

ITMS LEGEND	
	EXISTING CONDUIT RUN IDENTIFIER (# OF CONDUIT RUN)
	EXISTING MULTIDUCT CONDUIT (INSTALLED IN BARRIER)
	EXISTING PULL BOX INSTALLED IN BARRIER
	EXISTING JUNCTION WELL IDENTIFIER (TYPE OF JUNCTION WELL)
	EXISTING POLE BASE IDENTIFIER (TYPE OF POLE BASE)
	EXISTING CABINET BASE IDENTIFIER (TYPE OF CABINET BASE)
	PROPOSED CONDUIT RUN IDENTIFIER (# OF CONDUIT RUN)
	PROPOSED JUNCTION WELL IDENTIFIER (TYPE OF JUNCTION WELL)
	PROPOSED POLE BASE IDENTIFIER (TYPE OF POLE BASE)
	PROPOSED CABINET BASE IDENTIFIER (TYPE OF CABINET BASE)
	PROPOSED CCTV CAMERA POLE WITH DIRECTION OF ARM
	PROPOSED TAR REPEATER WITH DIRECTION FOR LOWERING POLE
	PROPOSED METERED SERVICE PEDESTAL WITH DISCONNECT
	PROPOSED WAVETRONIX DEVICE
	PROPOSED DYNAMIC MESSAGE BOARD

GENERAL REPEATER AND CCTV CAMERA NOTES

- CONTRACTOR SHALL INSTALL NEW 44' DELDOT SUPPLIED TAR WHIP ANTENNA ON A MODIFIED TYPE III POLE BASE USING DELDOT SUPPLIED ANCHOR BOLTS (SEE TAR REPEATER CONSTRUCTION DETAILS).
- CONTRACTOR SHALL AUGER A 10 IN. DIAMETER X 40.5 FT DEEP SHAFT FOR GROUND ROD INSTALLATION. GROUND ROD SHALL NOT BE MORE THAN 5' FROM EDGE OF REPEATER FOUNDATION.
- DELDOT SHALL INSTALL TAR TRANSMISSION EQUIPMENT AND PERFORM FINAL TUNING.
- CONDUIT 13 SHALL BE SDR-13.5 HDPE. ALL OTHER CONDUIT SHALL BE RIGID POLYVINYL CHLORIDE SCHEDULE 80.
- ALL UNDERGROUND AND OVERHEAD UTILITIES SHOWN ON THESE PLANS ARE SCHEMATIC ONLY AND MAY NOT BE COMPLETE. THE CONTRACTOR SHALL BE RESPONSIBLE FOR NOTIFYING MISS UTILITY, AND/OR THE APPROPRIATE UTILITY PRIOR TO THE BEGINNING OF CONSTRUCTION FOR THE UTILITY MARKOUTS. IF THE CONTRACTOR PERCEIVES THAT A CONFLICT BETWEEN UTILITIES AND THE TRAFFIC SIGNAL WILL OCCUR, THE CONTRACTOR SHALL NOTIFY DELDOT TRAFFIC IMMEDIATELY BEFORE CONSTRUCTION.
- ALL SIGNAL EQUIPMENT REMOVED FROM THIS PROJECT IS TO BE RETURNED TO DELDOT TRAFFIC - DOVER, DELAWARE.
- INSTALL CCTV EQUIPMENT AND REPEATER EQUIPMENT IN NEW TYPE P CABINET. DELDOT TRAFFIC FORCES TO ADJUST EQUIPMENT AS NEEDED.
- DELDOT FORCES SHALL INTEGRATE CCTV CAMERA WITH EXISTING FIBER TRUNKLINE.

CONDUIT RUN SCHEDULE					
CR#	# OF CON	SIZE	LENGTH	B/T/O	AMOUNT AND TYPE OF CABLE/ WIRE
1	1	2.0"	10'	T	[NEW (1) 2/*8 U.F. W/GROUND]
2	1	2.0"	80'	B	[NEW (1) 2/*8 U.F. W/GROUND]
3	1	2.0"	75'	B	[NEW (1) 2/*8 U.F. W/GROUND]
4	1	2.0"	250'	T	[NEW (1) 2/*8 U.F. W/GROUND]
5	1	2.0"	115'	T	[NEW (1) 2/*8 U.F. W/GROUND]
6	1	2.0"	45'	B	[NEW (1) 2/*8 U.F. W/GROUND]
7	1	2.0"	25'	T	[NEW (1) 2/*8 U.F. W/GROUND]
8	1	2.0"	10'	T	[NEW (1) 2/*8 U.F. W/GROUND]
9	4	4.0"	10'	T	[NEW COMM. CABLE]
					[NEW CAMERA COAXIAL CABLE + #6 GROUND]
					[NEW RG-8 COAXIAL CABLE + #6 GROUND]
10	1	2.5"	20'	T	[NEW CAMERA COAXIAL CABLE + #6 GROUND]
11	1	3.0"	15'	T	[NEW RG-8 COAXIAL CABLE + #6 GROUND]
12	1	3.0"	5'	T	[NEW 3" COPPER GROUND STRAP]
13	1	4.0"	50'	B	[NEW COMM. CABLE]
14	1	4.0"	350'	T	[NEW COMM. CABLE]

* DENOTES EXISTING
 B = BORE, T = TRENCH, O = OPEN CUT.

