Contents

Revisions & Change Log

Rev	Description	Date	Approved
X1	27909 base Initial Draft	03/07/13	J. SCOTT
A	27909 Prototype Release	03/26/13	J. SCOTT
AX1_UD	27982 (BT Version) Under Development	07/16/13	J. SCOTT
AX1	27982 (BT Version) PPL & A070 RELEASE	07/22/13	J. SCOTT
AX2	27982 (BT Version) Block Diagram Update	08/07/13	J. SCOTT
B	27982 (BT Version) Release candidate	08/23/13	J. SCOTT
BX1	27982 (UNDER DEVELOPMENT) I2C swap fix	09/25/13	J. SCOTT
C	27909 Non BT ver. (BOM update per coreid) Release to prod.	10/02/13	J. SCOTT

FRDM-FXS-MULTI

freescale

Automotive, Industrial & Multi-Market Solutions Group

6501 William Cannon Drive West Austin, TX 78735-8598

ICAP Classification: FCP: FIUO: PUBI: X

Designer: RAFAEL DEL REY	Drawing Title: FRDM-FXS-MULTI		
Drawn by: RAFAEL DEL REY	Page Title: TITLE PAGE		
Approved: JAMES SCOTT	Size C	Document Number SCH-27909 | PDF: SPF-27909	Rev C
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ecified:
ohms, 5%, 1/8 Watt
ı uF, 20%, 50V

All polarized capacitors are aluminum electrolytic

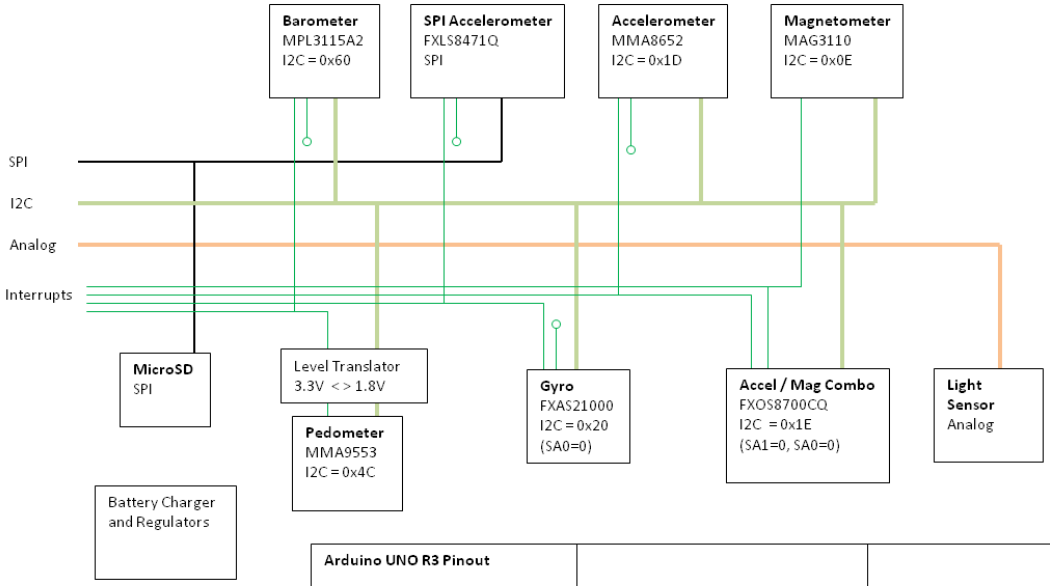
2. Interrupted lines coded with the same letter or letter combinations are electrically connected.

3. Device type number is for reference only. The number varies with the manufacturer.

4. Special signal usage:
   _B Denotes - Active-Low Signal
   <> or [] Denotes - Vectored Signals

5. Interpret diagram in accordance with American National Standards Institute specifications, current revision, with the exception of logic block symbology.

