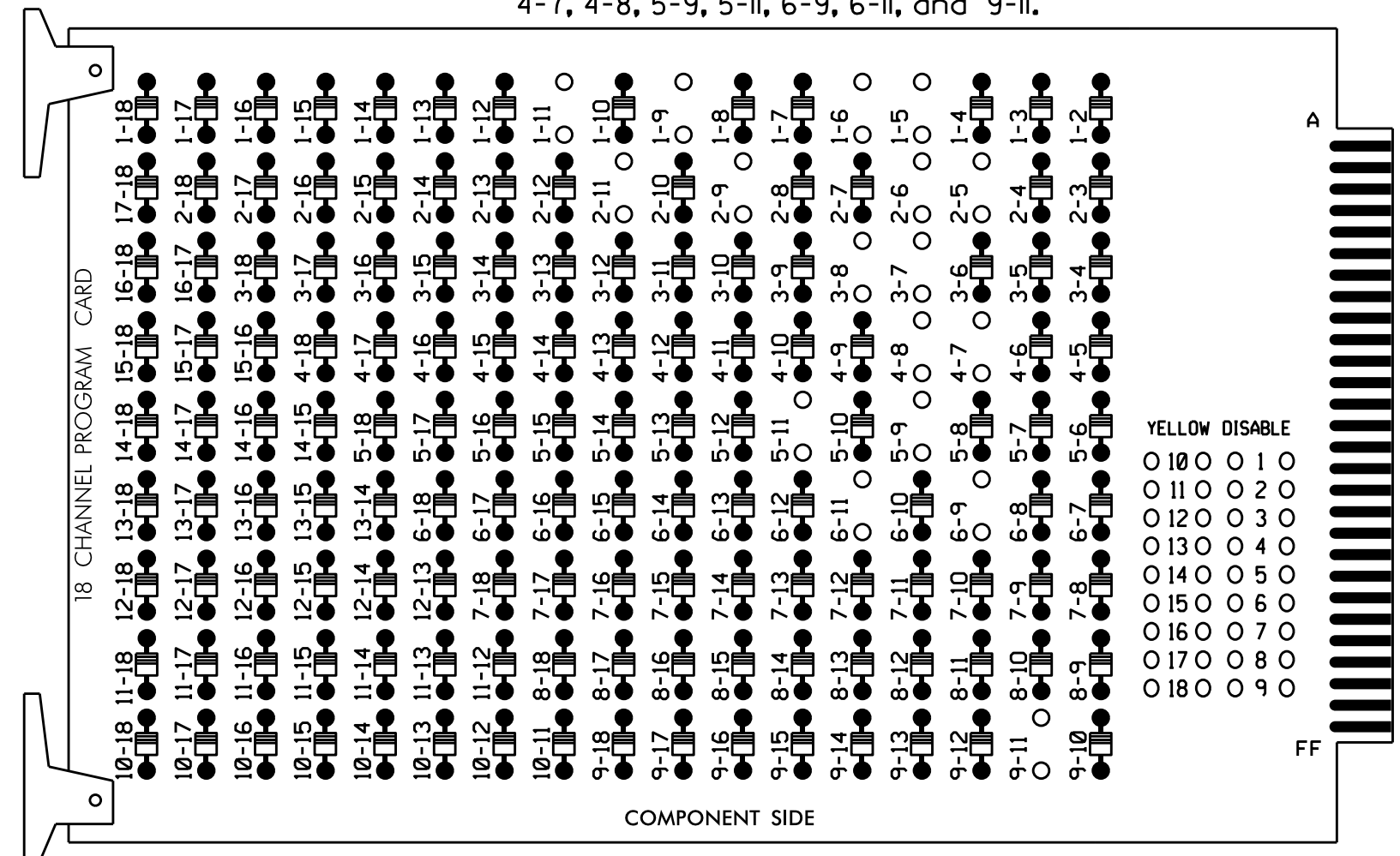


EDI MODEL 2018ECL-NC CONFLICT MONITOR PROGRAMMING DETAIL

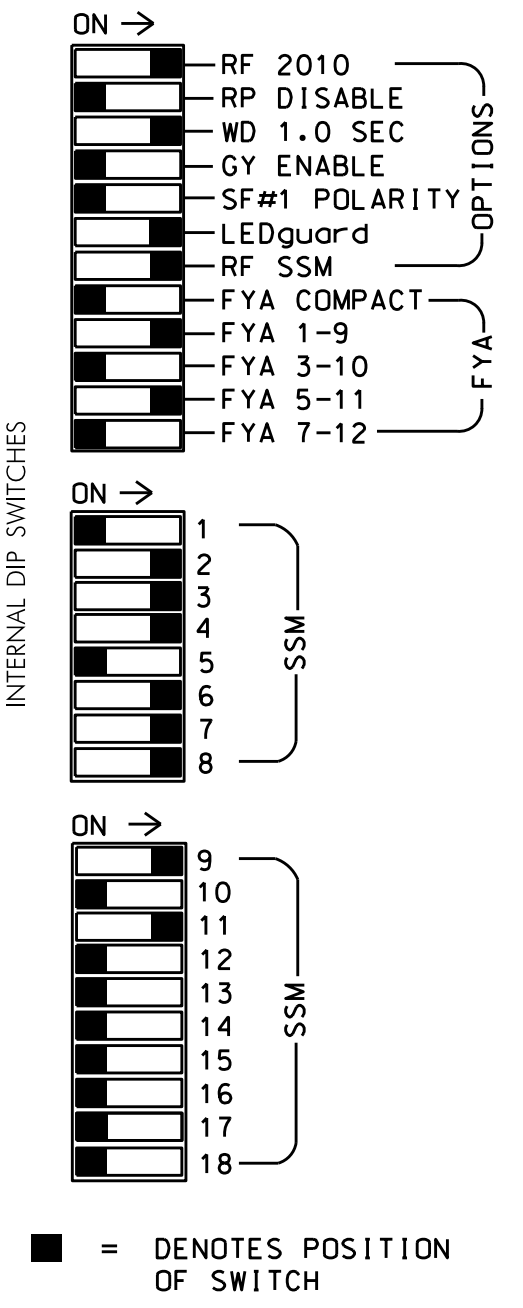
(remove jumpers and set switches as shown)

REMOVE DIODE JUMPERS 1-5, 1-6, 1-9, 1-II, 2-5, 2-6, 2-9, 2-II, 3-7, 3-8, 4-7, 4-8, 5-9, 5-II, 6-9, 6-II, and 9-II.



NOTES:

1. Card is provided with all diode jumpers in place. Removal of any jumper allows its channels to run concurrently.
2. Ensure jumpers SEL2-SEL5 and SEL9 are present on the monitor board.
3. Ensure that Red Enable is active at all times during normal operation.
4. Connect serial cable from conflict monitor to comm. port 1 of 2070 controller. Ensure conflict monitor communicates with 2070.



■ = DENOTES POSITION OF SWITCH

NOTES

1. To prevent "flash-conflict" problems, insert red flash program blocks for all unused vehicle load switches in the output file. The installer shall verify that signal heads flash in accordance with the Signal Plans.
2. Enable Simultaneous Gap-Out for all phases.
3. Program phases 2 and 6 for Start Up In Green.
4. Program phases 2 and 6 for Yellow Flash, and overlap 1 as Wag Overlaps.
5. The cabinet and controller are part of the Kannapolis City System.

EQUIPMENT INFORMATION

CONTROLLER.....2070
 CABINET.....332 W/ AUX
 SOFTWARE.....ECONOLITE OASIS
 CABINET MOUNT.....BASE
 OUTPUT FILE POSITIONS...18 WITH AUX. OUTPUT FILE
 LOAD SWITCHES USED.....S1,S2,S4,S5,S7,S8,S10,S11,
 AUX S1,AUX S4
 PHASES USED.....1,2,3,4,5,6,7,8
 OVERLAP "A".....1+2
 OVERLAP "B".....NOT USED
 OVERLAP "C".....5+6
 OVERLAP "D".....NOT USED

