
24	*	0.0	0.0	0.0	0.0	0.0	0.0
25	*	0.0	0.0	0.0	0.1	0.0	0.0
26	*	0.0	0.0	0.0	0.1	0.1	0.1
27	*	0.0	0.0	0.0	0.0	0.0	0.0
28	*	0.0	0.0	0.0	0.0	0.0	0.0
29	*	0.0	0.0	0.0	0.0	0.0	0.0
30	*	0.0	0.0	0.0	0.0	0.0	0.0
31	*	0.0	0.0	0.0	0.0	0.0	0.0
32	*	0.0	0.0	0.0	0.0	0.0	0.0
33	*	0.0	0.0	0.0	0.0	0.0	0.0
34	*	0.0	0.0	0.0	0.0	0.0	0.0
35	*	0.0	0.0	0.0	0.0	0.0	0.0
36	*	0.0	0.0	0.0	0.0	0.0	0.0
37	*	0.0	0.0	0.0	0.0	0.0	0.0
38	*	0.0	0.0	0.0	0.0	0.0	0.0
39	*	0.0	0.0	0.0	0.0	0.0	0.0
40	*	0.0	0.0	0.0	0.0	0.0	0.0
41	*	0.0	0.0	0.0	0.0	0.0	0.0
42	*	0.0	0.0	0.0	0.0	0.0	0.0
43	*	0.0	0.0	0.0	0.0	0.0	0.0
44	*	0.0	0.0	0.0	0.0	0.0	0.0
45	*	0.0	0.0	0.0	0.0	0.0	0.0

		CO/LINK (PPM) ANGLE (DEGREES)					
	*	REC1	REC2	REC3	REC4	REC5	REC6
LINK #	*	90	250	100	80	70	280
46	*	0.0	0.0	0.0	0.0	0.0	0.0
47	*	0.0	0.0	0.0	0.0	0.0	0.0
48	*	0.0	0.0	0.0	0.0	0.0	0.0
49	*	0.0	0.0	0.0	0.0	0.0	0.0
50	*	0.0	0.0	0.0	0.0	0.0	0.0
51	*	0.0	0.0	0.0	0.0	0.0	0.0
52	*	0.0	0.0	0.0	0.0	0.0	0.0
53	*	0.0	0.0	0.0	0.0	0.0	0.0
54	*	0.0	0.0	0.0	0.0	0.0	0.0
55	*	0.0	0.0	0.0	0.0	0.0	0.0
56	*	0.0	0.0	0.0	0.0	0.0	0.0
57	*	0.0	0.0	0.0	0.0	0.0	0.0
58	*	0.0	0.0	0.0	0.0	0.0	0.0
59	*	0.0	0.0	0.0	0.0	0.0	0.0
60	*	0.0	0.0	0.0	0.0	0.0	0.0

61	*	0.0	0.0	0.0	0.0	0.0	0.0
62	*	0.0	0.0	0.0	0.0	0.0	0.0
63	*	0.0	0.0	0.0	0.0	0.0	0.0
64	*	0.0	0.0	0.0	0.0	0.0	0.0
65	*	0.0	0.0	0.0	0.0	0.0	0.0
66	*	0.0	0.0	0.0	0.0	0.0	0.0
67	*	0.0	0.0	0.0	0.0	0.0	0.0
68	*	0.0	0.0	0.0	0.0	0.0	0.0
69	*	0.0	0.0	0.0	0.0	0.0	0.0
70	*	0.0	0.0	0.0	0.0	0.0	0.0
71	*	0.0	0.0	0.0	0.0	0.0	0.0
72	*	0.0	0.0	0.0	0.0	0.0	0.0
73	*	0.0	0.0	0.0	0.0	0.0	0.0
74	*	0.0	0.0	0.0	0.0	0.0	0.0

```
'I-20 at Bowman Springs 2045' 60 108 0 0 6 0.3048 1 1
'R1' 8332 63467 5.9
'R2' 6886 63454 5.9
'R3' 6069 63274 5.9
'R4' 6079 62726 5.9
'R5' 7056 62546 5.9
'R6' 8690 62916 5.9
'2045' 74 36 1 'C'
1
'WBFRP1-P2' 'AG' 9061 63602 8667 63461 1340 0.43 0 58
1
'WBFRP2-P3' 'AG' 8667 63461 8349 63415 1340 0.43 0 58
1
'WBFRP3-WBFRP4' 'AG' 8349 63415 7424 63399 1340 0.43 0 58
1
'WBFRP4-WBFRAPP5' 'AG' 7424 63399 7325 63399 1340 0.43 0 58
2
'WBFRAPP5-WBFRAPP6' 'AG' 7325 63399 7010 63408 0 24 2
80 36.5 2.0 960 1.49 3539 2 1
1
'WBFRAPP6-WBFRP7' 'AG' 7325      63399 7010 63408 1260 0.43 0 44
1
'WBFRP7-WBFRP8' 'AG' 6886 63402 6745 63382 1260 0.43 0 46
1
'WBFRP8-WBFRP9' 'AG' 6745 63382 6416 63287 1260 0.43 0 46
1
'WBFRP9-WBFRP10' 'AG' 6416 63287 6059 63231 1260 0.43 0 46
1
'WBFRP10-WBFRP11' 'AG' 6059 63231 5262 63303 1260 0.43 0 46
1
'WBEBUTRP1-WBEBUTRP2' 'AG' 7420 63376 7082 63369 20 0.74 0 38
1
'WBEBUTRP2-WBEBUTRP3' 'BR' 7082 63369 7050 63320 20 0.74 20 38
1
'WBEBUTRP3-WBEBUTRP4' 'BR' 7050 63320 7046 62664 20 0.74 20 38
1
'WBEBUTRP4-EBFRP7' 'BR' 7046 62664 7086  62591 20 0.74 20 38
2
'WBFRRTP1-WBFRRTP2' 'AG' 7283 63428 7020 63428 0 12 1
80 36.5 2.0 130 1.49 1583 2 1
2
'WBFRLTP1-WBFRLTP2' 'AG' 7286 63389 7020 63389 0 12 1
80 36.5 2.0 200 1.49 1770 2 1
1
'WBCDP1-WBCDP2' 'FL' 9080 63520 8575 63359 4500 0.43 16 68
1
'WBCDP2-WBCDP3' 'DP' 8575 63359 7935 63241 4500 0.43 -10 68
1
'WBCDP3-WBCDP4' 'DP' 7935 63241 6859 63159 4500 0.43 -20 68
1
```

'WBCDP4-WBCDP5' 'FL' 6859 63159 5262 63192 4500 0.43 20 68
1
'WBMLP1-WBMLP2' 'DP' 9103 63339 7949 63130 7000 0.45 -10 92
1
'WBMLP2-WBMLP3' 'DP' 7949 63130 6859 63044 7000 0.45 -20 92
1
'WBMLP3-WBMLP4' 'FL' 6859 63044 5262 63077 7000 0.45 20 92
1
'EBMLP1-EBMLP2' 'FL' 5262 62988 6873 62965 4790 0.45 20 68
1
'EBMLP2-EBMLP3' 'DP' 6873 62965 7972 63028 7990 0.45 -20 80
1
'EBMLP3-EBMLP4' 'DP' 7972 63028 9130 63235 7990 0.45 -10 80
1
'EBDCP1-EBDCP2' 'FL' 5262 62933 5757 62916 3200 0.43 20 44
1
'EBDCP2-EBDCP3' 'FL' 5757 62916 6472 62906 3200 0.43 10 44
1
'EBDCP3-EBDCP4' 'DP' 6472 62906 6876 62923 3200 0.43 -20 44
1
'EBCDP1-EBCDP2' 'FL' 5271 62854 5764 62847 3040 0.43 20 68
1
'EBCDP2-EBCDP3' 'FL' 5764 62847 6476 62838 3040 0.43 10 68
1
'EBCDP3-EBCDP4' 'DP' 6476 62838 6873 62838 3040 0.43 -20 68
1
'EBCDP4-EBCDP5' 'DP' 6873 62838 7981 62920 3040 0.43 -10 68
1
'EBCDP5-EBCDP6' 'DP' 7981 62920 9153 63130 3040 0.43 -10 68
1
'EBFRP1-EBFRP2' 'AG' 5271 62788 6161 62769 1590 0.43 0 58
1
'EBFRP2-EBFRP3' 'AG' 6161 62769 6439 62713 250 0.43 0 58
1
'EBFRP3-EBFRP4' 'AG' 6439 62713 6567 62664 250 0.43 0 58
1
'EBFRP4-EBFRAPP5' 'AG' 6567 62664 6656 62631 250 0.43 0 58
2
'EBFRAPP5-EBFRAPP6' 'AG' 6656 62631 6922 62578 0 24 2
80 36.5 2.0 20 1.49 3539 2 1
1
'EBFRAPP6-EBFRP7' 'AG' 6922 62578 7086 62591 210 0.43 0 44
1
'EBFRP7-EBFRP8' 'AG' 7086 62591 7338 62654 220 0.43 0 46
1
'EBFRP8-EBFRP9' 'AG' 7338 62654 7696 62792 220 0.43 0 46
1
'EBFRP9-EBFRP10' 'AG' 7696 62792 8306 62906 220 0.43 0 46
1
'EBFRP10-EBFRP11' 'AG' 8306 62906 9169 63048 1560 0.43 0 58

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2
'EBFRLTP1-EBFRLTP2' 'AG' 6672 62644 6827 62608 0 12 1
80 36.5 2.0 180 1.49 1770 2 1
2
'EBFRLTP2-EBFRLTP3' 'AG' 6827 62608 6915 62598 0 12 1
80 36.5 2.0 180 1.49 1770 2 1
2
'EBFRRTP1-EBFRRTP2' 'AG' 6663 62608 6774 62578 0 12 1
80 36.5 2.0 40 1.49 1583 2 1
2
'EBFRRTP2-EBFRRTP3' 'AG' 6774 62578 6915 62559 0 12 1
80 36.5 2.0 40 1.49 1583 2 1
1
'EBFRBPP1-EBFRBPP2' 'AG' 6157 62792 7073 62667 1340 0.43 0 32
1
'EBFRBPP2-EBFRBPP3' 'AG' 7073 62667 7758 62851 1340 0.43 0 32
1
'EBFRBPP3-EBFRP10' 'AG' 7758 62851 8306 62906 1340 0.43 0 32
1
'EBWBUTRP1-EBWBUTRP2' 'AG' 6446 62736 6827 62621 20 0.72 0 38
1
'EBWBUTRP2-EBWBUTRP3' 'BR' 6827 62621 6886 62664 20 0.72 20 38
1
'EBWBUTRP3-EBWBUTRP4' 'BR' 6886 62664 6886 63336 20 0.72 20 38
1
'EBWBUTRP4-EBWBUTRP5' 'BR' 6886 63336 6836 63376 20 0.72 20 38
1
'EBWBUTRP5-WBFRP8' 'AG' 6836 63376 6745 63382 20 0.72 0 38
1
'NBBSP1-NBBSAPP2' 'AG' 6991 62175 6994 62306 160 0.51 0 44
2
'NBBSAPP2-NBBSAPP3' 'AG' 6994 62306 6987 62546 0 24 2
80 48.5 2.0 60 1.49 3539 2 1
1
'NBBSAPP3-NBBSP4' 'BR' 6987 62546 6987 62733 240 0.51 20 44
1
'NBBSP4-NBBSAPP5' 'BR' 6987 62733 6991 63130 240 0.51 20 44
2
'NBBSAPP5-NBBSAPP6' 'BR' 6991 63130 6991 63369 20 12 1
80 57.5 2.0 120 1.49 1863 2 1
1
'NBBSAPP6-NBBSP7' 'AG' 6991 63369 6987 63474 250 0.51 0 44
1
'NBBSP7-NBBSP8' 'AG' 6987 63474 6984 63766 250 0.51 0 44
2
'NBBSLTP1-NBBSLTP2' 'BR' 6977 63189 6981 63362 20 12 1
80 53.0 2.0 130 1.49 1770 2 1
2
'NBBSRTP1-NBBSRTP2' 'AG' 7014 62349 7004 62539 0 12 1
80 48.5 2.0 110 1.49 1583 2 1
```

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1
'SBBSP1-SBBSAPP2' 'AG' 6945 63766 6945 63661 330 0.51 0 44
2
'SBBSAPP2-SBBSAPP3' 'AG' 6945 63661 6951 63431 0 24 2
80 77.5 2.0 140 1.49 3539 2 1
1
'SBBSAPP3-SBBSP4' 'BR' 6951 63431 6948 63353 390 0.51 20 44
1
'SBBSP4-SBBSAPP5' 'BR' 6948 63353 6948 62801 390 0.51 20 44
2
'SBBSAPP5-SBBSAPP6' 'BR' 6948 62801 6945 62614 20 24 2
80 48.5 2.0 300 1.49 3518 2 1
1
'SBBSAPP6-SBBSP7' 'AG' 6945 62614 6945 62529 340 0.51 0 44
1
'SBBSP7-SBBSP8' 'AG' 6945 62529 6958 62303 340 0.51 0 44
1
'SBBSP8-SBBSP9' 'AG' 6958 62303 6964 62175 340 0.51 0 44
2
'SBBSRTP1-SBBSRTP2' 'AG' 6928 63648 6925 63438 0 12 1
80 57.5 2.0 190 1.49 1583 2 1
1 0 6 1000 1.7 'Y' 10 0 36
```

JOB: I-20 at Bowman Springs 2045 RUN: 2045

DATE : 11/16/19
TIME : 17:37: 2

The MODE flag has been set to C for calculating CO averages.

SITE & METEOROLOGICAL VARIABLES

VS = 0.0 CM/S VD = 0.0 CM/S Z0 = 108. CM
U = 1.0 M/S CLAS = 6 (F) ATIM = 60. MINUTES MIXH = 1000. M AMB = 1.7 PPM

LINK VARIABLES

	LINK DESCRIPTION	*	LINK COORDINATES (FT) X1	Y1	X2	Y2	*	LENGTH (FT)	BRG (DEG)	TYPE	VPH	EF (G/MI)	H (FT)	W (FT)	V/C	QUEUE (VEH)
1.	WBFRP1-P2	*	9061.0	63602.0	8667.0	63461.0	*	418.	250.	AG	1340.	0.4	0.0	58.0		
2.	WBFRP2-P3	*	8667.0	63461.0	8349.0	63415.0	*	321.	262.	AG	1340.	0.4	0.0	58.0		
3.	WBFRP3-WBFRP4	*	8349.0	63415.0	7424.0	63399.0	*	925.	269.	AG	1340.	0.4	0.0	58.0		
4.	WBFRP4-WBFRAPP5	*	7424.0	63399.0	7325.0	63399.0	*	99.	270.	AG	1340.	0.4	0.0	58.0		
5.	WBFRAPP5-WBFRAPP6	*	7325.0	63399.0	7230.5	63401.7	*	94.	272.	AG	4.	100.0	0.0	24.0	0.27	4.8
6.	WBFRAPP6-WBFRP7	*	7325.0	63399.0	7010.0	63408.0	*	315.	272.	AG	1260.	0.4	0.0	44.0		
7.	WBFRP7-WBFRP8	*	6886.0	63402.0	6745.0	63382.0	*	142.	262.	AG	1260.	0.4	0.0	46.0		
8.	WBFRP8-WBFRP9	*	6745.0	63382.0	6416.0	63287.0	*	342.	254.	AG	1260.	0.4	0.0	46.0		
9.	WBFRP9-WBFRP10	*	6416.0	63287.0	6059.0	63231.0	*	361.	261.	AG	1260.	0.4	0.0	46.0		
10.	WBFRP10-WBFRP11	*	6059.0	63231.0	5262.0	63303.0	*	800.	275.	AG	1260.	0.4	0.0	46.0		
11.	WBEBUTRP1-WBEBUTRP2	*	7420.0	63376.0	7082.0	63369.0	*	338.	269.	AG	20.	0.7	0.0	38.0		
12.	WBEBUTRP2-WBEBUTRP3	*	7082.0	63369.0	7050.0	63320.0	*	59.	213.	BR	20.	0.7	20.0	38.0		

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     13. WBEBUTRP3-WBEBUTRP4 *   7050.0   63320.0    7046.0   62664.0 *     656.
180. BR     20.   0.7  20.0 38.0
     14. WBEBUTRP4-EBFRP7    *   7046.0   62664.0    7086.0   62591.0 *      83.
151. BR     20.   0.7  20.0 38.0
     15. WBFRRTP1-WBFRRTP2   *   7283.0   63428.0    7257.4   63428.0 *      26.
270. AG      2. 100.0   0.0 12.0 0.16   1.3
     16. WBFRLTP1-WBFRLTP2   *   7286.0   63389.0    7246.6   63389.0 *      39.
270. AG      2. 100.0   0.0 12.0 0.23   2.0
     17. WBCDP1-WBCDP2       *   9080.0   63520.0    8575.0   63359.0 *     530.
252. FL   4500.   0.4  16.0 68.0
     18. WBCDP2-WBCDP3       *   8575.0   63359.0    7935.0   63241.0 *     651.
260. DP   4500.   0.4 -10.0 68.0
     19. WBCDP3-WBCDP4       *   7935.0   63241.0    6859.0   63159.0 *    1079.
266. DP   4500.   0.4 -20.0 68.0
     20. WBCDP4-WBCDP5       *   6859.0   63159.0    5262.0   63192.0 *    1597.
271. FL   4500.   0.4  20.0 68.0
     21. WBMLP1-WBMLP2       *   9103.0   63339.0    7949.0   63130.0 *    1173.
260. DP   7000.   0.4 -10.0 92.0
     22. WBMLP2-WBMLP3       *   7949.0   63130.0    6859.0   63044.0 *    1093.
265. DP   7000.   0.4 -20.0 92.0
     23. WBMLP3-WBMLP4       *   6859.0   63044.0    5262.0   63077.0 *    1597.
271. FL   7000.   0.4  20.0 92.0
     24. EBMLP1-EBMLP2       *   5262.0   62988.0    6873.0   62965.0 *    1611.
 91. FL   4790.   0.4  20.0 68.0
     25. EBMLP2-EBMLP3       *   6873.0   62965.0    7972.0   63028.0 *    1101.
 87. DP   7990.   0.4 -20.0 80.0
     26. EBMLP3-EBMLP4       *   7972.0   63028.0    9130.0   63235.0 *    1176.
 80. DP   7990.   0.4 -10.0 80.0
     27. EBDCP1-EBDCP2       *   5262.0   62933.0    5757.0   62916.0 *     495.
 92. FL   3200.   0.4  20.0 44.0
     28. EBDCP2-EBDCP3       *   5757.0   62916.0    6472.0   62906.0 *     715.
 91. FL   3200.   0.4  10.0 44.0
     29. EBDCP3-EBDCP4       *   6472.0   62906.0    6876.0   62923.0 *     404.
 88. DP   3200.   0.4 -20.0 44.0
     30. EBCDP1-EBCDP2       *   5271.0   62854.0    5764.0   62847.0 *     493.
 91. FL   3040.   0.4  20.0 68.0
     31. EBCDP2-EBCDP3       *   5764.0   62847.0    6476.0   62838.0 *     712.
 91. FL   3040.   0.4  10.0 68.0
     32. EBCDP3-EBCDP4       *   6476.0   62838.0    6873.0   62838.0 *     397.
 90. DP   3040.   0.4 -20.0 68.0
     33. EBCDP4-EBCDP5       *   6873.0   62838.0    7981.0   62920.0 *    1111.
 86. DP   3040.   0.4 -10.0 68.0
     34. EBCDP5-EBCDP6       *   7981.0   62920.0    9153.0   63130.0 *    1191.
 80. DP   3040.   0.4 -10.0 68.0
     35. EBFRP1-EBFRP2       *   5271.0   62788.0    6161.0   62769.0 *     890.
 91. AG   1590.   0.4   0.0 58.0
     36. EBFRP2-EBFRP3       *   6161.0   62769.0    6439.0   62713.0 *     284.
101. AG    250.   0.4   0.0 58.0
     37. EBFRP3-EBFRP4       *   6439.0   62713.0    6567.0   62664.0 *     137.
111. AG    250.   0.4   0.0 58.0
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      38. EBFRP4-EBFRAPP5     *   6567.0   62664.0    6656.0   62631.0 *      95.
110. AG    250.   0.4   0.0 58.0
      39. EBFRAPP5-EBFRAPP6   *   6656.0   62631.0    6657.9   62630.6 *       2.
101. AG      4. 100.0   0.0 24.0 0.01   0.1
      40. EBFRAPP6-EBFRP7     *   6922.0   62578.0    7086.0   62591.0 *     165.
 85. AG    210.   0.4   0.0 44.0
      41. EBFRP7-EBFRP8       *   7086.0   62591.0    7338.0   62654.0 *     260.
 76. AG    220.   0.4   0.0 46.0
      42. EBFRP8-EBFRP9       *   7338.0   62654.0    7696.0   62792.0 *     384.
 69. AG    220.   0.4   0.0 46.0
      43. EBFRP9-EBFRP10      *   7696.0   62792.0    8306.0   62906.0 *     621.
 79. AG    220.   0.4   0.0 46.0
      44. EBFRP10-EBFRP11     *   8306.0   62906.0    9169.0   63048.0 *     875.
 81. AG   1560.   0.4   0.0 58.0
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      DATE : 11/16/19
      TIME : 17:37: 2

       LINK VARIABLES
       --------------
         LINK DESCRIPTION     *         LINK COORDINATES (FT)          *    LENGTH
BRG TYPE   VPH    EF      H   W    V/C QUEUE
                               *   X1        Y1        X2        Y2     *     (FT)
(DEG)           (G/MI)  (FT) (FT)       (VEH)

-----------------------*----------------------------------------*----------------
----------------------------------------
      45. EBFRLTP1-EBFRLTP2   *   6672.0   62644.0    6706.5   62636.0 *      35.
103. AG      2. 100.0   0.0 12.0 0.20   1.8
      46. EBFRLTP2-EBFRLTP3   *   6827.0   62608.0    6862.2   62604.0 *      35.
 96. AG      2. 100.0   0.0 12.0 0.20   1.8
      47. EBFRRTP1-EBFRRTP2   *   6663.0   62608.0    6670.6   62605.9 *       8.
105. AG      2. 100.0   0.0 12.0 0.05   0.4
      48. EBFRRTP2-EBFRRTP3   *   6774.0   62578.0    6781.8   62577.0 *       8.
 98. AG      2. 100.0   0.0 12.0 0.05   0.4
      49. EBFRBPP1-EBFRBPP2   *   6157.0   62792.0    7073.0   62667.0 *     924.
 98. AG   1340.   0.4   0.0 32.0
      50. EBFRBPP2-EBFRBPP3   *   7073.0   62667.0    7758.0   62851.0 *     709.
 75. AG   1340.   0.4   0.0 32.0
      51. EBFRBPP3-EBFRP10    *   7758.0   62851.0    8306.0   62906.0 *     551.
 84. AG   1340.   0.4   0.0 32.0
      52. EBWBUTRP1-EBWBUTRP2 *   6446.0   62736.0    6827.0   62621.0 *     398.
107. AG     20.   0.7   0.0 38.0
      53. EBWBUTRP2-EBWBUTRP3 *   6827.0   62621.0    6886.0   62664.0 *      73.
 54. BR     20.   0.7  20.0 38.0
      54. EBWBUTRP3-EBWBUTRP4 *   6886.0   62664.0    6886.0   63336.0 *     672.
```

360. BR   20.   0.7 20.0 38.0
      55. EBWBUTRP4-EBWBUTRP5 *   6886.0   63336.0   6836.0   63376.0 *   64.
309. BR   20.   0.7 20.0 38.0
      56. EBWBUTRP5-WBFRP8   *   6836.0   63376.0   6745.0   63382.0 *   91.
274. AG   20.   0.7   0.0 38.0
      57. NBBSP1-NBBSAPP2   *   6991.0   62175.0   6994.0   62306.0 *   131.
  1. AG   160.   0.5   0.0 44.0
      58. NBBSAPP2-NBBSAPP3   *   6994.0   62306.0   6993.8   62313.9 *   8.
358. AG   5. 100.0   0.0 24.0 0.02   0.4
      59. NBBSAPP3-NBBSP4   *   6987.0   62546.0   6987.0   62733.0 *   187.
360. BR   240.   0.5 20.0 44.0
      60. NBBSP4-NBBSAPP5   *   6987.0   62733.0   6991.0   63130.0 *   397.
  1. BR   240.   0.5 20.0 44.0
      61. NBBSAPP5-NBBSAPP6   *   6991.0   63130.0   6991.0   63170.8 *   41.
360. BR   3. 100.0 20.0 12.0 0.27   2.1
      62. NBBSAPP6-NBBSP7   *   6991.0   63369.0   6987.0   63474.0 *   105.
358. AG   250.   0.5   0.0 44.0
      63. NBBSP7-NBBSP8   *   6987.0   63474.0   6984.0   63766.0 *   292.
359. AG   250.   0.5   0.0 44.0
      64. NBBSLTP1-NBBSLTP2   *   6977.0   63189.0   6977.9   63228.7 *   40.
  1. BR   3. 100.0 20.0 12.0 0.26   2.0
      65. NBBSRTP1-NBBSRTP2   *   7014.0   62349.0   7012.5   62377.8 *   29.
357. AG   2. 100.0   0.0 12.0 0.20   1.5
      66. SBBSP1-SBBSAPP2   *   6945.0   63766.0   6945.0   63661.0 *   105.
180. AG   330.   0.5   0.0 44.0
      67. SBBSAPP2-SBBSAPP3   *   6945.0   63661.0   6946.9   63589.2 *   72.
179. AG   8. 100.0   0.0 24.0 ****   3.6
      68. SBBSAPP3-SBBSP4   *   6951.0   63431.0   6948.0   63353.0 *   78.
182. BR   390.   0.5 20.0 44.0
      69. SBBSP4-SBBSAPP5   *   6948.0   63353.0   6948.0   62801.0 *   552.
180. BR   390.   0.5 20.0 44.0
      70. SBBSAPP5-SBBSAPP6   *   6948.0   62801.0   6947.4   62761.6 *   39.
181. BR   5. 100.0 20.0 24.0 0.12   2.0
      71. SBBSAPP6-SBBSP7   *   6945.0   62614.0   6945.0   62529.0 *   85.
180. AG   340.   0.5   0.0 44.0
      72. SBBSP7-SBBSP8   *   6945.0   62529.0   6958.0   62303.0 *   226.
177. AG   340.   0.5   0.0 44.0
      73. SBBSP8-SBBSP9   *   6958.0   62303.0   6964.0   62175.0 *   128.
177. AG   340.   0.5   0.0 44.0
      74. SBBSRTP1-SBBSRTP2   *   6928.0   63648.0   6927.0   63578.8 *   69.
181. AG   3. 100.0   0.0 12.0 0.51   3.5
♠

DATE : 11/16/19
TIME : 17:37: 2

ADDITIONAL QUEUE LINK PARAMETERS

LINK DESCRIPTION	*	CYCLE LENGTH (SEC)	RED TIME (SEC)	CLEARANCE LOST TIME (SEC)	APPROACH VOL (VPH)	SATURATION FLOW RATE (VPH)	IDLE EM FAC (gm/hr)	SIGNAL TYPE	ARRIVAL RATE
5. WBFRAPP5-WBFRAPP6	*	80	36	2.0	960	3539	1.49	2	1
15. WBFRRTP1-WBFRRTP2	*	80	36	2.0	130	1583	1.49	2	1
16. WBFRLTP1-WBFRLTP2	*	80	36	2.0	200	1770	1.49	2	1
39. EBFRAPP5-EBFRAPP6	*	80	36	2.0	20	3539	1.49	2	1
45. EBFRLTP1-EBFRLTP2	*	80	36	2.0	180	1770	1.49	2	1
46. EBFRLTP2-EBFRLTP3	*	80	36	2.0	180	1770	1.49	2	1
47. EBFRRTP1-EBFRRTP2	*	80	36	2.0	40	1583	1.49	2	1
48. EBFRRTP2-EBFRRTP3	*	80	36	2.0	40	1583	1.49	2	1
58. NBBSAPP2-NBBSAPP3	*	80	48	2.0	60	3539	1.49	2	1
61. NBBSAPP5-NBBSAPP6	*	80	57	2.0	120	1863	1.49	2	1
64. NBBSLTP1-NBBSLTP2	*	80	53	2.0	130	1770	1.49	2	1
65. NBBSRTP1-NBBSRTP2	*	80	48	2.0	110	1583	1.49	2	1
67. SBBSAPP2-SBBSAPP3	*	80	77	2.0	140	3539	1.49	2	1
70. SBBSAPP5-SBBSAPP6	*	80	48	2.0	300	3518	1.49	2	1
74. SBBSRTP1-SBBSRTP2	*	80	57	2.0	190	1583	1.49	2	1

RECEPTOR LOCATIONS

RECEPTOR	*	COORDINATES (FT) X	Y	Z
1. R1	*	8332.0	63467.0	5.9
2. R2	*	6886.0	63454.0	5.9
3. R3	*	6069.0	63274.0	5.9
4. R4	*	6079.0	62726.0	5.9

5. R5	*	7056.0	62546.0	5.9	*
6. R6	*	8690.0	62916.0	5.9	*

MODEL RESULTS

REMARKS : In search of the angle corresponding to the maximum concentration, only the first angle, of the angles with same maximum concentrations, is indicated as maximum.

WIND ANGLE RANGE: 0.-360.

WIND ANGLE (DEGR)	* CONCENTRATION (PPM) REC1	REC2	REC3	REC4	REC5	REC6
0.	* 1.7	1.7	1.7	1.7	1.7	1.7
10.	* 1.7	1.7	1.7	1.7	1.7	1.7
20.	* 1.7	1.7	1.7	1.7	1.7	1.7
30.	* 1.7	1.7	1.7	1.7	1.7	1.7
40.	* 1.7	1.7	1.7	1.7	1.7	1.7
50.	* 1.7	1.7	1.7	1.7	1.7	1.7
60.	* 1.7	1.7	1.7	1.7	1.7	1.7
70.	* 1.7	1.7	1.7	1.7	1.7	1.7
80.	* 1.7	1.7	1.7	1.8	1.7	1.7
90.	* 1.7	1.7	1.7	1.7	1.7	1.7
100.	* 1.7	1.7	1.8	1.7	1.7	1.7
110.	* 1.7	1.7	1.9	1.7	1.7	1.7
120.	* 1.7	1.7	1.9	1.7	1.7	1.7
130.	* 1.7	1.7	1.8	1.7	1.7	1.7
140.	* 1.7	1.7	1.8	1.7	1.7	1.7
150.	* 1.7	1.7	1.7	1.7	1.7	1.7
160.	* 1.7	1.7	1.7	1.7	1.7	1.7
170.	* 1.7	1.7	1.7	1.7	1.7	1.7
180.	* 1.7	1.7	1.7	1.7	1.7	1.7
190.	* 1.7	1.7	1.7	1.7	1.7	1.7
200.	* 1.7	1.7	1.7	1.7	1.7	1.7
210.	* 1.7	1.7	1.7	1.7	1.7	1.7
220.	* 1.7	1.7	1.7	1.7	1.7	1.7
230.	* 1.7	1.7	1.8	1.7	1.7	1.7
240.	* 1.7	1.7	1.9	1.7	1.7	1.7
250.	* 1.7	1.7	1.9	1.7	1.7	1.7
260.	* 1.7	1.7	1.8	1.7	1.7	1.7
270.	* 1.7	1.7	1.7	1.7	1.7	1.7
280.	* 1.7	1.7	1.7	1.7	1.7	1.7

290.	*	1.7	1.7	1.7	1.7	1.7	1.8
300.	*	1.7	1.7	1.7	1.7	1.7	1.7
310.	*	1.7	1.7	1.7	1.7	1.7	1.7
320.	*	1.7	1.7	1.7	1.7	1.7	1.7
330.	*	1.7	1.7	1.7	1.7	1.7	1.7
340.	*	1.7	1.7	1.7	1.7	1.7	1.7
350.	*	1.7	1.7	1.7	1.7	1.7	1.7
360.	*	1.7	1.7	1.7	1.7	1.7	1.7
MAX	*	1.7	1.7	1.9	1.8	1.7	1.8
DEGR.	*	0	0	110	80	0	290

THE HIGHEST CONCENTRATION OF 1.90 PPM OCCURRED AT RECEPTOR REC3 .

DATE : 11/16/19
TIME : 17:37: 2

RECEPTOR - LINK MATRIX FOR THE ANGLE PRODUCING
THE MAXIMUM CONCENTRATION FOR EACH RECEPTOR

	* CO/LINK (PPM) ANGLE (DEGREES)					
	* REC1	REC2	REC3	REC4	REC5	REC6
LINK #	* 0	0	110	80	0	290
1	* 0.0	0.0	0.0	0.0	0.0	0.0
2	* 0.0	0.0	0.0	0.0	0.0	0.0
3	* 0.0	0.0	0.0	0.0	0.0	0.0
4	* 0.0	0.0	0.0	0.0	0.0	0.0
5	* 0.0	0.0	0.0	0.0	0.0	0.0
6	* 0.0	0.0	0.0	0.0	0.0	0.0
7	* 0.0	0.0	0.0	0.0	0.0	0.0
8	* 0.0	0.0	0.0	0.0	0.0	0.0
9	* 0.0	0.0	0.0	0.0	0.0	0.0
10	* 0.0	0.0	0.0	0.0	0.0	0.0
11	* 0.0	0.0	0.0	0.0	0.0	0.0
12	* 0.0	0.0	0.0	0.0	0.0	0.0
13	* 0.0	0.0	0.0	0.0	0.0	0.0
14	* 0.0	0.0	0.0	0.0	0.0	0.0
15	* 0.0	0.0	0.0	0.0	0.0	0.0
16	* 0.0	0.0	0.0	0.0	0.0	0.0
17	* 0.0	0.0	0.0	0.0	0.0	0.0
18	* 0.0	0.0	0.0	0.0	0.0	0.0
19	* 0.0	0.0	0.0	0.0	0.0	0.0
20	* 0.0	0.0	0.1	0.0	0.0	0.0

21	*	0.0	0.0	0.0	0.0	0.0	0.0
22	*	0.0	0.0	0.0	0.0	0.0	0.0
23	*	0.0	0.0	0.1	0.0	0.0	0.0
24	*	0.0	0.0	0.0	0.0	0.0	0.0
25	*	0.0	0.0	0.0	0.0	0.0	0.0
26	*	0.0	0.0	0.0	0.1	0.0	0.1
27	*	0.0	0.0	0.0	0.0	0.0	0.0
28	*	0.0	0.0	0.0	0.0	0.0	0.0
29	*	0.0	0.0	0.0	0.0	0.0	0.0
30	*	0.0	0.0	0.0	0.0	0.0	0.0
31	*	0.0	0.0	0.0	0.0	0.0	0.0
32	*	0.0	0.0	0.0	0.0	0.0	0.0
33	*	0.0	0.0	0.0	0.0	0.0	0.0
34	*	0.0	0.0	0.0	0.0	0.0	0.0
35	*	0.0	0.0	0.0	0.0	0.0	0.0
36	*	0.0	0.0	0.0	0.0	0.0	0.0
37	*	0.0	0.0	0.0	0.0	0.0	0.0
38	*	0.0	0.0	0.0	0.0	0.0	0.0
39	*	0.0	0.0	0.0	0.0	0.0	0.0
40	*	0.0	0.0	0.0	0.0	0.0	0.0
41	*	0.0	0.0	0.0	0.0	0.0	0.0
42	*	0.0	0.0	0.0	0.0	0.0	0.0
43	*	0.0	0.0	0.0	0.0	0.0	0.0
44	*	0.0	0.0	0.0	0.0	0.0	0.0
45	*	0.0	0.0	0.0	0.0	0.0	0.0

		CO/LINK (PPM)					
		ANGLE (DEGREES)					
		REC1	REC2	REC3	REC4	REC5	REC6
LINK #	*	0	0	110	80	0	290
46	*	0.0	0.0	0.0	0.0	0.0	0.0
47	*	0.0	0.0	0.0	0.0	0.0	0.0
48	*	0.0	0.0	0.0	0.0	0.0	0.0
49	*	0.0	0.0	0.0	0.0	0.0	0.0
50	*	0.0	0.0	0.0	0.0	0.0	0.0
51	*	0.0	0.0	0.0	0.0	0.0	0.0
52	*	0.0	0.0	0.0	0.0	0.0	0.0
53	*	0.0	0.0	0.0	0.0	0.0	0.0
54	*	0.0	0.0	0.0	0.0	0.0	0.0
55	*	0.0	0.0	0.0	0.0	0.0	0.0
56	*	0.0	0.0	0.0	0.0	0.0	0.0
57	*	0.0	0.0	0.0	0.0	0.0	0.0
58	*	0.0	0.0	0.0	0.0	0.0	0.0
59	*	0.0	0.0	0.0	0.0	0.0	0.0
60	*	0.0	0.0	0.0	0.0	0.0	0.0

61	*	0.0	0.0	0.0	0.0	0.0	0.0
62	*	0.0	0.0	0.0	0.0	0.0	0.0
63	*	0.0	0.0	0.0	0.0	0.0	0.0
64	*	0.0	0.0	0.0	0.0	0.0	0.0
65	*	0.0	0.0	0.0	0.0	0.0	0.0
66	*	0.0	0.0	0.0	0.0	0.0	0.0
67	*	0.0	0.0	0.0	0.0	0.0	0.0
68	*	0.0	0.0	0.0	0.0	0.0	0.0
69	*	0.0	0.0	0.0	0.0	0.0	0.0
70	*	0.0	0.0	0.0	0.0	0.0	0.0
71	*	0.0	0.0	0.0	0.0	0.0	0.0
72	*	0.0	0.0	0.0	0.0	0.0	0.0
73	*	0.0	0.0	0.0	0.0	0.0	0.0
74	*	0.0	0.0	0.0	0.0	0.0	0.0

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'I-20 at Green Oaks 2028' 60 108 0 0 6 0.3048 1 1
'R1' 8470 66479 5.9
'R2' 6282 66099 5.9
'R3' 5321 65715 5.9
'R4' 5419 65200 5.9
'R5' 6065 65377 5.9
'R6' 8683 65918 5.9
'2028' 73 36 1 'C'
1
'WBFRP1-P2' 'BR' 9408 66473 8939 66466 1970 0.78 15 70
1
'WBFRP2-P3' 'BR' 8939 66466 8467 66437 1970 0.78 15 70
1
'WBFR P3-WBFRP4' 'AG' 8467 66437 7571 66282 1970 0.78 0 58
1
'WBFRP4-WBFRP5' 'AG' 7571 66282 6685 66092 1480 0.78 0 70
1
'WBFRP5-WBFRGOAPP6' 'AG' 6685 66092 6590 66069 1480 0.78 0 58
2
'WBFRGOAPP6-WBFRGOAPP7' 'AG' 6590 66069 6233 65971 0 36 3
105 66.9 2.0 810 3.01 5085 2 1
1
'WBFRGOAPP7-WBFRP8' 'AG' 6233 65971 5996 65892 810 0.78 0 58
1
'WBFRP8-WBFRP9' 'AG' 5996 65892 5737 65820 1890 0.78 0 70
1
'WBFRP9-WBFRP10' 'AG' 5737 65820 4796 65479 1340 0.78 0 58
1
'WBEBUTRNP1-WBEBUTRNP2' 'AG' 6692 66072 6580 66030 20 1.34 0 38
1
'WBEBUTRNP2-WBEBUTRNP3' 'AG' 6580 66030 6256 65928 20 1.34 0 38
1
'WBEBUTRNP3-WBEBUTRNP4' 'AG' 6256 65928 6275 65590 20 1.34 0 38
1
'WBEBUTRNP4-EBFRP6' 'AG' 6275 65590 6311 65547 20 1.34 0 38
2
'WBFRGORTP1-WBFRGORTP2' 'AG' 6557 66092 6272 66013 0 12 1
105 68.9 2.0 520 3.01 2787 2 1
2
'WBFRGORTP2-WBFRGORTP3' 'AG' 6272 66013 6226 66036 0 12 1
105 66.9 2.0 520 3.01 2787 2 1
2
'WBFRGOLTP1-WBFRGOLTP2' 'AG' 6577 66043 6239 65951 0 12 1
105 66.9 2.0 150 3.01 1770 2 1
1
'WBENTR1P1-WBENTR1P2' 'AG' 8467 66427 7903 66312 560 0.78 0 34
1
'WBENTR1P2-WBENTR1P3' 'DP' 7903 66312 6843 66004 560 0.78 -15 34
1
'WBMLP1-WBMLP2' 'DP' 9408 66273 8614 66243 6450 0.77 -15 80
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1
'WBMLP2-WBMLP3' 'DP' 8614 66243 7761 66151 6450 0.77 -15 80
1
'WBMLP3-WBMLP4' 'DP' 7761 66151 6849 65967 6450 0.77 -15 80
1
'WBMLP4-WBMLP5' 'FL' 6849 65967 6302 65833 6940 0.77 30 94
1
'WBMLP5-WBMLP6' 'BR' 6302 65833 6033 65744 6940 0.77 30 92
1
'WBMLP6-WBMLP7' 'FL' 6033 65744 4796 65305 7490 0.77 30 92
1
'WBENTR2P1-WBENTR2P2' 'AG' 5747 65794 5281 65564 560 0.78 0 34
1
'WBENTR2P2-WBENTR2P3' 'FL' 5281 65564 4792 65344 560 0.78 0 34
1
'EBMLP1-EBMLP2' 'DP' 4805 65203 6039 65646 6890 0.77 -15 92
1
'EBMLP2-EBMLP3' 'DP' 6039 65646 6305 65721 6890 0.77 -15 92
1
'EBMLP3-EBMLP4' 'DP' 6305 65721 6859 65879 6890 0.77 -15 92
1
'EBMLP4-EBMLP5' 'FL' 6859 65879 7765 66056 6400 0.77 30 80
1
'EBMLP5-EBMLP6' 'BR' 7765 66056 8618 66158 6400 0.77 30 80
1
'EBMLP6-EBMLP7' 'FL' 8618 66158 9405 66184 6400 0.77 30 80
1
'EBEXR1P1-EBEXR1P2' 'FL' 4809 65134 5404 65292 560 0.78 30 34
1
'EBEXR1P2-EBEXR1P3' 'AG' 5404 65292 5855 65420 560 0.78 30 34
1
'EBEXR2P1-EBEXR2P2' 'DP' 6863 65846 7381 65915 500 0.78 -15 34
1
'EBEXR2P2-EBEXR2P3' 'DP' 7381 65915 7922 65951 500 0.78 -7 34
1
'EBEXR2P3-EBEXR2P4' 'AG' 7922 65951 8477 65981 500 0.78 0 34
1
'EBFRP1-EBFRP2' 'AG' 4815 65023 5780 65370 1280 0.78 0 46
1
'EBFRP2-EBFRP3' 'AG' 5780 65370 5862 65403 1280 0.78 0 46
1
'EBFRP3-EBFRGOAPP4' 'AG' 5862 65403 5937 65429 1830 0.78 0 58
2
'EBFRGOAPP4-EBFRGOAPP5' 'AG' 5937 65429 6111 65485 0 24 2
105 66.9 2.0 730 3.01 3366 2 1
1
'EBFRGOAPP5-EBFRP6' 'AG' 6111 65485 6311 65547 1200 0.78 0 44
1
'EBFRP6-EBFRP7' 'AG' 6311 65547 6905 65702 1380 0.78 0 46
1
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'EBFRP7-EBFRP8' 'AG' 6905 65702 7919 65892 1380 0.78 0 46
1
'EBFRP8-EBFRP9' 'AG' 7919 65892 8477 65958 1380 0.78 0 46
1
'EBFRP9-EBFRP10' 'AG' 8477 65958 9415 66013 1880 0.78 0 58
1
'EBWBUTRNP1-EBWBUTRNP2' 'AG' 5934 65446 6078 65518 230 1.34 0 38
1
'EBWBUTRNP2-EBWBUTRNP3' 'AG' 6078 65518 6092 65593 230 1.34 0 38
1
'EBWBUTRNP3-EBWBUTRNP4' 'AG' 6092 65593 6052 65859 230 1.34 0 38
1
'EBWBUTRNP4-WBFRP8' 'AG' 6052 65859 5996 65892 230 1.34 0 38
2
'EBFRGOLTP1-EBFRGOLTP2' 'AG' 5950 65442 6101 65502 0 12 1
105 66.9 2.0 520 3.01 1610 2 1
2
'EBFRGORTP1-EBFRGORTP2' 'AG' 5964 65413 6039 65433 0 12 1
105 66.9 2.0 370 3.01 1583 2 1
2
'EBFRGORTP2-EBFRGORTP3' 'AG' 6039 65433 6124 65383 0 12 1
105 66.9 2.0 370 3.01 1583 2 1
1
'NBGOP1-NBGOAPP2' 'AG' 6246 64826 6229 65272 880 0.94 0 56
2
'NBGOAPP2-NBGOAPP3' 'AG' 6229 65272 6220 65488 0 36 3
105 79.4 2.0 710 3.01 7544 2 1
1
'NBGOAPP3-NBGOP4' 'AG' 6220 65488 6216 65584 1220 0.94 0 56
1
‘NBGOP4-NBGOAPP5’ ‘AG’ 6216 65584 6213 65669 1220 0.94 0 56
2
'NBGOAPP5-NBGOAPP6' 'AG' 6213 65669 6193 65925 0 36 3
105 47.1 2.0 860 3.01 5085 2 1
1
'NBGOAPP6-NBGOP7' 'AG' 6193 65925 6193 66030 860 0.94 0 56
1
'NBGOP7-NBGOP8' 'AG' 6193 66030 6137 66305 1370 0.94 0 56
2
'NBGORTP1-NBGORTP2' 'AG' 6256 65295 6256 65459 0 12 1
105 79.4 2.0 170 3.01 1583 2 1
2
'NBGORTP2-NBGORTP3' 'AG' 6256 65459 6288 65511 0 12 1
105 79.4 2.0 170 3.01 1583 2 1
2
'NBGOLTP1-NBGOLTP2' 'AG' 6180 65672 6167 65908 0 24 2
105 53.6 2.0 370 3.01 3433 2 1
1
'SBGOP1-SBGOAPP2' 'AG' 6078 66292 6105 66161 1420 0.94 0 44
2

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'SBGOAPP2-SBGOAPP3' 'AG' 6105 66161 6118 65964 0 36 3
105 70.3 2.0 930 3.01 6408 2 1
1
'SBGOAPP3-SBGOP4' 'AG' 6118 65964 6131 65882 1070 0.94 0 56
1
'SBGOP4-SBGOAPP5' 'AG' 6131 65882 6128 65767 1070 0.94 0 56
2
'SBGOAPP5-SBGOAPP6' 'AG' 6128 65767 6137 65528 0 36 3
105 46.1 2.0 600 3.01 5085 2 1
2
'SBGOLTP1-SBGOLTP2' 'AG' 6154 65751 6164 65538 0 24 2
105 51.6 2.0 480 3.01 3433 2 1
1
'SBGOAPP6-SBGOP7' 'AG' 6137 65528 6147 65383 600 0.94 0 56
1
'SBGOP7-SBGOP8' 'AG' 6147 65383 6167 65187 600 0.94 0 56
1
'SBGOP8-SBGOP9' 'AG' 6167 65187 6167 64996 970 0.94 0 56
1
'SBGOP9-SBGOP10' 'AG' 6167 64996 6193 64826 970 0.94 0 56
1 0 6 1000 1.7 'Y' 10 0 36
```