6/28/2012 9:18:20 AM \\ARKK\MY2010\2010\10028_DELDOT_JTS\TASK 5 - REPEATER SITE DESIGNS\CADD\PLANS\US 13 @ SR 1 (SMYRNA).DGN

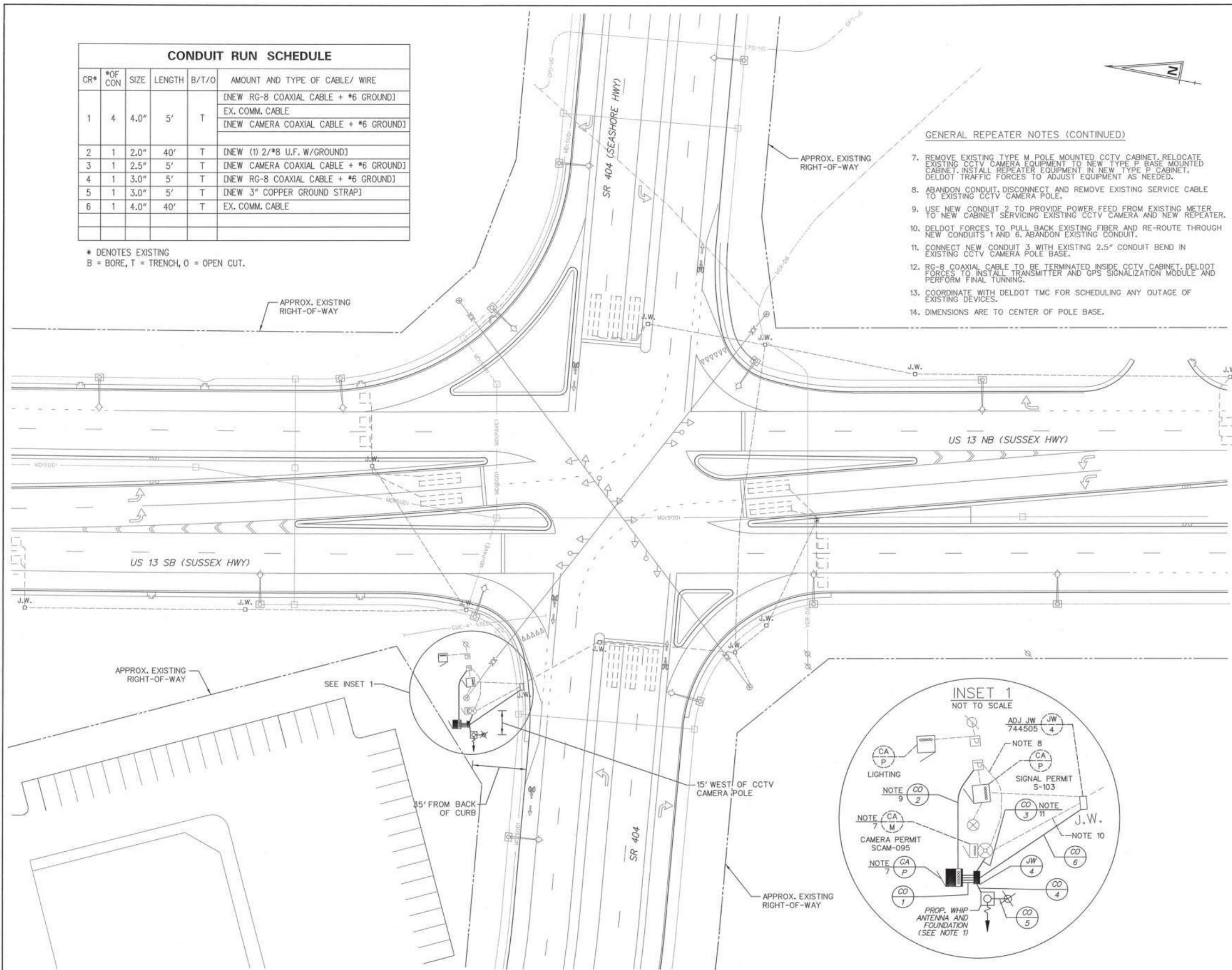
RECOMMENDED	DATE: 6.28.12	RECOMMENDED	DATE: 7/1/12	RECOMMENDED	DATE: 7/1/12	APPROVED TRAFFIC ENGINEER	DATE: 7/1/12	APPROVED FOR INSTALLATION CHIEF TRAFFIC ENGINEER	DATE: 7/1/12
DELAWARE DEPARTMENT OF TRANSPORTATION		SCALE 		CONTRACT T201304701 COUNTY NEW CASTLE		PERMIT NO. NWTMC07 DESIGNED BY: SM CHECKED BY: JCR		WTMC REPEATER AND CCTV PLAN SR 1 @ US 13	
ADDENDUMS / REVISIONS				SHEET NO. 1		TOTAL SHTS. 1			

