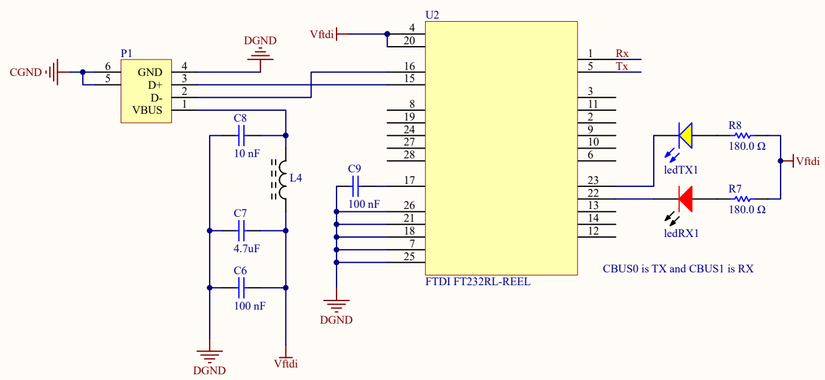
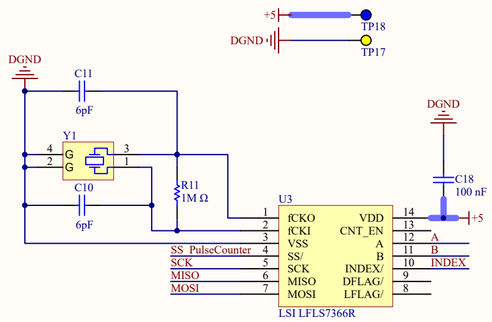
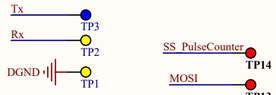
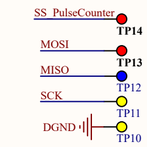
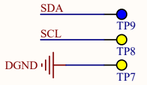
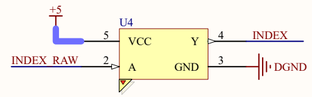

P1
GND
D+
D-
VBUS
CGND
DGND
Vftdi
C8
10 nF
L4
C7
4.7uF
C6
100 nF
C9
100 nF
U2
FTDI FT232RL-REEL
Rx
Tx
R8
180.0 Ω
R7
180.0 Ω
ledTX1
ledRX1
CBUS0 is TX and CBUS1 is RX

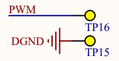

+5
TP18
DGND
TP17
C11
6pF
Y1
C10
6pF
R11
1M Ω
U3
fCKO
fCKI
VSS
SS/
SCK
MISO
MOSI
VDD
CNT_EN
A
B
INDEX/
DFLAG/
LFLAG/
C18
100 nF
SS_PulseCounter
SCK
MISO
MOSI
INDEX
LSI LFLS7366R

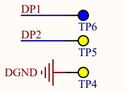

Tx
TP3
Rx
TP2
DGND
TP1

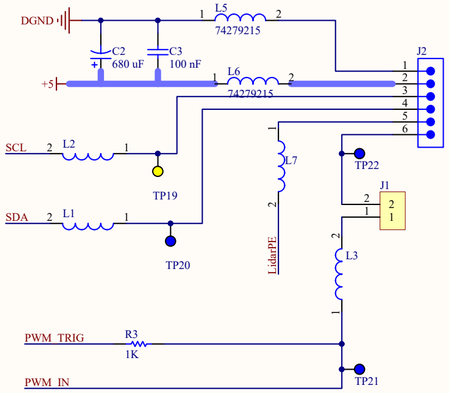

SS_PulseCounter
TP14
MOSI
TP13
MISO
TP12
SCK
TP11
DGND
TP10

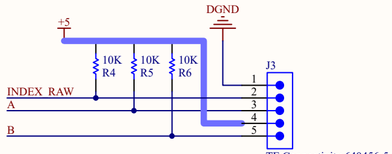

SDA
TP9
SCL
TP8
DGND
TP7

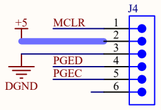

+5
U4
VCC
Y
INDEX_RAW
A
GND
INDEX
DGND

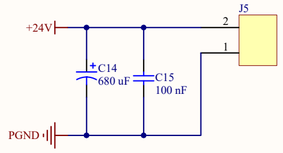

PWM
TP16
DGND
TP15


DP1
TP6
DP2
TP5
DGND
TP4

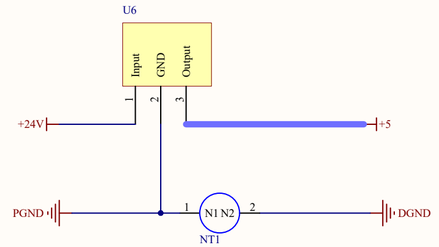

DGND
L5
74279215
C2
680 uF
C3
100 nF
+5
L6
74279215
J2
SCL
L2
TP19
SDA
L1
TP20
L7
LidarPE
TP22
J1
L3
PWM_TRIG
R3
1K
PWM_IN
TP21