JOB: I-20 at Green Oaks 2028 RUN: 2028

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The MODE flag has been set to C for calculating CO averages.

SITE & METEOROLOGICAL VARIABLES

VS = 0.0 CM/S VD = 0.0 CM/S Z0 = 108. CM
U = 1.0 M/S CLAS = 6 (F) ATIM = 60. MINUTES MIXH = 1000. M AMB = 1.7 PPM

LINK VARIABLES

LINK DESCRIPTION	*	LINK COORDINATES (FT)				*	LENGTH	BRG	TYPE	VPH	EF	H	W	V/C	QUEUE
	*	X1	Y1	X2	Y2	*	(FT)	(DEG)			(G/MI)	(FT)	(FT)		(VEH)
1. WBFRP1-P2	*	9408.0	66473.0	8939.0	66466.0	*	469.	269.	BR	1970.	0.8	15.0	70.0		
2. WBFRP2-P3	*	8939.0	66466.0	8467.0	66437.0	*	473.	266.	BR	1970.	0.8	15.0	70.0		
3. WBFR P3-WBFRP4	*	8467.0	66437.0	7571.0	66282.0	*	909.	260.	AG	1970.	0.8	0.0	58.0		
4. WBFRP4-WBFRP5	*	7571.0	66282.0	6685.0	66092.0	*	906.	258.	AG	1480.	0.8	0.0	70.0		
5. WBFRP5-WBFRGOAPP6	*	6685.0	66092.0	6590.0	66069.0	*	98.	256.	AG	1480.	0.8	0.0	58.0		
6. WBFRGOAPP6-WBFRGOAPP	*	6590.0	66069.0	6495.2	66043.0	*	98.	255.	AG	15.	100.0	0.0	36.0	0.16	5.0
7. WBFRGOAPP7-WBFRP8	*	6233.0	65971.0	5996.0	65892.0	*	250.	252.	AG	810.	0.8	0.0	58.0		
8. WBFRP8-WBFRP9	*	5996.0	65892.0	5737.0	65820.0	*	269.	254.	AG	1890.	0.8	0.0	70.0		
9. WBFRP9-WBFRP10	*	5737.0	65820.0	4796.0	65479.0	*	1001.	250.	AG	1340.	0.8	0.0	58.0		
10. WBEBUTRNP1-WBEBUTRNP	*	6692.0	66072.0	6580.0	66030.0	*	120.	249.	AG	20.	1.3	0.0	38.0		
11. WBEBUTRNP2-WBEBUTRNP	*	6580.0	66030.0	6256.0	65928.0	*	340.	253.	AG	20.	1.3	0.0	38.0		
12. WBEBUTRNP3-WBEBUTRNP	*	6256.0	65928.0	6275.0	65590.0	*	339.	177.	AG	20.	1.3	0.0	38.0		

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     13. WBEBUTRNP4-EBFRP6   *   6275.0   65590.0    6311.0   65547.0 *      56.
140. AG     20.   1.3   0.0 38.0
     14. WBFRGORTP1-WBFRGORTP*   6557.0   66092.0    6343.3   66032.8 *     222.
255. AG      5. 100.0   0.0 12.0 0.59  11.3
     15. WBFRGORTP2-WBFRGORTP*   6272.0   66013.0    6083.7   66107.2 *     211.
297. AG      5. 100.0   0.0 12.0 0.56  10.7
     16. WBFRGOLTP1-WBFRGOLTP*   6577.0   66043.0    6523.2   66028.4 *      56.
255. AG      5. 100.0   0.0 12.0 0.25   2.8
     17. WBENTR1P1-WBENTR1P2 *   8467.0   66427.0    7903.0   66312.0 *     576.
258. AG    560.   0.8   0.0 34.0
     18. WBENTR1P2-WBENTR1P3 *   7903.0   66312.0    6843.0   66004.0 *    1104.
254. DP    560.   0.8 -15.0 34.0
     19. WBMLP1-WBMLP2       *   9408.0   66273.0    8614.0   66243.0 *     795.
268. DP   6450.   0.8 -15.0 80.0
     20. WBMLP2-WBMLP3       *   8614.0   66243.0    7761.0   66151.0 *     858.
264. DP   6450.   0.8 -15.0 80.0
     21. WBMLP3-WBMLP4       *   7761.0   66151.0    6849.0   65967.0 *     930.
259. DP   6450.   0.8 -15.0 80.0
     22. WBMLP4-WBMLP5       *   6849.0   65967.0    6302.0   65833.0 *     563.
256. FL   6940.   0.8  30.0 94.0
     23. WBMLP5-WBMLP6       *   6302.0   65833.0    6033.0   65744.0 *     283.
252. BR   6940.   0.8  30.0 92.0
     24. WBMLP6-WBMLP7       *   6033.0   65744.0    4796.0   65305.0 *    1313.
250. FL   7490.   0.8  30.0 92.0
     25. WBENTR2P1-WBENTR2P2 *   5747.0   65794.0    5281.0   65564.0 *     520.
244. AG    560.   0.8   0.0 34.0
     26. WBENTR2P2-WBENTR2P3 *   5281.0   65564.0    4792.0   65344.0 *     536.
246. FL    560.   0.8   0.0 34.0
     27. EBMLP1-EBMLP2       *   4805.0   65203.0    6039.0   65646.0 *    1311.
 70. DP   6890.   0.8 -15.0 92.0
     28. EBMLP2-EBMLP3       *   6039.0   65646.0    6305.0   65721.0 *     276.
 74. DP   6890.   0.8 -15.0 92.0
     29. EBMLP3-EBMLP4       *   6305.0   65721.0    6859.0   65879.0 *     576.
 74. DP   6890.   0.8 -15.0 92.0
     30. EBMLP4-EBMLP5       *   6859.0   65879.0    7765.0   66056.0 *     923.
 79. FL   6400.   0.8  30.0 80.0
     31. EBMLP5-EBMLP6       *   7765.0   66056.0    8618.0   66158.0 *     859.
 83. BR   6400.   0.8  30.0 80.0
     32. EBMLP6-EBMLP7       *   8618.0   66158.0    9405.0   66184.0 *     787.
 88. FL   6400.   0.8  30.0 80.0
     33. EBEXR1P1-EBEXR1P2   *   4809.0   65134.0    5404.0   65292.0 *     616.
 75. FL    560.   0.8  30.0 34.0
     34. EBEXR1P2-EBEXR1P3   *   5404.0   65292.0    5855.0   65420.0 *     469.
 74. AG    560.   0.8  30.0 34.0
     35. EBEXR2P1-EBEXR2P2   *   6863.0   65846.0    7381.0   65915.0 *     523.
 82. DP    500.   0.8 -15.0 34.0
     36. EBEXR2P2-EBEXR2P3   *   7381.0   65915.0    7922.0   65951.0 *     542.
 86. DP    500.   0.8  -7.0 34.0
     37. EBEXR2P3-EBEXR2P4   *   7922.0   65951.0    8477.0   65981.0 *     556.
 87. AG    500.   0.8   0.0 34.0
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     38. EBFRP1-EBFRP2       *   4815.0   65023.0    5780.0   65370.0 *    1025.
 70. AG   1280.   0.8   0.0 46.0
     39. EBFRP2-EBFRP3       *   5780.0   65370.0    5862.0   65403.0 *      88.
 68. AG   1280.   0.8   0.0 46.0
     40. EBFRP3-EBFRGOAPP4   *   5862.0   65403.0    5937.0   65429.0 *      79.
 71. AG   1830.   0.8   0.0 58.0
     41. EBFRGOAPP4-EBFRGOAPP*   5937.0   65429.0    6068.1   65471.2 *     138.
 72. AG     10. 100.0   0.0 24.0 0.33   7.0
     42. EBFRGOAPP5-EBFRP6   *   6111.0   65485.0    6311.0   65547.0 *     209.
 73. AG   1200.   0.8   0.0 44.0
     43. EBFRP6-EBFRP7       *   6311.0   65547.0    6905.0   65702.0 *     614.
 75. AG   1380.   0.8   0.0 46.0
     44. EBFRP7-EBFRP8       *   6905.0   65702.0    7919.0   65892.0 *    1032.
 79. AG   1380.   0.8   0.0 46.0
```



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     DATE : 11/15/19
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      LINK VARIABLES
      --------------
        LINK DESCRIPTION     *         LINK COORDINATES (FT)          *    LENGTH
BRG TYPE   VPH    EF      H   W    V/C QUEUE
                             *   X1        Y1        X2        Y2     *     (FT)
(DEG)           (G/MI)  (FT) (FT)       (VEH)

-----------------------*----------------------------------------*----------------
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     45. EBFRP8-EBFRP9       *   7919.0   65892.0    8477.0   65958.0 *     562.
 83. AG   1380.   0.8   0.0 46.0
     46. EBFRP9-EBFRP10      *   8477.0   65958.0    9415.0   66013.0 *     940.
 87. AG   1880.   0.8   0.0 58.0
     47. EBWBUTRNP1-EBWBUTRNP*   5934.0   65446.0    6078.0   65518.0 *     161.
 63. AG    230.   1.3   0.0 38.0
     48. EBWBUTRNP2-EBWBUTRNP*   6078.0   65518.0    6092.0   65593.0 *      76.
 11. AG    230.   1.3   0.0 38.0
     49. EBWBUTRNP3-EBWBUTRNP*   6092.0   65593.0    6052.0   65859.0 *     269.
351. AG    230.   1.3   0.0 38.0
     50. EBWBUTRNP4-WBFRP8   *   6052.0   65859.0    5996.0   65892.0 *      65.
301. AG    230.   1.3   0.0 38.0
     51. EBFRGOLTP1-EBFRGOLTP*   5950.0   65442.0    6228.1   65552.5 *     299.
 68. AG      5. 100.0   0.0 12.0 0.97  15.2
     52. EBFRGORTP1-EBFRGORTP*   5964.0   65413.0    6105.4   65450.7 *     146.
 75. AG      5. 100.0   0.0 12.0 0.70   7.4
     53. EBFRGORTP2-EBFRGORTP*   6039.0   65433.0    6165.2   65358.8 *     146.
120. AG      5. 100.0   0.0 12.0 0.70   7.4
     54. NBGOP1-NBGOAPP2     *   6246.0   64826.0    6229.0   65272.0 *     446.
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358. AG    880.   0.9   0.0 56.0
      55. NBGOAPP2-NBGOAPP3   *   6229.0   65272.0    6224.4   65383.5 *     112.
358. AG     18. 100.0   0.0 36.0 0.15   5.7
      56. NBGOAPP3-NBGOP4     *   6220.0   65488.0    6216.0   65584.0 *      96.
358. AG   1220.   0.9   0.0 56.0
      57. 'NBGOP4-NBGOAPP5'   *   6216.0   65584.0    6213.0   65669.0 *      85.
358. 'A   1220.   0.9   0.0 56.0
      58. NBGOAPP5-NBGOAPP6   *   6213.0   65669.0    6207.3   65742.3 *      74.
356. AG     11. 100.0   0.0 36.0 0.11   3.7
      59. NBGOAPP6-NBGOP7     *   6193.0   65925.0    6193.0   66030.0 *     105.
360. AG    860.   0.9   0.0 56.0
      60. NBGOP7-NBGOP8       *   6193.0   66030.0    6137.0   66305.0 *     281.
348. AG   1370.   0.9   0.0 56.0
      61. NBGORTP1-NBGORTP2   *   6256.0   65295.0    6256.0   65382.0 *      87.
360. AG      6. 100.0   0.0 12.0 0.51   4.4
      62. NBGORTP2-NBGORTP3   *   6256.0   65459.0    6301.6   65533.1 *      87.
 32. AG      6. 100.0   0.0 12.0 0.51   4.4
      63. NBGOLTP1-NBGOLTP2   *   6180.0   65672.0    6177.1   65725.5 *      54.
357. AG      8. 100.0   0.0 24.0 0.12   2.7
      64. SBGOP1-SBGOAPP2     *   6078.0   66292.0    6105.0   66161.0 *     134.
168. AG   1420.   0.9   0.0 44.0
      65. SBGOAPP2-SBGOAPP3   *   6105.0   66161.0    6113.1   66038.3 *     123.
176. AG     16. 100.0   0.0 36.0 0.16   6.2
      66. SBGOAPP3-SBGOP4     *   6118.0   65964.0    6131.0   65882.0 *      83.
171. AG   1070.   0.9   0.0 56.0
      67. SBGOP4-SBGOAPP5     *   6131.0   65882.0    6128.0   65767.0 *     115.
181. AG   1070.   0.9   0.0 56.0
      68. SBGOAPP5-SBGOAPP6   *   6128.0   65767.0    6129.9   65716.7 *      50.
178. AG     11. 100.0   0.0 36.0 0.08   2.6
      69. SBGOLTP1-SBGOLTP2   *   6154.0   65751.0    6157.1   65684.1 *      67.
177. AG      8. 100.0   0.0 24.0 0.15   3.4
      70. SBGOAPP6-SBGOP7     *   6137.0   65528.0    6147.0   65383.0 *     145.
176. AG    600.   0.9   0.0 56.0
      71. SBGOP7-SBGOP8       *   6147.0   65383.0    6167.0   65187.0 *     197.
174. AG    600.   0.9   0.0 56.0
      72. SBGOP8-SBGOP9       *   6167.0   65187.0    6167.0   64996.0 *     191.
180. AG    970.   0.9   0.0 56.0
      73. SBGOP9-SBGOP10      *   6167.0   64996.0    6193.0   64826.0 *     172.
171. AG    970.   0.9   0.0 56.0
```


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ADDITIONAL QUEUE LINK PARAMETERS

LINK DESCRIPTION	*	CYCLE	RED	CLEARANCE	APPROACH	SATURATION

		IDLE EM FAC	SIGNAL TYPE	ARRIVAL RATE
	LENGTH (SEC)	TIME (SEC)	LOST TIME (SEC)	VOL (VPH)	FLOW RATE (VPH)	(gm/hr)		
6. WBFRGOAPP6-WBFRGOAPP	105	66	2.0	810	5085	3.01	2	1
14. WBFRGORTP1-WBFRGORTP	105	68	2.0	520	2787	3.01	2	1
15. WBFRGORTP2-WBFRGORTP	105	66	2.0	520	2787	3.01	2	1
16. WBFRGOLTP1-WBFRGOLTP	105	66	2.0	150	1770	3.01	2	1
41. EBFRGOAPP4-EBFRGOAPP	105	66	2.0	730	3366	3.01	2	1
51. EBFRGOLTP1-EBFRGOLTP	105	66	2.0	520	1610	3.01	2	1
52. EBFRGORTP1-EBFRGORTP	105	66	2.0	370	1583	3.01	2	1
53. EBFRGORTP2-EBFRGORTP	105	66	2.0	370	1583	3.01	2	1
55. NBGOAPP2-NBGOAPP3 *	105	79	2.0	710	7544	3.01	2	1
58. NBGOAPP5-NBGOAPP6 *	105	47	2.0	860	5085	3.01	2	1
61. NBGORTP1-NBGORTP2 *	105	79	2.0	170	1583	3.01	2	1
62. NBGORTP2-NBGORTP3 *	105	79	2.0	170	1583	3.01	2	1
63. NBGOLTP1-NBGOLTP2 *	105	53	2.0	370	3433	3.01	2	1
65. SBGOAPP2-SBGOAPP3 *	105	70	2.0	930	6408	3.01	2	1
68. SBGOAPP5-SBGOAPP6 *	105	46	2.0	600	5085	3.01	2	1
69. SBGOLTP1-SBGOLTP2 *	105	51	2.0	480	3433	3.01	2	1

RECEPTOR LOCATIONS

RECEPTOR	COORDINATES (FT) X	Y	Z
1. R1	8470.0	66479.0	5.9
2. R2	6282.0	66099.0	5.9
3. R3	5321.0	65715.0	5.9
4. R4	5419.0	65200.0	5.9

5. R5	*	6065.0	65377.0	5.9	*
6. R6	*	8683.0	65918.0	5.9	*

MODEL RESULTS

REMARKS : In search of the angle corresponding to the maximum concentration, only the first angle, of the angles with same maximum concentrations, is indicated as maximum.

WIND ANGLE RANGE: 0.-360.

WIND ANGLE (DEGR)	* CONCENTRATION (PPM) REC1	REC2	REC3	REC4	REC5	REC6
0.	* 1.7	1.7	1.7	1.9	1.7	1.8
10.	* 1.7	1.7	1.7	1.8	1.7	1.8
20.	* 1.7	1.7	1.7	1.9	1.8	1.8
30.	* 1.7	1.7	1.7	1.9	1.7	1.8
40.	* 1.7	1.7	1.7	1.9	1.8	1.8
50.	* 1.7	1.7	1.7	1.9	1.9	1.9
60.	* 1.7	1.7	1.7	1.8	1.9	1.9
70.	* 1.7	1.7	1.7	1.7	1.7	1.9
80.	* 1.7	1.7	2.0	1.7	1.7	1.8
90.	* 1.8	1.8	1.9	1.7	1.7	1.7
100.	* 1.8	1.9	1.8	1.7	1.7	1.7
110.	* 2.0	1.8	1.9	1.7	1.7	1.7
120.	* 1.9	1.8	1.8	1.7	1.7	1.7
130.	* 1.9	1.8	1.8	1.7	1.7	1.7
140.	* 1.8	1.8	1.8	1.7	1.7	1.7
150.	* 1.7	1.8	1.8	1.7	1.7	1.7
160.	* 1.7	1.8	1.8	1.7	1.7	1.7
170.	* 1.7	1.8	1.8	1.7	1.7	1.7
180.	* 1.7	1.7	1.8	1.7	1.7	1.7
190.	* 1.7	1.7	1.8	1.7	1.7	1.7
200.	* 1.7	1.8	1.8	1.7	1.7	1.7
210.	* 1.8	1.7	1.9	1.7	1.7	1.7
220.	* 2.0	1.9	1.8	1.7	1.7	1.7
230.	* 2.0	1.9	1.9	1.7	1.7	1.7
240.	* 2.0	1.8	1.8	1.7	1.7	1.7
250.	* 2.1	1.7	1.7	1.7	1.7	1.7
260.	* 1.8	1.7	1.7	1.8	1.7	1.7
270.	* 1.7	1.7	1.7	1.8	1.9	1.8
280.	* 1.7	1.7	1.7	1.8	1.9	1.8

290.	*	1.7	1.7	1.7	1.9	1.9	2.0
300.	*	1.7	1.7	1.7	1.9	1.9	2.0
310.	*	1.7	1.7	1.7	1.8	1.8	1.8
320.	*	1.7	1.7	1.7	1.9	1.8	1.7
330.	*	1.7	1.7	1.7	1.8	1.8	1.7
340.	*	1.7	1.7	1.7	1.8	1.8	1.7
350.	*	1.7	1.7	1.7	1.8	1.7	1.7
360.	*	1.7	1.7	1.7	1.9	1.7	1.8
MAX	*	2.1	1.9	2.0	1.9	1.9	2.0
DEGR.	*	250	100	80	0	50	290

THE HIGHEST CONCENTRATION OF 2.10 PPM OCCURRED AT RECEPTOR REC1 .

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RECEPTOR - LINK MATRIX FOR THE ANGLE PRODUCING
THE MAXIMUM CONCENTRATION FOR EACH RECEPTOR

	*	CO/LINK (PPM) ANGLE (DEGREES)					
	*	REC1	REC2	REC3	REC4	REC5	REC6
LINK #	*	250	100	80	0	50	290
1	*	0.0	0.0	0.0	0.0	0.0	0.0
2	*	0.0	0.0	0.0	0.0	0.0	0.0
3	*	0.1	0.0	0.0	0.0	0.0	0.0
4	*	0.0	0.0	0.0	0.0	0.0	0.0
5	*	0.0	0.0	0.0	0.0	0.0	0.0
6	*	0.0	0.0	0.0	0.0	0.0	0.0
7	*	0.0	0.0	0.0	0.0	0.0	0.0
8	*	0.0	0.0	0.0	0.0	0.0	0.0
9	*	0.0	0.0	0.1	0.0	0.0	0.0
10	*	0.0	0.0	0.0	0.0	0.0	0.0
11	*	0.0	0.0	0.0	0.0	0.0	0.0
12	*	0.0	0.0	0.0	0.0	0.0	0.0
13	*	0.0	0.0	0.0	0.0	0.0	0.0
14	*	0.0	0.0	0.0	0.0	0.0	0.0
15	*	0.0	0.0	0.0	0.0	0.0	0.0
16	*	0.0	0.0	0.0	0.0	0.0	0.0
17	*	0.0	0.0	0.0	0.0	0.0	0.0
18	*	0.0	0.0	0.0	0.0	0.0	0.0
19	*	0.0	0.0	0.0	0.0	0.0	0.0
20	*	0.0	0.0	0.0	0.0	0.0	0.1

21	*	0.1	0.1	0.1	0.0	0.0	0.0
22	*	0.0	0.0	0.1	0.0	0.1	0.0
23	*	0.0	0.0	0.0	0.0	0.0	0.0
24	*	0.0	0.0	0.0	0.1	0.0	0.0
25	*	0.0	0.0	0.0	0.0	0.0	0.0
26	*	0.0	0.0	0.0	0.0	0.0	0.0
27	*	0.1	0.0	0.0	0.1	0.0	0.0
28	*	0.0	0.0	0.0	0.0	0.0	0.0
29	*	0.0	0.0	0.0	0.0	0.1	0.0
30	*	0.1	0.1	0.0	0.0	0.0	0.0
31	*	0.0	0.0	0.0	0.0	0.0	0.1
32	*	0.0	0.0	0.0	0.0	0.0	0.0
33	*	0.0	0.0	0.0	0.0	0.0	0.0
34	*	0.0	0.0	0.0	0.0	0.0	0.0
35	*	0.0	0.0	0.0	0.0	0.0	0.0
36	*	0.0	0.0	0.0	0.0	0.0	0.0
37	*	0.0	0.0	0.0	0.0	0.0	0.0
38	*	0.0	0.0	0.0	0.0	0.0	0.0
39	*	0.0	0.0	0.0	0.0	0.0	0.0
40	*	0.0	0.0	0.0	0.0	0.0	0.0
41	*	0.0	0.0	0.0	0.0	0.0	0.0
42	*	0.0	0.0	0.0	0.0	0.0	0.0
43	*	0.0	0.0	0.0	0.0	0.0	0.0
44	*	0.0	0.0	0.0	0.0	0.0	0.0
45	*	0.0	0.0	0.0	0.0	0.0	0.0

		CO/LINK (PPM) ANGLE (DEGREES)					
	*	REC1	REC2	REC3	REC4	REC5	REC6
LINK #	*	250	100	80	0	50	290
46	*	0.0	0.0	0.0	0.0	0.0	0.1
47	*	0.0	0.0	0.0	0.0	0.0	0.0
48	*	0.0	0.0	0.0	0.0	0.0	0.0
49	*	0.0	0.0	0.0	0.0	0.0	0.0
50	*	0.0	0.0	0.0	0.0	0.0	0.0
51	*	0.0	0.0	0.0	0.0	0.0	0.0
52	*	0.0	0.0	0.0	0.0	0.0	0.0
53	*	0.0	0.0	0.0	0.0	0.0	0.0
54	*	0.0	0.0	0.0	0.0	0.0	0.0
55	*	0.0	0.0	0.0	0.0	0.0	0.0
56	*	0.0	0.0	0.0	0.0	0.0	0.0
57	*	0.0	0.0	0.0	0.0	0.0	0.0
58	*	0.0	0.0	0.0	0.0	0.0	0.0
59	*	0.0	0.0	0.0	0.0	0.0	0.0
60	*	0.0	0.0	0.0	0.0	0.0	0.0

