

NOTES:
1. ALL ANGLES MEASURED CLOCKWISE.
2. BASE PLATE IS ORIENTED SQUARE TO MAST ARM A (LARGEST ARM) EVEN IF SUPPORT HAS TWO MAST ARMS.

SUPPORT NO.	SIGNAL SUPPORT					ORIENTATION ANGLES (DEG.) FROM MAST ARM "A"																	
	TC-81.20	TC-12.30	TC-81.20	TC-12.30	TC-12.30	FOUNDATION					MAST ARM A ANGLE (DEG.)												
	DESIGN NO.	DESIGN NO.	DESIGN NO.	DESIGN NO.	DESIGN NO.	STATION	OFFSET	L (FT.)	L1 (FT.)	L2 (FT.)	L3 (FT.)	X1 (FT.)	MAST ARM A ANGLE (DEG.)	MAST ARM B ANGLE (DEG.)	PEDESTRIAN SIGNALS	PEDESTRIAN PUSH BUTTONS	POWER SERVICE	CONTROLLER	LUMINAIRE BRACKET	HANDHOLE	CABLE ENTRANCE (12" FROM TOP)		
P1	12	12	21	251+98	52'R	48	23	35	47	44	0	0	0	0	0	0	0	0	0	0	0	0	0
P2	3	3	21	251+35	51'R	32	20	31			90	270	270										
P3	12	12	21	250+99	51'L	48	23	35	47	44	0	0	0	0	0	0	0	0	0	0	0	0	0
P4	11	11	21	252+08	46'L	39	28	38			90	0	0										

ORIENTATION ANGLE CHART

NOTES:
1. PHASE SPLITS SHALL INCLUDE ALL GREEN PLUS YELLOW & ALL RED
2. PERMISSIVES SHALL START AT THE ZERO POINT OF THE CYCLE
3. OFFSETS SHALL BE REFERENCED TO THE BEGINNING OF PHASE 1 YELLOW

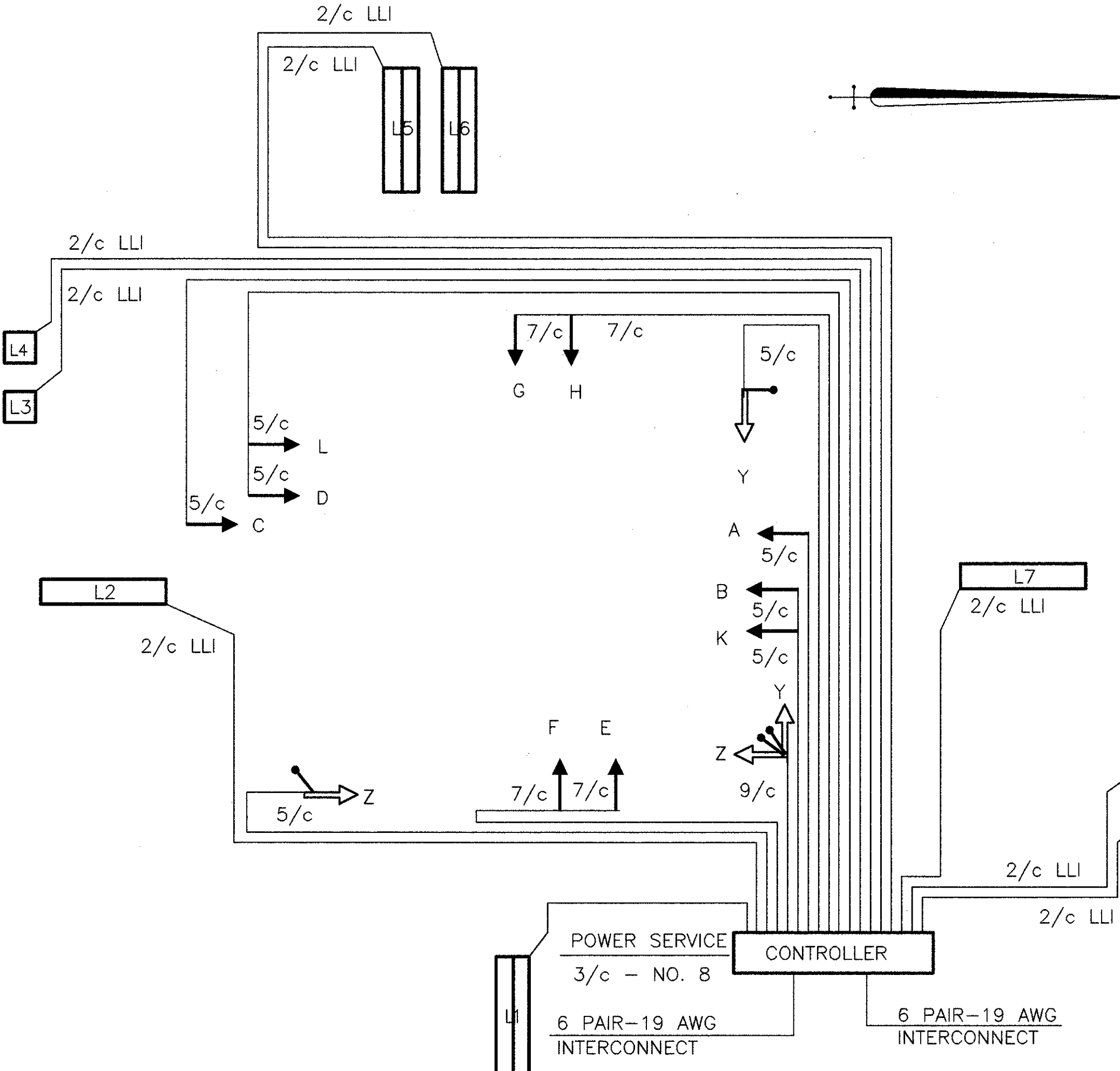
	DIAL 1	DIAL 2	DIAL 3
CYCLE LENGTH	90 SEC	110 SEC	120 SEC
PHASE 1 SPLIT	25 %	28 %	19 %
PHASE 2 SPLIT	30 %	47 %	46 %
PHASE 3 SPLIT	32 %	14 %	20 %
PHASE 4 SPLIT	13 %	11 %	15 %
PHASE 5 SPLIT	25 %	28 %	19 %
PHASE 6 SPLIT	30 %	47 %	46 %
PERMISSIVE	5 %	5 %	5 %
OFFSET	22 %	28 %	38 %
TIME OF DAY SCHEDULE	ALL OTHER TIMES	6:30AM TO 2:30PM 6:30PM TO 9:00PM MON-SAT	2:30PM TO 6:30PM MON-SAT

