

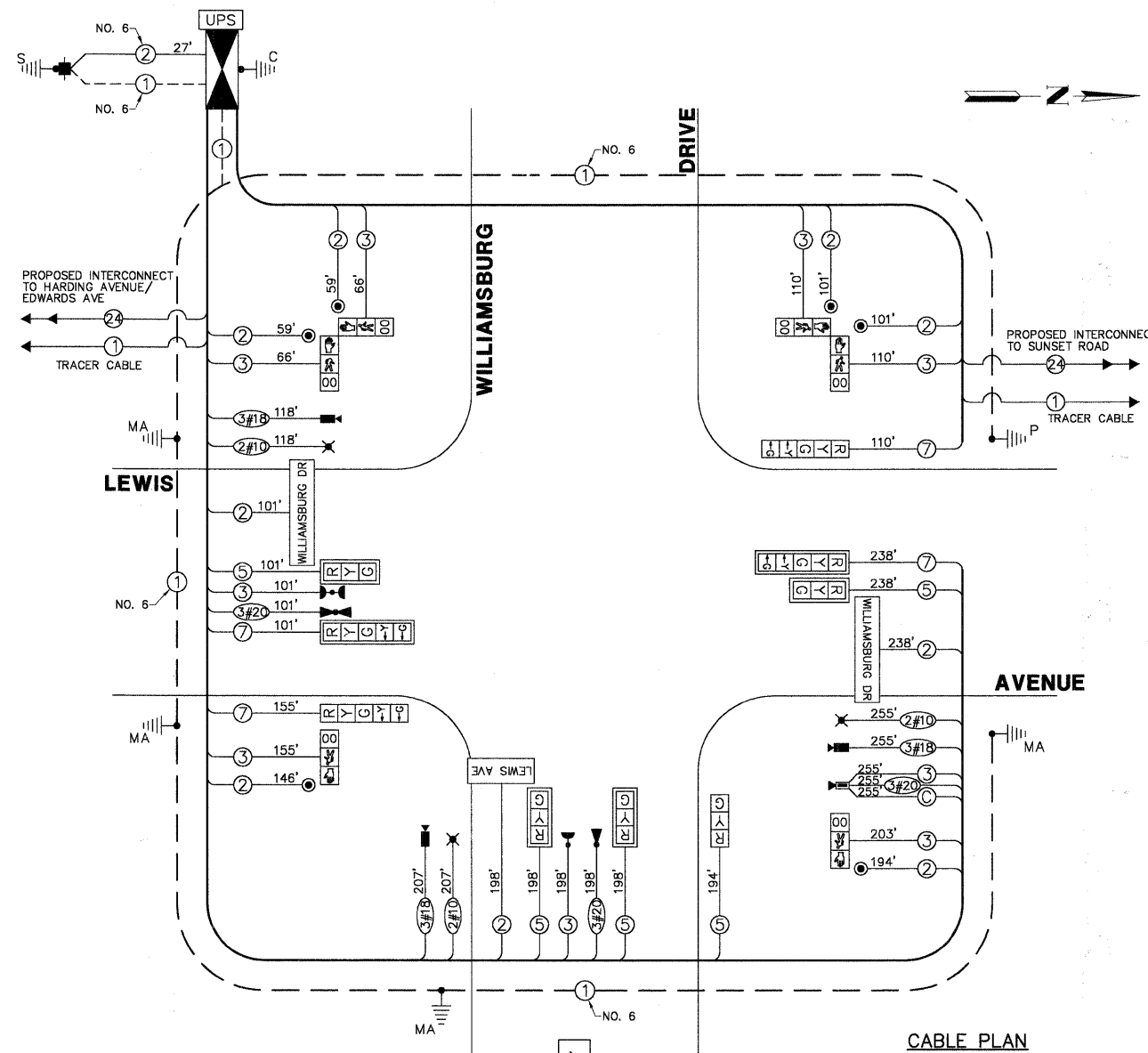
SCHEDULE OF QUANTITIES

LEWIS AVENUE AT WILLIAMSBURG DRIVE TRAFFIC SIGNAL MODERNIZATION

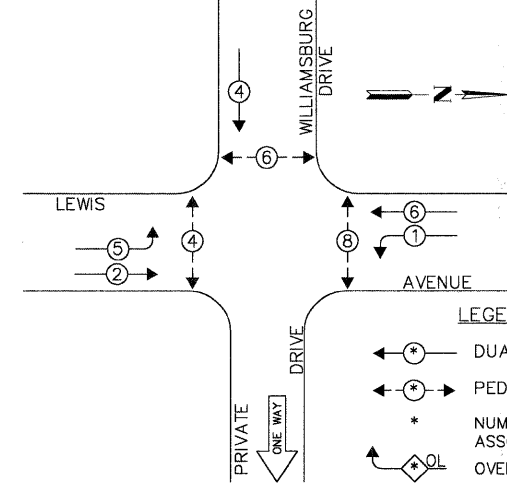
NO.	QUANT.	UNIT
1.	5	CU.YD. EARTH EXCAVATION
2.	15	SQ.YD. AGGREGATE BASE COURSE, TYPE B, 4"
3.	800	SQ.FT. PORTLAND CEMENT CONCRETE SIDEWALK, 5"
4.	72	SQ.FT. DETECTABLE WARNINGS
5.	100	FOOT COMBINATION CURB AND GUTTER REMOVAL
6.	675	SQ.FT. SIDEWALK REMOVAL
7.	2	EACH FRAMES AND LIDS TO BE ADJUSTED
8.	100	FOOT COMBINATION CONCRETE CURB AND GUTTER, TYPE B6.12
9.	115	FOOT THERMOPLASTIC PAVEMENT MARKING - LINE 12"
10.	5	FOOT CONDUIT IN TRENCH, 2" DIA., GALVANIZED STEEL
11.	10	FOOT CONDUIT IN TRENCH, 2-1/2" DIA., GALVANIZED STEEL
12.	44	FOOT CONDUIT IN TRENCH, 3-1/2" DIA., GALVANIZED STEEL
13.	27	FOOT CONDUIT IN TRENCH, 4" DIA., GALVANIZED STEEL
14.	188	FOOT CONDUIT PUSHED, 4" DIA., GALVANIZED STEEL
15.	1	EACH HANDHOLE
16.	2	EACH DOUBLE HANDHOLE
17.	580	FOOT ELECTRIC CABLE IN CONDUIT, 600 (EPR-TYPE RHW) 2-1/C NO. 10