SIGNAL HEAD HOOK-UP CHART

LOAD SWITCH NO.	S1	S2	S3	S4	S5	S6	S7	S8	S9	S10	S11	S12	AUX S1	AUX S2	AUX S3	AUX S4	AUX S5	AUX S6
CMU CHANNEL NO.	1	2	13	3	4	14	5	6	15	7	8	16	9	10	17	11	12	18
PHASE	1	2	2 PED	3	4	4 PED	5	6	6 PED	7	8	8 PED	OLA	OLB	SPARE	OLC	OLD	SPARE
SIGNAL HEAD NO.	11*	21,22	NU	31	41,42	NU	51*	61,62	NU	71	81,82	NU	11*	NU	NU	51*	NU	NU
RED		128			101			134			107							
YELLOW	*	129			102		*	135			108							
GREEN		130			103			136			109							
RED ARROW					116						122		A121			A114		
YELLOW ARROW					117						123		A122			A115		
FLASHING YELLOW ARROW													A123			A116		
GREEN ARROW	127				118			133			124							

NU = Not Used

* Denotes install load resistor. See load resistor installation detail this sheet.

★ See pictorial of head wiring in detail below.

INPUT FILE POSITION LAYOUT

(front view)

FILE	1	2	3	4	5	6	7	8	9	10	11	12	13	14
U	∅ 1	-ORS	-ORS	-ORS	-ORS	-ORS	-ORS	-ORS	-ORS	-ORS	-ORS	-ORS	-ORS	FS
I	1A													DC ISOLATOR
L	NOT USED													ST
U	∅ 5	-ORS	-ORS	-ORS	-ORS	-ORS	-ORS	-ORS	-ORS	-ORS	-ORS	-ORS	-ORS	FS
I	5A													DC ISOLATOR
L	NOT USED													ST

EX.: 1A, 2A, ETC. = LOOP NO.'S

FS = FLASH SENSE
 ST = STOP TIME

⊗ Wired Input - Do not populate slot with detector card

See SPECIAL DETECTOR NOTE on this sheet regarding video detection equipment.

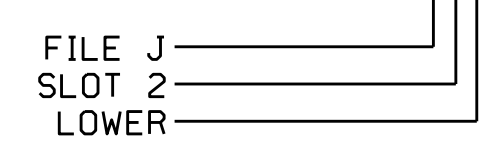
INPUT FILE CONNECTION & PROGRAMMING CHART

DETECTION ZONE NO.	LOOP TERMINAL	INPUT FILE POS.	PIN NO.	INPUT ASSIGNMENT NO.	DETECTOR NO.	NEMA PHASE	CALL	EXTEND	FULL TIME DELAY	STRETCH TIME	DELAY TIME
1A ¹	-	I1U	56	18	1	1	Y	Y			15
	-	J4U	48	10	26	6	Y	Y			
5A ²	-	J1U	55	17	5	5	Y	Y			15
	-	14U	47	9	22	2	Y	Y			

¹Add jumper from I1-W to J4-W, on rear of input file.

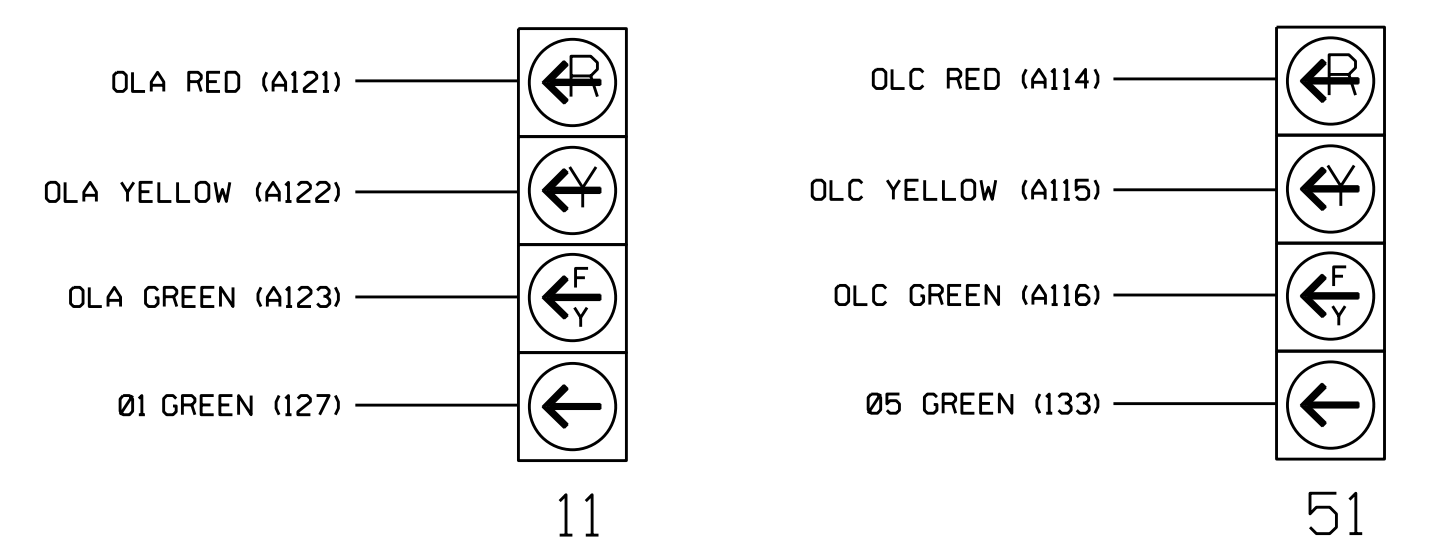
²Add jumper from J1-W to I4-W, on rear of input file.