COORDINATION TIMING

① REMAINS ⚡ IF ⦶2 & ⦶5 NEXT
② REMAINS ⚡ IF ⦶1 & ⦶6 NEXT
③ REMAINS ⦶ IF ⦶2 & ⦶5 NEXT

SIGNAL HEAD	⦶1 & ⦶5		⦶1 & ⦶6		⦶2 & ⦶5		⦶2 & ⦶6		⦶3		⦶4		FLASH
	R/W	CLEAR	R/W	CLEAR	R/W	CLEAR	R/W	CLEAR	R/W	CLEAR	R/W	CLEAR	
A	⚡①	⦶ R	R	R R	⚡	⦶ R	R	R R	R	R R	R	R R	Y
B	R	R R	R	R R	G	G G	G	G Y	R	R R	R	R R	Y
C	⚡②	⦶ R	⚡	⦶ R	R	R R	R	R R	R	R R	R	R R	Y
D	R	R R	G	G G	R	R R	G	G Y	R	R R	R	R R	Y
E	R	R R	R	R R	R	R R	R	R R	⚡③	Y	R	R R	R
F	⦶③	⦶ R	R	R R	⦶③	⦶ R	R	R R	R	G	Y	R	R R
G	R	R R	R	R R	R	R R	R	R R	R	R R	⚡③	⚡③	Y
H	R	R R	R	R R	R	R R	R	R R	R	R R	R	R R	R
K	R	R R	R	R R	G	G G	G	G Y	R	R R	R	R R	Y
L	R	R R	R	R R	G	G G	R	R R	R	R R	R	R R	Y
Y-Y	DW	DW DW	DW	DW DW	DW	DW DW	DW	DW DW	DW	DW DW	W	FDW	DW DW
Z-Z	DW	DW DW	DW	DW DW	DW	DW DW	W	FDW	DW	DW DW	DW	DW DW	DW DW

