NOTE: TPD4S012 all protection circuits are identical. Connections chosen for simple routing.

See PG0 and PG4 for additional LED's used for Ethernet or user application.

convenience test points for ground
JP4 and JP5 CAN and ICDI UART Selection: Populate Jumpers from 1-2 and 3-4 for Default Mode. This enables ROM UART boot loader. UART 0 to ICDI Populate from 1-3 and 2-4 for controller area network on the boosterpack. UART2 is then available to ICDI. Populate from 1-3 and 2-4 for controller area network on the boosterpack. UART2 is then available to ICDI.

R19 and R20 can be populated to enable I2C on Right side of BP2 interface. This is for legacy support and the Sensor Hub BoosterPack. I2C and SSI are available on the corresponding BoosterPack 1 interface pins with modification to the board. PM6 and PA7 are also used by the onboard radio. Configure the radio to tri-state these GPIO before using them on the boosterpack interface.
NOTE: PB0 and PB1 are used in some configurations with 5V signals especially in USB Host or OTG mode. Be aware the 5V may be present on these pins depending on system jumper configuration.

These pins are only 5V tolerant when configured for USB mode applications.
Place pull up resistors and C16-C17 near TM4C MCU.

Place C18 and C22 near pin 2 and pin 7 of U$10.

U10 May be populated with either HX1188FNL or HX1198FNL. HX1198FNL preferred for best Ethernet performance.

For Ethernet example Applications: LED4 is default configured as Ethernet Link OK LED3 is default configured as Ethernet TX/RX activity. User may re-configure these pins / LED’s for any application usage.

Place pull up resistors and C16-C17 near TM4C MCU.
Default Bootmode Setting:
MFSXB_SPISTE:1
GPIO_84:1
NOTE: In this configuration the voltage placed on PA_VS1 and PA_VS2 is 15V. For other input voltages, please follow the recommendations found in the AFE032 datasheet for the proper sizing of this component.
NOTE:
For Cenelec band use values below:
R100 - 150 ohm
L46 - 330uH
C140 - 0.022uF
C141 - 0.033uF
L45 - 180uH
L53 - 1mH
C166 - 8200pF
C167 - 0.015uF
L52 - 470uH
R121 - 150 ohm

NOTE:
For FCC/ARIB band
RxLine
TxLine

TIDM-MINI-DC

Title:
Page Contents: 05 - BPF
Size:B <Doc> Revision: 0.8
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Title: F28PLC90PZT AFE032 SOM
Page Contents: 06 - Connector

Date: Thursday, August 28, 2014
Notes/Revision Information

V0.01 - Initial Release
V0.02 - 10/10/12
- Changed C2 value
- Removed 5V rail
- Changed L14, L12 to
- Part 27 and connected to J22
- Removed 5V power supply
- Changed R35 to 1.87k
V0.03 - 10/18/12
- Changed C19, C34 parts
- Added symbol for M1
- Added multiple pins
V0.04 - 10/22/12
- Updated part US Symbol
- Added R11, R12, R1
- Added R34, T1
- Removed 35, J6 and J7
V0.05 - 11/12/12
- Changed C23, C24 parts
- Changed symbol for M1 added multiple pins
V0.06 - 12/05/12
- Connected M1 to Earth (GND)
- Removed Ground from M64
- Moved T11 to the other side of R3
- Changed symbol for M1
- Removed Ground from M1 add
V0.07 - 12/07/12
- Removed T11 to the other side of R3
- Connect M1 to Earth (GND)
V0.08 - 01/14/13 (R2 Release)
- Updated part D1
V0.09 - 05/13/13 (R2 Release)
- Changed C22 to DNP
- Added C30
V0.10 - 12/5/13 (R2 Release)
- Changed U1 to 10V
V0.11 - 2/24/14 (R5 Release)
- Added U11
- Added C71, C72
HIGH VOLTAGE!
Switch Operation:

SW1:
1. ON, SCIB - USB; OFF, JTAG (SCIB EXT)
2. ON, SCIB - USB; OFF, JTAG (SCIB EXT)
3. ON, SCIB - USB; OFF, JTAG (SCIB EXT)

SW2:
1. ON, SCIA-USB; OFF, SCIA-EXT
2. ON, SCIA-USB; OFF, SCIA-EXT

TIDM-MINI-DC

Title: SOMPLC-DOCKV1 R2
Page Contents: 03 - USB JTAGUART
Size: B
<Doc>
Date: Wednesday, February 26, 2014
Sheet 3 of 5
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