61	*	0.0	0.0	0.0	0.0	0.0	0.0
62	*	0.0	0.0	0.0	0.0	0.0	0.0
63	*	0.0	0.0	0.0	0.0	0.0	0.0
64	*	0.0	0.0	0.0	0.0	0.0	0.0
65	*	0.0	0.0	0.0	0.0	0.0	0.0
66	*	0.0	0.0	0.0	0.0	0.0	0.0
67	*	0.0	0.0	0.0	0.0	0.0	0.0
68	*	0.0	0.0	0.0	0.0	0.0	0.0
69	*	0.0	0.0	0.0	0.0	0.0	0.0
70	*	0.0	0.0	0.0	0.0	0.0	0.0
71	*	0.0	0.0	0.0	0.0	0.0	0.0
72	*	0.0	0.0	0.0	0.0	0.0	0.0
73	*	0.0	0.0	0.0	0.0	0.0	0.0

```
'I-20 at Green Oaks 2045' 60 108 0 0 6 0.3048 1 1
'R1' 8470 66479 5.9
'R2' 6282 66099 5.9
'R3' 5321 65715 5.9
'R4' 5419 65200 5.9
'R5' 6065 65377 5.9
'R6' 8683 65918 5.9
'2045' 73 36 1 'C'
1
'WBFRP1-P2' 'BR' 9408 66473 8939 66466 2520 0.43 15 70
1
'WBFRP2-P3' 'BR' 8939 66466 8467 66437 2520 0.43 15 70
1
'WBFR P3-WBFRP4' 'AG' 8467 66437 7571 66282 2520 0.43 0 58
1
'WBFRP4-WBFRP5' 'AG' 7571 66282 6685 66092 1890 0.43 0 70
1
'WBFRP5-WBFRGOAPP6' 'AG' 6685 66092 6590 66069 1890 0.43 0 58
2
'WBFRGOAPP6-WBFRGOAPP7' 'AG' 6590 66069 6233 65971 0 36 3
105 66.9 2.0 1020 1.49 5085 2 1
1
'WBFRGOAPP7-WBFRP8' 'AG' 6233 65971 5996 65892 1020 0.43 0 58
1
'WBFRP8-WBFRP9' 'AG' 5996 65892 5737 65820 2420 0.43 0 70
1
'WBFRP9-WBFRP10' 'AG' 5737 65820 4796 65479 1700 0.43 0 58
1
'WBEBUTRNP1-WBEBUTRNP2' 'AG' 6692 66072 6580 66030 30 0.72 0 38
1
'WBEBUTRNP2-WBEBUTRNP3' 'AG' 6580 66030 6256 65928 30 0.72 0 38
1
'WBEBUTRNP3-WBEBUTRNP4' 'AG' 6256 65928 6275 65590 30 0.72 0 38
1
'WBEBUTRNP4-EBFRP6' 'AG' 6275 65590 6311 65547 30 0.72 0 38
2
'WBFRGORTP1-WBFRGORTP2' 'AG' 6557 66092 6272 66013 0 12 1
105 68.9 2.0 670 1.49 2787 2 1
2
'WBFRGORTP2-WBFRGORTP3' 'AG' 6272 66013 6226 66036 0 12 1
105 66.9 2.0 670 1.49 2787 2 1
2
'WBFRGOLTP1-WBFRGOLTP2' 'AG' 6577 66043 6239 65951 0 12 1
105 66.9 2.0 190 1.49 1770 2 1
1
'WBENTR1P1-WBENTR1P2' 'AG' 8467         66427 7903 66312 720 0.43 0 34
1
'WBENTR1P2-WBENTR1P3' 'DP' 7903 66312 6843 66004 720 0.43 -15 34
1
'WBMLP1-WBMLP2' 'DP' 9408 66273 8614 66243 8270 0.45 -15 80
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1
'WBMLP2-WBMLP3' 'DP' 8614 66243 7761 66151 8270 0.45 -15 80
1
'WBMLP3-WBMLP4' 'DP' 7761 66151 6849 65967 8270 0.45 -15 80
1
'WBMLP4-WBMLP5' 'FL' 6849 65967 6302 65833 8900 0.45 30 94
1
'WBMLP5-WBMLP6' 'BR' 6302 65833 6033 65744 8900 0.45 30 92
1
'WBMLP6-WBMLP7' 'FL' 6033 65744 4796 65305 9620 0.45 30 92
1
'WBENTR2P1-WBENTR2P2' 'AG' 5747 65794 5281 65564 720 0.43 0 34
1
'WBENTR2P2-WBENTR2P3' 'FL' 5281 65564 4792 65344 720 0.43 0 34
1
'EBMLP1-EBMLP2' 'DP' 4805 65203 6039 65646 8880 0.45 -15 92
1
'EBMLP2-EBMLP3' 'DP' 6039 65646 6305 65721 8880 0.45 -15 92
1
'EBMLP3-EBMLP4' 'DP' 6305 65721 6859 65879 8880 0.45 -15 92
1
'EBMLP4-EBMLP5' 'FL' 6859 65879 7765 66056 8240 0.45 30 80
1
'EBMLP5-EBMLP6' 'BR' 7765 66056 8618 66158 8240 0.45 30 80
1
'EBMLP6-EBMLP7' 'FL' 8618 66158 9405 66184 8240 0.45 30 80
1
'EBEXR1P1-EBEXR1P2' 'FL' 4809 65134 5404 65292 720 0.43 30 34
1
'EBEXR1P2-EBEXR1P3' 'AG' 5404 65292 5855 65420 720 0.43 30 34
1
'EBEXR2P1-EBEXR2P2' 'DP' 6863 65846 7381 65915 640 0.43 -15 34
1
'EBEXR2P2-EBEXR2P3' 'DP' 7381 65915 7922 65951 640 0.43 -7 34
1
'EBEXR2P3-EBEXR2P4' 'AG' 7922 65951 8477 65981 640 0.43 0 34
1
'EBFRP1-EBFRP2' 'AG' 4815 65023 5780 65370 1650 0.43 0 46
1
'EBFRP2-EBFRP3' 'AG' 5780 65370 5862 65403 1650 0.43 0 46
1
'EBFRP3-EBFRGOAPP4' 'AG' 5862 65403 5937 65429 2370 0.43 0 58
2
'EBFRGOAPP4-EBFRGOAPP5' 'AG' 5937 65429 6111 65485 0 24 2
105 66.9 2.0 930 1.49 3366 2 1
1
'EBFRGOAPP5-EBFRP6' 'AG' 6111 65485 6311 65547 1540 0.43 0 44
1
'EBFRP6-EBFRP7' 'AG' 6311 65547 6905 65702 1780 0.43 0 46
1
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'EBFRP7-EBFRP8' 'AG' 6905 65702 7919 65892 1780 0.43 0 46
1
'EBFRP8-EBFRP9' 'AG' 7919 65892 8477 65958 1780 0.43 0 46
1
'EBFRP9-EBFRP10' 'AG' 8477 65958 9415 66013 2410 0.43 0 58
1
'EBWBUTRNP1-EBWBUTRNP2' 'AG' 5934 65446 6078 65518 300 0.72 0 38
1
'EBWBUTRNP2-EBWBUTRNP3' 'AG' 6078 65518 6092 65593 300 0.72 0 38
1
'EBWBUTRNP3-EBWBUTRNP4' 'AG' 6092 65593 6052 65859 300 0.72 0 38
1
'EBWBUTRNP4-WBFRP8' 'AG' 6052 65859 5996 65892 300 0.72 0 38
2
'EBFRGOLTP1-EBFRGOLTP2' 'AG' 5950 65442 6101 65502 0 12 1
105 66.9 2.0 670 1.49 1610 2 1
2
'EBFRGORTP1-EBFRGORTP2' 'AG' 5964 65413 6039 65433 0 12 1
105 66.9 2.0 470 1.49 1583 2 1
2
'EBFRGORTP2-EBFRGORTP3' 'AG' 6039 65433 6124 65383 0 12 1
105 66.9 2.0 470 1.49 1583 2 1
1
'NBGOP1-NBGOAPP2' 'AG' 6246 64826 6229 65272 1120 0.51 0 56
2
'NBGOAPP2-NBGOAPP3' 'AG' 6229 65272 6220 65488 0 36 3
105 79.4 2.0 900 1.49 7544 2 1
1
'NBGOAPP3-NBGOP4' 'AG' 6220 65488 6216 65584 1570 0.51 0 56
1
‘NBGOP4-NBGOAPP5’ ‘AG’ 6216 65584 6213 65669 1570 0.51 0 56
2
'NBGOAPP5-NBGOAPP6' 'AG' 6213 65669 6193 65925 0 36 3
105 47.1 2.0 1110 1.49 5085 2 1
1
'NBGOAPP6-NBGOP7' 'AG' 6193 65925 6193 66030 1110 0.51 0 56
1
'NBGOP7-NBGOP8' 'AG' 6193 66030 6137 66305 1770 0.51 0 56
2
'NBGORTP1-NBGORTP2' 'AG' 6256 65295 6256 65459 0 12 1
105 79.4 2.0 220 1.49 1583 2 1
2
'NBGORTP2-NBGORTP3' 'AG' 6256 65459 6288 65511 0 12 1
105 79.4 2.0 220 1.49 1583 2 1
2
'NBGOLTP1-NBGOLTP2' 'AG' 6180 65672 6167 65908 0 24 2
105 53.6 2.0 470 1.49 3433 2 1
1
'SBGOP1-SBGOAPP2' 'AG' 6078 66292 6105 66161 1780 0.51 0 44
2

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'SBGOAPP2-SBGOAPP3' 'AG' 6105 66161 6118 65964 0 36 3
105 70.3 2.0 1150 1.49 6408 2 1
1
'SBGOAPP3-SBGOP4' 'AG' 6118 65964 6131 65882 1340 0.51 0 56
1
'SBGOP4-SBGOAPP5' 'AG' 6131 65882 6128 65767 1340 0.51 0 56
2
'SBGOAPP5-SBGOAPP6' 'AG' 6128 65767 6137 65528 0 36 3
105 46.1 2.0 730 1.49 5085 2 1
2
'SBGOLTP1-SBGOLTP2' 'AG' 6154 65751 6164 65538 0 24 2
105 51.6 2.0 610 1.49 3433 2 1
1
'SBGOAPP6-SBGOP7' 'AG' 6137 65528 6147 65383 730 0.51 0 56
1
'SBGOP7-SBGOP8' 'AG' 6147 65383 6167 65187 730 0.51 0 56
1
'SBGOP8-SBGOP9' 'AG' 6167 65187 6167 64996 1200 0.51 0 56
1
'SBGOP9-SBGOP10' 'AG' 6167 64996 6193 64826 1200 0.51 0 56
1 0 6 1000 1.7 'Y' 10 0 36
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JOB: I-20 at Green Oaks 2045 RUN: 2045

DATE : 11/15/19
TIME : 17:22:52

The MODE flag has been set to C for calculating CO averages.

SITE & METEOROLOGICAL VARIABLES

VS = 0.0 CM/S VD = 0.0 CM/S Z0 = 108. CM
U = 1.0 M/S CLAS = 6 (F) ATIM = 60. MINUTES MIXH = 1000. M AMB = 1.7 PPM

LINK VARIABLES

	LINK DESCRIPTION	*	LINK COORDINATES (FT) X1	Y1	X2	Y2	*	LENGTH (FT)	BRG (DEG)	TYPE	VPH	EF (G/MI)	H (FT)	W (FT)	V/C	QUEUE (VEH)
1.	WBFRP1-P2	*	9408.0	66473.0	8939.0	66466.0	*	469.	269.	BR	2520.	0.4	15.0	70.0		
2.	WBFRP2-P3	*	8939.0	66466.0	8467.0	66437.0	*	473.	266.	BR	2520.	0.4	15.0	70.0		
3.	WBFR P3-WBFRP4	*	8467.0	66437.0	7571.0	66282.0	*	909.	260.	AG	2520.	0.4	0.0	58.0		
4.	WBFRP4-WBFRP5	*	7571.0	66282.0	6685.0	66092.0	*	906.	258.	AG	1890.	0.4	0.0	70.0		
5.	WBFRP5-WBFRGOAPP6	*	6685.0	66092.0	6590.0	66069.0	*	98.	256.	AG	1890.	0.4	0.0	58.0		
6.	WBFRGOAPP6-WBFRGOAPP	*	6590.0	66069.0	6469.7	66036.0	*	125.	255.	AG	8.	100.0	0.0	36.0	0.20	6.3
7.	WBFRGOAPP7-WBFRP8	*	6233.0	65971.0	5996.0	65892.0	*	250.	252.	AG	1020.	0.4	0.0	58.0		
8.	WBFRP8-WBFRP9	*	5996.0	65892.0	5737.0	65820.0	*	269.	254.	AG	2420.	0.4	0.0	70.0		
9.	WBFRP9-WBFRP10	*	5737.0	65820.0	4796.0	65479.0	*	1001.	250.	AG	1700.	0.4	0.0	58.0		
10.	WBEBUTRNP1-WBEBUTRNP	*	6692.0	66072.0	6580.0	66030.0	*	120.	249.	AG	30.	0.7	0.0	38.0		
11.	WBEBUTRNP2-WBEBUTRNP	*	6580.0	66030.0	6256.0	65928.0	*	340.	253.	AG	30.	0.7	0.0	38.0		
12.	WBEBUTRNP3-WBEBUTRNP	*	6256.0	65928.0	6275.0	65590.0	*	339.	177.	AG	30.	0.7	0.0	38.0		

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     13. WBEBUTRNP4-EBFRP6   *   6275.0   65590.0    6311.0   65547.0 *      56.
140. AG     30.   0.7   0.0 38.0
     14. WBFRGORTP1-WBFRGORTP*   6557.0   66092.0    6289.1   66017.7 *     278.
255. AG      3. 100.0   0.0 12.0 0.77  14.1
     15. WBFRGORTP2-WBFRGORTP*   6272.0   66013.0    6038.8   66129.6 *     261.
297. AG      3. 100.0   0.0 12.0 0.72  13.2
     16. WBFRGOLTP1-WBFRGOLTP*   6577.0   66043.0    6507.8   66024.2 *      72.
255. AG      3. 100.0   0.0 12.0 0.32   3.6
     17. WBENTR1P1-WBENTR1P2 *   8467.0   66427.0    7903.0   66312.0 *     576.
258. AG    720.   0.4   0.0 34.0
     18. WBENTR1P2-WBENTR1P3 *   7903.0   66312.0    6843.0   66004.0 *    1104.
254. DP    720.   0.4 -15.0 34.0
     19. WBMLP1-WBMLP2       *   9408.0   66273.0    8614.0   66243.0 *     795.
268. DP   8270.   0.4 -15.0 80.0
     20. WBMLP2-WBMLP3       *   8614.0   66243.0    7761.0   66151.0 *     858.
264. DP   8270.   0.4 -15.0 80.0
     21. WBMLP3-WBMLP4       *   7761.0   66151.0    6849.0   65967.0 *     930.
259. DP   8270.   0.4 -15.0 80.0
     22. WBMLP4-WBMLP5       *   6849.0   65967.0    6302.0   65833.0 *     563.
256. FL   8900.   0.4  30.0 94.0
     23. WBMLP5-WBMLP6       *   6302.0   65833.0    6033.0   65744.0 *     283.
252. BR   8900.   0.4  30.0 92.0
     24. WBMLP6-WBMLP7       *   6033.0   65744.0    4796.0   65305.0 *    1313.
250. FL   9620.   0.4  30.0 92.0
     25. WBENTR2P1-WBENTR2P2 *   5747.0   65794.0    5281.0   65564.0 *     520.
244. AG    720.   0.4   0.0 34.0
     26. WBENTR2P2-WBENTR2P3 *   5281.0   65564.0    4792.0   65344.0 *     536.
246. FL    720.   0.4   0.0 34.0
     27. EBMLP1-EBMLP2       *   4805.0   65203.0    6039.0   65646.0 *    1311.
 70. DP   8880.   0.4 -15.0 92.0
     28. EBMLP2-EBMLP3       *   6039.0   65646.0    6305.0   65721.0 *     276.
 74. DP   8880.   0.4 -15.0 92.0
     29. EBMLP3-EBMLP4       *   6305.0   65721.0    6859.0   65879.0 *     576.
 74. DP   8880.   0.4 -15.0 92.0
     30. EBMLP4-EBMLP5       *   6859.0   65879.0    7765.0   66056.0 *     923.
 79. FL   8240.   0.4  30.0 80.0
     31. EBMLP5-EBMLP6       *   7765.0   66056.0    8618.0   66158.0 *     859.
 83. BR   8240.   0.4  30.0 80.0
     32. EBMLP6-EBMLP7       *   8618.0   66158.0    9405.0   66184.0 *     787.
 88. FL   8240.   0.4  30.0 80.0
     33. EBEXR1P1-EBEXR1P2   *   4809.0   65134.0    5404.0   65292.0 *     616.
 75. FL    720.   0.4  30.0 34.0
     34. EBEXR1P2-EBEXR1P3   *   5404.0   65292.0    5855.0   65420.0 *     469.
 74. AG    720.   0.4  30.0 34.0
     35. EBEXR2P1-EBEXR2P2   *   6863.0   65846.0    7381.0   65915.0 *     523.
 82. DP    640.   0.4 -15.0 34.0
     36. EBEXR2P2-EBEXR2P3   *   7381.0   65915.0    7922.0   65951.0 *     542.
 86. DP    640.   0.4  -7.0 34.0
     37. EBEXR2P3-EBEXR2P4   *   7922.0   65951.0    8477.0   65981.0 *     556.
 87. AG    640.   0.4   0.0 34.0
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     38. EBFRP1-EBFRP2       *   4815.0   65023.0    5780.0   65370.0 *    1025.
 70. AG   1650.   0.4   0.0 46.0
     39. EBFRP2-EBFRP3       *   5780.0   65370.0    5862.0   65403.0 *      88.
 68. AG   1650.   0.4   0.0 46.0
     40. EBFRP3-EBFRGOAPP4   *   5862.0   65403.0    5937.0   65429.0 *      79.
 71. AG   2370.   0.4   0.0 58.0
     41. EBFRGOAPP4-EBFRGOAPP*   5937.0   65429.0    6107.9   65484.0 *     180.
 72. AG      5. 100.0   0.0 24.0 0.41   9.1
     42. EBFRGOAPP5-EBFRP6   *   6111.0   65485.0    6311.0   65547.0 *     209.
 73. AG   1540.   0.4   0.0 44.0
     43. EBFRP6-EBFRP7       *   6311.0   65547.0    6905.0   65702.0 *     614.
 75. AG   1780.   0.4   0.0 46.0
     44. EBFRP7-EBFRP8       *   6905.0   65702.0    7919.0   65892.0 *    1032.
 79. AG   1780.   0.4   0.0 46.0
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     DATE : 11/15/19
     TIME : 17:22:52

      LINK VARIABLES
      --------------
        LINK DESCRIPTION     *         LINK COORDINATES (FT)          *    LENGTH
BRG TYPE   VPH    EF      H   W    V/C QUEUE
                             *   X1        Y1        X2        Y2     *     (FT)
(DEG)           (G/MI)  (FT) (FT)       (VEH)

-----------------------*----------------------------------------*----------------
---------------------------------------
     45. EBFRP8-EBFRP9       *   7919.0   65892.0    8477.0   65958.0 *     562.
 83. AG   1780.   0.4   0.0 46.0
     46. EBFRP9-EBFRP10      *   8477.0   65958.0    9415.0   66013.0 *     940.
 87. AG   2410.   0.4   0.0 58.0
     47. EBWBUTRNP1-EBWBUTRNP*   5934.0   65446.0    6078.0   65518.0 *     161.
 63. AG    300.   0.7   0.0 38.0
     48. EBWBUTRNP2-EBWBUTRNP*   6078.0   65518.0    6092.0   65593.0 *      76.
 11. AG    300.   0.7   0.0 38.0
     49. EBWBUTRNP3-EBWBUTRNP*   6092.0   65593.0    6052.0   65859.0 *     269.
351. AG    300.   0.7   0.0 38.0
     50. EBWBUTRNP4-WBFRP8   *   6052.0   65859.0    5996.0   65892.0 *      65.
301. AG    300.   0.7   0.0 38.0
     51. EBFRGOLTP1-EBFRGOLTP*   5950.0   65442.0    7570.3   66085.8 *    1743.
 68. AG      3. 100.0   0.0 12.0 1.25  88.6
     52. EBFRGORTP1-EBFRGORTP*   5964.0   65413.0    6180.0   65470.6 *     224.
 75. AG      3. 100.0   0.0 12.0 0.89  11.4
     53. EBFRGORTP2-EBFRGORTP*   6039.0   65433.0    6231.6   65319.7 *     224.
120. AG      3. 100.0   0.0 12.0 0.89  11.4
     54. NBGOP1-NBGOAPP2     *   6246.0   64826.0    6229.0   65272.0 *     446.
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358. AG   1120.   0.5   0.0 56.0
      55. NBGOAPP2-NBGOAPP3   *   6229.0   65272.0    6223.1   65414.5 *     143.
358. AG      9. 100.0   0.0 36.0 0.19   7.2
      56. NBGOAPP3-NBGOP4     *   6220.0   65488.0    6216.0   65584.0 *      96.
358. AG   1570.   0.5   0.0 56.0
      57. 'NBGOP4-NBGOAPP5'   *   6216.0   65584.0    6213.0   65669.0 *      85.
358. 'A   1570.   0.5   0.0 56.0
      58. NBGOAPP5-NBGOAPP6   *   6213.0   65669.0    6205.6   65763.8 *      95.
356. AG      5. 100.0   0.0 36.0 0.14   4.8
      59. NBGOAPP6-NBGOP7     *   6193.0   65925.0    6193.0   66030.0 *     105.
360. AG   1110.   0.5   0.0 56.0
      60. NBGOP7-NBGOP8       *   6193.0   66030.0    6137.0   66305.0 *     281.
348. AG   1770.   0.5   0.0 56.0
      61. NBGORTP1-NBGORTP2   *   6256.0   65295.0    6256.0   65402.1 *     107.
360. AG      3. 100.0   0.0 12.0 0.66   5.4
      62. NBGORTP2-NBGORTP3   *   6256.0   65459.0    6312.1   65550.2 *     107.
 32. AG      3. 100.0   0.0 12.0 0.66   5.4
      63. NBGOLTP1-NBGOLTP2   *   6180.0   65672.0    6176.3   65740.0 *      68.
357. AG      4. 100.0   0.0 24.0 0.15   3.5
      64. SBGOP1-SBGOAPP2     *   6078.0   66292.0    6105.0   66161.0 *     134.
168. AG   1780.   0.5   0.0 44.0
      65. SBGOAPP2-SBGOAPP3   *   6105.0   66161.0    6115.1   66008.3 *     153.
176. AG      8. 100.0   0.0 36.0 0.20   7.8
      66. SBGOAPP3-SBGOP4     *   6118.0   65964.0    6131.0   65882.0 *      83.
171. AG   1340.   0.5   0.0 56.0
      67. SBGOP4-SBGOAPP5     *   6131.0   65882.0    6128.0   65767.0 *     115.
181. AG   1340.   0.5   0.0 56.0
      68. SBGOAPP5-SBGOAPP6   *   6128.0   65767.0    6130.3   65705.9 *      61.
178. AG      5. 100.0   0.0 36.0 0.09   3.1
      69. SBGOLTP1-SBGOLTP2   *   6154.0   65751.0    6158.0   65666.0 *      85.
177. AG      4. 100.0   0.0 24.0 0.19   4.3
      70. SBGOAPP6-SBGOP7     *   6137.0   65528.0    6147.0   65383.0 *     145.
176. AG    730.   0.5   0.0 56.0
      71. SBGOP7-SBGOP8       *   6147.0   65383.0    6167.0   65187.0 *     197.
174. AG    730.   0.5   0.0 56.0
      72. SBGOP8-SBGOP9       *   6167.0   65187.0    6167.0   64996.0 *     191.
180. AG   1200.   0.5   0.0 56.0
      73. SBGOP9-SBGOP10      *   6167.0   64996.0    6193.0   64826.0 *     172.
171. AG   1200.   0.5   0.0 56.0
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DATE : 11/15/19
TIME : 17:22:52

ADDITIONAL QUEUE LINK PARAMETERS

LINK DESCRIPTION	*	CYCLE	RED	CLEARANCE	APPROACH	SATURATION

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  IDLE   SIGNAL   ARRIVAL
                                *    LENGTH   TIME    LOST TIME    VOL     FLOW RATE
 EM FAC   TYPE     RATE
                                *     (SEC)   (SEC)    (SEC)      (VPH)      (VPH)
(gm/hr)

------------------------*-------------------------------------------------------
----------------------
       6. WBFRGOAPP6-WBFRGOAPP*     105       66       2.0      1020       5085
  1.49      2        1
      14. WBFRGORTP1-WBFRGORTP*     105       68       2.0       670       2787
  1.49      2        1
      15. WBFRGORTP2-WBFRGORTP*     105       66       2.0       670       2787
  1.49      2        1
      16. WBFRGOLTP1-WBFRGOLTP*     105       66       2.0       190       1770
  1.49      2        1
      41. EBFRGOAPP4-EBFRGOAPP*     105       66       2.0       930       3366
  1.49      2        1
      51. EBFRGOLTP1-EBFRGOLTP*     105       66       2.0       670       1610
  1.49      2        1
      52. EBFRGORTP1-EBFRGORTP*     105       66       2.0       470       1583
  1.49      2        1
      53. EBFRGORTP2-EBFRGORTP*     105       66       2.0       470       1583
  1.49      2        1
      55. NBGOAPP2-NBGOAPP3   *     105       79       2.0       900       7544
  1.49      2        1
      58. NBGOAPP5-NBGOAPP6   *     105       47       2.0      1110       5085
  1.49      2        1
      61. NBGORTP1-NBGORTP2   *     105       79       2.0       220       1583
  1.49      2        1
      62. NBGORTP2-NBGORTP3   *     105       79       2.0       220       1583
  1.49      2        1
      63. NBGOLTP1-NBGOLTP2   *     105       53       2.0       470       3433
  1.49      2        1
      65. SBGOAPP2-SBGOAPP3   *     105       70       2.0      1150       6408
  1.49      2        1
      68. SBGOAPP5-SBGOAPP6   *     105       46       2.0       730       5085
  1.49      2        1
      69. SBGOLTP1-SBGOLTP2   *     105       51       2.0       610       3433
  1.49      2        1

       RECEPTOR LOCATIONS
       ------------------
                                *           COORDINATES (FT)          *
         RECEPTOR               *      X          Y          Z        *
     -------------------------*-------------------------------------*
      1. R1                     *      8470.0    66479.0        5.9   *
      2. R2                     *      6282.0    66099.0        5.9   *
      3. R3                     *      5321.0    65715.0        5.9   *
      4. R4                     *      5419.0    65200.0        5.9   *
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5. R5	*	6065.0	65377.0	5.9	*
6. R6	*	8683.0	65918.0	5.9	*

MODEL RESULTS

REMARKS : In search of the angle corresponding to the maximum concentration, only the first angle, of the angles with same maximum concentrations, is indicated as maximum.

WIND ANGLE RANGE: 0.-360.

WIND ANGLE (DEGR)	* CONCENTRATION (PPM) REC1	REC2	REC3	REC4	REC5	REC6
0.	1.7	1.7	1.7	1.7	1.7	1.7
10.	1.7	1.7	1.7	1.8	1.7	1.7
20.	1.7	1.7	1.7	1.8	1.7	1.7
30.	1.7	1.7	1.7	1.8	1.7	1.8
40.	1.7	1.7	1.7	1.9	1.7	1.8
50.	1.7	1.7	1.7	1.8	1.7	1.8
60.	1.7	1.7	1.7	1.7	1.7	1.8
70.	1.7	1.7	1.7	1.7	1.7	1.8
80.	1.7	1.7	1.8	1.7	1.7	1.8
90.	1.7	1.7	1.8	1.7	1.7	1.7
100.	1.8	1.8	1.8	1.7	1.7	1.7
110.	1.8	1.8	1.8	1.7	1.7	1.7
120.	1.8	1.8	1.8	1.7	1.7	1.7
130.	1.8	1.8	1.8	1.7	1.7	1.7
140.	1.7	1.7	1.8	1.7	1.7	1.7
150.	1.7	1.8	1.8	1.7	1.7	1.7
160.	1.7	1.7	1.8	1.7	1.7	1.7
170.	1.7	1.7	1.8	1.7	1.7	1.7
180.	1.7	1.7	1.8	1.7	1.7	1.7
190.	1.7	1.7	1.8	1.7	1.7	1.7
200.	1.7	1.7	1.8	1.7	1.7	1.7
210.	1.7	1.7	1.8	1.7	1.7	1.7
220.	1.7	1.8	1.8	1.7	1.7	1.7
230.	1.7	1.9	1.8	1.7	1.7	1.7
240.	1.8	1.8	1.7	1.7	1.7	1.7
250.	2.0	1.7	1.7	1.7	1.7	1.7
260.	1.7	1.7	1.7	1.7	1.7	1.7
270.	1.7	1.7	1.7	1.7	1.9	1.7
280.	1.7	1.7	1.7	1.8	1.8	1.7

290.	*	1.7	1.7	1.7	1.8	1.8	1.8
300.	*	1.7	1.7	1.7	1.8	1.8	1.7
310.	*	1.7	1.7	1.7	1.8	1.8	1.7
320.	*	1.7	1.7	1.7	1.7	1.7	1.7
330.	*	1.7	1.7	1.7	1.8	1.7	1.7
340.	*	1.7	1.7	1.7	1.7	1.7	1.7
350.	*	1.7	1.7	1.7	1.8	1.7	1.7
360.	*	1.7	1.7	1.7	1.7	1.7	1.7
MAX	*	2.0	1.9	1.8	1.9	1.9	1.8
DEGR.	*	250	230	80	40	270	30

THE HIGHEST CONCENTRATION OF 2.00 PPM OCCURRED AT RECEPTOR REC1 .

DATE : 11/15/19
TIME : 17:22:52

RECEPTOR - LINK MATRIX FOR THE ANGLE PRODUCING
THE MAXIMUM CONCENTRATION FOR EACH RECEPTOR

		CO/LINK (PPM) ANGLE (DEGREES)					
		REC1	REC2	REC3	REC4	REC5	REC6
LINK #	*	250	230	80	40	270	30
1	*	0.0	0.0	0.0	0.0	0.0	0.0
2	*	0.0	0.0	0.0	0.0	0.0	0.0
3	*	0.1	0.0	0.0	0.0	0.0	0.0
4	*	0.0	0.0	0.0	0.0	0.0	0.0
5	*	0.0	0.0	0.0	0.0	0.0	0.0
6	*	0.0	0.0	0.0	0.0	0.0	0.0
7	*	0.0	0.0	0.0	0.0	0.0	0.0
8	*	0.0	0.0	0.0	0.0	0.0	0.0
9	*	0.0	0.0	0.0	0.0	0.0	0.0
10	*	0.0	0.0	0.0	0.0	0.0	0.0
11	*	0.0	0.0	0.0	0.0	0.0	0.0
12	*	0.0	0.0	0.0	0.0	0.0	0.0
13	*	0.0	0.0	0.0	0.0	0.0	0.0
14	*	0.0	0.0	0.0	0.0	0.0	0.0
15	*	0.0	0.0	0.0	0.0	0.0	0.0
16	*	0.0	0.0	0.0	0.0	0.0	0.0
17	*	0.0	0.0	0.0	0.0	0.0	0.0
18	*	0.0	0.0	0.0	0.0	0.0	0.0
19	*	0.0	0.0	0.0	0.0	0.0	0.0
20	*	0.0	0.0	0.0	0.0	0.0	0.0

21	*	0.1	0.0	0.1	0.0	0.0	0.0
22	*	0.0	0.0	0.0	0.0	0.0	0.0
23	*	0.0	0.0	0.0	0.0	0.0	0.0
24	*	0.0	0.1	0.0	0.1	0.1	0.0
25	*	0.0	0.0	0.0	0.0	0.0	0.0
26	*	0.0	0.0	0.0	0.0	0.0	0.0
27	*	0.1	0.1	0.0	0.1	0.1	0.0
28	*	0.0	0.0	0.0	0.0	0.0	0.0
29	*	0.0	0.0	0.0	0.0	0.0	0.0
30	*	0.0	0.0	0.0	0.0	0.0	0.0
31	*	0.0	0.0	0.0	0.0	0.0	0.0
32	*	0.0	0.0	0.0	0.0	0.0	0.1
33	*	0.0	0.0	0.0	0.0	0.0	0.0
34	*	0.0	0.0	0.0	0.0	0.0	0.0
35	*	0.0	0.0	0.0	0.0	0.0	0.0
36	*	0.0	0.0	0.0	0.0	0.0	0.0
37	*	0.0	0.0	0.0	0.0	0.0	0.0
38	*	0.0	0.0	0.0	0.0	0.0	0.0
39	*	0.0	0.0	0.0	0.0	0.0	0.0
40	*	0.0	0.0	0.0	0.0	0.0	0.0
41	*	0.0	0.0	0.0	0.0	0.0	0.0
42	*	0.0	0.0	0.0	0.0	0.0	0.0
43	*	0.0	0.0	0.0	0.0	0.0	0.0
44	*	0.0	0.0	0.0	0.0	0.0	0.0
45	*	0.0	0.0	0.0	0.0	0.0	0.0

		CO/LINK (PPM) ANGLE (DEGREES)					
	*	REC1	REC2	REC3	REC4	REC5	REC6
LINK #	*	250	230	80	40	270	30
46	*	0.0	0.0	0.0	0.0	0.0	0.0
47	*	0.0	0.0	0.0	0.0	0.0	0.0
48	*	0.0	0.0	0.0	0.0	0.0	0.0
49	*	0.0	0.0	0.0	0.0	0.0	0.0
50	*	0.0	0.0	0.0	0.0	0.0	0.0
51	*	0.0	0.0	0.0	0.0	0.0	0.0
52	*	0.0	0.0	0.0	0.0	0.0	0.0
53	*	0.0	0.0	0.0	0.0	0.0	0.0
54	*	0.0	0.0	0.0	0.0	0.0	0.0
55	*	0.0	0.0	0.0	0.0	0.0	0.0
56	*	0.0	0.0	0.0	0.0	0.0	0.0
57	*	0.0	0.0	0.0	0.0	0.0	0.0
58	*	0.0	0.0	0.0	0.0	0.0	0.0
59	*	0.0	0.0	0.0	0.0	0.0	0.0
60	*	0.0	0.0	0.0	0.0	0.0	0.0

61	*	0.0	0.0	0.0	0.0	0.0	0.0
62	*	0.0	0.0	0.0	0.0	0.0	0.0
63	*	0.0	0.0	0.0	0.0	0.0	0.0
64	*	0.0	0.0	0.0	0.0	0.0	0.0
65	*	0.0	0.0	0.0	0.0	0.0	0.0
66	*	0.0	0.0	0.0	0.0	0.0	0.0
67	*	0.0	0.0	0.0	0.0	0.0	0.0
68	*	0.0	0.0	0.0	0.0	0.0	0.0
69	*	0.0	0.0	0.0	0.0	0.0	0.0
70	*	0.0	0.0	0.0	0.0	0.0	0.0
71	*	0.0	0.0	0.0	0.0	0.0	0.0
72	*	0.0	0.0	0.0	0.0	0.0	0.0
73	*	0.0	0.0	0.0	0.0	0.0	0.0

```
'I-287 I-20 TO SUBLETT 2028 LittleInt' 60 108 0 0 7 0.3048 1 1
'R1' 93152 863350 5.9
'R2' 95436 860443 5.9
'R3' 96650 858888 5.9
'R4' 91860 862989 5.9
'R5' 92851 862707 5.9
'R6' 93710 861886 5.9
'R7' 95318 859941 5.9
'2028 Little Int' 108 36 1 'C'
1
'NBFR P1-P2' 'AG' 97657 857510 95807 859908 1746 0.78 0 58
1
'NBFR P2-P3' 'AG' 95807 859908 94317 861811 1154 0.78 0 58
1
'NBFR P3-P4' 'AG' 94317 861811 93805 862470 1154 0.78 0 58
1
'NBFR P4-P5' 'AG' 93805 862470 93500 862857 1154 0.78 0 58
1
'NBFR P5-NBLRAP P1' 'AG' 93500 862857 93372 863022 1042 0.78 0 58
2
'NBLRAP P1-P2' 'AG' 93372 863022 93162 863261 0 38 3
   90 61 2.0 132 3.01 1748 2 1
2
'NBLRAP P2-P3' 'AG' 93162 863261 93034 863382 0 12 1
   90 61 2.0 132 3.01 1748 2 1
1
'NBLRLTUT P1-P2' 'AG' 93484 862848 93241 863136 113 1.34 0 12
1
'NBLRLTUT P2-P3' 'AG' 93241 863136 93093 863297 113 1.34 0 12
1
'NBLRLTUT P3-P4' 'AG' 93093 863297 93047 863317 113 1.34 0 12
1
'NBLRLTUT P4-P5' 'AG' 93047 863317 92982 863287 113 1.34 0 12
1
'NBLRLTUT P5-P6' 'AG' 92982 863287 92772 862920 113 1.34 0 12
1
'NBLRLTUT P6-P7' 'AG' 92772 862920 92765 862857 113 1.34 0 12
2
'NBLRLT P1-P2' 'AG' 93149 863258 93038 863366 0 12 1
   90 61 2.0 225 3.01 1681 2 1
2
'NBLRRT P1 -P2' 'AG' 93175 863268 93064 863389 0 12 1
   90 61 2.0 685 3.01 2787 2 1
1
'NBENTR P1-P2' 'AG' 95790 859895 95659 860046 592 0.78 0 32
1
'NBENTR P2-P3' 'AG' 95659 860046 95403 860335 592 0.78 0 32
1
'NBENTR P3-P4' 'DP' 95403 860335 94947 860889 592 0.78 -8 32
1
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'NBENTR P4-P5' 'AG' 94947 860889 94727 861148 592 0.78 0 32
1
'NBML P1-P2' 'AG' 97565 857467 94708 861138 3023 0.77 0 58
1
'NBML P2-P3' 'AG' 94708 861138 93753 862369 3614 0.77 0 58
1
'NBML P3-P4' 'AG' 93753 862369 93618 862536 3614 0.77 0 70
1
'NBML P4-P5' 'FL' 93618 862536 93464 862697 3614 0.77 2 70
1
'NBML P5-P6' 'FL' 93464 862697 93330 862818 3614 0.77 6 70
1
'NBML P6-P7' 'FL' 93330 862818 93172 862953 3614 0.77 10 70
1
'NBML P7-NBCD P8' 'FL' 93172 862953 92936 863130 3614 0.77 15 70
1
'NBCD P8-P9' 'BR' 92936 863130 92867 863169 3614 0.77 16 70
1
'NBCD P9-P10' 'BR' 92867 863169 92703 863287 2695 0.77 16 70
1
'NBCD P10-P11' 'FL' 92703 863287 92401 863510 2695 0.77 16 70
1
'NBCD P11-P12' 'FL' 92401 863510 92185 863694 2695 0.77 16 70
1
'NBDC P1-P2' 'BR' 92880 863195 92729 863320 920 0.78 16 12
1
'NBDC P2-P3' 'FL' 92729 863320 92598 863435 920 0.78 16 12
1
'NBDC P3-P4' 'FL' 92598 863435 92559 863478 920 0.78 16 12
1
'NBDC P4-P5' 'FL' 92559 863478 92519 863527 920 0.78 16 12
1
'NBDC P5-P6' 'FL' 92519 863527 92467 863622 920 0.78 16 12
1
'NBDC P6-P7' 'FL' 92467 863622 92431 863724 920 0.78 16 12
1
'NBDC P7-P8' 'FL' 92431 863724 92408 863861 920 0.78 16 12
1
'SBCD P1-P2' 'AG' 91883 863474 92060 863425 2478 0.78 0 58
1
'SBCD P2-P3' 'FL' 92060 863425 92283 863350 2478 0.78 12 58
1
'SBCD P3-P4' 'FL' 92283 863350 92532 863245 2478 0.78 14 58
1
'SBCD P4-P5' 'FL' 92532 863245 92670 863169 2478 0.78 15 58
1
'SBCD P5-P6' 'BR' 92670 863169 92887 863044 2478 0.78 15 58
1
'SBCD P6-SBML P7' 'FL' 92887 863044 93103 862900 2478 0.78 2 58
1

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'SBML P7-P8' 'DP' 93103 862900 93208 862808 2478 0.77 -2 58
1
'SBML P8-P9' 'AG' 93208 862808 93379 862648 3356 0.77 0 70
1
'SBML P9-P10' 'DP' 93379 862648 93553 862457 3356 0.77 -6 70
1
'SBML P10-P11' 'DP' 93553 862457 94373 861424 3356 0.77 -12 70
1
'SBML P11-P12' 'AG' 94373 861424 96505 858665 2590 0.77 0 58
1
'SBML P12-P13' 'AG' 96505 858665 97477 857421 2590 0.77 0 58
1
'SBDC P1-P2' 'BR' 92024 863563 92073 863484 878 0.78 32 12
1
'SBDC P2-P3' 'BR' 92073 863484 92158 863379 878 0.78 32 12
1
'SBDC P3-P4' 'BR' 92158 863379 92227 863314 878 0.78 32 12
1
'SBDC P4-P5' 'BR' 92227 863314 92313 863251 878 0.78 32 12
1
'SBDC P5-P6' 'BR' 92313 863251 92414 863195 878 0.78 20 12
1
'SBDC P6-P7' 'BR' 92414 863195 92897 862969 878 0.78 15 12
1
'SBDC P7-P8' 'FL' 92897 862969 93018 862907 878 0.78 2 12
1
'SBDC P8-P9' 'AG' 93018 862907 93113 862844 878 0.78 0 12
1
'SBDC P9-P10' 'DP' 93113 862844 93192 862789 878 0.78 -2 12
1
'SBEXR P1-P2' 'DP' 94350 861414 94475 861233 765 0.78 -12 32
1
'SBEXR P2-P3' 'DP' 94475 861233 94852 860705 765 0.78 -6 32
1
'SBEXR P3-P4' 'AG' 94852 860705 95226 860177 765 0.78 0 32
1
'SBENTR P1-P2' 'AG' 96538 858491 96692 858310 1127 0.78 0 32
1
'SBENTR P2-P3' 'AG' 96692 858310 97129 857802 1127 0.78 0 32
1
'SBENTR P3-P4' 'AG' 97129 857802 97313 857588 1127 0.78 0 32
1
'SBENTR P4-P5' 'AG' 97313 857588 97463 857411 1127 0.78 0 32
1
'SBFR P1-SBLRAP P1' 'AG' 91538 863140 91820 863064 1560 0.78 0 70
2
'SBLRAP P1-P2' 'AG' 91820 863064 92017 863038 0 26 2
   110 69 2.0 682 3.01 3539 2 1
2
'SBLRAP P2-P3' 'AG' 92017 863038 92204 863025 0 26 2
```

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   110 69 2.0 682 3.01 3539 2 1
2
'SBLRAP P3-P4' 'AG' 92204 863025 92358 863008 0 26 2
   110 69 2.0 682 3.01 3539 2 1
2
'SBLRAP P4-P5' 'AG' 92358 863008 92582 862933 0 26 2
   110 69 2.0 682 3.01 3539 2 1
1
'SBLRAP P5-SBFR P2' 'AG' 92582 862933 92834 862785 1326 0.78 0 46
1
'SBFR P2-P3' 'AG' 92834 862785 93241 862493 1326 0.78 0 46
1
'SBFR P3-P4' 'AG' 93241 862493 93392 862346 1326 0.78 0 46
1
'SBFR P4-P5' 'AG' 93392 862346 93631 862073 1326 0.78 0 46
1
'SBFR P5-P6' 'AG' 93631 862073 94586 860958 1326 0.78 0 46
1
'SBFR P6-P7' 'AG' 94586 860958 95206 860167 1326 0.78 0 46
1
'SBFR P7-P8' 'AG' 95206 860167 96519 858474 2246 0.78 0 58
1
'SBFR P8-P9' 'AG' 96519 858474 97388 857375 1119 0.78 0 58
2
'SBLRLT P1-P2' 'AG' 91870 863067 92004 863054 0 26 2
   110 69 2.0 735 3.01 3433 2 1
2
'SBLRLT P2-P3' 'AG' 92004 863054 92204 863054 0 26 2
   110 69 2.0 735 3.01 3433 2 1
2
'SBLRLT P3-P4' 'AG' 92204 863054 92349 863035 0 26 2
   110 69 2.0 735 3.01 3433 2 1
2
'SBLRLT P4-P5' 'AG' 92349 863035 92559 862966 0 26 2
   110 69 2.0 735 3.01 3433 2 1
2
'SBLRRT P1-P2' 'AG' 91863 863022 91994 863008 0 12 1
   110 69 2.0 143 3.01 1583 2 1
2
'SBLRRT P2-P3' 'AG' 91994 863008 92119 863008 0 12 1
   110 69 2.0 143 3.01 1583 2 1
2
'SBLRRT P3-P4' 'AG' 92119 863008 92267 863002 0 12 1
   110 69 2.0 143 3.01 1583 2 1
2
'SBLRRT P4-P5' 'AG' 92267 863002 92365 862982 0 12 1
   110 69 2.0 143 3.01 1583 2 1
2
'SBLRRT P5-P6' 'AG' 92365 862982 92536 862923 0 12 1
   110 69 2.0 143 3.01 1583 2 1
```

```
1
'WBLR P1-WBLRAP P2' 'AG' 93294 864016 93136 863786 1118 0.86 0 58
2
'WBLRAP P2-P3' 'AG' 93136 863786 92956 863491 0 38 3
   90 51 2.0 700 3.01 5085 2 1
1
'WBLRAP P3-WBLR P4' 'AG' 92956 863491 92890 863379 700 0.86 0 58
1
'WBLR P4-WBLRAP P5' 'AG' 92890 863379 92765 863169 1057 0.86 0 58
2
'WBLRAP P5-P6' 'AG' 92765 863169 92657 862962 0 38 3
   90 51 2.0 1057 3.01 5085 2 1
1
'WBLRAP P6-WBLR P7' 'AG' 92657 862962 92575 862821 1200 0.86 0 58
1
'WBLR P7-P8' 'AG' 92575 862821 92388 862438 1200 0.86 0 58
2
'WBLRLT P1-P2' 'AG' 93139 863747 92998 863517 0 12 1
   90 52 2.0 418 3.01 1770 2 1
2
'WBLRLT P2-P3' 'AG' 92998 863517 92916 863366 0 12 1
   90 52 2.0 418 3.01 1770 2 1
2
'WBLRLT P3-P4' 'AG' 92916 863366 92792 863153 0 12 1
   90 52 2.0 418 3.01 1770 2 1
2
'WBLRLT P4-P5' 'AG' 92792 863153 92683 862966 0 12 1
   90 52 2.0 418 3.01 1770 2 1
1
'EBLR P1-EBLRAP P2' 'AG' 92444 862415 92565 862657 1144 0.86 0 58
2
'EBLRAP P2-P3' 'AG' 92565 862657 92670 862841 0 38 3
    110 47 2.0 1144 3.01 4767 2 1
1
'EBLRAP P3-EBLR P4' 'AG' 92670 862841 92726 862943 1766 0.86 0 58
1
'EBLR P4-EBLRAP P5' 'AG' 92726 862943 92883 863228 1684 0.86 0 58
2
'EBLRAP P5-P6' 'AG' 92883 863228 92969 863373 0 38 3
   110 47 2.0 1684 3.01 4767 2 1
1
'EBLRAP P6-EBLR P7' 'AG' 92969 863373 93038 863491 2451 0.86 0 58
1
'EBLR P7-P8' 'AG' 93038 863491 93284 863881 2451 0.86 0 58
1
'EBLR P8-P9' 'AG' 93284 863881 93353 863986 2451 0.86 0 58
2
'EBLRLT P1-P2' 'AG' 92703 862949 92867 863241 0 12 1
   110 47 2.0 82 3.01 1522 2 1
2
```

```
'EBLRLT P2-P3' 'AG' 92867 863241 92939 863366 0 12 1
   110 47 2.0 82 3.01 1522 2 1
1 0 6 1000 1.7 'Y' 10 0 36
```

JOB: I-287 I-20 TO SUBLETT 2028 LittleInt RUN: 2028 Little Int

DATE : 12/16/19
TIME : 9:10:22

The MODE flag has been set to C for calculating CO averages.

