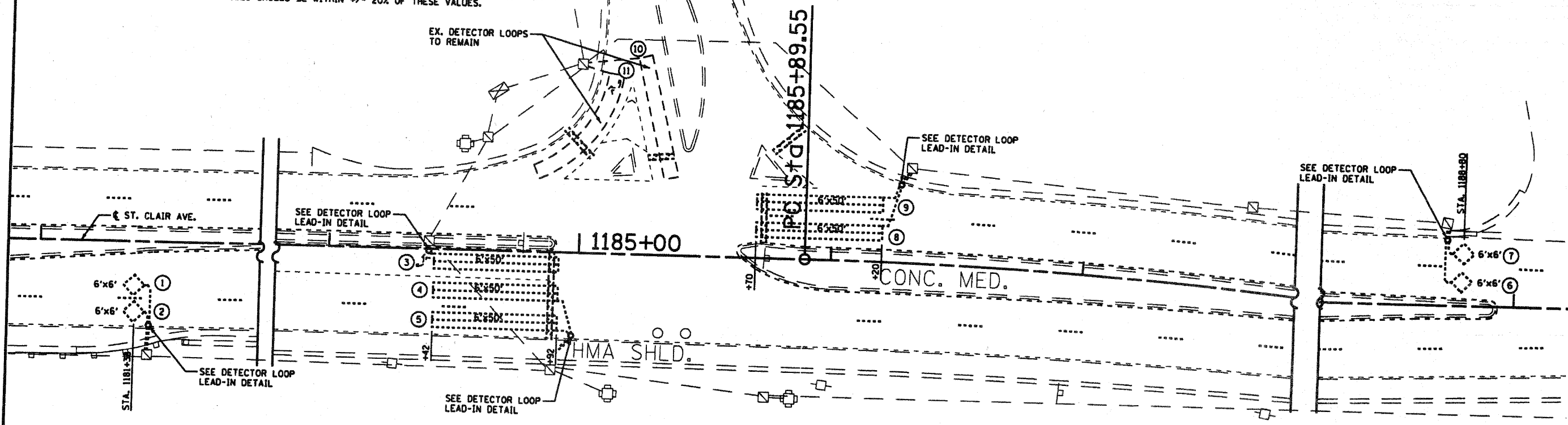


DETECTOR LOOP REQUIREMENTS AND CALCULATIONS FOR ST. CLAIR AVE AND IL RTE 157 (RAMPS 1 & 2)

ST. CLAIR & IL 157 RAMPS 1 & 2					
LOOP	PHASE #	FT. X FT.	CALCULATED INDUCTANCE MICROHENRIES (μH)	CALCULATED RESISTANCE OHMS (Ω)	REQUIRED # OF TURNS
1. EB A CCO	6	6 X 6	368.4	2.9	6
2. EB B CCO	6	6 X 6	364.4	2.9	6
3. EB LT CD	1	6 X 500	368.0	2.9	3-6-3
4. EB THRU A CD	6	6 X 500	364.4	2.9	3-6-3
5. EB THRU B CD	6	6 X 500	841.9	2.9	3-6-3
6. WB A CCO	2	6 X 6	841.9	2.9	6
7. WB B CCO	2	6 X 6	816.4	2.3	6
8. WB THRU A CD	2	6 X 500	795.7	1.8	3-6-3
9. WB THRU B CD	2	6 X 500	371.7	3.0	3-6-3
10. SB THRU CD	4	N/A	N/A	N/A	N/A
11. SB RT CD	4	N/A	N/A	N/A	N/A

THE ABOVE VALUES ARE CALCULATED OF COMBINED LOOP AND LEAD-IN INDUCTANCES AND RESISTANCES. ACTUAL MEASURED VALUES SHOULD BE WITHIN +/- 20% OF THESE VALUES.



LEGEND

- EX. DETECTOR LOOP TO REMAIN
- EX. VISIBLE DETECTOR LOOP TO BE REPLACED
- BURIED DETECTOR LOOP TO BE REPLACED IF REQUIRED
- EX. TRAFFIC CONTROLLER BOX
- EX. HANDHOLE
- EX. DOUBLE HANDHOLE
- EX. TRAFFIC SIGNAL BASE
- EX. TRAFFIC CONTROLLER CONDUIT

SCHEDULE OF QUANTITIES		
ITEM	UNIT	TOTAL QUANTITIES
LOCATING UNDERGROUND CABLE	FOOT	45
DETECTOR LOOP REPLACEMENT	FOOT	1,007

FILE NAME	USER NAME	DESIGNED	REVISED
#FILE#	#USER#	- CMV	-
		DRAWN	REVISED
		- SJS	-
		CHECKED	REVISED
		- CMV	-
		DATE	REVISED
		- 10/21/2010	-

STATE OF ILLINOIS  
DEPARTMENT OF TRANSPORTATION

DETECTOR LOOP REPLACEMENT  
ST. CLAIR AVE. & IL 157 RAMPS 1 & 2

SCALE:	SECTION	COUNTY	TOTAL SHEETS	SHEET NO.
	34-IRS-3	ST. CLAIR	87	74
CONTRACT NO. T0808				
ILLINOIS FED. AID PROJECT				