SIGNAL DISPLAY CHART



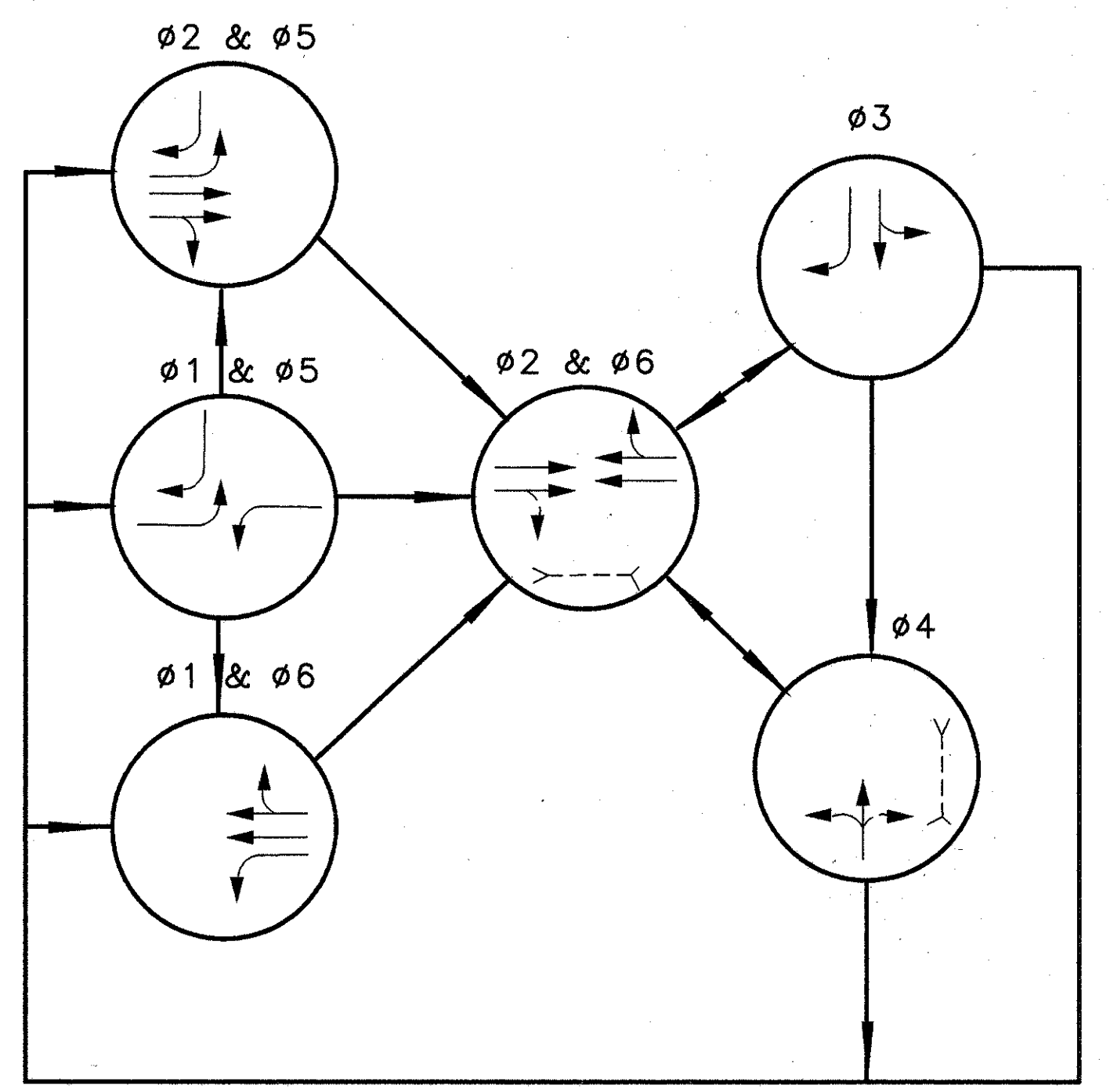
WIRING DIAGRAM

FUNCTION	⦶1	⦶2	⦶3	⦶4	⦶5	⦶6
MINIMUM GREEN	7	20	8	8	7	20
PED WALK	-	7	-	5	-	7
PED CLEARANCE	-	13	-	19	-	13
GREEN EXTENSION	2.5	3.0	3.0	3.0	2.5	3.0
MAXIMUM GREEN	29	41	21	24	29	41
YELLOW CLEARANCE	4.3	4.5	3.6	3.6	4.3	4.5
ALL RED CLEARANCE	0.9	1.0	1.6	1.8	0.9	1.0
RECALL	NONE	PED	NONE	NONE	NONE	PED