SITE & METEOROLOGICAL VARIABLES

VS = 0.0 CM/S VD = 0.0 CM/S Z0 = 108. CM
U = 1.0 M/S CLAS = 6 (F) ATIM = 60. MINUTES MIXH = 1000. M AMB = 1.7 PPM

LINK VARIABLES

	LINK DESCRIPTION	*	LINK COORDINATES (FT) X1	Y1	X2	Y2	*	LENGTH (FT)	BRG (DEG)	TYPE	VPH	EF (G/MI)	H (FT)	W (FT)	V/C	QUEUE (VEH)
1.	NBFR P1-P2	*	97657.0	857510.0	95807.0	859908.0	*	3029.	322.	AG	1746.	0.8	0.0	58.0		
2.	NBFR P2-P3	*	95807.0	859908.0	94317.0	861811.0	*	2417.	322.	AG	1154.	0.8	0.0	58.0		
3.	NBFR P3-P4	*	94317.0	861811.0	93805.0	862470.0	*	834.	322.	AG	1154.	0.8	0.0	58.0		
4.	NBFR P4-P5	*	93805.0	862470.0	93500.0	862857.0	*	493.	322.	AG	1154.	0.8	0.0	58.0		
5.	NBFR P5-NBLRAP P1	*	93500.0	862857.0	93372.0	863022.0	*	209.	322.	AG	1042.	0.8	0.0	58.0		
6.	NBLRAP P1-P2	*	93372.0	863022.0	93362.0	863033.3	*	15.	319.	AG	16.	100.0	0.0	38.0	0.09	0.8
7.	NBLRAP P2-P3	*	93162.0	863261.1	93127.8	863293.4	*	47.	313.	AG	5.	100.0	0.0	12.0	0.27	2.4
8.	NBLRLTUT P1-P2	*	93484.0	862848.0	93241.0	863136.0	*	377.	320.	AG	113.	1.3	0.0	12.0		
9.	NBLRLTUT P2-P3	*	93241.0	863136.0	93093.0	863297.0	*	219.	317.	AG	113.	1.3	0.0	12.0		
10.	NBLRLTUT P3-P4	*	93093.0	863297.0	93047.0	863317.0	*	50.	293.	AG	113.	1.3	0.0	12.0		
11.	NBLRLTUT P4-P5	*	93047.0	863317.0	92982.0	863287.0	*	72.	245.	AG	113.	1.3	0.0	12.0		
12.	NBLRLTUT P5-P6	*	92982.0	863287.0	92772.0	862920.1	*	423.	210.	AG	113.	1.3	0.0	12.0		

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      13. NBLRLTUT P6-P7      *  92772.0  862920.1   92765.0  862857.0 *      63.
186. AG    113.   1.3   0.0 12.0
      14. NBLRLT P1-P2        *  93149.0  863258.0   93088.2  863317.2 *      85.
314. AG      5. 100.0   0.0 12.0 0.48   4.3
      15. NBLRRT P1 -P2       *  93175.0  863268.0   92981.5  863478.9 *     286.
317. AG      5. 100.0   0.0 12.0 0.89  14.5
      16. NBENTR P1-P2        *  95790.0  859895.0   95659.0  860046.0 *     200.
319. AG    592.   0.8   0.0 32.0
      17. NBENTR P2-P3        *  95659.0  860046.0   95403.0  860335.1 *     386.
318. AG    592.   0.8   0.0 32.0
      18. NBENTR P3-P4        *  95403.0  860335.1   94947.0  860889.0 *     717.
321. DP    592.   0.8  -8.0 32.0
      19. NBENTR P4-P5        *  94947.0  860889.0   94727.0  861148.0 *     340.
320. AG    592.   0.8   0.0 32.0
      20. NBML P1-P2          *  97565.0  857467.0   94708.0  861138.0 *    4652.
322. AG   3023.   0.8   0.0 58.0
      21. NBML P2-P3          *  94708.0  861138.0   93753.0  862369.0 *    1558.
322. AG   3614.   0.8   0.0 58.0
      22. NBML P3-P4          *  93753.0  862369.0   93618.0  862536.0 *     215.
321. AG   3614.   0.8   0.0 70.0
      23. NBML P4-P5          *  93618.0  862536.0   93464.0  862697.1 *     223.
316. FL   3614.   0.8   2.0 70.0
      24. NBML P5-P6          *  93464.0  862697.1   93330.0  862818.0 *     181.
312. FL   3614.   0.8   6.0 70.0
      25. NBML P6-P7          *  93330.0  862818.0   93172.0  862953.0 *     208.
310. FL   3614.   0.8  10.0 70.0
      26. NBML P7-NBCD P8     *  93172.0  862953.0   92936.0  863130.0 *     295.
307. FL   3614.   0.8  15.0 70.0
      27. NBCD P8-P9          *  92936.0  863130.0   92867.0  863169.0 *      79.
299. BR   3614.   0.8  16.0 70.0
      28. NBCD P9-P10         *  92867.0  863169.0   92703.0  863287.0 *     202.
306. BR   2695.   0.8  16.0 70.0
      29. NBCD P10-P11        *  92703.0  863287.0   92401.0  863510.0 *     375.
306. FL   2695.   0.8  16.0 70.0
      30. NBCD P11-P12        *  92401.0  863510.0   92185.0  863694.0 *     284.
310. FL   2695.   0.8  16.0 70.0
      31. NBDC P1-P2          *  92880.0  863195.0   92729.0  863320.0 *     196.
310. BR    920.   0.8  16.0 12.0
      32. NBDC P2-P3          *  92729.0  863320.0   92598.0  863435.0 *     174.
311. FL    920.   0.8  16.0 12.0
      33. NBDC P3-P4          *  92598.0  863435.0   92559.0  863478.0 *      58.
318. FL    920.   0.8  16.0 12.0
      34. NBDC P4-P5          *  92559.0  863478.0   92519.0  863527.0 *      63.
321. FL    920.   0.8  16.0 12.0
      35. NBDC P5-P6          *  92519.0  863527.0   92467.0  863622.1 *     108.
331. FL    920.   0.8  16.0 12.0
      36. NBDC P6-P7          *  92467.0  863622.1   92431.0  863724.1 *     108.
341. FL    920.   0.8  16.0 12.0
      37. NBDC P7-P8          *  92431.0  863724.1   92408.0  863861.0 *     139.
350. FL    920.   0.8  16.0 12.0
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      38. SBCD P1-P2          *  91883.0  863474.0   92060.0  863425.0 *     184.
105. AG   2478.   0.8   0.0 58.0
      39. SBCD P2-P3          *  92060.0  863425.0   92283.0  863350.1 *     235.
109. FL   2478.   0.8  12.0 58.0
      40. SBCD P3-P4          *  92283.0  863350.1   92532.0  863245.1 *     270.
113. FL   2478.   0.8  14.0 58.0
      41. SBCD P4-P5          *  92532.0  863245.1   92670.0  863169.0 *     158.
119. FL   2478.   0.8  15.0 58.0
      42. SBCD P5-P6          *  92670.0  863169.0   92887.0  863044.0 *     250.
120. BR   2478.   0.8  15.0 58.0
      43. SBCD P6-SBML P7     *  92887.0  863044.0   93103.0  862900.1 *     260.
124. FL   2478.   0.8   2.0 58.0
      44. SBML P7-P8          *  93103.0  862900.1   93208.0  862808.0 *     140.
131. DP   2478.   0.8  -2.0 58.0
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      JOB: I-287 I-20 TO SUBLETT 2028 LittleInt                RUN: 2028 Little
Int

      DATE : 12/16/19
      TIME :  9:10:22

       LINK VARIABLES
       --------------
         LINK DESCRIPTION     *         LINK COORDINATES (FT)          *    LENGTH
BRG TYPE   VPH    EF      H   W    V/C QUEUE
                               *   X1        Y1        X2        Y2     *     (FT)
(DEG)           (G/MI)  (FT) (FT)       (VEH)

------------------------*----------------------------------------*----------------
----------------------------------------
      45. SBML P8-P9          *  93208.0  862808.0   93379.0  862648.1 *     234.
133. AG   3356.   0.8   0.0 70.0
      46. SBML P9-P10         *  93379.0  862648.1   93553.0  862457.0 *     258.
138. DP   3356.   0.8  -6.0 70.0
      47. SBML P10-P11        *  93553.0  862457.0   94373.0  861424.0 *    1319.
142. DP   3356.   0.8 -12.0 70.0
      48. SBML P11-P12        *  94373.0  861424.0   96505.0  858665.0 *    3487.
142. AG   2590.   0.8   0.0 58.0
      49. SBML P12-P13        *  96505.0  858665.0   97477.0  857421.0 *    1579.
142. AG   2590.   0.8   0.0 58.0
      50. SBDC P1-P2          *  92024.0  863563.0   92073.0  863484.1 *      93.
148. BR    878.   0.8  32.0 12.0
      51. SBDC P2-P3          *  92073.0  863484.1   92158.0  863379.1 *     135.
141. BR    878.   0.8  32.0 12.0
      52. SBDC P3-P4          *  92158.0  863379.1   92227.0  863314.1 *      95.
133. BR    878.   0.8  32.0 12.0
      53. SBDC P4-P5          *  92227.0  863314.1   92313.0  863251.0 *     107.
126. BR    878.   0.8  32.0 12.0
      54. SBDC P5-P6          *  92313.0  863251.0   92414.0  863195.0 *     115.
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119. BR    878.   0.8  20.0 12.0
      55. SBDC P6-P7          *  92414.0  863195.0   92897.0  862969.1 *     533.
115. BR    878.   0.8  15.0 12.0
      56. SBDC P7-P8          *  92897.0  862969.1   93018.0  862907.0 *     136.
117. FL    878.   0.8   2.0 12.0
      57. SBDC P8-P9          *  93018.0  862907.0   93113.0  862844.0 *     114.
124. AG    878.   0.8   0.0 12.0
      58. SBDC P9-P10         *  93113.0  862844.0   93192.0  862789.0 *      96.
125. DP    878.   0.8  -2.0 12.0
      59. SBEXR P1-P2         *  94350.0  861414.0   94475.0  861233.0 *     220.
145. DP    765.   0.8 -12.0 32.0
      60. SBEXR P2-P3         *  94475.0  861233.0   94852.0  860705.0 *     649.
144. DP    765.   0.8  -6.0 32.0
      61. SBEXR P3-P4         *  94852.0  860705.0   95226.0  860177.0 *     647.
145. AG    765.   0.8   0.0 32.0
      62. SBENTR P1-P2        *  96538.0  858491.0   96692.0  858310.0 *     238.
140. AG   1127.   0.8   0.0 32.0
      63. SBENTR P2-P3        *  96692.0  858310.0   97129.0  857802.0 *     670.
139. AG   1127.   0.8   0.0 32.0
      64. SBENTR P3-P4        *  97129.0  857802.0   97313.0  857588.0 *     282.
139. AG   1127.   0.8   0.0 32.0
      65. SBENTR P4-P5        *  97313.0  857588.0   97463.0  857411.0 *     232.
140. AG   1127.   0.8   0.0 32.0
      66. SBFR P1-SBLRAP P1   *  91538.0  863140.0   91820.0  863064.0 *     292.
105. AG   1560.   0.8   0.0 70.0
      67. SBLRAP P1-P2        *  91820.0  863064.0   91952.1  863046.6 *     133.
 97. AG     10. 100.0   0.0 26.0 0.29   6.8
      68. SBLRAP P2-P3        *  92017.0  863038.1   92149.9  863028.8 *     133.
 94. AG     10. 100.0   0.0 26.0 0.29   6.8
      69. SBLRAP P3-P4        *  92204.0  863025.0   92336.4  863010.4 *     133.
 96. AG     10. 100.0   0.0 26.0 0.29   6.8
      70. SBLRAP P4-P5        *  92358.0  863008.0   92484.3  862965.7 *     133.
109. AG     10. 100.0   0.0 26.0 0.29   6.8
      71. SBLRAP P5-SBFR P2   *  92582.0  862933.0   92834.0  862785.0 *     292.
120. AG   1326.   0.8   0.0 46.0
      72. SBFR P2-P3          *  92834.0  862785.0   93241.0  862493.0 *     501.
126. AG   1326.   0.8   0.0 46.0
      73. SBFR P3-P4          *  93241.0  862493.0   93392.0  862346.0 *     211.
134. AG   1326.   0.8   0.0 46.0
      74. SBFR P4-P5          *  93392.0  862346.0   93631.0  862073.0 *     363.
139. AG   1326.   0.8   0.0 46.0
      75. SBFR P5-P6          *  93631.0  862073.0   94586.0  860958.0 *    1468.
139. AG   1326.   0.8   0.0 46.0
      76. SBFR P6-P7          *  94586.0  860958.0   95206.0  860167.0 *    1005.
142. AG   1326.   0.8   0.0 46.0
      77. SBFR P7-P8          *  95206.0  860167.0   96519.0  858474.0 *    2142.
142. AG   2246.   0.8   0.0 58.0
      78. SBFR P8-P9          *  96519.0  858474.0   97388.0  857375.0 *    1401.
142. AG   1119.   0.8   0.0 58.0
      79. SBLRLT P1-P2        *  91870.0  863067.0   92013.8  863053.1 *     144.
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 96. AG     10. 100.0   0.0 26.0 0.32   7.3
      80. SBLRLT P2-P3        *  92004.0  863054.1   92148.4  863054.1 *     144.
 90. AG     10. 100.0   0.0 26.0 0.32   7.3
      81. SBLRLT P3-P4        *  92204.0  863054.1   92347.2  863035.2 *     144.
 97. AG     10. 100.0   0.0 26.0 0.32   7.3
      82. SBLRLT P4-P5        *  92349.0  863035.0   92486.2  862989.9 *     144.
108. AG     10. 100.0   0.0 26.0 0.32   7.3
      83. SBLRRT P1-P2        *  91863.0  863022.0   91918.4  863016.1 *      56.
 96. AG      5. 100.0   0.0 12.0 0.27   2.8
      84. SBLRRT P2-P3        *  91994.0  863008.0   92049.7  863008.0 *      56.
 90. AG      5. 100.0   0.0 12.0 0.27   2.8
      85. SBLRRT P3-P4        *  92119.0  863008.0   92174.7  863005.8 *      56.
 92. AG      5. 100.0   0.0 12.0 0.27   2.8
      86. SBLRRT P4-P5        *  92267.0  863002.0   92321.6  862990.8 *      56.
102. AG      5. 100.0   0.0 12.0 0.27   2.8
      87. SBLRRT P5-P6        *  92365.0  862982.0   92417.7  862963.8 *      56.
109. AG      5. 100.0   0.0 12.0 0.27   2.8
      88. WBLR P1-WBLRAP P2   *  93294.0  864016.1   93136.0  863786.0 *     279.
214. AG   1118.   0.9   0.0 58.0
      89. WBLRAP P2-P3        *  93136.0  863786.0   93102.2  863730.5 *      65.
211. AG     14. 100.0   0.0 38.0 0.12   3.3
      90. WBLRAP P3-WBLR P4   *  92956.0  863491.0   92890.0  863379.1 *     130.
211. AG    700.   0.9   0.0 58.0
      91. WBLR P4-WBLRAP P5   *  92890.0  863379.1   92765.0  863169.0 *     244.
211. AG   1057.   0.9   0.0 58.0
      92. WBLRAP P5-P6        *  92765.0  863169.0   92719.6  863081.9 *      98.
208. AG     14. 100.0   0.0 38.0 0.18   5.0
      93. WBLRAP P6-WBLR P7   *  92657.0  862962.0   92575.0  862821.0 *     163.
210. AG   1200.   0.9   0.0 58.0
      94. WBLR P7-P8          *  92575.0  862821.0   92388.0  862438.0 *     426.
206. AG   1200.   0.9   0.0 58.0
      95. WBLRLT P1-P2        *  93139.0  863747.0   93075.2  863643.1 *     122.
212. AG      5. 100.0   0.0 12.0 0.63   6.2
```


JOB: I-287 I-20 TO SUBLETT 2028 LittleInt RUN: 2028 Little Int

DATE : 12/16/19
TIME : 9:10:22

LINK VARIABLES

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  LINK DESCRIPTION     *         LINK COORDINATES (FT)          *    LENGTH
BRG TYPE   VPH    EF      H   W    V/C QUEUE
                       *   X1        Y1        X2        Y2     *     (FT)
(DEG)           (G/MI)  (FT) (FT)       (VEH)

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      96. WBLRLT P2-P3        *  92998.0  863517.1   92939.8  863409.9 *     122.
209. AG      5. 100.0   0.0 12.0 0.63   6.2
      97. WBLRLT P3-P4        *  92916.0  863366.0   92854.6  863260.6 *     122.
210. AG      5. 100.0   0.0 12.0 0.63   6.2
      98. WBLRLT P4-P5        *  92792.0  863153.0   92730.6  863047.6 *     122.
210. AG      5. 100.0   0.0 12.0 0.63   6.2
      99. EBLR P1-EBLRAP P2   *  92444.0  862415.0   92565.0  862657.0 *     271.
 27. AG   1144.   0.9   0.0 58.0
     100. EBLRAP P2-P3        *  92565.0  862657.0   92613.5  862742.1 *      98.
 30. AG     10. 100.0   0.0 38.0 0.15   5.0
     101. EBLRAP P3-EBLR P4   *  92670.0  862841.0   92726.0  862943.0 *     116.
 29. AG   1766.   0.9   0.0 58.0
     102. EBLR P4-EBLRAP P5   *  92726.0  862943.0   92883.0  863228.0 *     325.
 29. AG   1684.   0.9   0.0 58.0
     103. EBLRAP P5-P6        *  92883.0  863228.0   92956.6  863352.0 *     144.
 31. AG     10. 100.0   0.0 38.0 0.22   7.3
     104. EBLRAP P6-EBLR P7   *  92969.0  863373.0   93038.0  863491.0 *     137.
 30. AG   2451.   0.9   0.0 58.0
     105. EBLR P7-P8          *  93038.0  863491.0   93284.0  863881.0 *     461.
 32. AG   2451.   0.9   0.0 58.0
     106. EBLR P8-P9          *  93284.0  863881.0   93353.0  863986.0 *     126.
 33. AG   2451.   0.9   0.0 58.0
     107. EBLRLT P1-P2        *  92703.0  862949.0   92713.3  862967.3 *      21.
 29. AG      3. 100.0   0.0 12.0 0.10   1.1
     108. EBLRLT P2-P3        *  92867.0  863241.1   92877.5  863259.3 *      21.
 30. AG      3. 100.0   0.0 12.0 0.10   1.1
```


DATE : 12/16/19
TIME : 9:10:22

ADDITIONAL QUEUE LINK PARAMETERS

LINK DESCRIPTION	*	CYCLE LENGTH (SEC)	RED TIME (SEC)	CLEARANCE LOST TIME (SEC)	APPROACH VOL (VPH)	SATURATION FLOW RATE (VPH)	IDLE EM FAC (gm/hr)	SIGNAL TYPE	ARRIVAL RATE
6. NBLRAP P1-P2	*	90	61	2.0	132	1748	3.01	2	1
7. NBLRAP P2-P3	*	90	61	2.0	132	1748	3.01	2	1
14. NBLRLT P1-P2	*	90	61	2.0	225	1681			

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3.01      2        1
    15. NBLRRT P1 -P2       *      90       61       2.0       685       2787
3.01      2        1
    67. SBLRAP P1-P2        *     110       69       2.0       682       3539
3.01      2        1
    68. SBLRAP P2-P3        *     110       69       2.0       682       3539
3.01      2        1
    69. SBLRAP P3-P4        *     110       69       2.0       682       3539
3.01      2        1
    70. SBLRAP P4-P5        *     110       69       2.0       682       3539
3.01      2        1
    79. SBLRLT P1-P2        *     110       69       2.0       735       3433
3.01      2        1
    80. SBLRLT P2-P3        *     110       69       2.0       735       3433
3.01      2        1
    81. SBLRLT P3-P4        *     110       69       2.0       735       3433
3.01      2        1
    82. SBLRLT P4-P5        *     110       69       2.0       735       3433
3.01      2        1
    83. SBLRRT P1-P2        *     110       69       2.0       143       1583
3.01      2        1
    84. SBLRRT P2-P3        *     110       69       2.0       143       1583
3.01      2        1
    85. SBLRRT P3-P4        *     110       69       2.0       143       1583
3.01      2        1
    86. SBLRRT P4-P5        *     110       69       2.0       143       1583
3.01      2        1
    87. SBLRRT P5-P6        *     110       69       2.0       143       1583
3.01      2        1
    89. WBLRAP P2-P3        *      90       51       2.0       700       5085
3.01      2        1
    92. WBLRAP P5-P6        *      90       51       2.0      1057       5085
3.01      2        1
    95. WBLRLT P1-P2        *      90       52       2.0       418       1770
3.01      2        1
    96. WBLRLT P2-P3        *      90       52       2.0       418       1770
3.01      2        1
    97. WBLRLT P3-P4        *      90       52       2.0       418       1770
3.01      2        1
    98. WBLRLT P4-P5        *      90       52       2.0       418       1770
3.01      2        1
   100. EBLRAP P2-P3        *     110       47       2.0      1144       4767
3.01      2        1
   103. EBLRAP P5-P6        *     110       47       2.0      1684       4767
3.01      2        1
   107. EBLRLT P1-P2        *     110       47       2.0        82       1522
3.01      2        1
   108. EBLRLT P2-P3        *     110       47       2.0        82       1522
3.01      2        1
```

RECEPTOR LOCATIONS

RECEPTOR	COORDINATES (FT) X	Y	Z
1. R1	93152.0	863350.1	5.9
2. R2	95436.0	860443.0	5.9
3. R3	96650.0	858888.0	5.9
4. R4	91860.0	862989.1	5.9
5. R5	92851.0	862707.0	5.9
6. R6	93710.0	861886.0	5.9
7. R7	95318.0	859941.0	5.9

MODEL RESULTS

REMARKS : In search of the angle corresponding to the maximum concentration, only the first angle, of the angles with same maximum concentrations, is indicated as maximum.

WIND ANGLE RANGE: 0.-360.

WIND ANGLE (DEGR)	CONCENTRATION (PPM) REC1	REC2	REC3	REC4	REC5	REC6	REC7
0.	1.7	1.7	1.7	1.7	1.7	1.7	1.8
10.	1.7	1.7	1.7	1.7	1.7	1.7	1.8
20.	1.7	1.7	1.7	1.7	1.7	1.7	1.8
30.	1.7	1.7	1.7	1.7	1.7	1.7	1.7
40.	1.7	1.7	1.7	1.7	1.7	1.7	1.7
50.	1.7	1.7	1.7	1.7	1.7	1.7	1.7
60.	1.7	1.7	1.7	1.7	1.7	1.7	1.7
70.	1.7	1.7	1.7	1.7	1.7	1.7	1.7
80.	1.7	1.7	1.7	1.7	1.7	1.7	1.7
90.	1.7	1.7	1.7	1.7	1.7	1.7	1.8
100.	1.7	1.7	1.7	1.7	1.7	1.7	1.8
110.	1.7	1.7	1.7	1.7	1.7	1.7	1.8
120.	1.7	1.7	1.7	1.7	1.7	1.7	1.8
130.	1.7	1.7	1.7	1.7	1.7	1.8	2.0
140.	1.7	1.7	1.7	1.7	1.7	1.7	1.8
150.	1.7	1.9	1.9	1.7	1.7	1.7	1.7
160.	1.7	1.9	1.9	1.7	1.7	1.7	1.7
170.	1.7	1.8	1.9	1.7	1.7	1.7	1.7
180.	1.7	1.7	1.8	1.7	1.7	1.7	1.7

190.	*	1.7	1.7	1.7	1.7	1.7	1.7	1.7
200.	*	1.7	1.7	1.7	1.7	1.7	1.7	1.7
210.	*	1.7	1.7	1.7	1.7	1.7	1.7	1.7
220.	*	1.7	1.7	1.7	1.7	1.7	1.7	1.7
230.	*	1.7	1.7	1.7	1.7	1.7	1.7	1.7
240.	*	1.7	1.7	1.7	1.7	1.7	1.7	1.7
250.	*	1.7	1.7	1.7	1.7	1.7	1.7	1.7
260.	*	1.7	1.7	1.7	1.7	1.7	1.7	1.7
270.	*	1.7	1.7	1.7	1.7	1.7	1.7	1.7
280.	*	1.7	1.7	1.7	1.7	1.7	1.7	1.7
290.	*	1.7	1.8	1.9	1.7	1.7	1.7	1.7
300.	*	1.7	1.8	1.9	1.7	1.7	1.7	1.7
310.	*	1.7	1.9	2.0	1.7	1.7	1.7	1.7
320.	*	1.7	1.8	1.9	1.7	1.7	1.7	1.7
330.	*	1.7	1.7	1.7	1.7	1.7	1.7	1.8
340.	*	1.7	1.7	1.7	1.7	1.7	1.7	1.9
350.	*	1.7	1.7	1.7	1.7	1.7	1.7	1.8
360.	*	1.7	1.7	1.7	1.7	1.7	1.7	1.8
MAX	*	1.7	1.9	2.0	1.7	1.7	1.8	2.0
DEGR.	*	0	150	310	0	0	130	130

THE HIGHEST CONCENTRATION OF 2.00 PPM OCCURRED AT RECEPTOR REC7 .

DATE : 12/16/19
TIME : 9:10:22

RECEPTOR - LINK MATRIX FOR THE ANGLE PRODUCING
THE MAXIMUM CONCENTRATION FOR EACH RECEPTOR

		CO/LINK (PPM) ANGLE (DEGREES)						
		REC1	REC2	REC3	REC4	REC5	REC6	REC7
LINK #	*	0	150	310	0	0	130	130
1	*	0.0	0.0	0.1	0.0	0.0	0.0	0.0
2	*	0.0	0.1	0.0	0.0	0.0	0.0	0.0
3	*	0.0	0.0	0.0	0.0	0.0	0.0	0.0
4	*	0.0	0.0	0.0	0.0	0.0	0.0	0.0
5	*	0.0	0.0	0.0	0.0	0.0	0.0	0.0
6	*	0.0	0.0	0.0	0.0	0.0	0.0	0.0
7	*	0.0	0.0	0.0	0.0	0.0	0.0	0.0
8	*	0.0	0.0	0.0	0.0	0.0	0.0	0.0
9	*	0.0	0.0	0.0	0.0	0.0	0.0	0.0
10	*	0.0	0.0	0.0	0.0	0.0	0.0	0.0

11	*	0.0	0.0	0.0	0.0	0.0	0.0	0.0
12	*	0.0	0.0	0.0	0.0	0.0	0.0	0.0
13	*	0.0	0.0	0.0	0.0	0.0	0.0	0.0
14	*	0.0	0.0	0.0	0.0	0.0	0.0	0.0
15	*	0.0	0.0	0.0	0.0	0.0	0.0	0.0
16	*	0.0	0.0	0.0	0.0	0.0	0.0	0.0
17	*	0.0	0.0	0.0	0.0	0.0	0.0	0.0
18	*	0.0	0.0	0.0	0.0	0.0	0.0	0.0
19	*	0.0	0.0	0.0	0.0	0.0	0.0	0.0
20	*	0.0	0.1	0.1	0.0	0.0	0.0	0.1
21	*	0.0	0.0	0.0	0.0	0.0	0.0	0.0
22	*	0.0	0.0	0.0	0.0	0.0	0.0	0.0
23	*	0.0	0.0	0.0	0.0	0.0	0.0	0.0
24	*	0.0	0.0	0.0	0.0	0.0	0.0	0.0
25	*	0.0	0.0	0.0	0.0	0.0	0.0	0.0
26	*	0.0	0.0	0.0	0.0	0.0	0.0	0.0
27	*	0.0	0.0	0.0	0.0	0.0	0.0	0.0
28	*	0.0	0.0	0.0	0.0	0.0	0.0	0.0
29	*	0.0	0.0	0.0	0.0	0.0	0.0	0.0
30	*	0.0	0.0	0.0	0.0	0.0	0.0	0.0
31	*	0.0	0.0	0.0	0.0	0.0	0.0	0.0
32	*	0.0	0.0	0.0	0.0	0.0	0.0	0.0
33	*	0.0	0.0	0.0	0.0	0.0	0.0	0.0
34	*	0.0	0.0	0.0	0.0	0.0	0.0	0.0
35	*	0.0	0.0	0.0	0.0	0.0	0.0	0.0
36	*	0.0	0.0	0.0	0.0	0.0	0.0	0.0
37	*	0.0	0.0	0.0	0.0	0.0	0.0	0.0
38	*	0.0	0.0	0.0	0.0	0.0	0.0	0.0
39	*	0.0	0.0	0.0	0.0	0.0	0.0	0.0
40	*	0.0	0.0	0.0	0.0	0.0	0.0	0.0
41	*	0.0	0.0	0.0	0.0	0.0	0.0	0.0
42	*	0.0	0.0	0.0	0.0	0.0	0.0	0.0
43	*	0.0	0.0	0.0	0.0	0.0	0.0	0.0
44	*	0.0	0.0	0.0	0.0	0.0	0.0	0.0
45	*	0.0	0.0	0.0	0.0	0.0	0.0	0.0

		CO/LINK (PPM)						
		ANGLE (DEGREES)						
		REC1	REC2	REC3	REC4	REC5	REC6	REC7
LINK #	*	0	150	310	0	0	130	130
46	*	0.0	0.0	0.0	0.0	0.0	0.0	0.0
47	*	0.0	0.0	0.0	0.0	0.0	0.0	0.0
48	*	0.0	0.0	0.1	0.0	0.0	0.0	0.1
49	*	0.0	0.0	0.0	0.0	0.0	0.0	0.0
50	*	0.0	0.0	0.0	0.0	0.0	0.0	0.0

51	*	0.0	0.0	0.0	0.0	0.0	0.0	0.0
52	*	0.0	0.0	0.0	0.0	0.0	0.0	0.0
53	*	0.0	0.0	0.0	0.0	0.0	0.0	0.0
54	*	0.0	0.0	0.0	0.0	0.0	0.0	0.0
55	*	0.0	0.0	0.0	0.0	0.0	0.0	0.0
56	*	0.0	0.0	0.0	0.0	0.0	0.0	0.0
57	*	0.0	0.0	0.0	0.0	0.0	0.0	0.0
58	*	0.0	0.0	0.0	0.0	0.0	0.0	0.0
59	*	0.0	0.0	0.0	0.0	0.0	0.0	0.0
60	*	0.0	0.0	0.0	0.0	0.0	0.0	0.0
61	*	0.0	0.0	0.0	0.0	0.0	0.0	0.0
62	*	0.0	0.0	0.0	0.0	0.0	0.0	0.0
63	*	0.0	0.0	0.0	0.0	0.0	0.0	0.0
64	*	0.0	0.0	0.0	0.0	0.0	0.0	0.0
65	*	0.0	0.0	0.0	0.0	0.0	0.0	0.0
66	*	0.0	0.0	0.0	0.0	0.0	0.0	0.0
67	*	0.0	0.0	0.0	0.0	0.0	0.0	0.0
68	*	0.0	0.0	0.0	0.0	0.0	0.0	0.0
69	*	0.0	0.0	0.0	0.0	0.0	0.0	0.0
70	*	0.0	0.0	0.0	0.0	0.0	0.0	0.0
71	*	0.0	0.0	0.0	0.0	0.0	0.0	0.0
72	*	0.0	0.0	0.0	0.0	0.0	0.0	0.0
73	*	0.0	0.0	0.0	0.0	0.0	0.0	0.0
74	*	0.0	0.0	0.0	0.0	0.0	0.0	0.0
75	*	0.0	0.0	0.0	0.0	0.0	0.1	0.0
76	*	0.0	0.0	0.0	0.0	0.0	0.0	0.0
77	*	0.0	0.0	0.0	0.0	0.0	0.0	0.1
78	*	0.0	0.0	0.0	0.0	0.0	0.0	0.0
79	*	0.0	0.0	0.0	0.0	0.0	0.0	0.0
80	*	0.0	0.0	0.0	0.0	0.0	0.0	0.0
81	*	0.0	0.0	0.0	0.0	0.0	0.0	0.0
82	*	0.0	0.0	0.0	0.0	0.0	0.0	0.0
83	*	0.0	0.0	0.0	0.0	0.0	0.0	0.0
84	*	0.0	0.0	0.0	0.0	0.0	0.0	0.0
85	*	0.0	0.0	0.0	0.0	0.0	0.0	0.0
86	*	0.0	0.0	0.0	0.0	0.0	0.0	0.0
87	*	0.0	0.0	0.0	0.0	0.0	0.0	0.0
88	*	0.0	0.0	0.0	0.0	0.0	0.0	0.0
89	*	0.0	0.0	0.0	0.0	0.0	0.0	0.0
90	*	0.0	0.0	0.0	0.0	0.0	0.0	0.0
91	*	0.0	0.0	0.0	0.0	0.0	0.0	0.0
92	*	0.0	0.0	0.0	0.0	0.0	0.0	0.0
93	*	0.0	0.0	0.0	0.0	0.0	0.0	0.0
94	*	0.0	0.0	0.0	0.0	0.0	0.0	0.0
95	*	0.0	0.0	0.0	0.0	0.0	0.0	0.0
96	*	0.0	0.0	0.0	0.0	0.0	0.0	0.0
97	*	0.0	0.0	0.0	0.0	0.0	0.0	0.0
98	*	0.0	0.0	0.0	0.0	0.0	0.0	0.0

	*	CO/LINK (PPM) ANGLE (DEGREES)						
	*	REC1	REC2	REC3	REC4	REC5	REC6	REC7
LINK #	*	0	150	310	0	0	130	130
99	*	0.0	0.0	0.0	0.0	0.0	0.0	0.0
100	*	0.0	0.0	0.0	0.0	0.0	0.0	0.0
101	*	0.0	0.0	0.0	0.0	0.0	0.0	0.0
102	*	0.0	0.0	0.0	0.0	0.0	0.0	0.0
103	*	0.0	0.0	0.0	0.0	0.0	0.0	0.0
104	*	0.0	0.0	0.0	0.0	0.0	0.0	0.0
105	*	0.0	0.0	0.0	0.0	0.0	0.0	0.0
106	*	0.0	0.0	0.0	0.0	0.0	0.0	0.0
107	*	0.0	0.0	0.0	0.0	0.0	0.0	0.0
108	*	0.0	0.0	0.0	0.0	0.0	0.0	0.0