18.	3	EACH LUMINAIRE, SODIUM VAPOR, HORIZONTAL MOUNT, PHOTO-CELL CONTROL 250 WATT
19.	1	EACH FULL-ACTUATED CONTROLLER AND TYPE IV CABINET (SPECIAL)
20.	1	EACH TRANSCEIVER - FIBER OPTIC
21.	1,197	FOOT ELECTRIC CABLE IN CONDUIT, SIGNAL NO. 14 2C
22.	1,264	FOOT ELECTRIC CABLE IN CONDUIT, SIGNAL NO. 14 3C
23.	929	FOOT ELECTRIC CABLE IN CONDUIT, SIGNAL NO. 14 5C
24.	604	FOOT ELECTRIC CABLE IN CONDUIT, SIGNAL NO. 14 7C
25.	27	FOOT ELECTRIC CABLE IN CONDUIT, SERVICE, NO. 6 2C
26.	2	EACH STEEL COMBINATION MAST ARM ASSEMBLY AND POLE, 28 FT (SPECIAL)
27.	1	EACH STEEL COMBINATION MAST ARM ASSEMBLY AND POLE, 36 FT (SPECIAL)
28.	4	FOOT CONCRETE FOUNDATION, TYPE A
29.	4	FOOT CONCRETE FOUNDATION, TYPE C
30.	45	FOOT CONCRETE FOUNDATION, TYPE E, 36-INCH DIAMETER
31.	4	EACH SIGNAL HEAD, L.E.D., 1-FACE, 3-SECTION, MAST ARM MOUNTED
32.	1	EACH SIGNAL HEAD, L.E.D., 1-FACE, 3-SECTION, BRACKET MOUNTED
33.	2	EACH SIGNAL HEAD, L.E.D., 1-FACE, 5-SECTION, BRACKET MOUNTED
34.	2	EACH SIGNAL HEAD, L.E.D., 1-FACE, 5-SECTION, MAST ARM MOUNTED