INPUT FILE POSITION LEGEND: J2L



FYA SIGNAL WIRING DETAIL

(wire signal heads as shown)



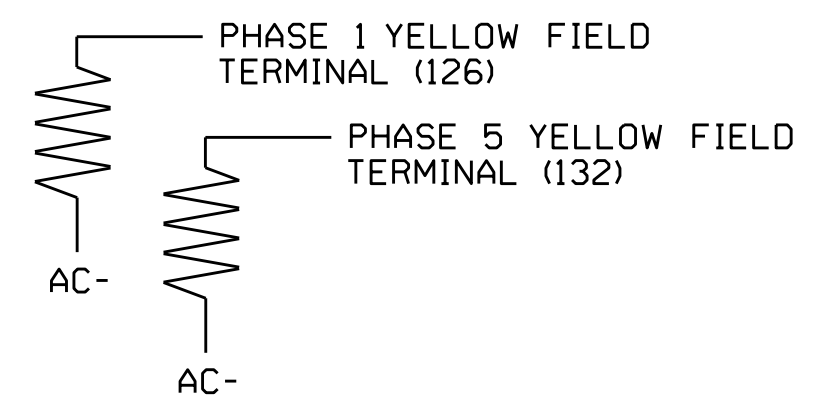
NOTE

The sequence display for signal heads 11 and 51 requires special logic programming. See sheet 2 for programming instructions.

LOAD RESISTOR INSTALLATION DETAIL

(install resistors as shown below)

VALUE (ohms)	WATTAGE
1.5K - 1.9K	25W (min)
2.0K - 3.0K	10W (min)



SPECIAL DETECTOR NOTE

Install a video detection system for vehicle detection. Perform installation according to manufacturer's directions and NCDOT engineer-approved mounting locations to accomplish the detection schemes shown on the Signal Design Plans.

For Detection Zones 1A and 5A, the equipment placement and slots reserved for wired inputs are typical for a NCDOT installation.

Electrical Detail - Temp Design - TMP Phase II
 Sheet 1 of 2

DOCUMENT NOT CONSIDERED FINAL UNLESS ALL SIGNATURES COMPLETED

Prepared In the Offices of:
 TRANSPORTATION MOBILITY AND SAFETY
 NORTH CAROLINA DEPARTMENT OF TRANSPORTATION
 Signal Management Section
 750 N. Greenfield Pkwy, Garner, NC 27529

NC 3 (Mooresville Road) at SR 1691 (Dale Earnhardt Blvd.)

Division 10 Cabarrus County Kannapolis
 PLAN DATE: June 2016 REVIEWED BY: BAS
 PREPARED BY: S. Armstrong REVIEWED BY:

REVISIONS INIT. DATE

Seal of North Carolina Professional Engineer Keith M. Mims
 036880
 6/28/2016
 DATE

SIG. INVENTORY NO. 10-0445T2