```
'I-287 I-20 TO SUBLETT 2045 LittleInt' 60 108 0 0 7 0.3048 1 1
'R1' 93152 863350 5.9
'R2' 95436 860443 5.9
'R3' 96650 858888 5.9
'R4' 91860 862989 5.9
'R5' 92851 862707 5.9
'R6' 93710 861886 5.9
'R7' 95318 859941 5.9
'2045 Little Int' 108 36 1 'C'
1
'NBFR P1-P2' 'AG' 97657 857510 95807 859908 2241 0.43 0 58
1
'NBFR P2-P3' 'AG' 95807 859908 94317 861811 1484 0.43 0 58
1
'NBFR P3-P4' 'AG' 94317 861811 93805 862470 1484 0.43 0 58
1
'NBFR P4-P5' 'AG' 93805 862470 93500 862857 1484 0.43 0 58
1
'NBFR P5-NBLRAP P1' 'AG' 93500 862857 93372 863022 1339 0.43 0 58
2
'NBLRAP P1-P2' 'AG' 93372 863022 93162 863261 0 38 3
   90 61 2.0 165 1.49 1748 2 1
2
'NBLRAP P2-P3' 'AG' 93162 863261 93034 863382 0 12 1
   90 61 2.0 165 1.49 1748 2 1
1
'NBLRLTUT P1-P2' 'AG' 93484 862848 93241 863136 146 0.72 0 12
1
'NBLRLTUT P2-P3' 'AG' 93241 863136 93093 863297 146 0.72 0 12
1
'NBLRLTUT P3-P4' 'AG' 93093 863297 93047 863317 146 0.72 0 12
1
'NBLRLTUT P4-P5' 'AG' 93047 863317 92982 863287 146 0.72 0 12
1
'NBLRLTUT P5-P6' 'AG' 92982 863287 92772 862920 146 0.72 0 12
1
'NBLRLTUT P6-P7' 'AG' 92772 862920 92765 862857 146 0.72 0 12
2
'NBLRLT P1-P2' 'AG' 93149 863258 93038 863366 0 12 1
   90 61 2.0 291 1.49 1681 2 1
2
'NBLRRT P1 -P2' 'AG' 93175 863268 93064 863389 0 12 1
   90 61 2.0 883 1.49 2787 2 1
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'NBENTR P1-P2' 'AG' 95790 859895 95659 860046 757 0.43 0 32
1
'NBENTR P2-P3' 'AG' 95659 860046 95403 860335 757 0.43 0 32
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'NBENTR P3-P4' 'DP' 95403 860335 94947 860889 757 0.43 -8 32
1
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'NBENTR P4-P5' 'AG' 94947 860889 94727 861148 757 0.43 0 32
1
'NBML P1-P2' 'AG' 97565 857467 94708 861138 3880 0.45 0 58
1
'NBML P2-P3' 'AG' 94708 861138 93753 862369 4637 0.45 0 58
1
'NBML P3-P4' 'AG' 93753 862369 93618 862536 4637 0.45 0 70
1
'NBML P4-P5' 'FL' 93618 862536 93464 862697 4637 0.45 2 70
1
'NBML P5-P6' 'FL' 93464 862697 93330 862818 4637 0.45 6 70
1
'NBML P6-P7' 'FL' 93330 862818 93172 862953 4637 0.45 10 70
1
'NBML P7-NBCD P8' 'FL' 93172 862953 92936 863130 4637 0.45 15 70
1
'NBCD P8-P9' 'BR' 92936 863130 92867 863169 4637 0.43 16 70
1
'NBCD P9-P10' 'BR' 92867 863169 92703 863287 3453 0.43 16 70
1
'NBCD P10-P11' 'FL' 92703 863287 92401 863510 3453 0.43 16 70
1
'NBCD P11-P12' 'FL' 92401 863510 92185 863694 3453 0.43 16 70
1
'NBDC P1-P2' 'BR' 92880 863195 92729 863320 1183 0.43 16 12
1
'NBDC P2-P3' 'FL' 92729 863320 92598 863435 1183 0.43 16 12
1
'NBDC P3-P4' 'FL' 92598 863435 92559 863478 1183 0.43 16 12
1
'NBDC P4-P5' 'FL' 92559 863478 92519 863527 1183 0.43 16 12
1
'NBDC P5-P6' 'FL' 92519 863527 92467 863622 1183 0.43 16 12
1
'NBDC P6-P7' 'FL' 92467 863622 92431 863724 1183 0.43 16 12
1
'NBDC P7-P8' 'FL' 92431 863724 92408 863861 1183 0.43 16 12
1
'SBCD P1-P2' 'AG' 91883 863474 92060 863425 3162 0.43 0 58
1
'SBCD P2-P3' 'FL' 92060 863425 92283 863350 3162 0.43 12 58
1
'SBCD P3-P4' 'FL' 92283 863350 92532 863245 3162 0.43 14 58
1
'SBCD P4-P5' 'FL' 92532 863245 92670 863169 3162 0.43 15 58
1
'SBCD P5-P6' 'BR' 92670 863169 92887 863044 3162 0.43 15 58
1
'SBCD P6-SBML P7' 'FL' 92887 863044 93103 862900 3162 0.43 2 58
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'SBML P7-P8' 'DP' 93103 862900 93208 862808 3162 0.45 -2 58
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'SBML P8-P9' 'AG' 93208 862808 93379 862648 4287 0.45 0 70
1
'SBML P9-P10' 'DP' 93379 862648 93553 862457 4287 0.45 -6 70
1
'SBML P10-P11' 'DP' 93553 862457 94373 861424 4287 0.45 -12 70
1
'SBML P11-P12' 'AG' 94373 861424 96505 858665 3308 0.45 0 58
1
'SBML P12-P13' 'AG' 96505 858665 97477 857421 3308 0.45 0 58
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'SBDC P1-P2' 'BR' 92024 863563 92073 863484 1125 0.43 32 12
1
'SBDC P2-P3' 'BR' 92073 863484 92158 863379 1125 0.43 32 12
1
'SBDC P3-P4' 'BR' 92158 863379 92227 863314 1125 0.43 32 12
1
'SBDC P4-P5' 'BR' 92227 863314 92313 863251 1125 0.43 32 12
1
'SBDC P5-P6' 'BR' 92313 863251 92414 863195 1125 0.43 20 12
1
'SBDC P6-P7' 'BR' 92414 863195 92897 862969 1125 0.43 15 12
1
'SBDC P7-P8' 'FL' 92897 862969 93018 862907 1125 0.43 2 12
1
'SBDC P8-P9' 'AG' 93018 862907 93113 862844 1125 0.43 0 12
1
'SBDC P9-P10' 'DP' 93113 862844 93192 862789 1125 0.43 -2 12
1
'SBEXR P1-P2' 'DP' 94350 861414 94475 861233 980 0.43 -12 32
1
'SBEXR P2-P3' 'DP' 94475 861233 94852 860705 980 0.43 -6 32
1
'SBEXR P3-P4' 'AG' 94852 860705 95226 860177 980 0.43 0 32
1
'SBENTR P1-P2' 'AG' 96538 858491 96692 858310 1465 0.43 0 32
1
'SBENTR P2-P3' 'AG' 96692 858310 97129 857802 1465 0.43 0 32
1
'SBENTR P3-P4' 'AG' 97129 857802 97313 857588 1465 0.43 0 32
1
'SBENTR P4-P5' 'AG' 97313 857588 97463 857411 1465 0.43 0 32
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'SBFR P1-SBLRAP P1' 'AG' 91538 863140 91820 863064 2047 0.43 0 70
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'SBLRAP P1-P2' 'AG' 91820 863064 92017 863038 0 26 2
   110 69 2.0 922 1.49 3539 2 1
2
'SBLRAP P2-P3' 'AG' 92017 863038 92204 863025 0 26 2
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   110 69 2.0 922 1.49 3539 2 1
2
'SBLRAP P3-P4' 'AG' 92204 863025 92358 863008 0 26 2
   110 69 2.0 922 1.49 3539 2 1
2
'SBLRAP P4-P5' 'AG' 92358 863008 92582 862933 0 26 2
   110 69 2.0 922 1.49 3539 2 1
1
'SBLRAP P5-SBFR P2' 'AG' 92582 862933 92834 862785 1746 0.43 0 46
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'SBFR P2-P3' 'AG' 92834 862785 93241 862493 1746 0.43 0 46
1
'SBFR P3-P4' 'AG' 93241 862493 93392 862346 1746 0.43 0 46
1
'SBFR P4-P5' 'AG' 93392 862346 93631 862073 1746 0.43 0 46
1
'SBFR P5-P6' 'AG' 93631 862073 94586 860958 1746 0.43 0 46
1
'SBFR P6-P7' 'AG' 94586 860958 95206 860167 1746 0.43 0 46
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'SBFR P7-P8' 'AG' 95206 860167 96519 858474 2881 0.43 0 58
1
'SBFR P8-P9' 'AG' 96519 858474 97388 857375 1416 0.43 0 58
2
'SBLRLT P1-P2' 'AG' 91870 863067 92004 863054 0 26 2
   110 69 2.0 941 1.49 3433 2 1
2
'SBLRLT P2-P3' 'AG' 92004 863054 92204 863054 0 26 2
   110 69 2.0 941 1.49 3433 2 1
2
'SBLRLT P3-P4' 'AG' 92204 863054 92349 863035 0 26 2
   110 69 2.0 941 1.49 3433 2 1
2
'SBLRLT P4-P5' 'AG' 92349 863035 92559 862966 0 26 2
   110 69 2.0 941 1.49 3433 2 1
2
'SBLRRT P1-P2' 'AG' 91863 863022 91994 863008 0 12 1
   110 69 2.0 184 1.49 1583 2 1
2
'SBLRRT P2-P3' 'AG' 91994 863008 92119 863008 0 12 1
   110 69 2.0 184 1.49 1583 2 1
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'SBLRRT P3-P4' 'AG' 92119 863008 92267 863002 0 12 1
   110 69 2.0 184 1.49 1583 2 1
2
'SBLRRT P4-P5' 'AG' 92267 863002 92365 862982 0 12 1
   110 69 2.0 184 1.49 1583 2 1
2
'SBLRRT P5-P6' 'AG' 92365 862982 92536 862923 0 12 1
   110 69 2.0 184 1.49 1583 2 1
```

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1
'WBLR P1-WBLRAP P2' 'AG' 93294 864016 93136 863786 1465 0.47 0 58
2
'WBLRAP P2-P3' 'AG' 93136 863786 92956 863491 0 38 3
   90 51 2.0 931 1.49 5085 2 1
1
'WBLRAP P3-WBLR P4' 'AG' 92956 863491 92890 863379 931 0.47 0 58
1
'WBLR P4-WBLRAP P5' 'AG' 92890 863379 92765 863169 1387 0.47 0 58
2
'WBLRAP P5-P6' 'AG' 92765 863169 92657 862962 0 38 3
   90 51 2.0 1387 1.49 5085 2 1
1
'WBLRAP P6-WBLR P7' 'AG' 92657 862962 92575 862821 1571 0.47 0 58
1
'WBLR P7-P8' 'AG' 92575 862821 92388 862438 1571 0.47 0 58
2
'WBLRLT P1-P2' 'AG' 93139 863747 92998 863517 0 12 1
   90 52 2.0 534 1.49 1770 2 1
2
'WBLRLT P2-P3' 'AG' 92998 863517 92916 863366 0 12 1
   90 52 2.0 534 1.49 1770 2 1
2
'WBLRLT P3-P4' 'AG' 92916 863366 92792 863153 0 12 1
   90 52 2.0 534 1.49 1770 2 1
2
'WBLRLT P4-P5' 'AG' 92792 863153 92683 862966 0 12 1
   90 52 2.0 534 1.49 1770 2 1
1
'EBLR P1-EBLRAP P2' 'AG' 92444 862415 92565 862657 1581 0.47 0 58
2
'EBLRAP P2-P3' 'AG' 92565 862657 92670 862841 0 38 3
   110 47 2.0 1581 1.49 4767 2 1
1
'EBLRAP P3-EBLR P4' 'AG' 92670 862841 92726 862943 2377 0.47 0 58
1
'EBLR P4-EBLRAP P5' 'AG' 92726 862943 92883 863228 2270 0.47 0 58
2
'EBLRAP P5-P6' 'AG' 92883 863228 92969 863373 0 38 3
   110 47 2.0 2270 1.49 4767 2 1
1
'EBLRAP P6-EBLR P7' 'AG' 92969 863373 93038 863491 3259 0.47 0 58
1
'EBLR P7-P8' 'AG' 93038 863491 93284 863881 3259 0.47 0 58
1
'EBLR P8-P9' 'AG' 93284 863881 93353 863986 3259 0.47 0 58
2
'EBLRLT P1-P2' 'AG' 92703 862949 92867 863241 0 12 1
   110 47 2.0 107 1.49 1522 2 1
2
```

```
'EBLRLT P2-P3' 'AG' 92867 863241 92939 863366 0 12 1
   110 47 2.0 107 1.49 1522 2 1
1 0 6 1000 1.7 'Y' 10 0 36
```

JOB: I-287 I-20 TO SUBLETT 2045 LittleInt RUN: 2045 Little Int

DATE : 12/16/19
TIME : 9:18:29

The MODE flag has been set to C for calculating CO averages.

SITE & METEOROLOGICAL VARIABLES

VS = 0.0 CM/S VD = 0.0 CM/S Z0 = 108. CM
U = 1.0 M/S CLAS = 6 (F) ATIM = 60. MINUTES MIXH = 1000. M AMB = 1.7 PPM

LINK VARIABLES

	LINK DESCRIPTION	*	LINK COORDINATES (FT) X1	Y1	X2	Y2	*	LENGTH (FT)	BRG (DEG)	TYPE	VPH	EF (G/MI)	H (FT)	W (FT)	V/C	QUEUE (VEH)
1.	NBFR P1-P2	*	97657.0	857510.0	95807.0	859908.0	*	3029.	322.	AG	2241.	0.4	0.0	58.0		
2.	NBFR P2-P3	*	95807.0	859908.0	94317.0	861811.0	*	2417.	322.	AG	1484.	0.4	0.0	58.0		
3.	NBFR P3-P4	*	94317.0	861811.0	93805.0	862470.0	*	834.	322.	AG	1484.	0.4	0.0	58.0		
4.	NBFR P4-P5	*	93805.0	862470.0	93500.0	862857.0	*	493.	322.	AG	1484.	0.4	0.0	58.0		
5.	NBFR P5-NBLRAP P1	*	93500.0	862857.0	93372.0	863022.0	*	209.	322.	AG	1339.	0.4	0.0	58.0		
6.	NBLRAP P1-P2	*	93372.0	863022.0	93359.5	863036.2	*	19.	319.	AG	8.	100.0	0.0	38.0	0.11	1.0
7.	NBLRAP P2-P3	*	93162.0	863261.1	93118.6	863302.1	*	60.	313.	AG	3.	100.0	0.0	12.0	0.34	3.0
8.	NBLRLTUT P1-P2	*	93484.0	862848.0	93241.0	863136.0	*	377.	320.	AG	146.	0.7	0.0	12.0		
9.	NBLRLTUT P2-P3	*	93241.0	863136.0	93093.0	863297.0	*	219.	317.	AG	146.	0.7	0.0	12.0		
10.	NBLRLTUT P3-P4	*	93093.0	863297.0	93047.0	863317.0	*	50.	293.	AG	146.	0.7	0.0	12.0		
11.	NBLRLTUT P4-P5	*	93047.0	863317.0	92982.0	863287.0	*	72.	245.	AG	146.	0.7	0.0	12.0		
12.	NBLRLTUT P5-P6	*	92982.0	863287.0	92772.0	862920.1	*	423.	210.	AG	146.	0.7	0.0	12.0		

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      13. NBLRLTUT P6-P7      *  92772.0  862920.1   92765.0  862857.0 *      63.
186. AG    146.   0.7   0.0 12.0
      14. NBLRLT P1-P2        *  93149.0  863258.0   93074.3  863330.7 *     104.
314. AG      3. 100.0   0.0 12.0 0.62   5.3
      15. NBLRRT P1 -P2       *  93175.0  863268.0   92113.6  864424.8 *    1570.
317. AG      3. 100.0   0.0 12.0 1.14  79.8
      16. NBENTR P1-P2        *  95790.0  859895.0   95659.0  860046.0 *     200.
319. AG    757.   0.4   0.0 32.0
      17. NBENTR P2-P3        *  95659.0  860046.0   95403.0  860335.1 *     386.
318. AG    757.   0.4   0.0 32.0
      18. NBENTR P3-P4        *  95403.0  860335.1   94947.0  860889.0 *     717.
321. DP    757.   0.4  -8.0 32.0
      19. NBENTR P4-P5        *  94947.0  860889.0   94727.0  861148.0 *     340.
320. AG    757.   0.4   0.0 32.0
      20. NBML P1-P2          *  97565.0  857467.0   94708.0  861138.0 *    4652.
322. AG   3880.   0.4   0.0 58.0
      21. NBML P2-P3          *  94708.0  861138.0   93753.0  862369.0 *    1558.
322. AG   4637.   0.4   0.0 58.0
      22. NBML P3-P4          *  93753.0  862369.0   93618.0  862536.0 *     215.
321. AG   4637.   0.4   0.0 70.0
      23. NBML P4-P5          *  93618.0  862536.0   93464.0  862697.1 *     223.
316. FL   4637.   0.4   2.0 70.0
      24. NBML P5-P6          *  93464.0  862697.1   93330.0  862818.0 *     181.
312. FL   4637.   0.4   6.0 70.0
      25. NBML P6-P7          *  93330.0  862818.0   93172.0  862953.0 *     208.
310. FL   4637.   0.4  10.0 70.0
      26. NBML P7-NBCD P8     *  93172.0  862953.0   92936.0  863130.0 *     295.
307. FL   4637.   0.4  15.0 70.0
      27. NBCD P8-P9          *  92936.0  863130.0   92867.0  863169.0 *      79.
299. BR   4637.   0.4  16.0 70.0
      28. NBCD P9-P10         *  92867.0  863169.0   92703.0  863287.0 *     202.
306. BR   3453.   0.4  16.0 70.0
      29. NBCD P10-P11        *  92703.0  863287.0   92401.0  863510.0 *     375.
306. FL   3453.   0.4  16.0 70.0
      30. NBCD P11-P12        *  92401.0  863510.0   92185.0  863694.0 *     284.
310. FL   3453.   0.4  16.0 70.0
      31. NBDC P1-P2          *  92880.0  863195.0   92729.0  863320.0 *     196.
310. BR   1183.   0.4  16.0 12.0
      32. NBDC P2-P3          *  92729.0  863320.0   92598.0  863435.0 *     174.
311. FL   1183.   0.4  16.0 12.0
      33. NBDC P3-P4          *  92598.0  863435.0   92559.0  863478.0 *      58.
318. FL   1183.   0.4  16.0 12.0
      34. NBDC P4-P5          *  92559.0  863478.0   92519.0  863527.0 *      63.
321. FL   1183.   0.4  16.0 12.0
      35. NBDC P5-P6          *  92519.0  863527.0   92467.0  863622.1 *     108.
331. FL   1183.   0.4  16.0 12.0
      36. NBDC P6-P7          *  92467.0  863622.1   92431.0  863724.1 *     108.
341. FL   1183.   0.4  16.0 12.0
      37. NBDC P7-P8          *  92431.0  863724.1   92408.0  863861.0 *     139.
350. FL   1183.   0.4  16.0 12.0
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      38. SBCD P1-P2          *  91883.0  863474.0   92060.0  863425.0 *     184.
105. AG   3162.   0.4   0.0 58.0
      39. SBCD P2-P3          *  92060.0  863425.0   92283.0  863350.1 *     235.
109. FL   3162.   0.4  12.0 58.0
      40. SBCD P3-P4          *  92283.0  863350.1   92532.0  863245.1 *     270.
113. FL   3162.   0.4  14.0 58.0
      41. SBCD P4-P5          *  92532.0  863245.1   92670.0  863169.0 *     158.
119. FL   3162.   0.4  15.0 58.0
      42. SBCD P5-P6          *  92670.0  863169.0   92887.0  863044.0 *     250.
120. BR   3162.   0.4  15.0 58.0
      43. SBCD P6-SBML P7     *  92887.0  863044.0   93103.0  862900.1 *     260.
124. FL   3162.   0.4   2.0 58.0
      44. SBML P7-P8          *  93103.0  862900.1   93208.0  862808.0 *     140.
131. DP   3162.   0.4  -2.0 58.0
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      JOB: I-287 I-20 TO SUBLETT 2045 LittleInt                RUN: 2045 Little
Int

      DATE : 12/16/19
      TIME :  9:18:29

       LINK VARIABLES
       --------------
         LINK DESCRIPTION     *         LINK COORDINATES (FT)          *    LENGTH
BRG TYPE   VPH    EF      H   W    V/C QUEUE
                               *   X1        Y1        X2        Y2     *     (FT)
(DEG)           (G/MI)  (FT) (FT)       (VEH)

-----------------------*----------------------------------------*----------------
----------------------------------------
      45. SBML P8-P9          *  93208.0  862808.0   93379.0  862648.1 *     234.
133. AG   4287.   0.4   0.0 70.0
      46. SBML P9-P10         *  93379.0  862648.1   93553.0  862457.0 *     258.
138. DP   4287.   0.4  -6.0 70.0
      47. SBML P10-P11        *  93553.0  862457.0   94373.0  861424.0 *    1319.
142. DP   4287.   0.4 -12.0 70.0
      48. SBML P11-P12        *  94373.0  861424.0   96505.0  858665.0 *    3487.
142. AG   3308.   0.4   0.0 58.0
      49. SBML P12-P13        *  96505.0  858665.0   97477.0  857421.0 *    1579.
142. AG   3308.   0.4   0.0 58.0
      50. SBDC P1-P2          *  92024.0  863563.0   92073.0  863484.1 *      93.
148. BR   1125.   0.4  32.0 12.0
      51. SBDC P2-P3          *  92073.0  863484.1   92158.0  863379.1 *     135.
141. BR   1125.   0.4  32.0 12.0
      52. SBDC P3-P4          *  92158.0  863379.1   92227.0  863314.1 *      95.
133. BR   1125.   0.4  32.0 12.0
      53. SBDC P4-P5          *  92227.0  863314.1   92313.0  863251.0 *     107.
126. BR   1125.   0.4  32.0 12.0
      54. SBDC P5-P6          *  92313.0  863251.0   92414.0  863195.0 *     115.
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119. BR   1125.   0.4  20.0 12.0
      55. SBDC P6-P7          *  92414.0  863195.0   92897.0  862969.1 *     533.
115. BR   1125.   0.4  15.0 12.0
      56. SBDC P7-P8          *  92897.0  862969.1   93018.0  862907.0 *     136.
117. FL   1125.   0.4   2.0 12.0
      57. SBDC P8-P9          *  93018.0  862907.0   93113.0  862844.0 *     114.
124. AG   1125.   0.4   0.0 12.0
      58. SBDC P9-P10         *  93113.0  862844.0   93192.0  862789.0 *      96.
125. DP   1125.   0.4  -2.0 12.0
      59. SBEXR P1-P2         *  94350.0  861414.0   94475.0  861233.0 *     220.
145. DP    980.   0.4 -12.0 32.0
      60. SBEXR P2-P3         *  94475.0  861233.0   94852.0  860705.0 *     649.
144. DP    980.   0.4  -6.0 32.0
      61. SBEXR P3-P4         *  94852.0  860705.0   95226.0  860177.0 *     647.
145. AG    980.   0.4   0.0 32.0
      62. SBENTR P1-P2        *  96538.0  858491.0   96692.0  858310.0 *     238.
140. AG   1465.   0.4   0.0 32.0
      63. SBENTR P2-P3        *  96692.0  858310.0   97129.0  857802.0 *     670.
139. AG   1465.   0.4   0.0 32.0
      64. SBENTR P3-P4        *  97129.0  857802.0   97313.0  857588.0 *     282.
139. AG   1465.   0.4   0.0 32.0
      65. SBENTR P4-P5        *  97313.0  857588.0   97463.0  857411.0 *     232.
140. AG   1465.   0.4   0.0 32.0
      66. SBFR P1-SBLRAP P1   *  91538.0  863140.0   91820.0  863064.0 *     292.
105. AG   2047.   0.4   0.0 70.0
      67. SBLRAP P1-P2        *  91820.0  863064.0   92003.0  863039.9 *     185.
 98. AG      5. 100.0   0.0 26.0 0.39   9.4
      68. SBLRAP P2-P3        *  92017.0  863038.1   92201.1  863025.2 *     185.
 94. AG      5. 100.0   0.0 26.0 0.39   9.4
      69. SBLRAP P3-P4        *  92204.0  863025.0   92387.4  863004.7 *     185.
 96. AG      5. 100.0   0.0 26.0 0.39   9.4
      70. SBLRAP P4-P5        *  92358.0  863008.0   92533.0  862949.4 *     185.
109. AG      5. 100.0   0.0 26.0 0.39   9.4
      71. SBLRAP P5-SBFR P2   *  92582.0  862933.0   92834.0  862785.0 *     292.
120. AG   1746.   0.4   0.0 46.0
      72. SBFR P2-P3          *  92834.0  862785.0   93241.0  862493.0 *     501.
126. AG   1746.   0.4   0.0 46.0
      73. SBFR P3-P4          *  93241.0  862493.0   93392.0  862346.0 *     211.
134. AG   1746.   0.4   0.0 46.0
      74. SBFR P4-P5          *  93392.0  862346.0   93631.0  862073.0 *     363.
139. AG   1746.   0.4   0.0 46.0
      75. SBFR P5-P6          *  93631.0  862073.0   94586.0  860958.0 *    1468.
139. AG   1746.   0.4   0.0 46.0
      76. SBFR P6-P7          *  94586.0  860958.0   95206.0  860167.0 *    1005.
142. AG   1746.   0.4   0.0 46.0
      77. SBFR P7-P8          *  95206.0  860167.0   96519.0  858474.0 *    2142.
142. AG   2881.   0.4   0.0 58.0
      78. SBFR P8-P9          *  96519.0  858474.0   97388.0  857375.0 *    1401.
142. AG   1416.   0.4   0.0 58.0
      79. SBLRLT P1-P2        *  91870.0  863067.0   92058.3  863048.8 *     189.
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 96. AG      5. 100.0   0.0 26.0 0.41   9.6
      80. SBLRLT P2-P3        *  92004.0  863054.1   92193.1  863054.1 *     189.
 90. AG      5. 100.0   0.0 26.0 0.41   9.6
      81. SBLRLT P3-P4        *  92204.0  863054.1   92391.5  863029.3 *     189.
 97. AG      5. 100.0   0.0 26.0 0.41   9.6
      82. SBLRLT P4-P5        *  92349.0  863035.0   92528.7  862975.9 *     189.
108. AG      5. 100.0   0.0 26.0 0.41   9.6
      83. SBLRRT P1-P2        *  91863.0  863022.0   91935.7  863014.3 *      73.
 96. AG      3. 100.0   0.0 12.0 0.35   3.7
      84. SBLRRT P2-P3        *  91994.0  863008.0   92067.1  863008.0 *      73.
 89. AG      3. 100.0   0.0 12.0 0.35   3.7
      85. SBLRRT P3-P4        *  92119.0  863008.0   92192.0  863005.1 *      73.
 92. AG      3. 100.0   0.0 12.0 0.35   3.7
      86. SBLRRT P4-P5        *  92267.0  863002.0   92338.6  862987.4 *      73.
102. AG      3. 100.0   0.0 12.0 0.35   3.7
      87. SBLRRT P5-P6        *  92365.0  862982.0   92434.1  862958.2 *      73.
109. AG      3. 100.0   0.0 12.0 0.35   3.7
      88. WBLR P1-WBLRAP P2   *  93294.0  864016.1   93136.0  863786.0 *     279.
214. AG   1465.   0.5   0.0 58.0
      89. WBLRAP P2-P3        *  93136.0  863786.0   93091.0  863712.2 *      86.
211. AG      7. 100.0   0.0 38.0 0.16   4.4
      90. WBLRAP P3-WBLR P4   *  92956.0  863491.0   92890.0  863379.1 *     130.
211. AG    931.   0.5   0.0 58.0
      91. WBLR P4-WBLRAP P5   *  92890.0  863379.1   92765.0  863169.0 *     244.
211. AG   1387.   0.5   0.0 58.0
      92. WBLRAP P5-P6        *  92765.0  863169.0   92705.4  863054.8 *     129.
208. AG      7. 100.0   0.0 38.0 0.23   6.5
      93. WBLRAP P6-WBLR P7   *  92657.0  862962.0   92575.0  862821.0 *     163.
210. AG   1571.   0.5   0.0 58.0
      94. WBLR P7-P8          *  92575.0  862821.0   92388.0  862438.0 *     426.
206. AG   1571.   0.5   0.0 58.0
      95. WBLRLT P1-P2        *  93139.0  863747.0   93044.8  863593.3 *     180.
212. AG      2. 100.0   0.0 12.0 0.80   9.2
```


DATE : 12/16/19
TIME : 9:18:29

LINK VARIABLES

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  LINK DESCRIPTION     *         LINK COORDINATES (FT)          *    LENGTH
BRG TYPE   VPH    EF      H   W    V/C QUEUE
                       *   X1        Y1        X2        Y2     *     (FT)
(DEG)           (G/MI)  (FT) (FT)       (VEH)

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      96. WBLRLT P2-P3        *  92998.0  863517.1   92912.0  863358.7 *     180.
209. AG      2. 100.0   0.0 12.0 0.80   9.2
      97. WBLRLT P3-P4        *  92916.0  863366.0   92825.3  863210.2 *     180.
210. AG      2. 100.0   0.0 12.0 0.80   9.2
      98. WBLRLT P4-P5        *  92792.0  863153.0   92701.2  862997.3 *     180.
210. AG      2. 100.0   0.0 12.0 0.80   9.2
      99. EBLR P1-EBLRAP P2   *  92444.0  862415.0   92565.0  862657.0 *     271.
 27. AG   1581.   0.5   0.0 58.0
     100. EBLRAP P2-P3        *  92565.0  862657.0   92632.1  862774.6 *     135.
 30. AG      5. 100.0   0.0 38.0 0.21   6.9
     101. EBLRAP P3-EBLR P4   *  92670.0  862841.0   92726.0  862943.0 *     116.
 29. AG   2377.   0.5   0.0 58.0
     102. EBLR P4-EBLRAP P5   *  92726.0  862943.0   92883.0  863228.0 *     325.
 29. AG   2270.   0.5   0.0 58.0
     103. EBLRAP P5-P6        *  92883.0  863228.0   92982.1  863395.2 *     194.
 31. AG      5. 100.0   0.0 38.0 0.30   9.9
     104. EBLRAP P6-EBLR P7   *  92969.0  863373.0   93038.0  863491.0 *     137.
 30. AG   3259.   0.5   0.0 58.0
     105. EBLR P7-P8          *  93038.0  863491.0   93284.0  863881.0 *     461.
 32. AG   3259.   0.5   0.0 58.0
     106. EBLR P8-P9          *  93284.0  863881.0   93353.0  863986.0 *     126.
 33. AG   3259.   0.5   0.0 58.0
     107. EBLRLT P1-P2        *  92703.0  862949.0   92716.5  862973.0 *      27.
 29. AG      2. 100.0   0.0 12.0 0.13   1.4
     108. EBLRLT P2-P3        *  92867.0  863241.1   92880.7  863264.9 *      27.
 30. AG      2. 100.0   0.0 12.0 0.13   1.4
```


DATE : 12/16/19
TIME : 9:18:29

ADDITIONAL QUEUE LINK PARAMETERS

LINK DESCRIPTION	*	CYCLE LENGTH (SEC)	RED TIME (SEC)	CLEARANCE LOST TIME (SEC)	APPROACH VOL (VPH)	SATURATION FLOW RATE (VPH)	IDLE EM FAC (gm/hr)	SIGNAL TYPE	ARRIVAL RATE
6. NBLRAP P1-P2	*	90	61	2.0	165	1748	1.49	2	1
7. NBLRAP P2-P3	*	90	61	2.0	165	1748	1.49	2	1
14. NBLRLT P1-P2	*	90	61	2.0	291	1681			