35.	2	EACH PEDESTRIAN COUNTDOWN SIGNAL HEAD, L.E.D., 1-FACE, BRACKET MOUNTED
36.	2	EACH PEDESTRIAN COUNTDOWN SIGNAL HEAD, L.E.D., 2-FACE, BRACKET MOUNTED
37.	6	EACH TRAFFIC SIGNAL BACKPLATE, LOUVERED, ALUMINIUM
38.	2	EACH LIGHT DETECTOR
39.	1	EACH LIGHT DETECTOR AMPLIFIER
40.	6	EACH PEDESTRIAN PUSH-BUTTON
41.	1	EACH TEMPORARY TRAFFIC SIGNAL INSTALLATION
42.	1	EACH REMOVE EXISTING TRAFFIC SIGNAL EQUIPMENT
43.	5	EACH REMOVE EXISTING HANDHOLE
44.	6	EACH REMOVE EXISTING CONCRETE FOUNDATION
45.	1	EACH SERVICE INSTALLATION, POLE MOUNT
46.	317	FOOT ELECTRIC CABLE IN CONDUIT, GROUNDING, NO. 6 1C
47.	554	FOOT ELECTRIC CABLE IN CONDUIT, NO. 20 3C, TWISTED, GROUNDED
48.	255	FOOT ELECTRIC CABLE IN CONDUIT, COAXIAL
49.	580	FOOT ELECTRIC CABLE IN CONDUIT, COMMUNICATION NO. 18, 3C
50.	1	EACH VIDEO DETECTION SYSTEM (COMPLETE INTERSECTION)
51.	3	EACH L.E.D. INTERNALLY ILLUMINATED STREET NAME SIGN
52.	1	EACH TRAFFIC SIGNAL POST, 16 FT (SPECIAL)
53.	1	EACH REMOTE-CONTROLLED VIDEO SYSTEM
54.	1	EACH UNINTERRUPTIBLE POWER SUPPLY
55.	1	EACH VIDEO ENCODER

