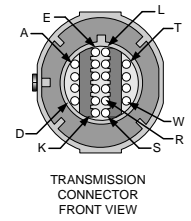


REVISION HISTORY				
LEVEL	DESCRIPTION	DATE	DRN	APP
1	RELEASE	2/12/2013	FAD	

C-1 TRANSMISSION CONNECTOR

QTY	DESCRIPTION	PCS PIN	NOTES
1	CONNECTOR	CON-2000	
14	TERMINAL	CON-2804	20-22 AWG.
1	TERMINAL	CON-2805	16-18 AWG
5	CAVITY PLUG	CON-1044	BLU
1	MULTI CABLE SEAL	CON-3309	LT.GRN
1	CONDUIT CLIP	CON-2008	BLK
1	TPA	CON-2003	GRY



C-2 OUTPUT SHAFT SPEED SENSOR FEMALE

QTY	DESCRIPTION	PCS PIN	NOTES
1	CONNECTOR	CON-1070	
2	TERMINALS	CON-1084	20 AWG
2	CABLE SEAL	CON-1093	GRN
1	TPA	CON-1072	GRY



C-3 LAPTOP CAL CONNECTOR

QTY	DESCRIPTION	PCS PIN	NOTES
1	CONNECTOR	CON-3416	
3	TERMINALS	CON-1038	
1	TPA	CON-3417	CREAM
3	CABLE SEALS	CON-1027	WHT



C-4 OPTION FRONT VIEW

QTY	DESCRIPTION	PCS PIN	NOTES
1	CONNECTOR	CON-0065	
4	TERMINALS	CON-0051	



C-5 CAN BUS CONNECTOR

QTY	DESCRIPTION	PCS PIN	NOTES
1	CONNECTOR	CON-5050	
2	TERMINALS	CON-5200	(20-18gauge)
1	WEDGE LOCK	CON-5100	GRN



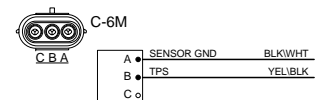
C-6 THROTTLE POSITION CONNECTOR

QTY	DESCRIPTION	PCS PIN	NOTES
1	CONNECTOR	CON-2302	
3	TERMINALS	CON-1006	
3	CABLE SEALS	CON-1004	VIO



C-6M THROTTLE POSITION SENSOR PIGTAIL

QTY	DESCRIPTION	PCS PIN	NOTES
1	CONNECTOR	CON-2307	
2	TERMINALS	CON-1011	20 AWG
2	CABLE SEALS	CON-1004	VIO
1	PLUG	CON-0999	GRN



7 PIN NISSAN CONNECTION PIGTAIL

PCS COLOR	GM FUNCTION	TCU POS.
A	WHITE/BLACK	PLANE IN+12V
B	WHITE/RED	PLANE IN+12V
C	BLACK/WHITE	RANGE S.GND
D	RED (16AWG)	START RELAY
E	BROWN/PNK	REV. LAUP
F	BLACK (16AWG)	18S1-PWM12V

Part Numbers:
 Connector Assembly: CON-3166/12128445
 Terminal (20-22AWG): CON-1038/12084200
 Terminal (16AWG): CON-1033/12074411
 TPA: CON-2157/12128441

APPLICABLE STANDARDS

- ASME Y14.100-200
- ASME Y14.5M-1994
- IPC/WHMA-A-620A-CLASS 2
- MARK IAW MIL-STD-130.

NOTES

- WIRE LENGTH TOLERANCE +/- 1/2 INCH
- WIRE GAUGE IS 20 AWG UNLESS OTHERWISE STATED
- TAPE ALL LOOM JOINTS UNLESS OTHERWISE STATED
- TWIST INDICATED WIRES AT LEAST 10-12 TURNS PER FOOT
- PLACE TAGS NO MORE THAN 2" FROM CONNECTOR. PLACE TAGS FOR UNTERMINATED WIRES NO MORE THAN 2" FROM UNTERMINATED END.
- WIRE TYPE IS TXL UNLESS OTHERWISE STATED