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1.49      2        1
    15. NBLRRT P1 -P2       *      90       61       2.0       883       2787
1.49      2        1
    67. SBLRAP P1-P2        *     110       69       2.0       922       3539
1.49      2        1
    68. SBLRAP P2-P3        *     110       69       2.0       922       3539
1.49      2        1
    69. SBLRAP P3-P4        *     110       69       2.0       922       3539
1.49      2        1
    70. SBLRAP P4-P5        *     110       69       2.0       922       3539
1.49      2        1
    79. SBLRLT P1-P2        *     110       69       2.0       941       3433
1.49      2        1
    80. SBLRLT P2-P3        *     110       69       2.0       941       3433
1.49      2        1
    81. SBLRLT P3-P4        *     110       69       2.0       941       3433
1.49      2        1
    82. SBLRLT P4-P5        *     110       69       2.0       941       3433
1.49      2        1
    83. SBLRRT P1-P2        *     110       69       2.0       184       1583
1.49      2        1
    84. SBLRRT P2-P3        *     110       69       2.0       184       1583
1.49      2        1
    85. SBLRRT P3-P4        *     110       69       2.0       184       1583
1.49      2        1
    86. SBLRRT P4-P5        *     110       69       2.0       184       1583
1.49      2        1
    87. SBLRRT P5-P6        *     110       69       2.0       184       1583
1.49      2        1
    89. WBLRAP P2-P3        *      90       51       2.0       931       5085
1.49      2        1
    92. WBLRAP P5-P6        *      90       51       2.0      1387       5085
1.49      2        1
    95. WBLRLT P1-P2        *      90       52       2.0       534       1770
1.49      2        1
    96. WBLRLT P2-P3        *      90       52       2.0       534       1770
1.49      2        1
    97. WBLRLT P3-P4        *      90       52       2.0       534       1770
1.49      2        1
    98. WBLRLT P4-P5        *      90       52       2.0       534       1770
1.49      2        1
   100. EBLRAP P2-P3        *     110       47       2.0      1581       4767
1.49      2        1
   103. EBLRAP P5-P6        *     110       47       2.0      2270       4767
1.49      2        1
   107. EBLRLT P1-P2        *     110       47       2.0       107       1522
1.49      2        1
   108. EBLRLT P2-P3        *     110       47       2.0       107       1522
1.49      2        1
```

RECEPTOR LOCATIONS

RECEPTOR	COORDINATES (FT) X	Y	Z
1. R1	93152.0	863350.1	5.9
2. R2	95436.0	860443.0	5.9
3. R3	96650.0	858888.0	5.9
4. R4	91860.0	862989.1	5.9
5. R5	92851.0	862707.0	5.9
6. R6	93710.0	861886.0	5.9
7. R7	95318.0	859941.0	5.9

MODEL RESULTS

REMARKS : In search of the angle corresponding to the maximum concentration, only the first angle, of the angles with same maximum concentrations, is indicated as maximum.

WIND ANGLE RANGE: 0.-360.

WIND ANGLE (DEGR)	CONCENTRATION (PPM) REC1	REC2	REC3	REC4	REC5	REC6	REC7
0.	1.7	1.7	1.7	1.7	1.7	1.7	1.7
10.	1.7	1.7	1.7	1.7	1.7	1.7	1.7
20.	1.7	1.7	1.7	1.7	1.7	1.7	1.7
30.	1.7	1.7	1.7	1.7	1.7	1.7	1.7
40.	1.7	1.7	1.7	1.7	1.7	1.7	1.7
50.	1.7	1.7	1.7	1.7	1.7	1.7	1.7
60.	1.7	1.7	1.7	1.7	1.7	1.7	1.7
70.	1.7	1.7	1.7	1.7	1.7	1.7	1.7
80.	1.7	1.7	1.7	1.7	1.7	1.7	1.7
90.	1.7	1.7	1.7	1.7	1.7	1.7	1.7
100.	1.7	1.7	1.7	1.7	1.7	1.7	1.7
110.	1.7	1.7	1.7	1.7	1.7	1.7	1.7
120.	1.7	1.7	1.7	1.7	1.7	1.7	1.8
130.	1.7	1.7	1.7	1.7	1.7	1.7	1.8
140.	1.7	1.7	1.7	1.7	1.7	1.7	1.8
150.	1.7	1.8	1.8	1.7	1.7	1.7	1.7
160.	1.7	1.8	1.8	1.7	1.7	1.7	1.7
170.	1.7	1.7	1.7	1.7	1.7	1.7	1.7
180.	1.7	1.7	1.7	1.7	1.7	1.7	1.7

190.	*	1.7	1.7	1.7	1.7	1.7	1.7	1.7
200.	*	1.7	1.7	1.7	1.7	1.7	1.7	1.7
210.	*	1.7	1.7	1.7	1.7	1.7	1.7	1.7
220.	*	1.7	1.7	1.7	1.7	1.7	1.7	1.7
230.	*	1.7	1.7	1.7	1.7	1.7	1.7	1.7
240.	*	1.7	1.7	1.7	1.7	1.7	1.7	1.7
250.	*	1.7	1.7	1.7	1.7	1.7	1.7	1.7
260.	*	1.7	1.7	1.7	1.7	1.7	1.7	1.7
270.	*	1.7	1.7	1.7	1.7	1.7	1.7	1.7
280.	*	1.7	1.7	1.7	1.7	1.7	1.7	1.7
290.	*	1.7	1.7	1.7	1.7	1.7	1.7	1.7
300.	*	1.7	1.7	1.7	1.7	1.7	1.7	1.7
310.	*	1.7	1.7	1.9	1.7	1.7	1.7	1.7
320.	*	1.7	1.7	1.8	1.7	1.7	1.7	1.7
330.	*	1.7	1.7	1.7	1.7	1.7	1.7	1.7
340.	*	1.7	1.7	1.7	1.7	1.7	1.7	1.8
350.	*	1.7	1.7	1.7	1.7	1.7	1.7	1.7
360.	*	1.7	1.7	1.7	1.7	1.7	1.7	1.7
------	*	----------						
MAX	*	1.7	1.8	1.9	1.7	1.7	1.7	1.8
DEGR.	*	0	150	310	0	0	0	120

THE HIGHEST CONCENTRATION OF 1.90 PPM OCCURRED AT RECEPTOR REC3 .

DATE : 12/16/19
TIME : 9:18:29

RECEPTOR - LINK MATRIX FOR THE ANGLE PRODUCING
THE MAXIMUM CONCENTRATION FOR EACH RECEPTOR

		CO/LINK (PPM) ANGLE (DEGREES)						
		REC1	REC2	REC3	REC4	REC5	REC6	REC7
LINK #	*	0	150	310	0	0	0	120
-------	*	----------						
1	*	0.0	0.0	0.1	0.0	0.0	0.0	0.0
2	*	0.0	0.0	0.0	0.0	0.0	0.0	0.0
3	*	0.0	0.0	0.0	0.0	0.0	0.0	0.0
4	*	0.0	0.0	0.0	0.0	0.0	0.0	0.0
5	*	0.0	0.0	0.0	0.0	0.0	0.0	0.0
6	*	0.0	0.0	0.0	0.0	0.0	0.0	0.0
7	*	0.0	0.0	0.0	0.0	0.0	0.0	0.0
8	*	0.0	0.0	0.0	0.0	0.0	0.0	0.0
9	*	0.0	0.0	0.0	0.0	0.0	0.0	0.0
10	*	0.0	0.0	0.0	0.0	0.0	0.0	0.0

11	*	0.0	0.0	0.0	0.0	0.0	0.0	0.0
12	*	0.0	0.0	0.0	0.0	0.0	0.0	0.0
13	*	0.0	0.0	0.0	0.0	0.0	0.0	0.0
14	*	0.0	0.0	0.0	0.0	0.0	0.0	0.0
15	*	0.0	0.0	0.0	0.0	0.0	0.0	0.0
16	*	0.0	0.0	0.0	0.0	0.0	0.0	0.0
17	*	0.0	0.0	0.0	0.0	0.0	0.0	0.0
18	*	0.0	0.0	0.0	0.0	0.0	0.0	0.0
19	*	0.0	0.0	0.0	0.0	0.0	0.0	0.0
20	*	0.0	0.1	0.1	0.0	0.0	0.0	0.0
21	*	0.0	0.0	0.0	0.0	0.0	0.0	0.0
22	*	0.0	0.0	0.0	0.0	0.0	0.0	0.0
23	*	0.0	0.0	0.0	0.0	0.0	0.0	0.0
24	*	0.0	0.0	0.0	0.0	0.0	0.0	0.0
25	*	0.0	0.0	0.0	0.0	0.0	0.0	0.0
26	*	0.0	0.0	0.0	0.0	0.0	0.0	0.0
27	*	0.0	0.0	0.0	0.0	0.0	0.0	0.0
28	*	0.0	0.0	0.0	0.0	0.0	0.0	0.0
29	*	0.0	0.0	0.0	0.0	0.0	0.0	0.0
30	*	0.0	0.0	0.0	0.0	0.0	0.0	0.0
31	*	0.0	0.0	0.0	0.0	0.0	0.0	0.0
32	*	0.0	0.0	0.0	0.0	0.0	0.0	0.0
33	*	0.0	0.0	0.0	0.0	0.0	0.0	0.0
34	*	0.0	0.0	0.0	0.0	0.0	0.0	0.0
35	*	0.0	0.0	0.0	0.0	0.0	0.0	0.0
36	*	0.0	0.0	0.0	0.0	0.0	0.0	0.0
37	*	0.0	0.0	0.0	0.0	0.0	0.0	0.0
38	*	0.0	0.0	0.0	0.0	0.0	0.0	0.0
39	*	0.0	0.0	0.0	0.0	0.0	0.0	0.0
40	*	0.0	0.0	0.0	0.0	0.0	0.0	0.0
41	*	0.0	0.0	0.0	0.0	0.0	0.0	0.0
42	*	0.0	0.0	0.0	0.0	0.0	0.0	0.0
43	*	0.0	0.0	0.0	0.0	0.0	0.0	0.0
44	*	0.0	0.0	0.0	0.0	0.0	0.0	0.0
45	*	0.0	0.0	0.0	0.0	0.0	0.0	0.0

		CO/LINK (PPM)						
		ANGLE (DEGREES)						
		REC1	REC2	REC3	REC4	REC5	REC6	REC7
LINK #	*	0	150	310	0	0	0	120
46	*	0.0	0.0	0.0	0.0	0.0	0.0	0.0
47	*	0.0	0.0	0.0	0.0	0.0	0.0	0.0
48	*	0.0	0.0	0.0	0.0	0.0	0.0	0.0
49	*	0.0	0.0	0.0	0.0	0.0	0.0	0.0
50	*	0.0	0.0	0.0	0.0	0.0	0.0	0.0

51	*	0.0	0.0	0.0	0.0	0.0	0.0	0.0
52	*	0.0	0.0	0.0	0.0	0.0	0.0	0.0
53	*	0.0	0.0	0.0	0.0	0.0	0.0	0.0
54	*	0.0	0.0	0.0	0.0	0.0	0.0	0.0
55	*	0.0	0.0	0.0	0.0	0.0	0.0	0.0
56	*	0.0	0.0	0.0	0.0	0.0	0.0	0.0
57	*	0.0	0.0	0.0	0.0	0.0	0.0	0.0
58	*	0.0	0.0	0.0	0.0	0.0	0.0	0.0
59	*	0.0	0.0	0.0	0.0	0.0	0.0	0.0
60	*	0.0	0.0	0.0	0.0	0.0	0.0	0.0
61	*	0.0	0.0	0.0	0.0	0.0	0.0	0.0
62	*	0.0	0.0	0.0	0.0	0.0	0.0	0.0
63	*	0.0	0.0	0.0	0.0	0.0	0.0	0.0
64	*	0.0	0.0	0.0	0.0	0.0	0.0	0.0
65	*	0.0	0.0	0.0	0.0	0.0	0.0	0.0
66	*	0.0	0.0	0.0	0.0	0.0	0.0	0.0
67	*	0.0	0.0	0.0	0.0	0.0	0.0	0.0
68	*	0.0	0.0	0.0	0.0	0.0	0.0	0.0
69	*	0.0	0.0	0.0	0.0	0.0	0.0	0.0
70	*	0.0	0.0	0.0	0.0	0.0	0.0	0.0
71	*	0.0	0.0	0.0	0.0	0.0	0.0	0.0
72	*	0.0	0.0	0.0	0.0	0.0	0.0	0.0
73	*	0.0	0.0	0.0	0.0	0.0	0.0	0.0
74	*	0.0	0.0	0.0	0.0	0.0	0.0	0.0
75	*	0.0	0.0	0.0	0.0	0.0	0.0	0.0
76	*	0.0	0.0	0.0	0.0	0.0	0.0	0.0
77	*	0.0	0.0	0.0	0.0	0.0	0.0	0.1
78	*	0.0	0.0	0.0	0.0	0.0	0.0	0.0
79	*	0.0	0.0	0.0	0.0	0.0	0.0	0.0
80	*	0.0	0.0	0.0	0.0	0.0	0.0	0.0
81	*	0.0	0.0	0.0	0.0	0.0	0.0	0.0
82	*	0.0	0.0	0.0	0.0	0.0	0.0	0.0
83	*	0.0	0.0	0.0	0.0	0.0	0.0	0.0
84	*	0.0	0.0	0.0	0.0	0.0	0.0	0.0
85	*	0.0	0.0	0.0	0.0	0.0	0.0	0.0
86	*	0.0	0.0	0.0	0.0	0.0	0.0	0.0
87	*	0.0	0.0	0.0	0.0	0.0	0.0	0.0
88	*	0.0	0.0	0.0	0.0	0.0	0.0	0.0
89	*	0.0	0.0	0.0	0.0	0.0	0.0	0.0
90	*	0.0	0.0	0.0	0.0	0.0	0.0	0.0
91	*	0.0	0.0	0.0	0.0	0.0	0.0	0.0
92	*	0.0	0.0	0.0	0.0	0.0	0.0	0.0
93	*	0.0	0.0	0.0	0.0	0.0	0.0	0.0
94	*	0.0	0.0	0.0	0.0	0.0	0.0	0.0
95	*	0.0	0.0	0.0	0.0	0.0	0.0	0.0
96	*	0.0	0.0	0.0	0.0	0.0	0.0	0.0
97	*	0.0	0.0	0.0	0.0	0.0	0.0	0.0
98	*	0.0	0.0	0.0	0.0	0.0	0.0	0.0

	* CO/LINK (PPM)						
	* ANGLE (DEGREES)						
	* REC1	REC2	REC3	REC4	REC5	REC6	REC7
LINK #	* 0	150	310	0	0	0	120
99	* 0.0	0.0	0.0	0.0	0.0	0.0	0.0
100	* 0.0	0.0	0.0	0.0	0.0	0.0	0.0
101	* 0.0	0.0	0.0	0.0	0.0	0.0	0.0
102	* 0.0	0.0	0.0	0.0	0.0	0.0	0.0
103	* 0.0	0.0	0.0	0.0	0.0	0.0	0.0
104	* 0.0	0.0	0.0	0.0	0.0	0.0	0.0
105	* 0.0	0.0	0.0	0.0	0.0	0.0	0.0
106	* 0.0	0.0	0.0	0.0	0.0	0.0	0.0
107	* 0.0	0.0	0.0	0.0	0.0	0.0	0.0
108	* 0.0	0.0	0.0	0.0	0.0	0.0	0.0

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'R2' 76227 873389 5.9
'R3' 77460 873035 5.9
'R4' 76089 873051 5.9
'R5' 78710 872962 17.9
'R6' 78277 872424 17.9
'2028 Int' 101 36 1 'C'
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'NBVCRT P2-P3' 'FL' 78828 872848 78641 872923 12 12 1
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'NBVCLT P1-P2' 'FL' 79028 872684 78805 872795 6 12 1
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'NBENTR P1-P2' 'FL' 75072 874216 75400 873917 542 0.78 10 34
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'NBENTR P2-P3' 'FL' 75400 873917 75725 873642 542 0.78 5 34
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'NBML P3-P4' 'DP' 75590 873668 75754 873527 2859 0.77 -4 56
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'NBML P7-P8' 'DP' 76404 873143 76604 873064 2859 0.77 -10 56
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   95 64 2.0 194 3.01 1583 2 1
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'WBVCAP P2-WBVC P3' 'FL' 78569 872949 78543 872815 519 0.94 14 44
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'WBVC P3-WBVCAP P4' 'BR' 78543 872815 78494 872552 539 0.94 16 44
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   95 48 2.0 539 3.01 2775 2 1
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'EBVC P3-EBVCAP P4' 'BR' 78523 872546 78569 872802 207 0.94 16 44
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'EBVCAP P4-P5' 'FL' 78569 872802 78579 872861 15 24 2
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'EBVCAP P5-EBVC P6' 'FL' 78579 872861 78608 873008 207 0.94 14 44
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'EBVC P6-P7' 'FL' 78608 873008 78635 873140 278 0.94 15 44
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JOB: I-287 I-820 TO BISHOP 2028 VillageInt RUN: 2028 Int

DATE : 11/17/19
TIME : 14:51:17

The MODE flag has been set to C for calculating CO averages.

SITE & METEOROLOGICAL VARIABLES

VS = 0.0 CM/S VD = 0.0 CM/S Z0 = 108. CM
U = 1.0 M/S CLAS = 6 (F) ATIM = 60. MINUTES MIXH = 1000. M AMB = 1.7 PPM

LINK VARIABLES

LINK DESCRIPTION	*	LINK COORDINATES (FT)				*	LENGTH	BRG	TYPE	VPH	EF	H	W	V/C	QUEUE
	*	X1	Y1	X2	Y2	*	(FT)	(DEG)			(G/MI)	(FT)	(FT)		(VEH)
1. NBFR P1-P2	*	75023.0	874495.1	75032.0	874409.0	*	86.	174.	AG	642.	0.8	0.0	46.0		
2. NBFR P2-P3	*	75032.0	874409.0	75055.0	874360.0	*	54.	155.	AG	642.	0.8	0.0	46.0		
3. NBFR P3-P4	*	75055.0	874360.0	75088.0	874317.0	*	54.	143.	AG	642.	0.8	0.0	46.0		
4. NBFR P4-P5	*	75088.0	874317.0	75567.0	873842.0	*	675.	135.	AG	642.	0.8	0.0	46.0		
5. NBFR P5-P6	*	75567.0	873842.0	75771.0	873655.1	*	277.	132.	AG	642.	0.8	0.0	46.0		
6. NBFR P6-P7	*	75771.0	873655.1	75941.0	873520.0	*	217.	128.	AG	642.	0.8	0.0	46.0		
7. NBFR P7-P8	*	75941.0	873520.0	76207.0	873353.0	*	314.	122.	AG	642.	0.8	0.0	46.0		
8. NBFR P8-P9	*	76207.0	873353.0	76469.0	873232.0	*	289.	115.	AG	642.	0.8	0.0	46.0		
9. NBFR P9-P10	*	76469.0	873232.0	76715.0	873143.1	*	262.	110.	AG	642.	0.8	0.0	46.0		
10. NBFR P10-P11	*	76715.0	873143.1	76978.0	873077.0	*	271.	104.	AG	642.	0.8	0.0	46.0		
11. NBFR P11-P12	*	76978.0	873077.0	77345.0	872999.0	*	375.	102.	AG	642.	0.8	0.0	58.0		
12. NBFR P12-P13	*	77345.0	872999.0	77621.0	872966.0	*	278.	97.	AG	1183.	0.8	0.0	58.0		

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     13. NBFR P13-P14        *  77621.0  872966.0   78018.0  872887.0 *     405.
101. AG    704.   0.8   0.0 46.0
     14. NBFR P14-P15        *  78018.0  872887.0   78225.0  872887.0 *     207.
 90. FL    704.   0.8   6.0 46.0
     15. NBFR P15-P16        *  78225.0  872887.0   78418.0  872907.0 *     194.
 84. FL    704.   0.8  12.0 46.0
     16. NBFR P16-NBVCAP P2  *  78418.0  872907.0   79061.0  872697.1 *     676.
108. FL    704.   0.8  14.0 46.0
     17. NBVCAP P2-P1        *  79061.0  872697.1   78992.8  872728.7 *      75.
295. FL     12. 100.0   8.0 24.0 0.22   3.8
     18. NBVCAP P1-NBFR P17  *  78631.0  872897.0   79521.0  872605.0 *     937.
108. AG    794.   0.8   0.0 58.0
     19. NBVCRT P1-P2        *  79012.0  872743.0   78927.2  872791.4 *      98.
300. FL      6. 100.0   6.0 12.0 0.58   5.0
     20. NBVCRT P2-P3        *  78828.0  872848.0   78737.4  872884.4 *      98.
292. FL      6. 100.0  12.0 12.0 0.58   5.0
     21. NBVCLT P1-P2        *  79028.0  872684.0   78943.1  872726.3 *      95.
296. FL      6. 100.0   6.0 12.0 0.52   4.8
     22. NBVCLT P2-P3        *  78805.0  872795.0   78718.8  872834.2 *      95.
295. FL      6. 100.0  12.0 12.0 0.52   4.8
     23. NBENTR P1-P2        *  75072.0  874216.0   75400.0  873917.0 *     444.
132. FL    542.   0.8  10.0 34.0
     24. NBENTR P2-P3        *  75400.0  873917.0   75725.0  873642.0 *     426.
130. FL    542.   0.8   5.0 34.0
     25. NBENTR P3-P4        *  75725.0  873642.0   75853.0  873543.0 *     162.
128. DP    542.   0.8  -2.0 34.0
     26. NBENTR P4-P5        *  75853.0  873543.0   76010.0  873432.0 *     192.
125. DP    542.   0.8  -5.0 34.0
     27. NBENTR P5-P6        *  76010.0  873432.0   76125.0  873359.0 *     136.
122. DP    542.   0.8  -5.0 34.0
     28. NBENTR P6-P7        *  76125.0  873359.0   76299.0  873268.0 *     196.
118. DP    542.   0.8  -5.0 34.0
     29. NBENTR P7-P8        *  76299.0  873268.0   76466.0  873192.1 *     183.
114. DP    542.   0.8  -4.0 34.0
     30. NBENTR P8-P9        *  76466.0  873192.1   76571.0  873149.0 *     113.
112. DP    542.   0.8  -3.0 34.0
     31. NBENTR P9-P10       *  76571.0  873149.0   76712.0  873113.0 *     146.
104. DP    542.   0.8  -2.0 34.0
     32. NBENTR P10-P11      *  76712.0  873113.0   76843.0  873084.0 *     134.
102. DP    542.   0.8  -1.0 34.0
     33. NBENTR P11-P12      *  76843.0  873084.0   76975.0  873058.1 *     135.
101. AG    542.   0.8   0.0 34.0
     34. NBEXR P1-P2         *  77618.0  872940.0   77719.0  872920.1 *     103.
101. AG    479.   0.8   0.0 34.0
     35. NBEXR P2-P3         *  77719.0  872920.1   77897.0  872871.0 *     185.
105. DP    479.   0.8  -1.0 34.0
     36. NBEXR P3-P4         *  77897.0  872871.0   78015.0  872848.0 *     120.
101. DP    479.   0.8  -2.0 34.0
     37. NBEXR P4-P5         *  78015.0  872848.0   78704.0  872690.0 *     707.
103. AG    479.   0.8   0.0 34.0
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      38. NBML P1-P2          *  74819.0  874432.0   75052.0  874196.0 *     332.
135. FL   3400.   0.8  16.0 56.0
      39. NBML P2-P3          *  75052.0  874196.0   75590.0  873668.0 *     754.
134. FL   2859.   0.8   8.0 56.0
      40. NBML P3-P4          *  75590.0  873668.0   75754.0  873527.0 *     216.
131. DP   2859.   0.8  -4.0 56.0
      41. NBML P4-P5          *  75754.0  873527.0   75905.0  873415.1 *     188.
127. DP   2859.   0.8 -10.0 56.0
      42. NBML P5-P6          *  75905.0  873415.1   76115.0  873284.0 *     248.
122. DP   2859.   0.8 -11.0 56.0
      43. NBML P6-P7          *  76115.0  873284.0   76404.0  873143.1 *     322.
116. DP   2859.   0.8 -12.0 56.0
      44. NBML P7-P8          *  76404.0  873143.1   76604.0  873064.0 *     215.
112. DP   2859.   0.8 -10.0 56.0
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      DATE : 11/17/19
      TIME : 14:51:17

       LINK VARIABLES
       --------------
         LINK DESCRIPTION     *         LINK COORDINATES (FT)          *    LENGTH
BRG TYPE   VPH    EF      H   W    V/C QUEUE
                               *   X1        Y1        X2        Y2     *     (FT)
(DEG)            (G/MI)  (FT) (FT)       (VEH)

-----------------------*----------------------------------------*----------------
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      45. NBML P8-P9          *  76604.0  873064.0   76811.0  873005.1 *     215.
106. DP   2859.   0.8  -8.0 56.0
      46. NBML P9-P10         *  76811.0  873005.1   77316.0  872907.0 *     514.
101. DP   2859.   0.8  -7.0 56.0
      47. NBML P10-P11        *  77316.0  872907.0   78005.0  872782.1 *     700.
100. DP   2859.   0.8  -2.0 56.0
      48. NBML P11-P12        *  78005.0  872782.1   78697.0  872657.0 *     703.
100. AG   2859.   0.8   0.0 56.0
      49. NBML P12-P13        *  78697.0  872657.0   79498.0  872510.1 *     814.
100. AG   2859.   0.8   0.0 68.0
      50. SBML P1-P2          *  74770.0  874386.0   74855.0  874308.1 *     115.
133. FL   3349.   0.8  16.0 68.0
      51. SBML P2-P3          *  74855.0  874308.1   75577.0  873599.0 *    1012.
134. FL   2960.   0.8   6.0 56.0
      52. SBML P3-P4          *  75577.0  873599.0   75813.0  873409.0 *     303.
129. DP   2960.   0.8  -4.0 56.0
      53. SBML P4-P5          *  75813.0  873409.0   76020.0  873271.0 *     249.
124. DP   2960.   0.8 -10.0 56.0
      54. SBML P5-P6          *  76020.0  873271.0   76273.0  873133.0 *     288.
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119. DP   2960.   0.8 -13.0 56.0
      55. SBML P6-P7          *  76273.0  873133.0   76525.0  873028.0 *     273.
113. DP   2960.   0.8 -10.0 56.0
      56. SBML P7-P8          *  76525.0  873028.0   76797.0  872946.0 *     284.
107. DP   2960.   0.8  -8.0 56.0
      57. SBML P8-P9          *  76797.0  872946.0   77247.0  872854.0 *     459.
102. DP   2960.   0.8  -6.0 56.0
      58. SBML P9-P10         *  77247.0  872854.0   77998.0  872716.0 *     764.
100. DP   2960.   0.8  -2.0 56.0
      59. SBML P10-P11        *  77998.0  872716.0   78435.0  872634.0 *     445.
101. AG   2960.   0.8   0.0 56.0
      60. SBML P11-P12        *  78435.0  872634.0   79484.0  872441.1 *    1067.
100. AG   2960.   0.8   0.0 68.0
      61. SBEXR P1-P2         *  74836.0  874294.0   75272.0  873796.0 *     662.
139. FL    389.   0.8   7.0 34.0
      62. SBEXR P2-P3         *  75272.0  873796.0   75515.0  873556.0 *     342.
135. FL    389.   0.8   4.0 34.0
      63. SBEXR P3-P4         *  75515.0  873556.0   75757.0  873356.0 *     314.
130. FL    389.   0.8   2.0 34.0
      64. SBEXR P4-P5         *  75757.0  873356.0   75836.0  873291.0 *     102.
129. FL    389.   0.8   2.0 34.0
      65. SBEXR P5-P6         *  75836.0  873291.0   75899.0  873241.1 *      80.
128. AG    389.   0.8   0.0 34.0
      66. SBEXR P6-P7         *  75899.0  873241.1   75987.0  873182.0 *     106.
124. AG    389.   0.8   0.0 34.0
      67. SBENTR P1-P2        *  76791.0  872848.0   76975.0  872818.0 *     186.
 99. AG    479.   0.8   0.0 34.0
      68. SBENTR P2-P3        *  76975.0  872818.0   77231.0  872789.0 *     258.
 96. AG    479.   0.8   0.0 34.0
      69. SBENTR P3-P4        *  77231.0  872789.0   77523.0  872746.0 *     295.
 98. DP    479.   0.8  -2.0 34.0
      70. SBENTR P4-P5        *  77523.0  872746.0   77992.0  872670.0 *     475.
 99. DP    479.   0.8  -2.0 34.0
      71. SBENTR P5-P6        *  77992.0  872670.0   78428.0  872611.0 *     440.
 98. AG    479.   0.8   0.0 34.0
      72. SBFR P1-P2          *  74668.0  874183.0   74809.0  874170.1 *     142.
 95. AG    847.   0.8   0.0 46.0
      73. SBFR P2-P3          *  74809.0  874170.1   74908.0  874098.0 *     122.
126. AG    847.   0.8   0.0 46.0
      74. SBFR P3-P4          *  74908.0  874098.0   75541.0  873484.1 *     882.
134. AG    847.   0.8   0.0 46.0
      75. SBFR P4-P5          *  75541.0  873484.1   75702.0  873353.0 *     208.
129. AG    847.   0.8   0.0 46.0
      76. SBFR P5-P6          *  75702.0  873353.0   75885.0  873225.0 *     223.
125. AG    847.   0.8   0.0 46.0
      77. SBFR P6-P7          *  75885.0  873225.0   75977.0  873163.0 *     111.
124. AG    847.   0.8   0.0 46.0
      78. SBFR P7-P8          *  75977.0  873163.0   76230.0  873038.1 *     282.
116. AG    847.   0.8   0.0 58.0
      79. SBFR P8-P9          *  76230.0  873038.1   76502.0  872926.0 *     294.
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112. AG   1236.   0.8   0.0 58.0
      80. SBFR P9-P10         *  76502.0  872926.0   76784.0  872831.1 *     298.
109. AG   1236.   0.8   0.0 58.0
      81. SBFR P10-P11        *  76784.0  872831.1   76883.0  872812.0 *     101.
101. AG    757.   0.8   0.0 58.0
      82. SBFR P11-P12        *  76883.0  872812.0   77204.0  872756.0 *     326.
100. AG    757.   0.8   0.0 58.0
      83. SBFR P12-SBVCAP P1  *  77204.0  872756.0   78038.0  872602.0 *     848.
100. AG    757.   0.8   0.0 58.0
      84. SBVCAP P1-P2        *  78038.0  872602.0   78084.8  872579.5 *      52.
116. FL     16. 100.0   6.0 36.0 0.14   2.6
      85. SBVCAP P2-SBFR P14  *  78425.0  872415.0   78720.0  872395.0 *     296.
 94. FL    715.   0.8  12.0 46.0
      86. SBFR P14-P15        *  78720.0  872395.0   78999.0  872418.0 *     280.
 85. FL    715.   0.8   6.0 46.0
      87. SBFR P15-P16        *  78999.0  872418.0   79465.0  872336.1 *     473.
100. AG    715.   0.8   0.0 46.0
      88. SBVCLT P1-P2        *  78044.0  872621.0   78088.4  872599.1 *      49.
116. FL      5. 100.0   6.0 12.0 0.26   2.5
      89. SBVCRT P1-P2        *  78070.0  872556.0   78137.5  872522.6 *      75.
116. FL      5. 100.0   6.0 12.0 0.43   3.8
      90. WBVCAP P1-P2        *  78602.0  873146.0   78590.8  873079.0 *      68.
190. FL      8. 100.0  15.0 24.0 0.21   3.5
      91. WBVCAP P2-WBVC P3   *  78569.0  872949.0   78543.0  872815.0 *     137.
191. FL    519.   0.9  14.0 44.0
      92. WBVC P3-WBVCAP P4   *  78543.0  872815.0   78494.0  872552.0 *     268.
191. BR    539.   0.9  16.0 44.0
      93. WBVCAP P4-P5        *  78494.0  872552.0   78480.6  872482.7 *      71.
191. FL      8. 100.0  12.0 24.0 0.21   3.6
      94. WBVCAP P5-WBVC P6   *  78477.0  872464.0   78448.0  872293.0 *     173.
190. FL    539.   0.9  12.0 44.0
      95. WBVC P6-P7          *  78448.0  872293.0   78385.0  871962.1 *     337.
191. FL    560.   0.9  12.0 44.0
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DATE : 11/17/19
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LINK VARIABLES

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  LINK DESCRIPTION     *         LINK COORDINATES (FT)          *    LENGTH
BRG TYPE   VPH    EF      H   W    V/C QUEUE
                       *   X1        Y1        X2        Y2     *     (FT)
(DEG)           (G/MI)  (FT) (FT)       (VEH)

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     96. EBVCAP P1-P2        *  78415.0  871959.0   78419.1  871981.5 *      23.
 10. FL      8. 100.0  12.0 24.0 0.06   1.2
     97. EBVCAP P2-EBVC P3   *  78487.0  872356.1   78523.0  872546.0 *     193.
 11. FL    186.   0.9  12.0 44.0
     98. EBVC P3-EBVCAP P4   *  78523.0  872546.0   78569.0  872802.0 *     260.
 10. BR    207.   0.9  16.0 44.0
     99. EBVCAP P4-P5        *  78569.0  872802.0   78573.0  872825.3 *      24.
 10. FL      7. 100.0  15.0 24.0 0.06   1.2
    100. EBVCAP P5-EBVC P6   *  78579.0  872861.0   78608.0  873008.0 *     150.
 11. FL    207.   0.9  14.0 44.0
    101. EBVC P6-P7          *  78608.0  873008.0   78635.0  873140.0 *     135.
 12. FL    278.   0.9  15.0 44.0
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DATE : 11/17/19
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ADDITIONAL QUEUE LINK PARAMETERS

LINK DESCRIPTION	*	CYCLE LENGTH (SEC)	RED TIME (SEC)	CLEARANCE LOST TIME (SEC)	APPROACH VOL (VPH)	SATURATION FLOW RATE (VPH)	IDLE EM FAC (gm/hr)	SIGNAL TYPE	ARRIVAL RATE
17. NBVCAP P2-P1	*	95	69	2.0	367	3539	3.01	2	1
19. NBVCRT P1-P2	*	95	69	2.0	214	1583	3.01	2	1
20. NBVCRT P2-P3	*	95	69	2.0	214	1583	3.01	2	1
21. NBVCLT P1-P2	*	95	69	2.0	214	1770	3.01	2	1
22. NBVCLT P2-P3	*	95	69	2.0	214	1770	3.01	2	1
84. SBVCAP P1-P2	*	95	64	2.0	429	3539	3.01	2	1
88. SBVCLT P1-P2	*	95	64	2.0	133	1770	3.01	2	1
89. SBVCRT P1-P2	*	95	64	2.0	194	1583	3.01	2	1
90. WBVCAP P1-P2	*	95	48	2.0	519	2775	3.01	2	1
93. WBVCAP P4-P5	*	95	48	2.0	539	2775			

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 3.01      2        1
     96. EBVCAP P1-P2        *      95       45       2.0       186       3362
 3.01      2        1
     99. EBVCAP P4-P5        *      95       42       2.0       207       3362
 3.01      2        1
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RECEPTOR LOCATIONS

RECEPTOR	COORDINATES (FT) X	Y	Z
1. R1	75646.0	873829.1	5.9
2. R2	76227.0	873389.0	5.9
3. R3	77460.0	873035.0	5.9
4. R4	76089.0	873051.0	5.9
5. R5	78710.0	872962.0	17.9
6. R6	78277.0	872424.0	17.9

MODEL RESULTS

REMARKS : In search of the angle corresponding to the maximum concentration, only the first angle, of the angles with same maximum concentrations, is indicated as maximum.

WIND ANGLE RANGE: 0.-360.

WIND ANGLE (DEGR)	CONCENTRATION (PPM) REC1	REC2	REC3	REC4	REC5	REC6
0.	1.7	1.7	1.7	1.7	1.7	1.7
10.	1.7	1.7	1.7	1.7	1.7	1.7
20.	1.7	1.7	1.7	1.7	1.7	1.7
30.	1.7	1.7	1.7	1.7	1.7	1.7
40.	1.7	1.7	1.7	1.7	1.7	1.7
50.	1.7	1.7	1.7	1.7	1.7	1.7
60.	1.7	1.7	1.7	1.7	1.7	1.7
70.	1.7	1.7	1.7	1.7	1.7	1.7
80.	1.7	1.7	1.7	1.7	1.7	1.7
90.	1.7	1.7	1.7	1.7	1.7	1.7
100.	1.7	1.7	1.7	1.7	1.7	1.7
110.	1.7	1.7	1.7	1.7	1.7	1.7
120.	1.7	1.7	1.7	1.7	1.7	1.7
130.	1.7	1.7	1.7	1.7	1.7	1.7

140.	*	1.7	1.7	1.7	1.7	1.7	1.7
150.	*	1.7	1.7	1.7	1.7	1.7	1.7
160.	*	1.7	1.7	1.7	1.7	1.7	1.7
170.	*	1.7	1.7	1.7	1.7	1.7	1.7
180.	*	1.7	1.7	1.7	1.7	1.7	1.7
190.	*	1.7	1.7	1.7	1.7	1.7	1.7
200.	*	1.7	1.7	1.7	1.7	1.7	1.7
210.	*	1.7	1.7	1.7	1.7	1.7	1.7
220.	*	1.7	1.7	1.7	1.7	1.7	1.7
230.	*	1.7	1.7	1.7	1.7	1.7	1.7
240.	*	1.7	1.7	1.7	1.7	1.7	1.7
250.	*	1.7	1.7	1.7	1.7	1.7	1.7
260.	*	1.7	1.7	1.7	1.7	1.7	1.7
270.	*	1.7	1.7	1.7	1.7	1.7	1.7
280.	*	1.7	1.7	1.7	1.7	1.7	1.7
290.	*	1.8	1.7	1.7	1.7	1.7	1.7
300.	*	1.7	1.7	1.7	1.7	1.7	1.7
310.	*	1.7	1.7	1.7	1.7	1.7	1.7
320.	*	1.7	1.7	1.7	1.7	1.7	1.7
330.	*	1.7	1.7	1.7	1.7	1.7	1.7
340.	*	1.7	1.7	1.7	1.7	1.7	1.7
350.	*	1.7	1.7	1.7	1.7	1.7	1.7
360.	*	1.7	1.7	1.7	1.7	1.7	1.7
MAX	*	1.8	1.7	1.7	1.7	1.7	1.7
DEGR.	*	290	0	0	0	0	0

THE HIGHEST CONCENTRATION OF 1.80 PPM OCCURRED AT RECEPTOR REC1 .

DATE : 11/17/19
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RECEPTOR - LINK MATRIX FOR THE ANGLE PRODUCING
THE MAXIMUM CONCENTRATION FOR EACH RECEPTOR

		CO/LINK (PPM) ANGLE (DEGREES)					
	*	REC1	REC2	REC3	REC4	REC5	REC6
LINK #	*	290	0	0	0	0	0
1	*	0.0	0.0	0.0	0.0	0.0	0.0
2	*	0.0	0.0	0.0	0.0	0.0	0.0
3	*	0.0	0.0	0.0	0.0	0.0	0.0
4	*	0.0	0.0	0.0	0.0	0.0	0.0
5	*	0.0	0.0	0.0	0.0	0.0	0.0

6	*	0.0	0.0	0.0	0.0	0.0	0.0
7	*	0.0	0.0	0.0	0.0	0.0	0.0
8	*	0.0	0.0	0.0	0.0	0.0	0.0
9	*	0.0	0.0	0.0	0.0	0.0	0.0
10	*	0.0	0.0	0.0	0.0	0.0	0.0
11	*	0.0	0.0	0.0	0.0	0.0	0.0
12	*	0.0	0.0	0.0	0.0	0.0	0.0
13	*	0.0	0.0	0.0	0.0	0.0	0.0
14	*	0.0	0.0	0.0	0.0	0.0	0.0
15	*	0.0	0.0	0.0	0.0	0.0	0.0
16	*	0.0	0.0	0.0	0.0	0.0	0.0
17	*	0.0	0.0	0.0	0.0	0.0	0.0
18	*	0.0	0.0	0.0	0.0	0.0	0.0
19	*	0.0	0.0	0.0	0.0	0.0	0.0
20	*	0.0	0.0	0.0	0.0	0.0	0.0
21	*	0.0	0.0	0.0	0.0	0.0	0.0
22	*	0.0	0.0	0.0	0.0	0.0	0.0
23	*	0.0	0.0	0.0	0.0	0.0	0.0
24	*	0.0	0.0	0.0	0.0	0.0	0.0
25	*	0.0	0.0	0.0	0.0	0.0	0.0
26	*	0.0	0.0	0.0	0.0	0.0	0.0
27	*	0.0	0.0	0.0	0.0	0.0	0.0
28	*	0.0	0.0	0.0	0.0	0.0	0.0
29	*	0.0	0.0	0.0	0.0	0.0	0.0
30	*	0.0	0.0	0.0	0.0	0.0	0.0
31	*	0.0	0.0	0.0	0.0	0.0	0.0
32	*	0.0	0.0	0.0	0.0	0.0	0.0
33	*	0.0	0.0	0.0	0.0	0.0	0.0
34	*	0.0	0.0	0.0	0.0	0.0	0.0
35	*	0.0	0.0	0.0	0.0	0.0	0.0
36	*	0.0	0.0	0.0	0.0	0.0	0.0
37	*	0.0	0.0	0.0	0.0	0.0	0.0
38	*	0.0	0.0	0.0	0.0	0.0	0.0
39	*	0.1	0.0	0.0	0.0	0.0	0.0
40	*	0.0	0.0	0.0	0.0	0.0	0.0
41	*	0.0	0.0	0.0	0.0	0.0	0.0
42	*	0.0	0.0	0.0	0.0	0.0	0.0
43	*	0.0	0.0	0.0	0.0	0.0	0.0
44	*	0.0	0.0	0.0	0.0	0.0	0.0
45	*	0.0	0.0	0.0	0.0	0.0	0.0

	*	CO/LINK (PPM)					
	*	ANGLE (DEGREES)					
	*	REC1	REC2	REC3	REC4	REC5	REC6
LINK #	*	290	0	0	0	0	0
-------	*						

46	*	0.0	0.0	0.0	0.0	0.0	0.0
47	*	0.0	0.0	0.0	0.0	0.0	0.0
48	*	0.0	0.0	0.0	0.0	0.0	0.0
49	*	0.0	0.0	0.0	0.0	0.0	0.0
50	*	0.0	0.0	0.0	0.0	0.0	0.0
51	*	0.0	0.0	0.0	0.0	0.0	0.0
52	*	0.0	0.0	0.0	0.0	0.0	0.0
53	*	0.0	0.0	0.0	0.0	0.0	0.0
54	*	0.0	0.0	0.0	0.0	0.0	0.0
55	*	0.0	0.0	0.0	0.0	0.0	0.0
56	*	0.0	0.0	0.0	0.0	0.0	0.0
57	*	0.0	0.0	0.0	0.0	0.0	0.0
58	*	0.0	0.0	0.0	0.0	0.0	0.0
59	*	0.0	0.0	0.0	0.0	0.0	0.0
60	*	0.0	0.0	0.0	0.0	0.0	0.0
61	*	0.0	0.0	0.0	0.0	0.0	0.0
62	*	0.0	0.0	0.0	0.0	0.0	0.0
63	*	0.0	0.0	0.0	0.0	0.0	0.0
64	*	0.0	0.0	0.0	0.0	0.0	0.0
65	*	0.0	0.0	0.0	0.0	0.0	0.0
66	*	0.0	0.0	0.0	0.0	0.0	0.0
67	*	0.0	0.0	0.0	0.0	0.0	0.0
68	*	0.0	0.0	0.0	0.0	0.0	0.0
69	*	0.0	0.0	0.0	0.0	0.0	0.0
70	*	0.0	0.0	0.0	0.0	0.0	0.0
71	*	0.0	0.0	0.0	0.0	0.0	0.0
72	*	0.0	0.0	0.0	0.0	0.0	0.0
73	*	0.0	0.0	0.0	0.0	0.0	0.0
74	*	0.0	0.0	0.0	0.0	0.0	0.0
75	*	0.0	0.0	0.0	0.0	0.0	0.0
76	*	0.0	0.0	0.0	0.0	0.0	0.0
77	*	0.0	0.0	0.0	0.0	0.0	0.0
78	*	0.0	0.0	0.0	0.0	0.0	0.0
79	*	0.0	0.0	0.0	0.0	0.0	0.0
80	*	0.0	0.0	0.0	0.0	0.0	0.0
81	*	0.0	0.0	0.0	0.0	0.0	0.0
82	*	0.0	0.0	0.0	0.0	0.0	0.0
83	*	0.0	0.0	0.0	0.0	0.0	0.0
84	*	0.0	0.0	0.0	0.0	0.0	0.0
85	*	0.0	0.0	0.0	0.0	0.0	0.0
86	*	0.0	0.0	0.0	0.0	0.0	0.0
87	*	0.0	0.0	0.0	0.0	0.0	0.0
88	*	0.0	0.0	0.0	0.0	0.0	0.0
89	*	0.0	0.0	0.0	0.0	0.0	0.0
90	*	0.0	0.0	0.0	0.0	0.0	0.0
91	*	0.0	0.0	0.0	0.0	0.0	0.0
92	*	0.0	0.0	0.0	0.0	0.0	0.0
93	*	0.0	0.0	0.0	0.0	0.0	0.0
94	*	0.0	0.0	0.0	0.0	0.0	0.0
95	*	0.0	0.0	0.0	0.0	0.0	0.0

96	*	0.0	0.0	0.0	0.0	0.0	0.0
97	*	0.0	0.0	0.0	0.0	0.0	0.0
98	*	0.0	0.0	0.0	0.0	0.0	0.0

		CO/LINK (PPM) ANGLE (DEGREES)					
		REC1	REC2	REC3	REC4	REC5	REC6
LINK #	*	290	0	0	0	0	0
99	*	0.0	0.0	0.0	0.0	0.0	0.0
100	*	0.0	0.0	0.0	0.0	0.0	0.0
101	*	0.0	0.0	0.0	0.0	0.0	0.0

```
'I-287 I-820 TO BISHOP 2045 VillageInt' 60 108 0 0 6 0.3048 1 1
'R1' 75646 873829 5.9
'R2' 76227 873389 5.9
'R3' 77460 873035 5.9
'R4' 76089 873051 5.9
'R5' 78710 872962 17.9
'R6' 78277 872424 17.9
'2045 Int' 101 36 1 'C'
1
'NBFR P1-P2' 'AG' 75023 874495 75032 874409 815 0.43 0 46
1
'NBFR P2-P3' 'AG' 75032 874409 75055 874360 815 0.43 0 46
1
'NBFR P3-P4' 'AG' 75055 874360 75088 874317 815 0.43 0 46
1
'NBFR P4-P5' 'AG' 75088 874317 75567 873842 815 0.43 0 46
1
'NBFR P5-P6' 'AG' 75567 873842 75771 873655 815 0.43 0 46
1
'NBFR P6-P7' 'AG' 75771 873655 75941 873520 815 0.43 0 46
1
'NBFR P7-P8' 'AG' 75941 873520 76207 873353 815 0.43 0 46
1
'NBFR P8-P9' 'AG' 76207 873353 76469 873232 815 0.43 0 46
1
'NBFR P9-P10' 'AG' 76469 873232 76715 873143 815 0.43 0 46
1
'NBFR P10-P11' 'AG' 76715 873143 76978 873077 815 0.43 0 46
1
'NBFR P11-P12' 'AG' 76978 873077 77345 872999 815 0.43 0 58
1
'NBFR P12-P13' 'AG' 77345 872999 77621 872966 1513 0.43 0 58
1
'NBFR P13-P14' 'AG' 77621 872966 78018 872887 902 0.43 0 46
1
'NBFR P14-P15' 'FL' 78018 872887 78225 872887 902 0.43 6 46
1
'NBFR P15-P16' 'FL' 78225 872887 78418 872907 902 0.43 12 46
1
'NBFR P16-NBVCAP P2' 'FL' 78418 872907 79061 872697 902 0.43 14 46
2
'NBVCAP P2-P1' 'FL' 79061 872697 78631 872897 8 24 2
   95 69 2.0 466 1.49 3539 2 1
1
'NBVCAP P1-NBFR P17' 'AG' 78631 872897 79521 872605 1009 0.43 0 58
2
'NBVCRT P1-P2' 'FL' 79012 872743 78828 872848 6 12 1
   95 69 2.0 272 1.49 1583 2 1
2
'NBVCRT P2-P3' 'FL' 78828 872848 78641 872923 12 12 1
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   95 69 2.0 272 1.49 1583 2 1
2
'NBVCLT P1-P2' 'FL' 79028 872684 78805 872795 6 12 1
   95 69 2.0 272 1.49 1770 2 1
2
'NBVCLT P2-P3' 'FL' 78805 872795 78625 872877 12 12 1
   95 69 2.0 272 1.49 1770 2 1
1
'NBENTR P1-P2' 'FL' 75072 874216 75400 873917 698 0.43 10 34
1
'NBENTR P2-P3' 'FL' 75400 873917 75725 873642 698 0.43 5 34
1
'NBENTR P3-P4' 'DP' 75725 873642 75853 873543 698 0.43 -2 34
1
'NBENTR P4-P5' 'DP' 75853 873543 76010 873432 698 0.43 -5 34
1
'NBENTR P5-P6' 'DP' 76010 873432 76125 873359 698 0.43 -5 34
1
'NBENTR P6-P7' 'DP' 76125 873359 76299 873268 698 0.43 -5 34
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'NBENTR P7-P8' 'DP' 76299 873268 76466 873192 698 0.43 -4 34
1
'NBENTR P8-P9' 'DP' 76466 873192 76571 873149 698 0.43 -3 34
1
'NBENTR P9-P10' 'DP' 76571 873149 76712 873113 698 0.43 -2 34
1
'NBENTR P10-P11' 'DP' 76712 873113 76843 873084 698 0.43 -1 34
1
'NBENTR P11-P12' 'AG' 76843 873084 76975 873058 698 0.43 0 34
1
'NBEXR P1-P2' 'AG' 77618 872940 77719 872920 611 0.43 0 34
1
'NBEXR P2-P3' 'DP' 77719 872920 77897 872871 611 0.43 -1 34
1
'NBEXR P3-P4' 'DP' 77897 872871 78015 872848 611 0.43 -2 34
1
'NBEXR P4-P5' 'AG' 78015 872848 78704 872690 611 0.43 0 34
1
'NBML P1-P2' 'FL' 74819 874432 75052 874196 4365 0.45 16 56
1
'NBML P2-P3' 'FL' 75052 874196 75590 873668 3667 0.45 8 56
1
'NBML P3-P4' 'DP' 75590 873668 75754 873527 3667 0.45 -4 56
1
'NBML P4-P5' 'DP' 75754 873527 75905 873415 3667 0.45 -10 56
1
'NBML P5-P6' 'DP' 75905 873415 76115 873284 3667 0.45 -11 56
1
'NBML P6-P7' 'DP' 76115 873284 76404 873143 3667 0.45 -12 56
1
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'NBML P7-P8' 'DP' 76404 873143 76604 873064 3667 0.45 -10 56
1
'NBML P8-P9' 'DP' 76604 873064 76811 873005 3667 0.45 -8 56
1
'NBML P9-P10' 'DP' 76811 873005 77316 872907 3667 0.45 -7 56
1
'NBML P10-P11' 'DP' 77316 872907 78005 872782 3667 0.45 -2 56
1
'NBML P11-P12' 'AG' 78005 872782 78697 872657 3667 0.45 0 56
1
'NBML P12-P13' 'AG' 78697 872657 79498 872510 3667 0.45 0 68
1
'SBML P1-P2' 'FL' 74770 874386 74855 874308 4297 0.45 16 68
1
'SBML P2-P3' 'FL' 74855 874308 75577 873599 3793 0.45 6 56
1
'SBML P3-P4' 'DP' 75577 873599 75813 873409 3793 0.45 -4 56
1
'SBML P4-P5' 'DP' 75813 873409 76020 873271 3793 0.45 -10 56
1
'SBML P5-P6' 'DP' 76020 873271 76273 873133 3793 0.45 -13 56
1
'SBML P6-P7' 'DP' 76273 873133 76525 873028 3793 0.45 -10 56
1
'SBML P7-P8' 'DP' 76525 873028 76797 872946 3793 0.45 -8 56
1
'SBML P8-P9' 'DP' 76797 872946 77247 872854 3793 0.45 -6 56
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'SBML P9-P10' 'DP' 77247 872854 77998 872716 3793 0.45 -2 56
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'SBML P10-P11' 'AG' 77998 872716 78435 872634 3793 0.45 0 56
1
'SBML P11-P12' 'AG' 78435 872634 79484 872441 3793 0.45 0 68
1
'SBEXR P1-P2' 'FL' 74836 874294 75272 873796 504 0.43 7 34
1
'SBEXR P2-P3' 'FL' 75272 873796 75515 873556 504 0.43 4 34
1
'SBEXR P3-P4' 'FL' 75515 873556 75757 873356 504 0.43 2 34
1
'SBEXR P4-P5' 'FL' 75757 873356 75836 873291 504 0.43 2 34
1
'SBEXR P5-P6' 'AG' 75836 873291 75899 873241 504 0.43 0 34
1
'SBEXR P6-P7' 'AG' 75899 873241 75987 873182 504 0.43 0 34
1
'SBENTR P1-P2' 'AG' 76791 872848 76975 872818 611 0.43 0 34
1
'SBENTR P2-P3' 'AG' 76975 872818 77231 872789 611 0.43 0 34
1

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'SBENTR P3-P4' 'DP' 77231 872789 77523 872746 611 0.43 -2 34
1
'SBENTR P4-P5' 'DP' 77523 872746 77992 872670 611 0.43 -2 34
1
'SBENTR P5-P6' 'AG' 77992 872670 78428 872611 611 0.43 0 34
1
'SBFR P1-P2' 'AG' 74668 874183 74809 874170 1086 0.43 0 46
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'SBFR P11-P12' 'AG' 76883 872812 77204 872756 980 0.43 0 58
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'SBFR P12-SBVCAP P1' 'AG' 77204 872756 78038 872602 980 0.43 0 58
2
'SBVCAP P1-P2' 'FL' 78038 872602 78425 872415 6 36 3
   95 64 2.0 553 1.49 3539 2 1
1
'SBVCAP P2-SBFR P14' 'FL' 78425 872415 78720 872395 922 0.43 12 46
1
'SBFR P14-P15' 'FL' 78720 872395 78999 872418 922 0.43 6 46
1
'SBFR P15-P16' 'AG' 78999 872418 79465 872336 922 0.43 0 46
2
'SBVCLT P1-P2' 'FL' 78044 872621 78431 872431 6 12 1
   95 64 2.0 175 1.49 1770 2 1
2
'SBVCRT P1-P2' 'FL' 78070 872556 78389 872398 6 12 1
   95 64 2.0 252 1.49 1583 2 1
2
'WBVCAP P1-P2' 'FL' 78602 873146 78569 872949 15 24 2
   95 48 2.0 660 1.49 2775 2 1
1
'WBVCAP P2-WBVC P3' 'FL' 78569 872949 78543 872815 660 0.51 14 44
1
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'WBVC P3-WBVCAP P4' 'BR' 78543 872815 78494 872552 679 0.51 16 44
2
'WBVCAP P4-P5' 'FL' 78494 872552 78477 872464 12 24 2
   95 48 2.0 679 1.49 2775 2 1
1
'WBVCAP P5-WBVC P6' 'FL' 78477 872464 78448 872293 679 0.51 12 44
1
'WBVC P6-P7' 'FL' 78448 872293 78385 871962 708 0.51 12 44
2
'EBVCAP P1-P2' 'FL' 78415 871959 78487 872356 12 24 2
   95 42 2.0 252 1.49 3362 2 1
1
'EBVCAP P2-EBVC P3' 'FL' 78487 872356 78523 872546 252 0.51 12 44
1
'EBVC P3-EBVCAP P4' 'BR' 78523 872546 78569 872802 281 0.51 16 44
2
'EBVCAP P4-P5' 'FL' 78569 872802 78579 872861 15 24 2
   95 42 2.0 281 1.49 3362 2 1
1
'EBVCAP P5-EBVC P6' 'FL' 78579 872861 78608 873008 281 0.51 14 44
1
'EBVC P6-P7' 'FL' 78608 873008 78635 873140 369 0.51 15 44
1 0 6 1000 1.7 'Y' 10 0 36
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JOB: I-287 I-820 TO BISHOP 2045 VillageInt RUN: 2045 Int

DATE : 11/17/19
TIME : 14:55:40

The MODE flag has been set to C for calculating CO averages.