CABLE PLAN LEGEND

EXISTING	PROPOSED	DESCRIPTION
		12" TRAFFIC SIGNAL SECTION
		CONTROLLER CABINET
		TELEPHONE INSTALLATION
		EMERGENCY VEHICLE LIGHT DETECTOR
		PUSHBUTTON DETECTOR
		FIBER OPTIC CABLE IN CONDUIT, 24 SINGLEMODE
		RAILROAD CONTROL CABINET
		ILLUMINATED SIGN "NO LEFT TURN"
		GROUND ROD AT POST (P) OR MAST ARM POLE (MA) INSTALLATION
		BELDEN 1694A RG-6/4 COAXIAL CABLE
		LUMINAIRE
		PTZ CAMERA
		L.E.D. STREET NAME SIGN
		UNINTERRUPTIBLE POWER SUPPLY

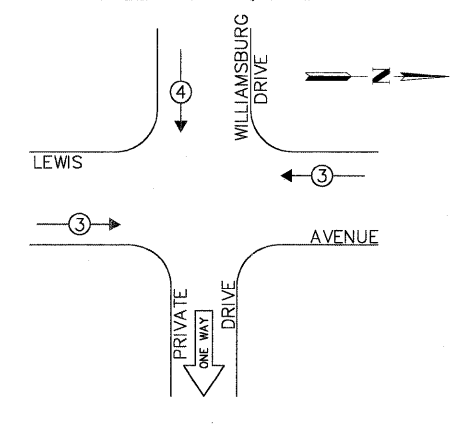


CONTROLLER SEQUENCE



LEGEND:
 DUAL ENTRY PHASE
 PEDESTRIAN PHASE
 * NUMBER REFERS TO ASSOCIATED PHASE
 OVERLAP

EMERGENCY VEHICLE PREEMPTION SEQUENCE



PROPOSED EMERGENCY VEHICLE PREEMPTORS		
EMERGENCY VEHICLE PREEMPTOR	3	4
MOVEMENT	←	↓

THE TRAFFIC SIGNAL CONTROL EQUIPMENT FOR THIS PROJECT SHALL BE "ECONOLITE NTCIP" COMPLIANT.

FOUNDATION (DEPTH)	(FT.)	CABLE SLACK	(FT.)	VERTICAL	(FT.)
TYPE A - POST	4	HANDHOLE	6.5	ALL FOUNDATIONS	3.5
TYPE D - CONTROLLER	4	DOUBLE HANDHOLE	13	MAST ARM (1) POLE	20'+1-2=
TYPE E - M.ARM POLE	15	SIGNAL POST	2	BRACKET MOUNTED	13
		CONTROLLER CAB.	1	PED. PUSHBUTTON	4
		FIBER OPTIC	13	ELECTRIC SERVICE	13.5
		ELECTRIC SERVICE	1	SERVICE TO GROUND	13.5
		GROUND CABLE	1	POST MOUNTED	6

L.C.D.O.T. TRAFFIC SIGNAL INSTALLATION ELECTRICAL SERVICE REQUIREMENTS					TOTAL WATTAGE
TYPE	NO LAMPS	WATTAGE INCAND. L.E.D.	% OPERATION		
SIGNAL (RED)	9	135	10	0.50	45.0
SIGNAL (YELLOW)	9	135	19	0.10	17.1
SIGNAL (GREEN)	9	135	11	0.40	39.6
ARROW	8	135	9	0.10	7.2
FRD.SIGNAL	6	90	9	1.00	54.0
CONTROLLER	1	-	100	1.00	100.0
LUMINAIRE	3	-	250	0.50	375.0
L.E.D. ST. NAME SIGN	3	-	64	0.50	96.0
VIDEO SYSTEM	1	-	150	1.00	150.0
BATTERY BACKUP	1	-	25	1.00	25.0
TOTAL =					908.9

ENERGY COSTS - BILLED TO: CITY OF WAUKEGAN
 (ADDRESS) 100 N. M.L.K. JR. AVENUE
 (ADDRESS) WAUKEGAN, IL
 ENERGY SUPPLY - CONTACT: NEW BUSINESS
 PHONE: (886) 639-3552
 COMPANY: COM-ED, LIBERTYVILLE

FILE NAME = 4135.315-TR1.dwg
 USER NAME = GHA
 PLOT SCALE = 1" = .08'
 PLOT DATE = 10/19/2009

DESIGNED - JRD
 DRAWN - ZCW
 CHECKED - DPB
 DATE - 10/19/09

REVISED - 9/15/09 (LCDOT)
 REVISED - 9/25/09 (IDOT)
 REVISED - 10/19/09 (LCDOT)
 REVISED -



CABLE PLAN, PHASE DESIGNATION DIAGRAM AND SCHEDULE OF QUANTITIES
 LEWIS AVENUE AT WILLIAMSBURG DRIVE
 SCALE: NONE SHEET NO. 44 OF 86 SHEETS STA. TO STA.

F.A.P. RTE.	SECTION	COUNTY	TOTAL SHEETS	SHEET NO.
2730	08-00259-00-TL	LAKE	86	44
CONTRACT #: 63344				

GHA #4135.800

ILLINOIS FED. AID PROJECT