

(NOTE 19) (NOTE 3+4) (NOTE 12) (NOTE 3+4) (NOTE 3+4) (NOTE 18) (NOTE 18) (NOTE 15+16+17) (NOTE 5) (NOTE 6+8) (NOTE 10) (NOTE 13) (NOTE 3+4) (NOTE 9) (NOTE 3+4+6) (NOTE 3+4+6+7) (NOTE 14)

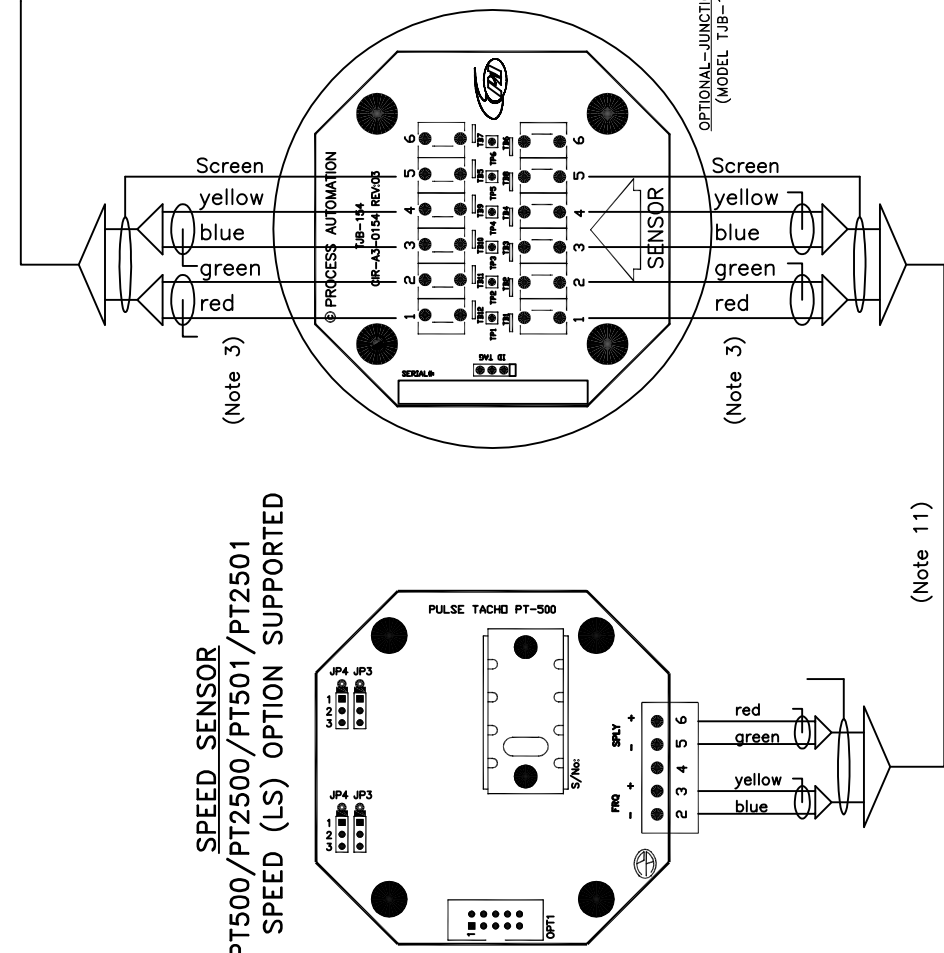
NOTES (FOR THE OPTIONAL MODEL 179 MAINS POWER SUPPLY):

15. HAZARDOUS VOLTAGES ARE PRESENT. CONTACT WILL CAUSE ELECTRIC SHOCK OR BURN. TURN OFF AND LOCK OUT POWER BEFORE SERVICING.
16. FUSE FS1-1.6A 250VAC 5X20MM SLOW BLOW(T). ALWAYS REPLACE WITH THE SAME TYPE AND RATING. FITTING A FUSE OF A DIFFERENT TYPE OR RATING COULD LEAD TO DAMAGE TO THE EQUIPMENT AND FIRE.
17. THE MAINS POWER SUPPLY VOLTAGE CAN BE 110VAC OR 220 VAC. (RANGE 90 VAC TO 230 VAC) FREQUENCY 50/60HZ. MAINS POWER SUPPLIED TO THE UNIT TO BE INSTRUMENTATION QUALITY AND TRANSIENT FREE. POWER CONSUMPTION IS 20W MAXIMUM.
18. 2 X RELAYS PROVIDED. THE CHANGE OVER CONTACT IS RATED AT 5A/250VAC OR 5A/30VDC FOR RESISTIVE LOADS; 2A/250VAC OR 3A/30VDC FOR INDUCTIVE LOADS. INDUCTIVE LOADS MUST BE FITTED WITH A FLYBACK DIODE (DC) OR SNUBBER NETWORK (AC) AT THE LOAD.
19. SWITCH 1 (REL1) IS PRE-WIRED TO CM1/NC1 (SPEED ALARM) ON THE SPEED SWITCH BOARD.
20. THE 24V OUTPUT IS PROTECTED FROM SHORT CIRCUITS BY A SELF RESETTING THERMAL FUSE.