SITE & METEOROLOGICAL VARIABLES

VS = 0.0 CM/S VD = 0.0 CM/S Z0 = 108. CM
U = 1.0 M/S CLAS = 6 (F) ATIM = 60. MINUTES MIXH = 1000. M AMB = 1.7 PPM

LINK VARIABLES

	LINK DESCRIPTION	*	LINK COORDINATES (FT) X1	Y1	X2	Y2	*	LENGTH (FT)	BRG (DEG)	TYPE	VPH	EF (G/MI)	H (FT)	W (FT)	V/C	QUEUE (VEH)
1.	NBFR P1-P2	*	75023.0	874495.1	75032.0	874409.0	*	86.	174.	AG	815.	0.4	0.0	46.0		
2.	NBFR P2-P3	*	75032.0	874409.0	75055.0	874360.0	*	54.	155.	AG	815.	0.4	0.0	46.0		
3.	NBFR P3-P4	*	75055.0	874360.0	75088.0	874317.0	*	54.	143.	AG	815.	0.4	0.0	46.0		
4.	NBFR P4-P5	*	75088.0	874317.0	75567.0	873842.0	*	675.	135.	AG	815.	0.4	0.0	46.0		
5.	NBFR P5-P6	*	75567.0	873842.0	75771.0	873655.1	*	277.	132.	AG	815.	0.4	0.0	46.0		
6.	NBFR P6-P7	*	75771.0	873655.1	75941.0	873520.0	*	217.	128.	AG	815.	0.4	0.0	46.0		
7.	NBFR P7-P8	*	75941.0	873520.0	76207.0	873353.0	*	314.	122.	AG	815.	0.4	0.0	46.0		
8.	NBFR P8-P9	*	76207.0	873353.0	76469.0	873232.0	*	289.	115.	AG	815.	0.4	0.0	46.0		
9.	NBFR P9-P10	*	76469.0	873232.0	76715.0	873143.1	*	262.	110.	AG	815.	0.4	0.0	46.0		
10.	NBFR P10-P11	*	76715.0	873143.1	76978.0	873077.0	*	271.	104.	AG	815.	0.4	0.0	46.0		
11.	NBFR P11-P12	*	76978.0	873077.0	77345.0	872999.0	*	375.	102.	AG	815.	0.4	0.0	58.0		
12.	NBFR P12-P13	*	77345.0	872999.0	77621.0	872966.0	*	278.	97.	AG	1513.	0.4	0.0	58.0		

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     13. NBFR P13-P14        *  77621.0  872966.0   78018.0  872887.0 *     405.
101. AG    902.   0.4   0.0 46.0
     14. NBFR P14-P15        *  78018.0  872887.0   78225.0  872887.0 *     207.
 90. FL    902.   0.4   6.0 46.0
     15. NBFR P15-P16        *  78225.0  872887.0   78418.0  872907.0 *     194.
 84. FL    902.   0.4  12.0 46.0
     16. NBFR P16-NBVCAP P2  *  78418.0  872907.0   79061.0  872697.1 *     676.
108. FL    902.   0.4  14.0 46.0
     17. NBVCAP P2-P1        *  79061.0  872697.1   78973.3  872737.9 *      97.
295. FL      6. 100.0   8.0 24.0 0.28   4.9
     18. NBVCAP P1-NBFR P17  *  78631.0  872897.0   79521.0  872605.0 *     937.
108. AG   1009.   0.4   0.0 58.0
     19. NBVCRT P1-P2        *  79012.0  872743.0   78905.8  872803.6 *     122.
300. FL      3. 100.0   6.0 12.0 0.74   6.2
     20. NBVCRT P2-P3        *  78828.0  872848.0   78714.6  872893.5 *     122.
292. FL      3. 100.0  12.0 12.0 0.74   6.2
     21. NBVCLT P1-P2        *  79028.0  872684.0   78925.6  872735.0 *     114.
296. FL      3. 100.0   6.0 12.0 0.67   5.8
     22. NBVCLT P2-P3        *  78805.0  872795.0   78700.9  872842.4 *     114.
294. FL      3. 100.0  12.0 12.0 0.67   5.8
     23. NBENTR P1-P2        *  75072.0  874216.0   75400.0  873917.0 *     444.
132. FL    698.   0.4  10.0 34.0
     24. NBENTR P2-P3        *  75400.0  873917.0   75725.0  873642.0 *     426.
130. FL    698.   0.4   5.0 34.0
     25. NBENTR P3-P4        *  75725.0  873642.0   75853.0  873543.0 *     162.
128. DP    698.   0.4  -2.0 34.0
     26. NBENTR P4-P5        *  75853.0  873543.0   76010.0  873432.0 *     192.
125. DP    698.   0.4  -5.0 34.0
     27. NBENTR P5-P6        *  76010.0  873432.0   76125.0  873359.0 *     136.
122. DP    698.   0.4  -5.0 34.0
     28. NBENTR P6-P7        *  76125.0  873359.0   76299.0  873268.0 *     196.
118. DP    698.   0.4  -5.0 34.0
     29. NBENTR P7-P8        *  76299.0  873268.0   76466.0  873192.1 *     183.
114. DP    698.   0.4  -4.0 34.0
     30. NBENTR P8-P9        *  76466.0  873192.1   76571.0  873149.0 *     113.
112. DP    698.   0.4  -3.0 34.0
     31. NBENTR P9-P10       *  76571.0  873149.0   76712.0  873113.0 *     146.
104. DP    698.   0.4  -2.0 34.0
     32. NBENTR P10-P11      *  76712.0  873113.0   76843.0  873084.0 *     134.
102. DP    698.   0.4  -1.0 34.0
     33. NBENTR P11-P12      *  76843.0  873084.0   76975.0  873058.1 *     135.
101. AG    698.   0.4   0.0 34.0
     34. NBEXR P1-P2         *  77618.0  872940.0   77719.0  872920.1 *     103.
101. AG    611.   0.4   0.0 34.0
     35. NBEXR P2-P3         *  77719.0  872920.1   77897.0  872871.0 *     185.
105. DP    611.   0.4  -1.0 34.0
     36. NBEXR P3-P4         *  77897.0  872871.0   78015.0  872848.0 *     120.
101. DP    611.   0.4  -2.0 34.0
     37. NBEXR P4-P5         *  78015.0  872848.0   78704.0  872690.0 *     707.
103. AG    611.   0.4   0.0 34.0
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      38. NBML P1-P2          *  74819.0  874432.0   75052.0  874196.0 *     332.
135. FL   4365.   0.4  16.0 56.0
      39. NBML P2-P3          *  75052.0  874196.0   75590.0  873668.0 *     754.
134. FL   3667.   0.4   8.0 56.0
      40. NBML P3-P4          *  75590.0  873668.0   75754.0  873527.0 *     216.
131. DP   3667.   0.4  -4.0 56.0
      41. NBML P4-P5          *  75754.0  873527.0   75905.0  873415.1 *     188.
127. DP   3667.   0.4 -10.0 56.0
      42. NBML P5-P6          *  75905.0  873415.1   76115.0  873284.0 *     248.
122. DP   3667.   0.4 -11.0 56.0
      43. NBML P6-P7          *  76115.0  873284.0   76404.0  873143.1 *     322.
116. DP   3667.   0.4 -12.0 56.0
      44. NBML P7-P8          *  76404.0  873143.1   76604.0  873064.0 *     215.
112. DP   3667.   0.4 -10.0 56.0
```



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      DATE : 11/17/19
      TIME : 14:55:40

       LINK VARIABLES
       --------------
         LINK DESCRIPTION     *         LINK COORDINATES (FT)          *    LENGTH
BRG TYPE   VPH    EF      H   W    V/C QUEUE
                               *   X1        Y1        X2        Y2     *     (FT)
(DEG)            (G/MI)  (FT) (FT)       (VEH)

-----------------------*----------------------------------------*----------------
---------------------------------------
      45. NBML P8-P9          *  76604.0  873064.0   76811.0  873005.1 *     215.
106. DP   3667.   0.4  -8.0 56.0
      46. NBML P9-P10         *  76811.0  873005.1   77316.0  872907.0 *     514.
101. DP   3667.   0.4  -7.0 56.0
      47. NBML P10-P11        *  77316.0  872907.0   78005.0  872782.1 *     700.
100. DP   3667.   0.4  -2.0 56.0
      48. NBML P11-P12        *  78005.0  872782.1   78697.0  872657.0 *     703.
100. AG   3667.   0.4   0.0 56.0
      49. NBML P12-P13        *  78697.0  872657.0   79498.0  872510.1 *     814.
100. AG   3667.   0.4   0.0 68.0
      50. SBML P1-P2          *  74770.0  874386.0   74855.0  874308.1 *     115.
133. FL   4297.   0.4  16.0 68.0
      51. SBML P2-P3          *  74855.0  874308.1   75577.0  873599.0 *    1012.
134. FL   3793.   0.4   6.0 56.0
      52. SBML P3-P4          *  75577.0  873599.0   75813.0  873409.0 *     303.
129. DP   3793.   0.4  -4.0 56.0
      53. SBML P4-P5          *  75813.0  873409.0   76020.0  873271.0 *     249.
124. DP   3793.   0.4 -10.0 56.0
      54. SBML P5-P6          *  76020.0  873271.0   76273.0  873133.0 *     288.
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119. DP   3793.   0.4 -13.0 56.0
      55. SBML P6-P7          *  76273.0  873133.0   76525.0  873028.0 *     273.
113. DP   3793.   0.4 -10.0 56.0
      56. SBML P7-P8          *  76525.0  873028.0   76797.0  872946.0 *     284.
107. DP   3793.   0.4  -8.0 56.0
      57. SBML P8-P9          *  76797.0  872946.0   77247.0  872854.0 *     459.
102. DP   3793.   0.4  -6.0 56.0
      58. SBML P9-P10         *  77247.0  872854.0   77998.0  872716.0 *     764.
100. DP   3793.   0.4  -2.0 56.0
      59. SBML P10-P11        *  77998.0  872716.0   78435.0  872634.0 *     445.
101. AG   3793.   0.4   0.0 56.0
      60. SBML P11-P12        *  78435.0  872634.0   79484.0  872441.1 *    1067.
100. AG   3793.   0.4   0.0 68.0
      61. SBEXR P1-P2         *  74836.0  874294.0   75272.0  873796.0 *     662.
139. FL    504.   0.4   7.0 34.0
      62. SBEXR P2-P3         *  75272.0  873796.0   75515.0  873556.0 *     342.
135. FL    504.   0.4   4.0 34.0
      63. SBEXR P3-P4         *  75515.0  873556.0   75757.0  873356.0 *     314.
130. FL    504.   0.4   2.0 34.0
      64. SBEXR P4-P5         *  75757.0  873356.0   75836.0  873291.0 *     102.
129. FL    504.   0.4   2.0 34.0
      65. SBEXR P5-P6         *  75836.0  873291.0   75899.0  873241.1 *      80.
128. AG    504.   0.4   0.0 34.0
      66. SBEXR P6-P7         *  75899.0  873241.1   75987.0  873182.0 *     106.
124. AG    504.   0.4   0.0 34.0
      67. SBENTR P1-P2        *  76791.0  872848.0   76975.0  872818.0 *     186.
 99. AG    611.   0.4   0.0 34.0
      68. SBENTR P2-P3        *  76975.0  872818.0   77231.0  872789.0 *     258.
 96. AG    611.   0.4   0.0 34.0
      69. SBENTR P3-P4        *  77231.0  872789.0   77523.0  872746.0 *     295.
 98. DP    611.   0.4  -2.0 34.0
      70. SBENTR P4-P5        *  77523.0  872746.0   77992.0  872670.0 *     475.
 99. DP    611.   0.4  -2.0 34.0
      71. SBENTR P5-P6        *  77992.0  872670.0   78428.0  872611.0 *     440.
 98. AG    611.   0.4   0.0 34.0
      72. SBFR P1-P2          *  74668.0  874183.0   74809.0  874170.1 *     142.
 95. AG   1086.   0.4   0.0 46.0
      73. SBFR P2-P3          *  74809.0  874170.1   74908.0  874098.0 *     122.
126. AG   1086.   0.4   0.0 46.0
      74. SBFR P3-P4          *  74908.0  874098.0   75541.0  873484.1 *     882.
134. AG   1086.   0.4   0.0 46.0
      75. SBFR P4-P5          *  75541.0  873484.1   75702.0  873353.0 *     208.
129. AG   1086.   0.4   0.0 46.0
      76. SBFR P5-P6          *  75702.0  873353.0   75885.0  873225.0 *     223.
125. AG   1086.   0.4   0.0 46.0
      77. SBFR P6-P7          *  75885.0  873225.0   75977.0  873163.0 *     111.
124. AG   1086.   0.4   0.0 46.0
      78. SBFR P7-P8          *  75977.0  873163.0   76230.0  873038.1 *     282.
116. AG   1086.   0.4   0.0 58.0
      79. SBFR P8-P9          *  76230.0  873038.1   76502.0  872926.0 *     294.
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112. AG   1591.   0.4   0.0 58.0
      80. SBFR P9-P10         *  76502.0  872926.0   76784.0  872831.1 *     298.
109. AG   1591.   0.4   0.0 58.0
      81. SBFR P10-P11        *  76784.0  872831.1   76883.0  872812.0 *     101.
101. AG    980.   0.4   0.0 58.0
      82. SBFR P11-P12        *  76883.0  872812.0   77204.0  872756.0 *     326.
100. AG    980.   0.4   0.0 58.0
      83. SBFR P12-SBVCAP P1  *  77204.0  872756.0   78038.0  872602.0 *     848.
100. AG    980.   0.4   0.0 58.0
      84. SBVCAP P1-P2        *  78038.0  872602.0   78098.6  872572.7 *      67.
116. FL      8. 100.0   6.0 36.0 0.18   3.4
      85. SBVCAP P2-SBFR P14  *  78425.0  872415.0   78720.0  872395.0 *     296.
 94. FL    922.   0.4  12.0 46.0
      86. SBFR P14-P15        *  78720.0  872395.0   78999.0  872418.0 *     280.
 85. FL    922.   0.4   6.0 46.0
      87. SBFR P15-P16        *  78999.0  872418.0   79465.0  872336.1 *     473.
100. AG    922.   0.4   0.0 46.0
      88. SBVCLT P1-P2        *  78044.0  872621.0   78103.6  872591.8 *      66.
116. FL      3. 100.0   6.0 12.0 0.35   3.4
      89. SBVCRT P1-P2        *  78070.0  872556.0   78162.1  872510.4 *     103.
116. FL      3. 100.0   6.0 12.0 0.56   5.2
      90. WBVCAP P1-P2        *  78602.0  873146.0   78587.7  873060.6 *      87.
190. FL      4. 100.0  15.0 24.0 0.26   4.4
      91. WBVCAP P2-WBVC P3   *  78569.0  872949.0   78543.0  872815.0 *     137.
191. FL    660.   0.5  14.0 44.0
      92. WBVC P3-WBVCAP P4   *  78543.0  872815.0   78494.0  872552.0 *     268.
191. BR    679.   0.5  16.0 44.0
      93. WBVCAP P4-P5        *  78494.0  872552.0   78477.1  872464.6 *      89.
191. FL      4. 100.0  12.0 24.0 0.27   4.5
      94. WBVCAP P5-WBVC P6   *  78477.0  872464.0   78448.0  872293.0 *     173.
190. FL    679.   0.5  12.0 44.0
      95. WBVC P6-P7          *  78448.0  872293.0   78385.0  871962.1 *     337.
191. FL    708.   0.5  12.0 44.0
```


DATE : 11/17/19
TIME : 14:55:40

LINK VARIABLES

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  LINK DESCRIPTION     *         LINK COORDINATES (FT)          *    LENGTH
BRG TYPE   VPH    EF      H   W    V/C QUEUE
                       *   X1        Y1        X2        Y2     *     (FT)
(DEG)           (G/MI)  (FT) (FT)       (VEH)

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     96. EBVCAP P1-P2        *  78415.0  871959.0   78420.2  871987.5 *      29.
 10. FL      4. 100.0  12.0 24.0 0.07   1.5
     97. EBVCAP P2-EBVC P3   *  78487.0  872356.1   78523.0  872546.0 *     193.
 11. FL    252.   0.5  12.0 44.0
     98. EBVC P3-EBVCAP P4   *  78523.0  872546.0   78569.0  872802.0 *     260.
 10. BR    281.   0.5  16.0 44.0
     99. EBVCAP P4-P5        *  78569.0  872802.0   78574.4  872833.7 *      32.
 10. FL      4. 100.0  15.0 24.0 0.08   1.6
    100. EBVCAP P5-EBVC P6   *  78579.0  872861.0   78608.0  873008.0 *     150.
 11. FL    281.   0.5  14.0 44.0
    101. EBVC P6-P7          *  78608.0  873008.0   78635.0  873140.0 *     135.
 12. FL    369.   0.5  15.0 44.0
```


DATE : 11/17/19
TIME : 14:55:40

ADDITIONAL QUEUE LINK PARAMETERS

LINK DESCRIPTION	*	CYCLE LENGTH (SEC)	RED TIME (SEC)	CLEARANCE LOST TIME (SEC)	APPROACH VOL (VPH)	SATURATION FLOW RATE (VPH)	IDLE EM FAC (gm/hr)	SIGNAL TYPE	ARRIVAL RATE
17. NBVCAP P2-P1	*	95	69	2.0	466	3539	1.49	2	1
19. NBVCRT P1-P2	*	95	69	2.0	272	1583	1.49	2	1
20. NBVCRT P2-P3	*	95	69	2.0	272	1583	1.49	2	1
21. NBVCLT P1-P2	*	95	69	2.0	272	1770	1.49	2	1
22. NBVCLT P2-P3	*	95	69	2.0	272	1770	1.49	2	1
84. SBVCAP P1-P2	*	95	64	2.0	553	3539	1.49	2	1
88. SBVCLT P1-P2	*	95	64	2.0	175	1770	1.49	2	1
89. SBVCRT P1-P2	*	95	64	2.0	252	1583	1.49	2	1
90. WBVCAP P1-P2	*	95	48	2.0	660	2775	1.49	2	1
93. WBVCAP P4-P5	*	95	48	2.0	679	2775			

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 1.49      2        1
    96. EBVCAP P1-P2        *      95       42       2.0       252       3362
 1.49      2        1
    99. EBVCAP P4-P5        *      95       42       2.0       281       3362
 1.49      2        1
```

RECEPTOR LOCATIONS

RECEPTOR	COORDINATES (FT) X	Y	Z
1. R1	75646.0	873829.1	5.9
2. R2	76227.0	873389.0	5.9
3. R3	77460.0	873035.0	5.9
4. R4	76089.0	873051.0	5.9
5. R5	78710.0	872962.0	17.9
6. R6	78277.0	872424.0	17.9

MODEL RESULTS

REMARKS : In search of the angle corresponding to the maximum concentration, only the first angle, of the angles with same maximum concentrations, is indicated as maximum.

WIND ANGLE RANGE: 0.-360.

WIND ANGLE (DEGR)	CONCENTRATION (PPM) REC1	REC2	REC3	REC4	REC5	REC6
0.	1.7	1.7	1.7	1.7	1.7	1.7
10.	1.7	1.7	1.7	1.7	1.7	1.7
20.	1.7	1.7	1.7	1.7	1.7	1.7
30.	1.7	1.7	1.7	1.7	1.7	1.7
40.	1.7	1.7	1.7	1.7	1.7	1.7
50.	1.7	1.7	1.7	1.7	1.7	1.7
60.	1.7	1.7	1.7	1.7	1.7	1.7
70.	1.7	1.7	1.7	1.7	1.7	1.7
80.	1.7	1.7	1.7	1.7	1.7	1.7
90.	1.7	1.7	1.7	1.7	1.7	1.7
100.	1.7	1.7	1.7	1.7	1.7	1.7
110.	1.7	1.7	1.7	1.7	1.7	1.7
120.	1.7	1.7	1.7	1.7	1.7	1.7
130.	1.7	1.7	1.7	1.7	1.7	1.7

140.	*	1.7	1.7	1.7	1.7	1.7	1.7
150.	*	1.7	1.7	1.7	1.7	1.7	1.7
160.	*	1.7	1.7	1.7	1.7	1.7	1.7
170.	*	1.7	1.7	1.7	1.7	1.7	1.7
180.	*	1.7	1.7	1.7	1.7	1.7	1.7
190.	*	1.7	1.7	1.7	1.7	1.7	1.7
200.	*	1.7	1.7	1.7	1.7	1.7	1.7
210.	*	1.7	1.7	1.7	1.7	1.7	1.7
220.	*	1.7	1.7	1.7	1.7	1.7	1.7
230.	*	1.7	1.7	1.7	1.7	1.7	1.7
240.	*	1.7	1.7	1.7	1.7	1.7	1.7
250.	*	1.7	1.7	1.7	1.7	1.7	1.7
260.	*	1.7	1.7	1.7	1.7	1.7	1.7
270.	*	1.7	1.7	1.7	1.7	1.7	1.7
280.	*	1.7	1.7	1.7	1.7	1.7	1.7
290.	*	1.7	1.7	1.7	1.7	1.7	1.7
300.	*	1.7	1.7	1.7	1.7	1.7	1.7
310.	*	1.7	1.7	1.7	1.7	1.7	1.7
320.	*	1.7	1.7	1.7	1.7	1.7	1.7
330.	*	1.7	1.7	1.7	1.7	1.7	1.7
340.	*	1.7	1.7	1.7	1.7	1.7	1.7
350.	*	1.7	1.7	1.7	1.7	1.7	1.7
360.	*	1.7	1.7	1.7	1.7	1.7	1.7
MAX	*	1.7	1.7	1.7	1.7	1.7	1.7
DEGR.	*	0	0	0	0	0	0

THE HIGHEST CONCENTRATION OF 1.70 PPM OCCURRED AT RECEPTOR REC1 .

DATE : 11/17/19
TIME : 14:55:40

RECEPTOR - LINK MATRIX FOR THE ANGLE PRODUCING
THE MAXIMUM CONCENTRATION FOR EACH RECEPTOR

		CO/LINK (PPM) ANGLE (DEGREES)					
		REC1	REC2	REC3	REC4	REC5	REC6
LINK #	*	0	0	0	0	0	0
1	*	0.0	0.0	0.0	0.0	0.0	0.0
2	*	0.0	0.0	0.0	0.0	0.0	0.0
3	*	0.0	0.0	0.0	0.0	0.0	0.0
4	*	0.0	0.0	0.0	0.0	0.0	0.0
5	*	0.0	0.0	0.0	0.0	0.0	0.0

6	*	0.0	0.0	0.0	0.0	0.0	0.0
7	*	0.0	0.0	0.0	0.0	0.0	0.0
8	*	0.0	0.0	0.0	0.0	0.0	0.0
9	*	0.0	0.0	0.0	0.0	0.0	0.0
10	*	0.0	0.0	0.0	0.0	0.0	0.0
11	*	0.0	0.0	0.0	0.0	0.0	0.0
12	*	0.0	0.0	0.0	0.0	0.0	0.0
13	*	0.0	0.0	0.0	0.0	0.0	0.0
14	*	0.0	0.0	0.0	0.0	0.0	0.0
15	*	0.0	0.0	0.0	0.0	0.0	0.0
16	*	0.0	0.0	0.0	0.0	0.0	0.0
17	*	0.0	0.0	0.0	0.0	0.0	0.0
18	*	0.0	0.0	0.0	0.0	0.0	0.0
19	*	0.0	0.0	0.0	0.0	0.0	0.0
20	*	0.0	0.0	0.0	0.0	0.0	0.0
21	*	0.0	0.0	0.0	0.0	0.0	0.0
22	*	0.0	0.0	0.0	0.0	0.0	0.0
23	*	0.0	0.0	0.0	0.0	0.0	0.0
24	*	0.0	0.0	0.0	0.0	0.0	0.0
25	*	0.0	0.0	0.0	0.0	0.0	0.0
26	*	0.0	0.0	0.0	0.0	0.0	0.0
27	*	0.0	0.0	0.0	0.0	0.0	0.0
28	*	0.0	0.0	0.0	0.0	0.0	0.0
29	*	0.0	0.0	0.0	0.0	0.0	0.0
30	*	0.0	0.0	0.0	0.0	0.0	0.0
31	*	0.0	0.0	0.0	0.0	0.0	0.0
32	*	0.0	0.0	0.0	0.0	0.0	0.0
33	*	0.0	0.0	0.0	0.0	0.0	0.0
34	*	0.0	0.0	0.0	0.0	0.0	0.0
35	*	0.0	0.0	0.0	0.0	0.0	0.0
36	*	0.0	0.0	0.0	0.0	0.0	0.0
37	*	0.0	0.0	0.0	0.0	0.0	0.0
38	*	0.0	0.0	0.0	0.0	0.0	0.0
39	*	0.0	0.0	0.0	0.0	0.0	0.0
40	*	0.0	0.0	0.0	0.0	0.0	0.0
41	*	0.0	0.0	0.0	0.0	0.0	0.0
42	*	0.0	0.0	0.0	0.0	0.0	0.0
43	*	0.0	0.0	0.0	0.0	0.0	0.0
44	*	0.0	0.0	0.0	0.0	0.0	0.0
45	*	0.0	0.0	0.0	0.0	0.0	0.0

	*	CO/LINK (PPM)					
	*	ANGLE (DEGREES)					
	*	REC1	REC2	REC3	REC4	REC5	REC6
LINK #	*	0	0	0	0	0	0
-------	*						

46	*	0.0	0.0	0.0	0.0	0.0	0.0
47	*	0.0	0.0	0.0	0.0	0.0	0.0
48	*	0.0	0.0	0.0	0.0	0.0	0.0
49	*	0.0	0.0	0.0	0.0	0.0	0.0
50	*	0.0	0.0	0.0	0.0	0.0	0.0
51	*	0.0	0.0	0.0	0.0	0.0	0.0
52	*	0.0	0.0	0.0	0.0	0.0	0.0
53	*	0.0	0.0	0.0	0.0	0.0	0.0
54	*	0.0	0.0	0.0	0.0	0.0	0.0
55	*	0.0	0.0	0.0	0.0	0.0	0.0
56	*	0.0	0.0	0.0	0.0	0.0	0.0
57	*	0.0	0.0	0.0	0.0	0.0	0.0
58	*	0.0	0.0	0.0	0.0	0.0	0.0
59	*	0.0	0.0	0.0	0.0	0.0	0.0
60	*	0.0	0.0	0.0	0.0	0.0	0.0
61	*	0.0	0.0	0.0	0.0	0.0	0.0
62	*	0.0	0.0	0.0	0.0	0.0	0.0
63	*	0.0	0.0	0.0	0.0	0.0	0.0
64	*	0.0	0.0	0.0	0.0	0.0	0.0
65	*	0.0	0.0	0.0	0.0	0.0	0.0
66	*	0.0	0.0	0.0	0.0	0.0	0.0
67	*	0.0	0.0	0.0	0.0	0.0	0.0
68	*	0.0	0.0	0.0	0.0	0.0	0.0
69	*	0.0	0.0	0.0	0.0	0.0	0.0
70	*	0.0	0.0	0.0	0.0	0.0	0.0
71	*	0.0	0.0	0.0	0.0	0.0	0.0
72	*	0.0	0.0	0.0	0.0	0.0	0.0
73	*	0.0	0.0	0.0	0.0	0.0	0.0
74	*	0.0	0.0	0.0	0.0	0.0	0.0
75	*	0.0	0.0	0.0	0.0	0.0	0.0
76	*	0.0	0.0	0.0	0.0	0.0	0.0
77	*	0.0	0.0	0.0	0.0	0.0	0.0
78	*	0.0	0.0	0.0	0.0	0.0	0.0
79	*	0.0	0.0	0.0	0.0	0.0	0.0
80	*	0.0	0.0	0.0	0.0	0.0	0.0
81	*	0.0	0.0	0.0	0.0	0.0	0.0
82	*	0.0	0.0	0.0	0.0	0.0	0.0
83	*	0.0	0.0	0.0	0.0	0.0	0.0
84	*	0.0	0.0	0.0	0.0	0.0	0.0
85	*	0.0	0.0	0.0	0.0	0.0	0.0
86	*	0.0	0.0	0.0	0.0	0.0	0.0
87	*	0.0	0.0	0.0	0.0	0.0	0.0
88	*	0.0	0.0	0.0	0.0	0.0	0.0
89	*	0.0	0.0	0.0	0.0	0.0	0.0
90	*	0.0	0.0	0.0	0.0	0.0	0.0
91	*	0.0	0.0	0.0	0.0	0.0	0.0
92	*	0.0	0.0	0.0	0.0	0.0	0.0
93	*	0.0	0.0	0.0	0.0	0.0	0.0
94	*	0.0	0.0	0.0	0.0	0.0	0.0
95	*	0.0	0.0	0.0	0.0	0.0	0.0

96	*	0.0	0.0	0.0	0.0	0.0	0.0
97	*	0.0	0.0	0.0	0.0	0.0	0.0
98	*	0.0	0.0	0.0	0.0	0.0	0.0

		CO/LINK (PPM) ANGLE (DEGREES)					
		REC1	REC2	REC3	REC4	REC5	REC6
LINK #	*	0	0	0	0	0	0
99	*	0.0	0.0	0.0	0.0	0.0	0.0
100	*	0.0	0.0	0.0	0.0	0.0	0.0
101	*	0.0	0.0	0.0	0.0	0.0	0.0

```
'I-287 Miller-Wilbarger Int-2028' 60 108 0 0 3 0.3048 1 1
'R1' 74501 74452 5.9
'R2' 74750 74705 5.9
'R3' 75052 74478 5.9
'2028 Miller-Wilbarger Int' 57 36 1 'C'
1
'NBFR P1-P2' 'AG' 73891 75505 74189 75220 214 0.78 0 46
1
'NBFR P2-P3' 'AG' 74189 75220 74353 75052 214 0.78 0 46
1
'NBFR P3-P4' 'AG' 74353 75052 74419 75023 622 0.78 0 46
1
'NBFR P4-P5' 'AG' 74419 75023 74586 75020 622 0.78 0 46
1
'NBENTR P1-P2' 'FL' 73855 75482 73963 75387 408 0.78 2 34
1
'NBENTR P2-P3' 'FL' 73963 75387 74071 75305 408 0.78 1 34
1
'NBENTR P3-P4' 'AG' 74071 75305 74179 75210 408 0.78 0 34
1
'WM NBML P1-P2' 'FL' 73799 75443 74514 74731 3400 0.77 10 56
1
'WM NBML P2-P3' 'BR' 74514 74731 74770 74472 3400 0.77 16 56
1
'WM NBML P3-P4' 'FL' 74770 74472 75039 74216 3400 0.77 16 56
1
'SBML P1-P2' 'FL' 73740 75410 74475 74688 3349 0.77 10 68
1
'SBML P2-P3' 'BR' 74475 74688 74727 74429 3349 0.77 16 68
1
'SBML P3-P4' 'FL' 74727 74429 74852 74308 3349 0.77 16 68
1
'SBML P4-P5' 'FL' 74852 74308 74990 74176 2960 0.77 16 56
1
'SBEXR P1-P2' 'FL' 74836 74294 74957 74153 389 0.78 15 34
1
'WM SBFR P1-P2' 'AG' 73658 75357 74166 74846 484 0.78 0 58
1
'WM SBFR P2-P3' 'AG' 74166 74846 74202 74764 484 0.78 0 58
1
'WM SBFR P3-P4' 'AG' 74202 74764 74215 74609 484 0.78 0 58
1
'MillerSBML P1-P2' 'AG' 74599 75357 74596 74833 857 0.78 0 46
1
'MillerSBML P2-MillerSBAP P1' 'AG' 74603 74987 74599 74642 695 0.78 0 46
2
'MillerSBAP P1-P2' 'AG' 74596 74833 74599 74642 0 26 2
   75 53 2.0 695 3.01 3415 2 1
1
'MillerSBAP P2-MillerSBML P2' 'AG' 74599 74642 74603 74495 643 0.78 0 46
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1
'MillerSBML P3-P4' 'AG' 74603 74495 74612 74393 1133 0.78 0 46
1
'MillerSBML P4-P5' 'AG' 74612 74393 74612 74193 1133 0.78 0 46
1
'MillerSBML P5-P6' 'AG' 74612 74193 74619 73947 664 0.78 0 46
2
'MillerSBLT P1-P2' 'AG' 74609 74751 74612 74672 0 12 1
   75 47 2.0 51 3.01 1770 2 1
1
'MillerSBLTFR P1-P2' 'AG' 74626 74360 74629 74242 469 3.01 0 12
1
'SBFR P1-P2' 'AG' 74668 74183 74809 74170 847 0.78 0 46
1
'SBFR P2-P3' 'AG' 74809 74170 74908 74098 847 0.78 0 46
1
'NBFR P1-P2' 'AG' 75023 74495 75032 74409 642 0.78 0 46
1
'NBFR P2-P3' 'AG' 75032 74409 75055 74360 642 0.78 0 46
1
'NBFR P3-P4' 'AG' 75055 74360 75088 74317 642 0.78 0 46
1
'MillerNBML P1-P2' 'AG' 74649 73947 74649 74160 878 0.78 0 46
1
'MillerNBML P2-MillerNBAP P1' 'AG' 74649 74160 74662 74370 878 0.78 0 46
2
'MillerNBAP P1-P2' 'AG' 74662 74370 74652 74534 0 26 2
   75 53 2.0 643 3.01 3465 2 1
1
'MillerNBAP P2-MillerNBML P3' 'AG' 74652 74534 74649 74672 603 0.78 0 46
1
'MillerNBML P3-P4' 'AG' 74649 74672 74642 74770 736 0.78 0 46
1
'MillerNBML P4-P5' 'AG' 74642 74770 74642 74990 1135 0.78 0 46
1
'MillerNBML P5-P6' 'AG' 74642 74990 74629 75361 696 0.78 0 46
2
'MillerNBLT P1-P2' 'AG' 74642 74393 74635 74534 0 12 1
   75 47 2.0 40 3.01 1770 2 1
1
'MillerNBLTFR P1-P2' 'AG' 74626 74790 74622 74974 439 3.01 0 12
1
'WilbEBML P1-P2' 'AG' 73861 74557 74189 74554 357 0.94 0 32
1
'WilbEBML P2-WilbEBAP P1' 'AG' 74189 74554 74422 74557 357 0.94 0 46
2
'WilbEBAP P1-P2' 'AG' 74422 74557 74560 74560 0 26 2
   75 54 2.0 810 3.01 3157 2 1
1
'WilbEBAP P2-WilbEBML P3' 'AG' 74560 74560 74793 74564 177 0.94 0 46
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1
'WilbEBML P3-P4' 'AG' 74793 74564 74878 74560 320 0.94 0 46
1
'WilbEBML P4-P5' 'AG' 74878 74560 74993 74531 320 0.94 0 46
1
'WilbEBML P5-P6' 'AG' 74993 74531 75134 74465 320 0.94 0 46
2
'WilbEBLT P1-P2' 'AG' 74442 74573 74560 74577 0 12 1
   75 41 2.0 225 3.01 1770 2 1
1
'WilbWBML P1-P2' 'AG' 75150 74495 75052 74547 308 0.94 0 46
1
'WilbWBML P2-WilbWBAP P1' 'AG' 75052 74547 74852 74596 308 0.94 0 46
2
'WilbWBAP P1-P2' 'AG' 74852 74596 74691 74603 0 26 2
   75 55 2.0 900 3.01 3309 2 1
1
'WilbWBAP P2-WilbWBML P3' 'AG' 74691 74603 74458 74600 276 0.94 0 46
1
'WilbWBML P3-P4' 'AG' 74458 74600 74242 74590 460 0.94 0 46
1
'WilbWBML P4-P5' 'AG' 74242 74590 74150 74586 460 0.94 0 32
1
'WilbWBML P5-P6' 'AG' 74150 74586 73855 74577 490 0.94 0 32
2
'WilbWBLT P1-P2' 'AG' 74832 74586 74685 74586 0 12 1
   75 43 2.0 225 3.01 1770 2 1
1 0 6 1000 1.7 'Y' 10 0 36
```

JOB: I-287 Miller-Wilbarger Int-2028 RUN: 2028 Miller-Wilbarger Int

DATE : 12/16/19
TIME : 9:27:52

The MODE flag has been set to C for calculating CO averages.