CONDUIT RUN SCHEDULE					
CR#	# OF CON	SIZE	LENGTH	B/T/O	AMOUNT AND TYPE OF CABLE/ WIRE
1	4	4.0"	5'	T	[NEW RG-8 COAXIAL CABLE + #6 GROUND] EX. COMM. CABLE [NEW CAMERA COAXIAL CABLE + #6 GROUND]
2	1	2.0"	40'	T	[NEW (1) 2/*8 U.F. W/GROUND]
3	1	2.5"	5'	T	[NEW CAMERA COAXIAL CABLE + #6 GROUND]
4	1	3.0"	5'	T	[NEW RG-8 COAXIAL CABLE + #6 GROUND]
5	1	3.0"	5'	T	[NEW 3" COPPER GROUND STRAP]
6	1	4.0"	40'	T	EX. COMM. CABLE

* DENOTES EXISTING
B = BORE, T = TRENCH, O = OPEN CUT.

GENERAL REPEATER NOTES (CONTINUED)

- REMOVE EXISTING TYPE M POLE MOUNTED CCTV CABINET, RELOCATE EXISTING CCTV CAMERA EQUIPMENT TO NEW TYPE P BASE MOUNTED CABINET. INSTALL REPEATER EQUIPMENT IN NEW TYPE P CABINET. DELDOT TRAFFIC FORCES TO ADJUST EQUIPMENT AS NEEDED.
- ABANDON CONDUIT, DISCONNECT AND REMOVE EXISTING SERVICE CABLE TO EXISTING CCTV CAMERA POLE.
- USE NEW CONDUIT 2 TO PROVIDE POWER FEED FROM EXISTING METER TO NEW CABINET SERVICING EXISTING CCTV CAMERA AND NEW REPEATER.
- DELDOT FORCES TO PULL BACK EXISTING FIBER AND RE-ROUTE THROUGH NEW CONDUITS 1 AND 6. ABANDON EXISTING CONDUIT.
- CONNECT NEW CONDUIT 3 WITH EXISTING 2.5" CONDUIT BEND IN EXISTING CCTV CAMERA POLE BASE.
- RG-8 COAXIAL CABLE TO BE TERMINATED INSIDE CCTV CABINET, DELDOT FORCES TO INSTALL TRANSMITTER AND GPS SIGNALIZATION MODULE AND PERFORM FINAL TUNNING.
- COORDINATE WITH DELDOT TMC FOR SCHEDULING ANY OUTAGE OF EXISTING DEVICES.
- DIMENSIONS ARE TO CENTER OF POLE BASE.