FRDM-FXS-MULTI Block Diagram



Arduino UNO R3 Pinout

D0 = BlueTooth RX
D1 = BlueTooth TX
D2 = Interrupt Combo 1 or Mag
D3 = test point
D4 = Interrupt Combo 2 or Accel 1
D5 = Interrupt Gyro or SPI Accel 1
D6 = test point
D7 = test point

D8 = Interrupt Pedometer or Pressure 1
D9 = test point
D10 = SPI_SS_SPI_ACCEL
D11 = SPI_MOSI
D12 = SPI_MISO
D13 = SPI_CLK
D14 = Optional I2C Data
D15 = Optional I2C Clock

A0 = BT_Wakeup
A1 = BT_Monitor
A2 = SPI_SS_SD
A3 = Light Sensor Analog Signal
A4 = Main I2C Data
A5 = Main I2C Clock

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ICAP Classification: FCP: ___ FIUO: X PUBI: ___
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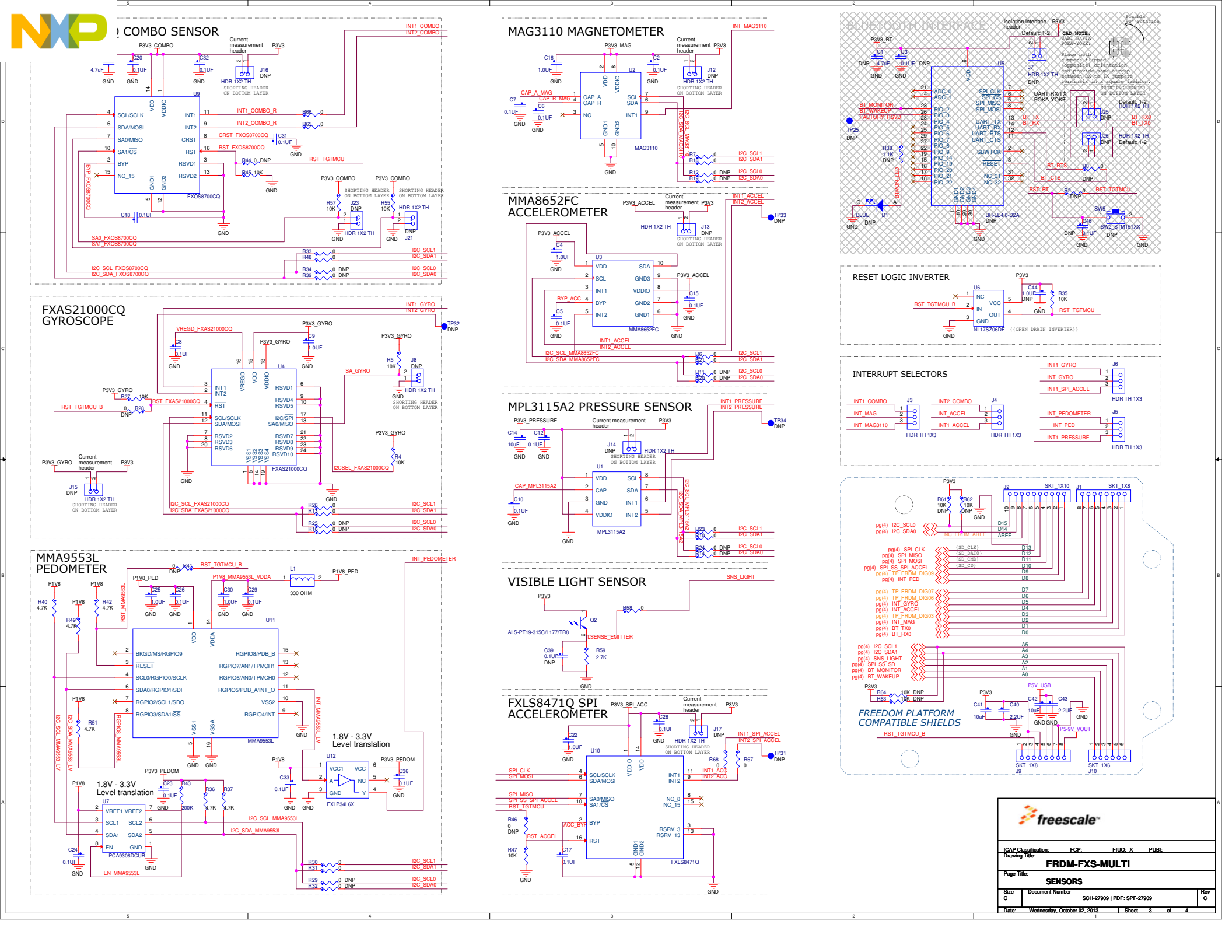
COMBO SENSOR
MAG3110 MAGNETOMETER
BLUETOOTH INTERFACE
MMA8652FC ACCELEROMETER
RESET LOGIC INVERTER
FXAS21000CQ GYROSCOPE
INTERRUPT SELECTORS
MPL3115A2 PRESSURE SENSOR
MMA9553L PEDOMETER
VISIBLE LIGHT SENSOR
FXLS8471Q SPI ACCELEROMETER
1.8V - 3.3V Level translation
FREEDOM PLATFORM COMPATIBLE SHIELDS
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ICAP Classification:
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SENSORS
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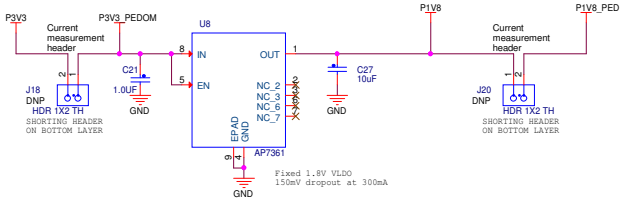
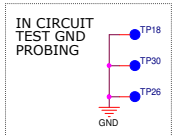
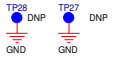
VOLTAGE REGULATION