SITE & METEOROLOGICAL VARIABLES

VS = 0.0 CM/S VD = 0.0 CM/S Z0 = 108. CM
U = 1.0 M/S CLAS = 6 (F) ATIM = 60. MINUTES MIXH = 1000. M AMB = 1.7 PPM

LINK VARIABLES

	LINK DESCRIPTION	*	LINK COORDINATES (FT) X1	Y1	X2	Y2	*	LENGTH (FT)	BRG (DEG)	TYPE	VPH	EF (G/MI)	H (FT)	W (FT)	V/C	QUEUE (VEH)
1.	NBFR P1-P2	*	73891.0	75505.0	74189.0	75220.0	*	412.	134.	AG	214.	0.8	0.0	46.0		
2.	NBFR P2-P3	*	74189.0	75220.0	74353.0	75052.0	*	235.	136.	AG	214.	0.8	0.0	46.0		
3.	NBFR P3-P4	*	74353.0	75052.0	74419.0	75023.0	*	72.	114.	AG	622.	0.8	0.0	46.0		
4.	NBFR P4-P5	*	74419.0	75023.0	74586.0	75020.0	*	167.	91.	AG	622.	0.8	0.0	46.0		
5.	NBENTR P1-P2	*	73855.0	75482.0	73963.0	75387.0	*	144.	131.	FL	408.	0.8	2.0	34.0		
6.	NBENTR P2-P3	*	73963.0	75387.0	74071.0	75305.0	*	136.	127.	FL	408.	0.8	1.0	34.0		
7.	NBENTR P3-P4	*	74071.0	75305.0	74179.0	75210.0	*	144.	131.	AG	408.	0.8	0.0	34.0		
8.	WM NBML P1-P2	*	73799.0	75443.0	74514.0	74731.0	*	1009.	135.	FL	3400.	0.8	10.0	56.0		
9.	WM NBML P2-P3	*	74514.0	74731.0	74770.0	74472.0	*	364.	135.	BR	3400.	0.8	16.0	56.0		
10.	WM NBML P3-P4	*	74770.0	74472.0	75039.0	74216.0	*	371.	134.	FL	3400.	0.8	16.0	56.0		
11.	SBML P1-P2	*	73740.0	75410.0	74475.0	74688.0	*	1030.	134.	FL	3349.	0.8	10.0	68.0		
12.	SBML P2-P3	*	74475.0	74688.0	74727.0	74429.0	*	361.	136.	BR	3349.	0.8	16.0	68.0		

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      13. SBML P3-P4          *  74727.0   74429.0   74852.0   74308.0 *     174.
134. FL   3349.   0.8  16.0 68.0
      14. SBML P4-P5          *  74852.0   74308.0   74990.0   74176.0 *     191.
134. FL   2960.   0.8  16.0 56.0
      15. SBEXR P1-P2         *  74836.0   74294.0   74957.0   74153.0 *     186.
139. FL    389.   0.8  15.0 34.0
      16. WM SBFR P1-P2       *  73658.0   75357.0   74166.0   74846.0 *     721.
135. AG    484.   0.8   0.0 58.0
      17. WM SBFR P2-P3       *  74166.0   74846.0   74202.0   74764.0 *      90.
156. AG    484.   0.8   0.0 58.0
      18. WM SBFR P3-P4       *  74202.0   74764.0   74215.0   74609.0 *     156.
175. AG    484.   0.8   0.0 58.0
      19. MillerSBML P1-P2    *  74599.0   75357.0   74596.0   74833.0 *     524.
180. AG    857.   0.8   0.0 46.0
      20. MillerSBML P2-Miller*  74603.0   74987.0   74599.0   74642.0 *     345.
181. AG    695.   0.8   0.0 46.0
      21. MillerSBAP P1-P2    *  74596.0   74833.0   74597.8   74720.2 *     113.
179. AG     11. 100.0   0.0 26.0 0.42   5.7
      22. MillerSBAP P2-Miller*  74599.0   74642.0   74603.0   74495.0 *     147.
178. AG    643.   0.8   0.0 46.0
      23. MillerSBML P3-P4    *  74603.0   74495.0   74612.0   74393.0 *     102.
175. AG   1133.   0.8   0.0 46.0
      24. MillerSBML P4-P5    *  74612.0   74393.0   74612.0   74193.0 *     200.
180. AG   1133.   0.8   0.0 46.0
      25. MillerSBML P5-P6    *  74612.0   74193.0   74619.0   73947.0 *     246.
178. AG    664.   0.8   0.0 46.0
      26. MillerSBLT P1-P2    *  74609.0   74751.0   74609.5   74737.9 *      13.
178. AG      5. 100.0   0.0 12.0 0.09   0.7
      27. MillerSBLTFR P1-P2  *  74626.0   74360.0   74629.0   74242.0 *     118.
179. AG    469.   3.0   0.0 12.0
      28. SBFR P1-P2          *  74668.0   74183.0   74809.0   74170.0 *     142.
 95. AG    847.   0.8   0.0 46.0
      29. SBFR P2-P3          *  74809.0   74170.0   74908.0   74098.0 *     122.
126. AG    847.   0.8   0.0 46.0
      30. NBFR P1-P2          *  75023.0   74495.0   75032.0   74409.0 *      86.
174. AG    642.   0.8   0.0 46.0
      31. NBFR P2-P3          *  75032.0   74409.0   75055.0   74360.0 *      54.
155. AG    642.   0.8   0.0 46.0
      32. NBFR P3-P4          *  75055.0   74360.0   75088.0   74317.0 *      54.
142. AG    642.   0.8   0.0 46.0
      33. MillerNBML P1-P2    *  74649.0   73947.0   74649.0   74160.0 *     213.
360. AG    878.   0.8   0.0 46.0
      34. MillerNBML P2-Miller*  74649.0   74160.0   74662.0   74370.0 *     210.
  4. AG    878.   0.8   0.0 46.0
      35. MillerNBAP P1-P2    *  74662.0   74370.0   74655.7   74473.3 *     103.
357. AG     11. 100.0   0.0 26.0 0.39   5.3
      36. MillerNBAP P2-Miller*  74652.0   74534.0   74649.0   74672.0 *     138.
359. AG    603.   0.8   0.0 46.0
      37. MillerNBML P3-P4    *  74649.0   74672.0   74642.0   74770.0 *      98.
356. AG    736.   0.8   0.0 46.0
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      38. MillerNBML P4-P5    *  74642.0   74770.0   74642.0   74990.0 *     220.
360. AG   1135.   0.8   0.0 46.0
      39. MillerNBML P5-P6    *  74642.0   74990.0   74629.0   75361.0 *     371.
358. AG    696.   0.8   0.0 46.0
      40. MillerNBLT P1-P2    *  74642.0   74393.0   74641.5   74403.3 *      10.
357. AG      5. 100.0   0.0 12.0 0.07   0.5
      41. MillerNBLTFR P1-P2  *  74626.0   74790.0   74622.0   74974.0 *     184.
359. AG    439.   3.0   0.0 12.0
      42. WilbEBML P1-P2      *  73861.0   74557.0   74189.0   74554.0 *     328.
 91. AG    357.   0.9   0.0 32.0
      43. WilbEBML P2-WilbEBAP*  74189.0   74554.0   74422.0   74557.0 *     233.
 89. AG    357.   0.9   0.0 46.0
      44. WilbEBAP P1-P2      *  74422.0   74557.0   74563.1   74560.1 *     141.
 89. AG     12. 100.0   0.0 26.0 0.57   7.2
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       LINK VARIABLES
       --------------
         LINK DESCRIPTION     *         LINK COORDINATES (FT)          *    LENGTH
BRG TYPE   VPH    EF      H   W    V/C QUEUE
                               *   X1        Y1        X2        Y2     *     (FT)
(DEG)            (G/MI)  (FT) (FT)       (VEH)

------------------------*----------------------------------------*----------------
----------------------------------------
      45. WilbEBAP P2-WilbEBML*  74560.0   74560.0   74793.0   74564.0 *     233.
 89. AG    177.   0.9   0.0 46.0
      46. WilbEBML P3-P4      *  74793.0   74564.0   74878.0   74560.0 *      85.
 93. AG    320.   0.9   0.0 46.0
      47. WilbEBML P4-P5      *  74878.0   74560.0   74993.0   74531.0 *     119.
104. AG    320.   0.9   0.0 46.0
      48. WilbEBML P5-P6      *  74993.0   74531.0   75134.0   74465.0 *     156.
115. AG    320.   0.9   0.0 46.0
      49. WilbEBLT P1-P2      *  74442.0   74573.0   74492.4   74574.7 *      50.
 88. AG      4. 100.0   0.0 12.0 0.32   2.6
      50. WilbWBML P1-P2      *  75150.0   74495.0   75052.0   74547.0 *     111.
298. AG    308.   0.9   0.0 46.0
      51. WilbWBML P2-WilbWBAP*  75052.0   74547.0   74852.0   74596.0 *     206.
284. AG    308.   0.9   0.0 46.0
      52. WilbWBAP P1-P2      *  74852.0   74596.0   74705.1   74602.4 *     147.
272. AG     12. 100.0   0.0 26.0 0.64   7.5
      53. WilbWBAP P2-WilbWBML*  74691.0   74603.0   74458.0   74600.0 *     233.
269. AG    276.   0.9   0.0 46.0
      54. WilbWBML P3-P4      *  74458.0   74600.0   74242.0   74590.0 *     216.
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267. AG    460.   0.9   0.0 46.0
      55. WilbWBML P4-P5      *  74242.0   74590.0   74150.0   74586.0 *      92.
268. AG    460.   0.9   0.0 32.0
      56. WilbWBML P5-P6      *  74150.0   74586.0   73855.0   74577.0 *     295.
268. AG    490.   0.9   0.0 32.0
      57. WilbWBLT P1-P2      *  74832.0   74586.0   74778.2   74586.0 *      54.
270. AG      5. 100.0   0.0 12.0 0.34   2.7
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JOB: I-287 Miller-Wilbarger Int-2028 RUN: 2028 Miller-Wilbarger Int

DATE : 12/16/19
TIME : 9:27:52

ADDITIONAL QUEUE LINK PARAMETERS

LINK DESCRIPTION	*	CYCLE LENGTH (SEC)	RED TIME (SEC)	CLEARANCE LOST TIME (SEC)	APPROACH VOL (VPH)	SATURATION FLOW RATE (VPH)	IDLE EM FAC (gm/hr)	SIGNAL TYPE	ARRIVAL RATE
21. MillerSBAP P1-P2	*	75	53	2.0	695	3415	3.01	2	1
26. MillerSBLT P1-P2	*	75	47	2.0	51	1770	3.01	2	1
35. MillerNBAP P1-P2	*	75	53	2.0	643	3465	3.01	2	1
40. MillerNBLT P1-P2	*	75	47	2.0	40	1770	3.01	2	1
44. WilbEBAP P1-P2	*	75	54	2.0	810	3157	3.01	2	1
49. WilbEBLT P1-P2	*	75	41	2.0	225	1770	3.01	2	1
52. WilbWBAP P1-P2	*	75	55	2.0	900	3309	3.01	2	1
57. WilbWBLT P1-P2	*	75	43	2.0	225	1770	3.01	2	1

RECEPTOR LOCATIONS

RECEPTOR	*	COORDINATES (FT) X	Y	Z
1. R1	*	74501.0	74452.0	5.9
2. R2	*	74750.0	74705.0	5.9

MODEL RESULTS

REMARKS : In search of the angle corresponding to the maximum concentration, only the first angle, of the angles with same maximum concentrations, is indicated as maximum.

WIND ANGLE RANGE: 0.-360.

WIND ANGLE (DEGR)	CONCENTRATION (PPM) REC1	REC2	REC3
0.	1.7	1.7	1.7
10.	1.7	1.7	1.7
20.	1.7	1.7	1.7
30.	1.7	1.7	1.7
40.	1.7	1.7	1.7
50.	1.7	1.7	1.7
60.	1.7	1.7	1.7
70.	1.7	1.7	1.7
80.	1.7	1.7	1.7
90.	1.7	1.7	1.7
100.	1.7	1.7	1.7
110.	1.7	1.7	1.7
120.	1.7	1.7	1.7
130.	1.7	1.7	1.7
140.	1.7	1.7	1.7
150.	1.7	1.7	1.7
160.	1.7	1.8	1.7
170.	1.7	1.7	1.7
180.	1.7	1.7	1.7
190.	1.7	1.7	1.7
200.	1.7	1.7	1.7
210.	1.7	1.7	1.7
220.	1.7	1.7	1.7
230.	1.7	1.7	1.7
240.	1.7	1.7	1.7
250.	1.7	1.7	1.7
260.	1.7	1.7	1.7
270.	1.7	1.7	1.7
280.	1.7	1.7	1.7
290.	1.7	1.9	1.7

300.	*	1.7	1.9	1.9
310.	*	1.7	1.7	1.7
320.	*	1.7	1.7	1.7
330.	*	1.9	1.7	1.7
340.	*	1.9	1.7	1.7
350.	*	1.7	1.7	1.7
360.	*	1.7	1.7	1.7
MAX	*	1.9	1.9	1.9
DEGR.	*	330	290	300

THE HIGHEST CONCENTRATION OF 1.90 PPM OCCURRED AT RECEPTOR REC2 .

DATE : 12/16/19
TIME : 9:27:52

RECEPTOR - LINK MATRIX FOR THE ANGLE PRODUCING
THE MAXIMUM CONCENTRATION FOR EACH RECEPTOR

	CO/LINK (PPM) ANGLE (DEGREES)		
LINK #	REC1 330	REC2 290	REC3 300
1	0.0	0.0	0.0
2	0.0	0.0	0.0
3	0.0	0.0	0.0
4	0.0	0.0	0.0
5	0.0	0.0	0.0
6	0.0	0.0	0.0
7	0.0	0.0	0.0
8	0.1	0.1	0.1
9	0.0	0.0	0.0
10	0.0	0.0	0.0
11	0.1	0.1	0.1
12	0.0	0.0	0.0
13	0.0	0.0	0.0
14	0.0	0.0	0.0
15	0.0	0.0	0.0
16	0.0	0.0	0.0
17	0.0	0.0	0.0
18	0.0	0.0	0.0
19	0.0	0.0	0.0
20	0.0	0.0	0.0
21	0.0	0.0	0.0

22	*	0.0	0.0	0.0
23	*	0.0	0.0	0.0
24	*	0.0	0.0	0.0
25	*	0.0	0.0	0.0
26	*	0.0	0.0	0.0
27	*	0.0	0.0	0.0
28	*	0.0	0.0	0.0
29	*	0.0	0.0	0.0
30	*	0.0	0.0	0.0
31	*	0.0	0.0	0.0
32	*	0.0	0.0	0.0
33	*	0.0	0.0	0.0
34	*	0.0	0.0	0.0
35	*	0.0	0.0	0.0
36	*	0.0	0.0	0.0
37	*	0.0	0.0	0.0
38	*	0.0	0.0	0.0
39	*	0.0	0.0	0.0
40	*	0.0	0.0	0.0
41	*	0.0	0.0	0.0
42	*	0.0	0.0	0.0
43	*	0.0	0.0	0.0
44	*	0.0	0.0	0.0
45	*	0.0	0.0	0.0

		CO/LINK (PPM) ANGLE (DEGREES)		
	*	REC1	REC2	REC3
LINK #	*	330	290	300
46	*	0.0	0.0	0.0
47	*	0.0	0.0	0.0
48	*	0.0	0.0	0.0
49	*	0.0	0.0	0.0
50	*	0.0	0.0	0.0
51	*	0.0	0.0	0.0
52	*	0.0	0.0	0.0
53	*	0.0	0.0	0.0
54	*	0.0	0.0	0.0
55	*	0.0	0.0	0.0
56	*	0.0	0.0	0.0
57	*	0.0	0.0	0.0

```
'I-287 Miller-Wilbarger Int-2045' 60 108 0 0 3 0.3048 1 1
'R1' 74501 74452 5.9
'R2' 74750 74705 5.9
'R3' 75052 74478 5.9
'2045 Miller-Wilbarger Int' 57 36 1 'C'
1
'NBFR P1-P2' 'AG' 73891 75505 74189 75220 272 0.43 0 46
1
'NBFR P2-P3' 'AG' 74189 75220 74353 75052 272 0.43 0 46
1
'NBFR P3-P4' 'AG' 74353 75052 74419 75023 795 0.43 0 46
1
'NBFR P4-P5' 'AG' 74419 75023 74586 75020 795 0.43 0 46
1
'NBENTR P1-P2' 'FL' 73855 75482 73963 75387 524 0.43 2 34
1
'NBENTR P2-P3' 'FL' 73963 75387 74071 75305 524 0.43 1 34
1
'NBENTR P3-P4' 'AG' 74071 75305 74179 75210 524 0.43 0 34
1
'WM NBML P1-P2' 'FL' 73799 75443 74514 74731 4365 0.45 10 56
1
'WM NBML P2-P3' 'BR' 74514 74731 74770 74472 4365 0.45 16 56
1
'WM NBML P3-P4' 'FL' 74770 74472 75039 74216 4365 0.45 16 56
1
'SBML P1-P2' 'FL' 73740 75410 74475 74688 4297 0.45 10 68
1
'SBML P2-P3' 'BR' 74475 74688 74727 74429 4297 0.45 16 68
1
'SBML P3-P4' 'FL' 74727 74429 74852 74308 4297 0.45 16 68
1
'SBML P4-P5' 'FL' 74852 74308 74990 74176 3793 0.45 16 56
1
'SBEXR P1-P2' 'FL' 74836 74294 74957 74153 504 0.43 15 34
1
'WM SBFR P1-P2' 'AG' 73658 75357 74166 74846 640 0.43 0 58
1
'WM SBFR P2-P3' 'AG' 74166 74846 74202 74764 640 0.43 0 58
1
'WM SBFR P3-P4' 'AG' 74202 74764 74215 74609 640 0.43 0 58
1
'MillerSBML P1-P2' 'AG' 74599 75357 74596 74833 1096 0.43 0 46
1
'MillerSBML P2-MillerSBAP P1' 'AG' 74603 74987 74599 74642 892 0.43 0 46
2
'MillerSBAP P1-P2' 'AG' 74596 74833 74599 74642 0 26 2
   75 53 2.0 892 1.49 3415 2 1
1
'MillerSBAP P2-MillerSBML P2' 'AG' 74599 74642 74603 74495 825 0.43 0 46
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1
'MillerSBML P3-P4' 'AG' 74603 74495 74612 74393 1455 0.43 0 46
1
'MillerSBML P4-P5' 'AG' 74612 74393 74612 74193 1455 0.43 0 46
1
'MillerSBML P5-P6' 'AG' 74612 74193 74619 73947 854 0.43 0 46
2
'MillerSBLT P1-P2' 'AG' 74609 74751 74612 74672 0 12 1
   75 47 2.0 68 1.49 1770 2 1
1
'MillerSBLTFR P1-P2' 'AG' 74626 74360 74629 74242 601 1.49 0 12
1
'SBFR P1-P2' 'AG' 74668 74183 74809 74170 1086 0.43 0 46
1
'SBFR P2-P3' 'AG' 74809 74170 74908 74098 1086 0.43 0 46
1
'NBFR P1-P2' 'AG' 75023 74495 75032 74409 815 0.43 0 46
1
'NBFR P2-P3' 'AG' 75032 74409 75055 74360 815 0.43 0 46
1
'NBFR P3-P4' 'AG' 75055 74360 75088 74317 815 0.43 0 46
1
'MillerNBML P1-P2' 'AG' 74649 73947 74649 74160 1125 0.43 0 46
1
'MillerNBML P2-MillerNBAP P1' 'AG' 74649 74160 74662 74370 1125 0.43 0 46
2
'MillerNBAP P1-P2' 'AG' 74662 74370 74652 74534 0 26 2
   75 53 2.0 825 1.49 3465 2 1
1
'MillerNBAP P2-MillerNBML P3' 'AG' 74652 74534 74649 74672 776 0.43 0 46
1
'MillerNBML P3-P4' 'AG' 74649 74672 74642 74770 951 0.43 0 46
1
'MillerNBML P4-P5' 'AG' 74642 74770 74642 74990 1465 0.43 0 46
1
'MillerNBML P5-P6' 'AG' 74642 74990 74629 75361 902 0.43 0 46
2
'MillerNBLT P1-P2' 'AG' 74642 74393 74635 74534 0 12 1
   75 47 2.0 49 1.49 1770 2 1
1
'MillerNBLTFR P1-P2' 'AG' 74626 74790 74622 74974 563 1.49 0 12
1
'WilbEBML P1-P2' 'AG' 73861 74557 74189 74554 456 0.51 0 32
1
'WilbEBML P2-WilbEBAP P1' 'AG' 74189 74554 74422 74557 456 0.51 0 46
2
'WilbEBAP P1-P2' 'AG' 74422 74557 74560 74560 0 26 2
   75 54 2.0 1057 1.49 3157 2 1
1
'WilbEBAP P2-WilbEBML P3' 'AG' 74560 74560 74793 74564 243 0.51 0 46
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1
'WilbEBML P3-P4' 'AG' 74793 74564 74878 74560 427 0.51 0 46
1
'WilbEBML P4-P5' 'AG' 74878 74560 74993 74531 427 0.51 0 46
1
'WilbEBML P5-P6' 'AG' 74993 74531 75134 74465 427 0.51 0 46
2
'WilbEBLT P1-P2' 'AG' 74442 74573 74560 74577 0 12 1
   75 41 2.0 291 1.49 1770 2 1
1
'WilbWBML P1-P2' 'AG' 75150 74495 75052 74547 407 0.51 0 46
1
'WilbWBML P2-WilbWBAP P1' 'AG' 75052 74547 74852 74596 407 0.51 0 46
2
'WilbWBAP P1-P2' 'AG' 74852 74596 74691 74603 0 26 2
   75 55 2.0 1164 1.49 3309 2 1
1
'WilbWBAP P2-WilbWBML P3' 'AG' 74691 74603 74458 74600 359 0.51 0 46
1
'WilbWBML P3-P4' 'AG' 74458 74600 74242 74590 592 0.51 0 46
1
'WilbWBML P4-P5' 'AG' 74242 74590 74150 74586 592 0.51 0 32
1
'WilbWBML P5-P6' 'AG' 74150 74586 73855 74577 631 0.51 0 32
2
'WilbWBLT P1-P2' 'AG' 74832 74586 74685 74586 0 12 1
   75 43 2.0 291 1.49 1770 2 1
1 0 6 1000 1.7 'Y' 10 0 36
```

JOB: I-287 Miller-Wilbarger Int-2045 RUN: 2045 Miller-Wilbarger Int

DATE : 12/16/19
TIME : 9:31:12

The MODE flag has been set to C for calculating CO averages.

SITE & METEOROLOGICAL VARIABLES

VS = 0.0 CM/S VD = 0.0 CM/S Z0 = 108. CM
U = 1.0 M/S CLAS = 6 (F) ATIM = 60. MINUTES MIXH = 1000. M AMB = 1.7 PPM

LINK VARIABLES

	LINK DESCRIPTION	*	LINK COORDINATES (FT) X1	Y1	X2	Y2	*	LENGTH (FT)	BRG (DEG)	TYPE	VPH	EF (G/MI)	H (FT)	W (FT)	V/C	QUEUE (VEH)
1.	NBFR P1-P2	*	73891.0	75505.0	74189.0	75220.0	*	412.	134.	AG	272.	0.4	0.0	46.0		
2.	NBFR P2-P3	*	74189.0	75220.0	74353.0	75052.0	*	235.	136.	AG	272.	0.4	0.0	46.0		
3.	NBFR P3-P4	*	74353.0	75052.0	74419.0	75023.0	*	72.	114.	AG	795.	0.4	0.0	46.0		
4.	NBFR P4-P5	*	74419.0	75023.0	74586.0	75020.0	*	167.	91.	AG	795.	0.4	0.0	46.0		
5.	NBENTR P1-P2	*	73855.0	75482.0	73963.0	75387.0	*	144.	131.	FL	524.	0.4	2.0	34.0		
6.	NBENTR P2-P3	*	73963.0	75387.0	74071.0	75305.0	*	136.	127.	FL	524.	0.4	1.0	34.0		
7.	NBENTR P3-P4	*	74071.0	75305.0	74179.0	75210.0	*	144.	131.	AG	524.	0.4	0.0	34.0		
8.	WM NBML P1-P2	*	73799.0	75443.0	74514.0	74731.0	*	1009.	135.	FL	4365.	0.4	10.0	56.0		
9.	WM NBML P2-P3	*	74514.0	74731.0	74770.0	74472.0	*	364.	135.	BR	4365.	0.4	16.0	56.0		
10.	WM NBML P3-P4	*	74770.0	74472.0	75039.0	74216.0	*	371.	134.	FL	4365.	0.4	16.0	56.0		
11.	SBML P1-P2	*	73740.0	75410.0	74475.0	74688.0	*	1030.	134.	FL	4297.	0.4	10.0	68.0		
12.	SBML P2-P3	*	74475.0	74688.0	74727.0	74429.0	*	361.	136.	BR	4297.	0.4	16.0	68.0		

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      13. SBML P3-P4          *  74727.0   74429.0   74852.0   74308.0 *     174.
134. FL   4297.   0.4  16.0 68.0
      14. SBML P4-P5          *  74852.0   74308.0   74990.0   74176.0 *     191.
134. FL   3793.   0.4  16.0 56.0
      15. SBEXR P1-P2         *  74836.0   74294.0   74957.0   74153.0 *     186.
139. FL    504.   0.4  15.0 34.0
      16. WM SBFR P1-P2       *  73658.0   75357.0   74166.0   74846.0 *     721.
135. AG    640.   0.4   0.0 58.0
      17. WM SBFR P2-P3       *  74166.0   74846.0   74202.0   74764.0 *      90.
156. AG    640.   0.4   0.0 58.0
      18. WM SBFR P3-P4       *  74202.0   74764.0   74215.0   74609.0 *     156.
175. AG    640.   0.4   0.0 58.0
      19. MillerSBML P1-P2    *  74599.0   75357.0   74596.0   74833.0 *     524.
180. AG   1096.   0.4   0.0 46.0
      20. MillerSBML P2-Miller*  74603.0   74987.0   74599.0   74642.0 *     345.
181. AG    892.   0.4   0.0 46.0
      21. MillerSBAP P1-P2    *  74596.0   74833.0   74598.4   74682.8 *     150.
179. AG      6. 100.0   0.0 26.0 0.54   7.6
      22. MillerSBAP P2-Miller*  74599.0   74642.0   74603.0   74495.0 *     147.
178. AG    825.   0.4   0.0 46.0
      23. MillerSBML P3-P4    *  74603.0   74495.0   74612.0   74393.0 *     102.
175. AG   1455.   0.4   0.0 46.0
      24. MillerSBML P4-P5    *  74612.0   74393.0   74612.0   74193.0 *     200.
180. AG   1455.   0.4   0.0 46.0
      25. MillerSBML P5-P6    *  74612.0   74193.0   74619.0   73947.0 *     246.
178. AG    854.   0.4   0.0 46.0
      26. MillerSBLT P1-P2    *  74609.0   74751.0   74609.7   74733.5 *      17.
178. AG      3. 100.0   0.0 12.0 0.12   0.9
      27. MillerSBLTFR P1-P2  *  74626.0   74360.0   74629.0   74242.0 *     118.
179. AG    601.   1.5   0.0 12.0
      28. SBFR P1-P2          *  74668.0   74183.0   74809.0   74170.0 *     142.
 95. AG   1086.   0.4   0.0 46.0
      29. SBFR P2-P3          *  74809.0   74170.0   74908.0   74098.0 *     122.
126. AG   1086.   0.4   0.0 46.0
      30. NBFR P1-P2          *  75023.0   74495.0   75032.0   74409.0 *      86.
174. AG    815.   0.4   0.0 46.0
      31. NBFR P2-P3          *  75032.0   74409.0   75055.0   74360.0 *      54.
155. AG    815.   0.4   0.0 46.0
      32. NBFR P3-P4          *  75055.0   74360.0   75088.0   74317.0 *      54.
142. AG    815.   0.4   0.0 46.0
      33. MillerNBML P1-P2    *  74649.0   73947.0   74649.0   74160.0 *     213.
360. AG   1125.   0.4   0.0 46.0
      34. MillerNBML P2-Miller*  74649.0   74160.0   74662.0   74370.0 *     210.
  4. AG   1125.   0.4   0.0 46.0
      35. MillerNBAP P1-P2    *  74662.0   74370.0   74653.7   74506.4 *     137.
357. AG      6. 100.0   0.0 26.0 0.50   6.9
      36. MillerNBAP P2-Miller*  74652.0   74534.0   74649.0   74672.0 *     138.
359. AG    776.   0.4   0.0 46.0
      37. MillerNBML P3-P4    *  74649.0   74672.0   74642.0   74770.0 *      98.
356. AG    951.   0.4   0.0 46.0
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      38. MillerNBML P4-P5    *  74642.0   74770.0   74642.0   74990.0 *     220.
360. AG   1465.   0.4   0.0 46.0
      39. MillerNBML P5-P6    *  74642.0   74990.0   74629.0   75361.0 *     371.
358. AG    902.   0.4   0.0 46.0
      40. MillerNBLT P1-P2    *  74642.0   74393.0   74641.4   74405.6 *      13.
357. AG      3. 100.0   0.0 12.0 0.09   0.6
      41. MillerNBLTFR P1-P2  *  74626.0   74790.0   74622.0   74974.0 *     184.
359. AG    563.   1.5   0.0 12.0
      42. WilbEBML P1-P2      *  73861.0   74557.0   74189.0   74554.0 *     328.
 91. AG    456.   0.5   0.0 32.0
      43. WilbEBML P2-WilbEBAP*  74189.0   74554.0   74422.0   74557.0 *     233.
 89. AG    456.   0.5   0.0 46.0
      44. WilbEBAP P1-P2      *  74422.0   74557.0   74600.5   74560.9 *     179.
 89. AG      6. 100.0   0.0 26.0 0.74   9.1
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      JOB: I-287 Miller-Wilbarger Int-2045                        RUN: 2045
Miller-Wilbarger Int

      DATE : 12/16/19
      TIME :  9:31:12

       LINK VARIABLES
       --------------
         LINK DESCRIPTION     *         LINK COORDINATES (FT)          *    LENGTH
BRG TYPE   VPH    EF      H   W    V/C QUEUE
                               *   X1        Y1        X2        Y2     *     (FT)
(DEG)            (G/MI)  (FT) (FT)       (VEH)

-----------------------*----------------------------------------*----------------
----------------------------------------
      45. WilbEBAP P2-WilbEBML*  74560.0   74560.0   74793.0   74564.0 *     233.
 89. AG    243.   0.5   0.0 46.0
      46. WilbEBML P3-P4      *  74793.0   74564.0   74878.0   74560.0 *      85.
 93. AG    427.   0.5   0.0 46.0
      47. WilbEBML P4-P5      *  74878.0   74560.0   74993.0   74531.0 *     119.
104. AG    427.   0.5   0.0 46.0
      48. WilbEBML P5-P6      *  74993.0   74531.0   75134.0   74465.0 *     156.
115. AG    427.   0.5   0.0 46.0
      49. WilbEBLT P1-P2      *  74442.0   74573.0   74508.7   74575.3 *      67.
 88. AG      2. 100.0   0.0 12.0 0.41   3.4
      50. WilbWBML P1-P2      *  75150.0   74495.0   75052.0   74547.0 *     111.
298. AG    407.   0.5   0.0 46.0
      51. WilbWBML P2-WilbWBAP*  75052.0   74547.0   74852.0   74596.0 *     206.
284. AG    407.   0.5   0.0 46.0
      52. WilbWBAP P1-P2      *  74852.0   74596.0   74643.6   74605.1 *     209.
272. AG      6. 100.0   0.0 26.0 0.83  10.6
      53. WilbWBAP P2-WilbWBML*  74691.0   74603.0   74458.0   74600.0 *     233.
269. AG    359.   0.5   0.0 46.0
      54. WilbWBML P3-P4      *  74458.0   74600.0   74242.0   74590.0 *     216.
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267. AG    592.   0.5   0.0 46.0
      55. WilbWBML P4-P5      *  74242.0   74590.0   74150.0   74586.0 *      92.
268. AG    592.   0.5   0.0 32.0
      56. WilbWBML P5-P6      *  74150.0   74586.0   73855.0   74577.0 *     295.
268. AG    631.   0.5   0.0 32.0
      57. WilbWBLT P1-P2      *  74832.0   74586.0   74760.0   74586.0 *      72.
270. AG      2. 100.0   0.0 12.0 0.44   3.7
```


DATE : 12/16/19
TIME : 9:31:12

ADDITIONAL QUEUE LINK PARAMETERS

LINK DESCRIPTION	*	CYCLE LENGTH (SEC)	RED TIME (SEC)	CLEARANCE LOST TIME (SEC)	APPROACH VOL (VPH)	SATURATION FLOW RATE (VPH)	IDLE EM FAC (gm/hr)	SIGNAL TYPE	ARRIVAL RATE
21. MillerSBAP P1-P2	*	75	53	2.0	892	3415	1.49	2	1
26. MillerSBLT P1-P2	*	75	47	2.0	68	1770	1.49	2	1
35. MillerNBAP P1-P2	*	75	53	2.0	825	3465	1.49	2	1
40. MillerNBLT P1-P2	*	75	47	2.0	49	1770	1.49	2	1
44. WilbEBAP P1-P2	*	75	54	2.0	1057	3157	1.49	2	1
49. WilbEBLT P1-P2	*	75	41	2.0	291	1770	1.49	2	1
52. WilbWBAP P1-P2	*	75	55	2.0	1164	3309	1.49	2	1
57. WilbWBLT P1-P2	*	75	43	2.0	291	1770	1.49	2	1

RECEPTOR LOCATIONS

RECEPTOR	*	COORDINATES (FT) X	Y	Z
1. R1	*	74501.0	74452.0	5.9
2. R2	*	74750.0	74705.0	5.9

MODEL RESULTS

REMARKS : In search of the angle corresponding to the maximum concentration, only the first angle, of the angles with same maximum concentrations, is indicated as maximum.

WIND ANGLE RANGE: 0.-360.

WIND ANGLE (DEGR)	CONCENTRATION (PPM) REC1	REC2	REC3
0.	1.7	1.7	1.7
10.	1.7	1.7	1.7
20.	1.7	1.7	1.7
30.	1.7	1.7	1.7
40.	1.7	1.7	1.7
50.	1.7	1.7	1.7
60.	1.7	1.7	1.7
70.	1.7	1.7	1.7
80.	1.7	1.7	1.7
90.	1.7	1.7	1.7
100.	1.7	1.7	1.7
110.	1.7	1.7	1.7
120.	1.7	1.7	1.7
130.	1.7	1.7	1.7
140.	1.7	1.7	1.7
150.	1.7	1.7	1.7
160.	1.7	1.7	1.7
170.	1.7	1.7	1.7
180.	1.7	1.7	1.7
190.	1.7	1.7	1.7
200.	1.7	1.7	1.7
210.	1.7	1.7	1.7
220.	1.7	1.7	1.7
230.	1.7	1.7	1.7
240.	1.7	1.7	1.7
250.	1.7	1.7	1.7
260.	1.7	1.7	1.7
270.	1.7	1.7	1.7
280.	1.7	1.7	1.7
290.	1.7	1.7	1.7

300.	*	1.7	1.8	1.7
310.	*	1.7	1.7	1.7
320.	*	1.7	1.7	1.7
330.	*	1.8	1.7	1.7
340.	*	1.7	1.7	1.7
350.	*	1.7	1.7	1.7
360.	*	1.7	1.7	1.7
MAX	*	1.8	1.8	1.7
DEGR.	*	330	300	0

THE HIGHEST CONCENTRATION OF 1.80 PPM OCCURRED AT RECEPTOR REC2 .

DATE : 12/16/19
TIME : 9:31:12

RECEPTOR - LINK MATRIX FOR THE ANGLE PRODUCING
THE MAXIMUM CONCENTRATION FOR EACH RECEPTOR

	CO/LINK (PPM) ANGLE (DEGREES)		
LINK #	REC1 330	REC2 300	REC3 0
1	0.0	0.0	0.0
2	0.0	0.0	0.0
3	0.0	0.0	0.0
4	0.0	0.0	0.0
5	0.0	0.0	0.0
6	0.0	0.0	0.0
7	0.0	0.0	0.0
8	0.0	0.1	0.0
9	0.0	0.0	0.0
10	0.0	0.0	0.0
11	0.1	0.0	0.0
12	0.0	0.0	0.0
13	0.0	0.0	0.0
14	0.0	0.0	0.0
15	0.0	0.0	0.0
16	0.0	0.0	0.0
17	0.0	0.0	0.0
18	0.0	0.0	0.0
19	0.0	0.0	0.0
20	0.0	0.0	0.0
21	0.0	0.0	0.0

22	*	0.0	0.0	0.0
23	*	0.0	0.0	0.0
24	*	0.0	0.0	0.0
25	*	0.0	0.0	0.0
26	*	0.0	0.0	0.0
27	*	0.0	0.0	0.0
28	*	0.0	0.0	0.0
29	*	0.0	0.0	0.0
30	*	0.0	0.0	0.0
31	*	0.0	0.0	0.0
32	*	0.0	0.0	0.0
33	*	0.0	0.0	0.0
34	*	0.0	0.0	0.0
35	*	0.0	0.0	0.0
36	*	0.0	0.0	0.0
37	*	0.0	0.0	0.0
38	*	0.0	0.0	0.0
39	*	0.0	0.0	0.0
40	*	0.0	0.0	0.0
41	*	0.0	0.0	0.0
42	*	0.0	0.0	0.0
43	*	0.0	0.0	0.0
44	*	0.0	0.0	0.0
45	*	0.0	0.0	0.0

		CO/LINK (PPM) ANGLE (DEGREES)		
	*	REC1	REC2	REC3
LINK #	*	330	300	0
46	*	0.0	0.0	0.0
47	*	0.0	0.0	0.0
48	*	0.0	0.0	0.0
49	*	0.0	0.0	0.0
50	*	0.0	0.0	0.0
51	*	0.0	0.0	0.0
52	*	0.0	0.0	0.0
53	*	0.0	0.0	0.0
54	*	0.0	0.0	0.0
55	*	0.0	0.0	0.0
56	*	0.0	0.0	0.0
57	*	0.0	0.0	0.0