SIGNAL TIMING

LOOP #	SIZE	# TURNS	MODE	DELAY	UNIT	# PHASE
L1	8' x 40'	2-4-2	PRESENCE	8	1	4
L2	6' x 40'	2	PRESENCE	0	2	5
L3	6' x 6'	3	PRESENCE	0	3	SYSTEM
L4	6' x 6'	3	PRESENCE	0	4	SYSTEM
L5	6' x 40'	2-4-2	PRESENCE	8	5	5
L6	6' x 40'	2-4-2	PRESENCE	0	6	3
L7	6' x 40'	2	PRESENCE	0	7	1
L8	6' x 6'	3	PRESENCE	0	8	SYSTEM
L9	6' x 6'	3	PRESENCE	0	9	SYSTEM

LOOP DETECTOR CHART



PHASING DIAGRAM

ITEM	TOTAL	UNIT	DESCRIPTION
625	5	EACH	GROUND ROD
625	6	EACH	PULLBOX, 18", AS PER PLAN
625	1	EACH	PULLBOX, 24", AS PER PLAN
625	171	LIN FT	CONDUIT, 2", 713.04
625	4	LIN FT	CONDUIT, 3", 713.04
625	252	LIN FT	CONDUIT, JACKED OR DRILLED UNDER PAVEMENT, 3"
625	175	LIN FT	TRENCH
630	2	EACH	SIGN HANGER ASSEMBLY, MAST ARM, AS PER PLAN
630	10	SQ FT	SIGN, FLAT SHEET, TYPE G
632	7	EACH	VEHICULAR SIGNAL HEAD, 3 SECT., 12" LENS, 1 WAY, AS PER PLAN
632	2	EACH	VEHICULAR SIGNAL HEAD, 4 SECT., 12" LENS, 1 WAY, AS PER PLAN
632	1	EACH	VEHICULAR SIGNAL HEAD, 5 SECT., 12" LENS, 1 WAY, AS PER PLAN
632	4	EACH	PEDESTRIAN SIGNAL HEAD, TYPE "D-2"
632	4	EACH	PEDESTRIAN PUSHBUTTON
632	7	EACH	LOOP DETECTOR UNIT, AS PER PLAN
632	2	EACH	LOOP DETECTOR UNIT, DELAY AND EXTENSION TYPE, AS PER PLAN
632	10.17	CU YD	CONCRETE FOR ANCHOR BASE FOUNDATIONS
632	2	EACH	SIGNAL SUPPORT, TYPE TC-81.20, DES. 12, WITH 48' ARM
632	1	EACH	SIGNAL SUPPORT, TYPE TC-81.20, DES. 3, WITH 32' ARM
632	1	EACH	SIGNAL SUPPORT, TYPE TC-81.20, DES. 11, WITH 39' ARM
632	4	EACH	CABLE SUPPORT ASSEMBLY
632	876	LIN FT	LOOP DETECTOR PAVEMENT CUTTING
632	1195	LIN FT	SIGNAL CABLE, 5 CONDUCTOR, NO. 14 AWG
632	372	LIN FT	SIGNAL CABLE, 7 CONDUCTOR, NO. 14 AWG
632	60	LIN FT	SIGNAL CABLE, 9 CONDUCTOR, NO. 14 AWG
632	2328	LIN FT	LOOP DETECTOR WIRE, TYPE E
632	1320	LIN FT	LOOP DETECTOR LEAD-IN CABLE
632	44	LIN FT	POWER CABLE, 3 CONDUCTOR, NO. 8 AWG
632	1	EACH	CONDUIT RISER, 2" DIAM.
632	10	EACH	COVERING OF VEHICULAR SIGNAL HEADS
632	1	EACH	REMOVAL OF TRAFFIC SIGNAL INSTALLATION, AS PER PLAN
633	10.42	SQ FT	CONTROLLER WORK PAD
633	1.85	CU YD	CONCRETE FOR CABINET FOUNDATION
633	1	EACH	CONTROLLER, ACTUATED, 6 PHASE, SOLID-STATE DIGITAL, MICROPROCESSOR, AS PER PLAN
642	291	LIN FT	CROSSWALK LINE, TYPE 2

REVISED 4-26-94