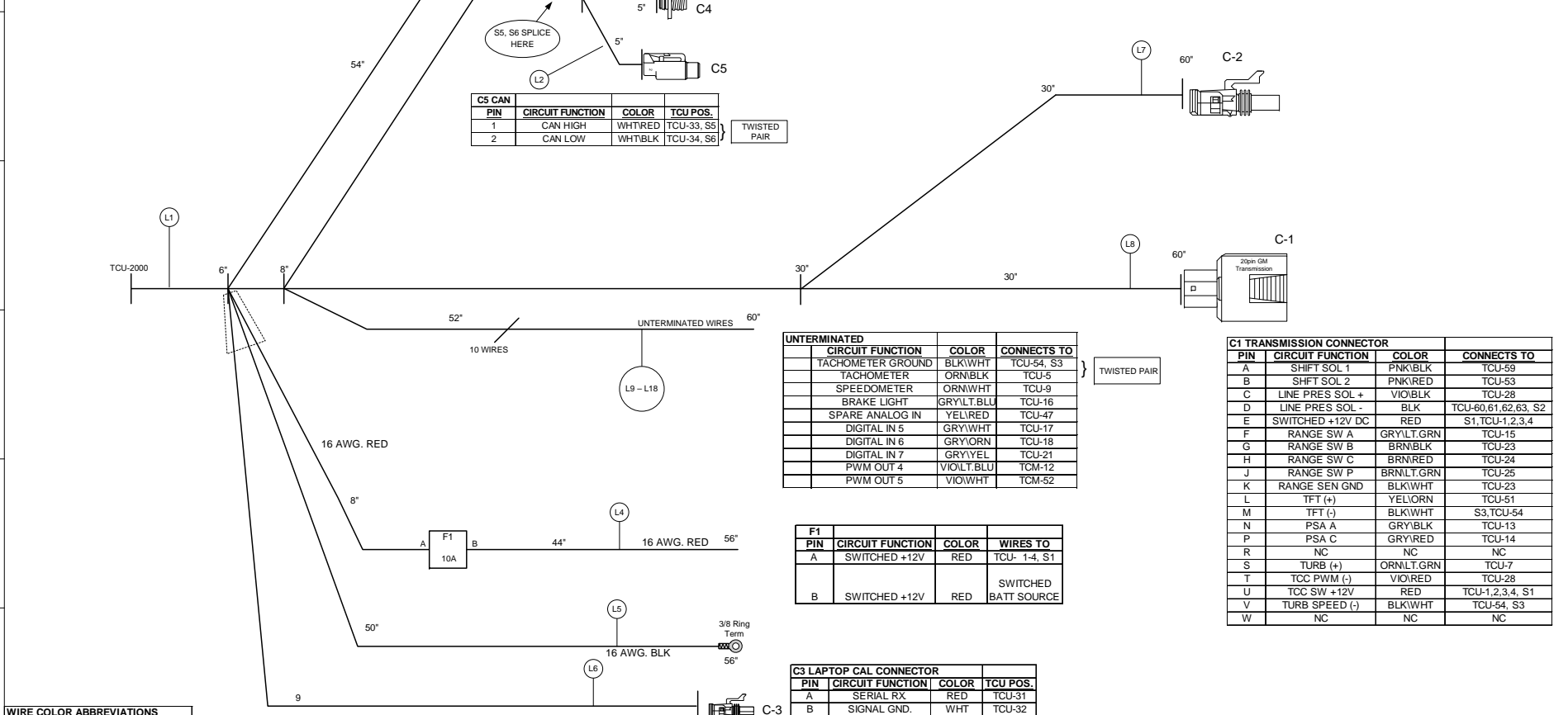
COMPANY: POWERTRAIN CONTROL SOLUTIONS

TITLE: GM 4T80 (2003) LATE TO TCM-2000

SIZE: CUSTOMER DRAWING NO. XXXXXX-XXXXX
 REV: TCM-4104
 DATE: 2/8/2013
 SHEET: 1 OF 3

LABEL DEFINITION TABLE			
NUM	NAME	PCS P/N	NOTES
L1	TCM-4101-001	WRE-8501	
L2	CAN BUS	WRE-8500	
L3	THROTTLE POSITION SENSOR	WRE-8500	
L4	SWITCHED +12V DC	WRE-8500	
L5	CHASSIS GROUND	WRE-8500	
L6	LAPTOP CAL CONNECTOR	WRE-8500	
L7	OUTPUT SHAFT SPEED SENSOR	WRE-8500	
L8	TRANSMISSION CONNECTOR	WRE-8501	
L9	TACHOMETER GROUND	WRE-8500	
L10	TACHOMETER	WRE-8500	
L11	SPEEDOMETER	WRE-8500	
L12	BRAKE LIGHT	WRE-8500	
L13	ANALOG IN 2	WRE-8500	
L14	DIGITAL IN 9	WRE-8500	
L15	DIGITAL IN 10	WRE-8500	
L16	DIGITAL IN 11	WRE-8500	
L17	PWM OUT 4	WRE-8500	
L18	PWM OUT 5	WRE-8500	
L19	OPTION	WRE-8500	

REVISION HISTORY				
LEVEL	DESCRIPTION	DATE	DRN	APP
1	RELEASE	2/22/2013	FAD	



C6 THROTTLE POSITION SENSOR			
PIN	CIRCUIT FUNCTION	COLOR	CONNECTS TO
A	SEN.GND	BLK/WHT	TCU-54, S3
B	TPS	YEL/BLK	TCU-46
C	+5V SENSOR	RED/WHT	TCU-58