SIGNAL PHASING

SIGNAL HEAD DIAGRAM

LEGEND

■	PROPOSED SIGNAL CABINET	⊗	REMOVE BY CONTRACTOR
□	EXISTING SIGNAL CABINET	⊙	REMOVE BY OTHERS
○	PROPOSED SIGNAL POLE BASE	⊖	ABANDON
⊙	EXISTING SIGNAL POLE BASE	⊗	PROPOSED POLE BASE IDENTIFIER (TYPE OF POLE BASE)
⊙	PROPOSED PEDESTRIAN POLE BASE	⊗	EXISTING POLE BASE IDENTIFIER (TYPE OF POLE BASE)
⊙	EXISTING PEDESTRIAN POLE BASE	⊗	PROPOSED JUNCTION WELL IDENTIFIER (TYPE OF JUNCTION WELL)
⊙	PROPOSED WOOD POLE	⊗	EXISTING JUNCTION WELL IDENTIFIER (TYPE OF JUNCTION WELL)
⊙	EXISTING UTILITY POLE	⊗	PROPOSED CONDUIT RUN IDENTIFIER (# OF CONDUIT RUN)
⊙	PROPOSED JUNCTION WELL	⊗	EXISTING CONDUIT RUN IDENTIFIER (# OF CONDUIT RUN)
⊙	EXISTING JUNCTION WELL	⊗	PROPOSED OVERHEAD RUN IDENTIFIER (# OF OVERHEAD RUN)
⊙	PROPOSED SIGNAL HEAD	⊗	EXISTING OVERHEAD RUN IDENTIFIER (# OF OVERHEAD RUN)
⊙	EXISTING SIGNAL HEAD	⊗	PROPOSED MAST ARM IDENTIFIER (LENGTH OF ARM)
⊙	PROPOSED PEDESTRIAN SIGNAL HEAD	⊗	EXISTING MAST ARM IDENTIFIER (LENGTH OF ARM)
⊙	EXISTING PEDESTRIAN SIGNAL HEAD	⊗	PROPOSED CABINET IDENTIFIER (TYPE OF CABINET)
⊙	PROPOSED PEDESTRIAN PUSHBUTTON	⊗	EXISTING CABINET IDENTIFIER (TYPE OF CABINET)
⊙	EXISTING PEDESTRIAN PUSHBUTTON	⊗	PROPOSED SPAN WIRE
⊙	PROPOSED VIDEO DETECTION	⊗	EXISTING SPAN WIRE
⊙	EXISTING VIDEO DETECTION	⊗	RIGHT-OF-WAY OR PROPERTY LINE
⊙	PROPOSED MICROWAVE DETECTION	⊗	SERVICE PEDESTAL
⊙	EXISTING MICROWAVE DETECTION	⊗	PROPOSED GROUND ROD
⊙	PROPOSED OVERHEAD SIGNING	⊗	PROPOSED TAR REPEATER
⊙	PROPOSED OPTICOM RECEIVER	⊗	DIRECTION FOR LOWERING POLE
⊙	EXISTING OPTICOM RECEIVER	⊗	
⊙	PROPOSED MAST ARM	⊗	
⊙	EXISTING MAST ARM	⊗	
⊙	PROPOSED LUMINAIRE	⊗	
⊙	EXISTING LUMINAIRE	⊗	
⊙	PROPOSED LOOP DETECTOR (TYPE 1 OR 2)	⊗	
⊙	EXISTING LOOP DETECTOR (TYPE 1 OR 2)	⊗	

GENERAL REPEATER NOTES

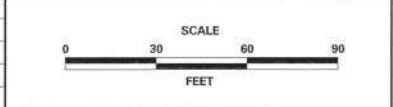
- CONTRACTOR SHALL INSTALL NEW 44" DELDOT SUPPLIED TAR WHIP ANTENNA ON A MODIFIED TYPE III POLE BASE USING DELDOT SUPPLIED ANCHOR BOLTS (SEE TAR REPEATER CONSTRUCTION DETAILS).
- CONTRACTOR SHALL AUGER A 10 IN DIAMETER X 40.5 FT DEEP SHAFT FOR GROUND ROD INSTALLATION. GROUND ROD SHALL NOT BE MORE THAN 5' FROM EDGE OF REPEATER FOUNDATION.
- DELDOT SHALL INSTALL TAR TRANSMISSION EQUIPMENT AND PERFORM FINAL TUNNING.
- ALL GALVANIZED CONDUIT (GRC) SHALL BE BEAMED AND THREADED. ALL GRC SHALL BE THREADED TOGETHER WITH APPROVED COUPLINGS, SET SCREWS, BOLTS, AND COMPRESSION FITTINGS ARE NOT ACCEPTABLE.
- ALL UNDERGROUND AND OVERHEAD UTILITIES SHOWN ON THESE PLANS ARE SCHEMATIC ONLY AND MAY NOT BE COMPLETE. THE CONTRACTOR SHALL BE RESPONSIBLE FOR NOTIFYING M&S UTILITY AND/OR THE APPROPRIATE UTILITY PRIOR TO THE BEGINNING OF CONSTRUCTION FOR THE UTILITY MARKOUTS. IF THE CONTRACTOR PERCEIVES THAT A CONFLICT BETWEEN UTILITIES AND THE TRAFFIC SIGNAL WILL OCCUR, THE CONTRACTOR SHALL NOTIFY DELDOT TRAFFIC IMMEDIATELY BEFORE CONSTRUCTION.
- ALL SIGNAL EQUIPMENT REMOVED FROM A PROJECT IS TO BE RETURNED TO DELDOT TRAFFIC - DOVER, DELAWARE.

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RECOMMENDED *[Signature]* DATE: 6.28.12 RECOMMENDED *[Signature]* DATE: RECOMMENDED *[Signature]* DATE: 7/1/12 APPROVED TRAFFIC ENGINEER *[Signature]* DATE: 7/1/12 APPROVED FOR INSTALLATION CHIEF TRAFFIC ENGINEER *[Signature]* DATE: 7/1/12

DELAWARE DEPARTMENT OF TRANSPORTATION

ADDENDUMS / REVISIONS	



CONTRACT: T201304701
COUNTY: SUSSEX

PERMIT NO.: SWTMC08
DESIGNED BY: SM
CHECKED BY: JCR

WTMC REPEATER PLAN
US 13 (SUSSEX HWY) @
SR 404 (SEASHORE HWY)

SHEET NO. 1
TOTAL SHTS. 1