+5
DGND
10K
R4
10K
R5
10K
R6
INDEX_RAW
A
B
J3
TE Connectivity 640456-5

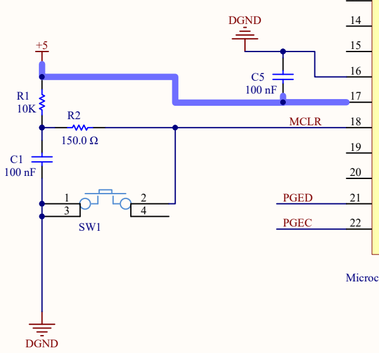

+5
MCLR
J4
PGED
PGEC
DGND


+24V
J5
C14
680 uF
C15
100 nF
PGND

M+
M-
J6
TE Connectivity 640456-2


U6
Input
GND
Output
+24V
+5
PGND
N1 N2
NT1
DGND

U1
AN21/SDA1/T1CK/U1RTS/U1BCLK/IC2/OC4/CLC1O/CTED4/CN21/RB9
U1RX/OC2C/CN18/RC6
U1TX/OC2D/CN17/RC7
OC2E/CN20/RC8
IC4/OC2F/CTED7/CN19/RC9
IC1/OC5/CLC2O/CTED3/CN9/RA7
VCAP or VDDCORE
PGED2/SDI1/OC1C/CTED11/CN16/RB10
PGEC2/SCK1/OC2A/CTED9/CN15/RB11
DAC1OUT/AN12/HLVDIN/OC2B/CTED2/INT2/ CN14/RB12
OA1INC/OA2INC/AN11/SDO1/OC1D/CTPLS/CN13/RB13
IC5/OC3A/CN35/RA10
IC3/OC3B/CTED8/CN36/RA11
DAC2OUT/CVREF/OA1IND/OA2IND/AN10/C3INB/RTCC/C1OUT/OCFA/CTED5/INT1/CN12/ RB14
DAC2REF+/OA2OUT/AN9/C3INA/REFO/SS1/TCKIA/CTED6/CN11/RB15
AVSS
AVDD
MCLR/VPP/RA5
CVREF+/VREF+/DAC1REF+/AN0/C3INC/ CTED1/CN2/RA0
CVREF-/VREF-/AN1/CN3/RA1
PGED1/AN2/CTCMP/ULPWU/C1IND/C2INB/C3IND/U2TX/CN4/RB0
PGEC1/OA1INA/OA2INA/AN3/C1INC/C2INA/U2RX/ CTED12/CN5/RB1
AN20/SCL1/U1CTS/C3OUT/OC1B/CTED10/CN22/RB8
AN19/C2OUT/OC1A/INT0/CN23/RB7
PGEC3/AN18/ASCL1/OC1F/CLCINB/CN24/RB6
PGED3/AN17/ASDA1/OC1E/CLCINA/CN27/RB5
VDD
VSS
SCK2/CN26/RC5
SDO2/CN25/RC4
SDI2/CN28/RC3
SS2/CN34/RA9
SOSCO/SCLKI/AN16/PWRLCLK/U2CTS/CN0/RA4
SOSCI/AN15/U2RTS/U2BCLK/CN1/RB4
OCFB/CN33/RA8
OSCO/CLKO/AN14/CN29/RA3
OSCI/CLKI/AN13/CN30/RA2
VSS
VDD
AN8/CN10/RC2
AN7/CN31/RC1
AN6/CN32/RC0
OA1OUT/AN5/C1INA/C2INC/SCL2/CN7/RB3
OA1INB/OA2INB/AN4/C1INB/C2IND/SDA2/TCKIB/CTED13/CN6/RB2
Rx
Tx
PWM_TRIG
PWM_IN
MISO
SCK
SS_PulseCounter
MOSI
PWM
LidarPE
DIR
SCL
SDA
Microchip PIC24FV16KM204-I/PT


+5
DGND
R1
10K
R2
150.0 Ω
C1
100 nF
SW1
MCLR

DGND
C5
100 nF

DGND
C4
10.0 µF

+5
C13
100 nF
DGND
R10
180.0 Ω
Debug2
R9
180.0 Ω
Debug1

DGND