C4 OPTION			
PIN	CIRCUIT FUNCTION	COLOR	TCU POS.
1	SWITCHED +12V DC	RED	TCU-1,2,3,4, S1
2	GND	BLK	TCU-60,61,62,63, S2
3	CAN HIGH	WHT/RED	TCU-33
4	CAN LOW	WHT/BLK	TCU-34

C5 CAN			
PIN	CIRCUIT FUNCTION	COLOR	TCU POS.
1	CAN HIGH	WHT/RED	TCU-33, S5
2	CAN LOW	WHT/BLK	TCU-34, S6

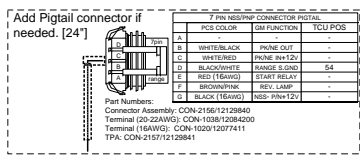
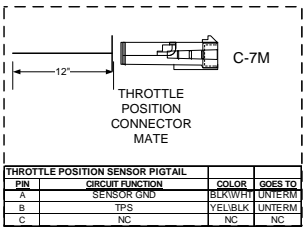
UNTERMINATED			
CIRCUIT FUNCTION	COLOR	CONNECTS TO	
TACHOMETER GROUND	BLK/WHT	TCU-54, S3	} TWISTED PAIR
TACHOMETER	ORN/BLK	TCU-5	
SPEEDOMETER	ORN/WHT	TCU-9	
BRAKE LIGHT	GRY/LT.BLU	TCU-16	
SPARE ANALOG IN	YEL/RED	TCU-47	
DIGITAL IN 5	GRY/WHT	TCU-17	
DIGITAL IN 6	GRY/ORN	TCU-18	
DIGITAL IN 7	GRY/YEL	TCU-21	
PWM OUT 4	VIOL/BLU	TCM-12	
PWM OUT 5	VIOWHT	TCM-52	

C1 TRANSMISSION CONNECTOR			
PIN	CIRCUIT FUNCTION	COLOR	CONNECTS TO
A	SHIFT SOL 1	PNK/BLK	TCU-59
B	SHIFT SOL 2	PNK/RED	TCU-53
C	LINE PRES SOL +	VIOL/BLK	TCU-28
D	LINE PRES SOL -	BLK	TCU-60,61,62,63, S2
E	SWITCHED +12V DC	RED	S1,TCU-1,2,3,4
F	RANGE SW A	GRY/LT.GRN	TCU-15
G	RANGE SW B	BRN/BLK	TCU-23
H	RANGE SW C	BRN/RED	TCU-24
J	RANGE SW P	BRN/LT.GRN	TCU-25
K	RANGE SEN GND	BLK/WHT	TCU-23
L	TFT (+)	YEL/ORN	TCU-51
M	TFT (-)	BLK/WHT	S3,TCU-54
N	PSA A	GRY/BLK	TCU-13
P	PSA C	GRY/RED	TCU-14
R	NC	NC	NC
S	TURB (+)	ORN/LT.GRN	TCU-7
T	TCC PWM (-)	VIOL/RED	TCU-28
U	TCC SW +12V	RED	TCU-1,2,3,4, S1
V	TURB SPEED (-)	BLK/WHT	TCU-54, S3
W	NC	NC	NC

F1			
PIN	CIRCUIT FUNCTION	COLOR	WIRES TO
A	SWITCHED +12V	RED	TCU- 1-4, S1
B	SWITCHED +12V	RED	SWITCHED BATT SOURCE

C3 LAPTOP CAL CONNECTOR			
PIN	CIRCUIT FUNCTION	COLOR	TCU POS.
A	SERIAL RX	RED	TCU-31
B	SIGNAL GND.	WHT	TCU-32
C	SERIAL TX	BLK	TCU-30

WIRE COLOR ABBREVIATIONS		
TXT	COLOR	NOTES
BLK	BLACK	
BRN	BROWN	
RED	RED	
ORN	ORANGE	
YEL	YELLOW	
LT.GRN	LIGHT GREEN	
GRN	GREEN	
LT.BLU	LIGHT BLUE	
BLU	BLUE	
VIO	VIOLET	
GRY	GRAY	
WHT	WHITE	
PNK	PINK	



APPLICABLE STANDARDS

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- ASME Y14.5M-1994
- IPC/WHMA-A-620A-CLASS 2
- MARK IAW MIL-STD-130.

NOTES:

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- 3.) TIE ALL LOOM JOINTS UNLESS OTHERWISE STATED
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- 5.) PLACE TAGS NO MORE THAN 2" FROM UNTERMINATED END.
- 6.) WIRE TYPE IS TX UNLESS OTHERWISE STATED

COMPANY: **POWERTRAIN CONTROL SOLUTIONS**

TITLE: **GM 4T80 (2003) LATE TO TCM-2000**

SIZE: C CUSTOMER DRAWING NO. XXXXX-XXXXX PCS PART NUMBER **TCM-4104** REV: 001

DRAWN BY: FRED D. DATE: 2/8/2013 APPROVED BY: XXXXX DATE: SHEET 2 OF 3