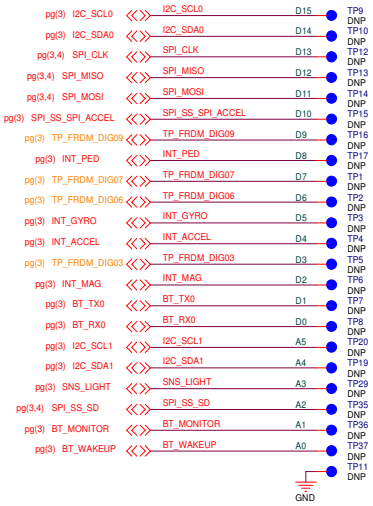
IN CIRCUIT TEST GND PROBING



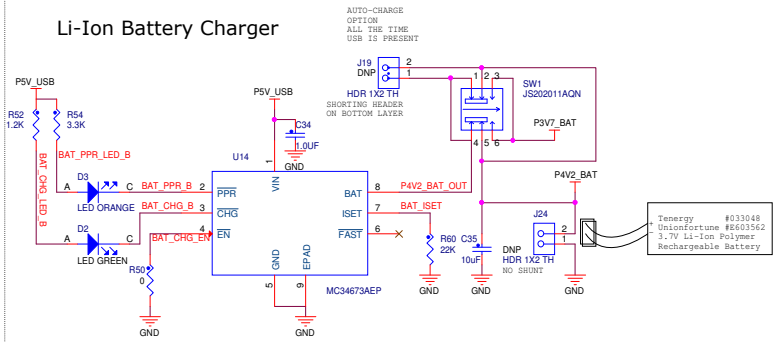
DEBUG GROUND HOOK



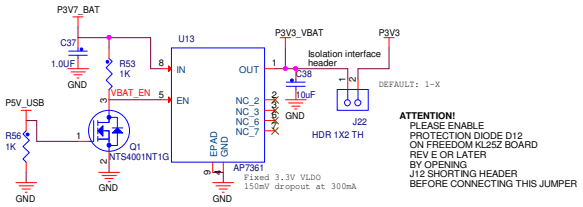
Prototyping Area Heading Signals



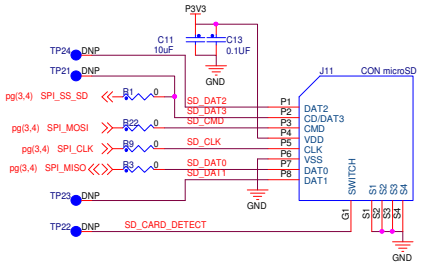
Li-Ion Battery Charger



Battery Regulation



microSD Card Connector, SPI Mode



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ICAP Classification:	FCP: ___ FIUO: X	PUBI: ___
Drawing Title:	**FRDM-FXS-MULTI**	
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