(NOTE 20)

(NOTE 11)



SPEED SENSOR  
PT500/PT2500/PT501/PT2501  
LOW SPEED (LS) OPTION SUPPORTED

NOTES:

1. THE SPEED SWITCH MAIN BOARD IS MOUNTED ON THE MODEL 174 CARRIER BOARD. ONE OPTIONAL OUTPUT BOARD CAN BE MOUNTED ON THE MODEL 174 CARRIER BOARD BELOW THE SPEED SWITCH MAIN BOARD.
2. JP1 MUST BE FITTED FOR NORMAL OPERATION.
3. TERMINATION IS SUITABLE FOR 0.2mm<sup>2</sup> (MINIMUM) TO 1.5mm<sup>2</sup> (MAXIMUM) SOLID OR STRANDED CONDUCTORS.
4. CUT OFF ALL CABLE SCREENS AS CLOSE TO THE CABLE ENTRY AS POSSIBLE.
5. 24VDC POWER SUPPLY (MAX 30V MIN 20V) AT 200mA MAX (SUBJECT TO OPTIONS INSTALLED). POWER SUPPLIED TO BE FREE FROM ANY ELECTRICAL NOISE AND TRANSIENTS. 24VDC IS PROVIDED BY THE OPTIONAL MODEL 179 POWER SUPPLY WHEN FITTED.
6. POWER SUPPLY TO BE FREE FROM ANY ELECTRICAL NOISE AND TRANSIENTS.
7. SIGNAL CABLES MUST NOT RUN WITH HIGH POWER CABLES.
8. THE mA OUTPUT WILL DRIVE 4-20mA INTO A 500 OHM RESISTANCE (LOAD + CABLE). THE mA OUTPUT BOARD CAN NOT BE FITTED IF THE PULSE OUTPUT BOARD IS FITTED.
9. CABLE BY OTHERS (PA PART 2841/050 OR SIMILAR; 2x TWISTED PAIR, INDIVIDUALLY SCREENED, OVERALL SCREENED. CONDUCTOR SIZE AT LEAST 0.5mm<sup>2</sup>). MAXIMUM CABLE LENGTH IS 250m.
10. THE SPEED SWITCH MAIN BOARD IS POWERED FROM THE MAIN MODEL 174 CARRIER BOARD USING THE FLYING LEAD PROVIDED.
11. RELAY OUTPUT RATED AT 0.5A/24V. D.C. LOADS MUST BE FITTED WITH A SUITABLE FLYBACK DIODE AT THE LOAD. A.C. LOADS MUST BE FITTED WITH A SUITABLE SNUBBER AT THE LOAD.
12. THE PT501/PT2501 IS SUPPLIED PRE-WIRED WITH A NOMINAL 2M LENGTH OF CABLE WHEN A TJB-154 JUNCTION BOX IS ORDERED. THE PT500/PT2500 IS SUPPLIED PRE-WIRED TO THE OPTIONAL TJB-154 JUNCTION BOX MOUNTED ON THE SPEED SENSOR CROSS SUPPORT.
13. OPTIONAL MODEL 179 MAINS TO 24V POWER SUPPLY WITH TWO MAINS RATED RELAYS.
14. TERMINALS NC2, CM2 AND NO2 ARE NOT USED - DO NOT CONNECT.
15. THE STANDARD ENCLOSURE IS DESIGNED FOR IP66 RATING WHEN SUITABLE GLANDS ARE USED. THE ENCLOSURE MATERIAL IS POLYCARBONATE.

REV	DATE	BY	DESCRIPTION	ENG APPROVED	REVIEWED
02	10.11.2016	R.KITCHING	ADDED MODEL 179 PSU AND RELAY OPTION	I.THORNTON	I.THORNTON
01	28.04.2016	J.BORRMAN	ISSUED FOR DISTRIBUTION	I.THORNTON	I.THORNTON
00	28.04.2016	J.BORRMAN	ISSUED FOR COMMENTS	I.THORNTON	I.THORNTON

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ENG APPROVED	DATE	TITLE
I.THORNTON	28.04.2016	INTERCONNECT WIRING DIAGRAM FOR THE REMOTE SPEED SWITCH ELECTRONICS AND SPEED SENSOR
DRAWN BY	DATE	
J. Borrman	28.04.2016	
REVIEWED BY	DATE	CUSTOMER: ** TAG NO/S: **
I.THORNTON	28.04.2016	

Job Ref No. \*\* N.T.S.A3 SCALE: \*\*

DWG. NO. WIR026-004-206 SHEET 1 of 1 REV 02