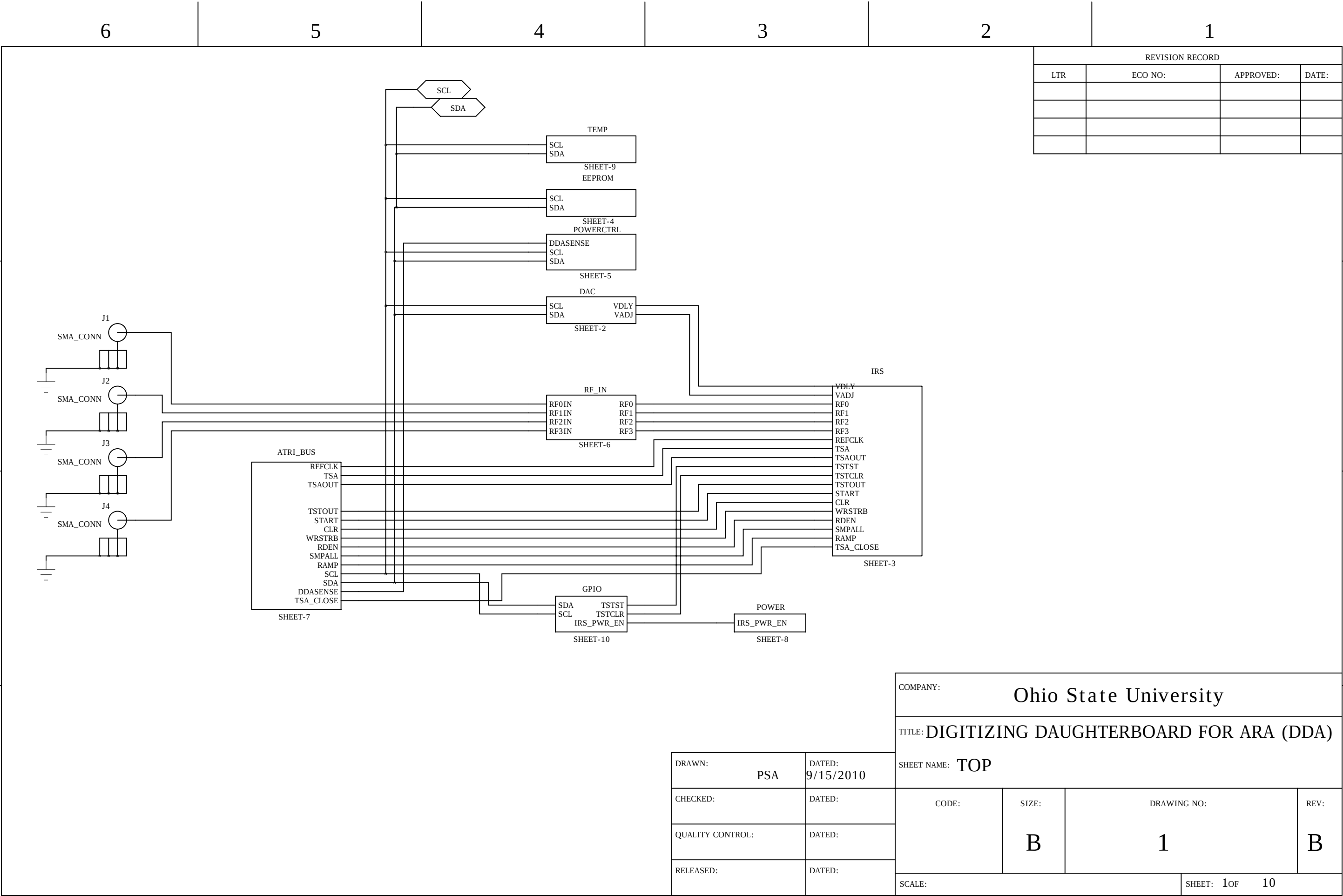




6

5

4

3

2

1

REVISION RECORD

LTR	ECO NO:	APPROVED:	DATE:

DDA gets A2/A1/A0 = 0/0/0
Device address is 1010000X (0xA0)

1A0

2A1

3A2

4VSS

U2

24LC32A

VCC

WP

SCL

SDA

3.3V

3.3V

3.3V

8

7

6

5

SCL

SDA

R8

N/C

2

R9

10k

1

CX18

0.1 uF

DRAWN:
PSA

DATED:
9/15/2010

CHECKED:

DATED:

QUALITY CONTROL:

DATED:

RELEASED:

DATED:

COMPANY:
Ohio State University

TITLE:
DIGITIZING DAUGHTERBOARD FOR ARA (DDA)

SHEET NAME:
EEPROM

CODE:

SIZE:
B

DRAWING NO:
1

REV:
B

SCALE:

SHEET: 4OF 10

D

C

B

A

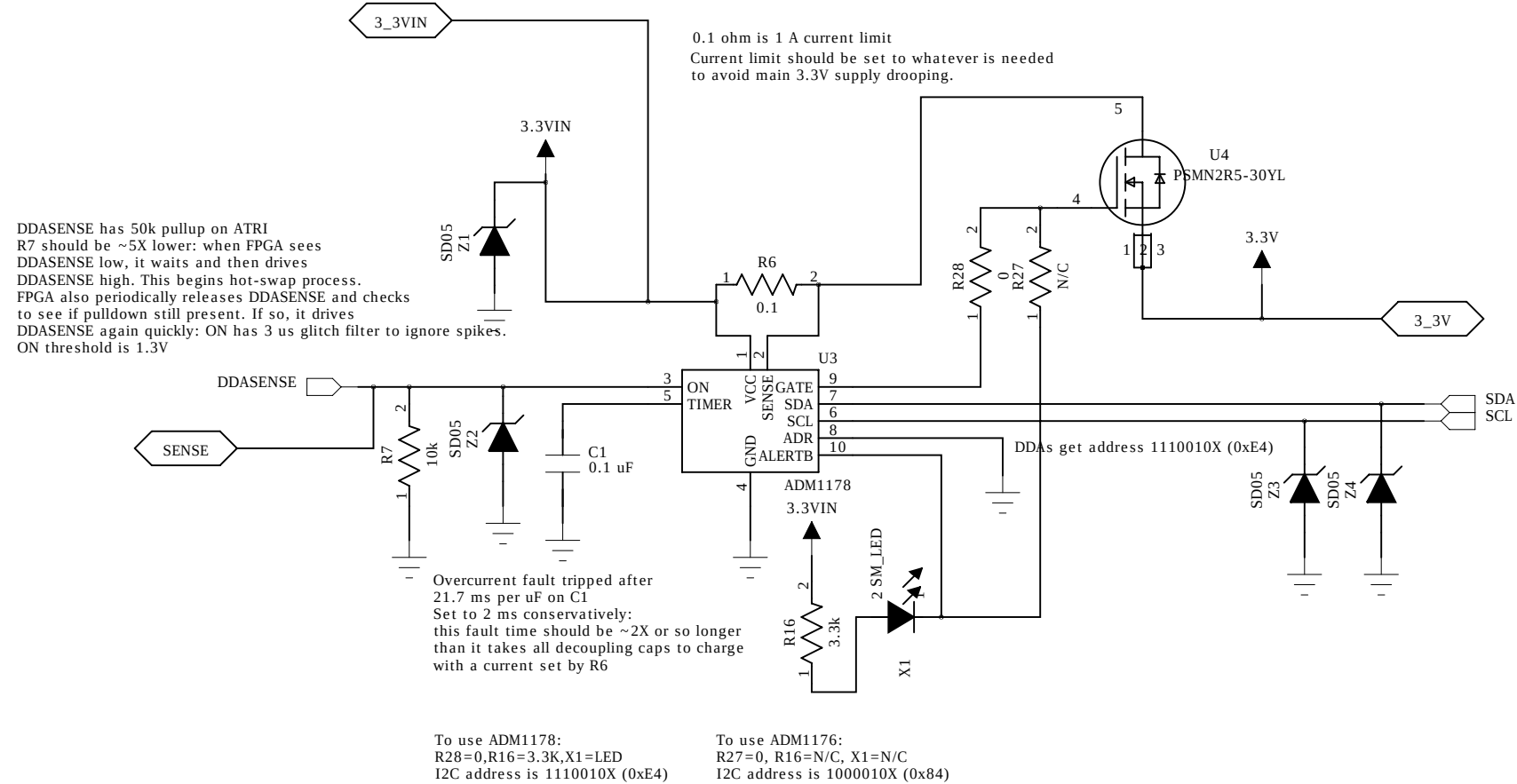
D

C

B

A

REVISION RECORD			
LTR	ECO NO:	APPROVED:	DATE:



To use ADM1178:
R28=0,R16=3.3K,X1=LED
I2C address is 1110010X (0xE4)

To use ADM1176:
R27=0, R16=N/C, X1=N/C
I2C address is 1000010X (0x84)

DRAWN: PSA	DATED: 9/15/2010
CHECKED:	DATED:
QUALITY CONTROL:	DATED:
RELEASED:	DATED:

COMPANY: Ohio State University			
TITLE: DIGITIZING DAUGHTERBOARD FOR ARA (DDA)			
SHEET NAME: POWERCTRL			
CODE:	SIZE:	DRAWING NO:	REV:
	B	1	B
SCALE:		SHEET: 5 OF 10	

6

5

4

3

2

1

REVISION RECORD

LTR	ECO NO:	APPROVED:	DATE:

RF0IN

4

FA1 HFCV-145+

Block/Pass

2

1

FA2 LFCN-630+

Pass/Block

3

CA1

30 pF

DA1 SMPN7320

2.5V

RF0

RF1IN

4

FB1 HFCV-145+

Block/Pass

2

1

FB2 LFCN-630+

Pass/Block

3

CB1

30 pF

DB1 SMPN7320

2.5V

RF1

RF2IN

4

FC1 HFCV-145+

Block/Pass

2

1

FC2 LFCN-630+

Pass/Block

3

CC1

30 pF

DC1 SMPN7320

2.5V

RF2

RF3IN

4

FD1 HFCV-145+

Block/Pass

2

1

FD2 LFCN-630+

Pass/Block

3

CD1

30 pF

DD1 SMPN7320

2.5V

RF3

30 pF yields 100 MHz low-frequency 3 dB point on 50 ohm

DRAWN:

PSA

CHECKED:

QUALITY CONTROL:

RELEASED:

DATED:

9/15/2010

DATED:

DATED:

DATED:

COMPANY:

Ohio State University

TITLE:

DIGITIZING DAUGHTERBOARD FOR ARA (DDA)

SHEET NAME:

RF_IN

CODE:

SIZE:

DRAWING NO:

REV:

B

1

B

SCALE:

SHEET: 6 OF 10

D

C

B

A

D

C

B

A

D

C

B

A

6

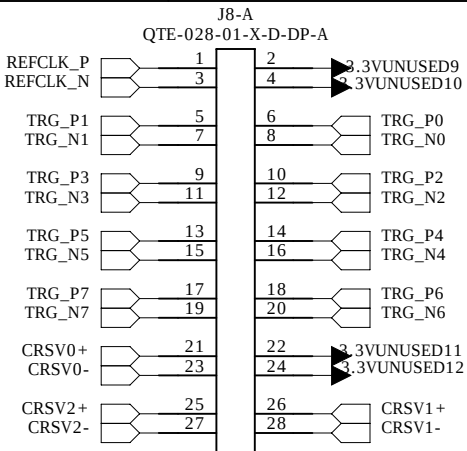
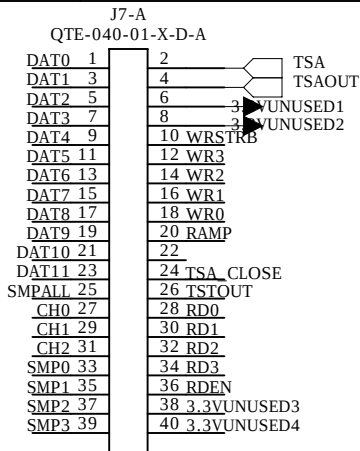
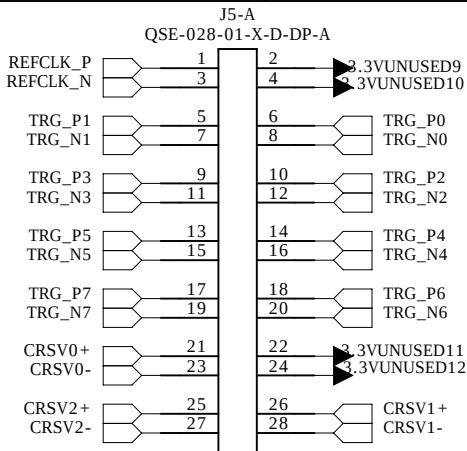
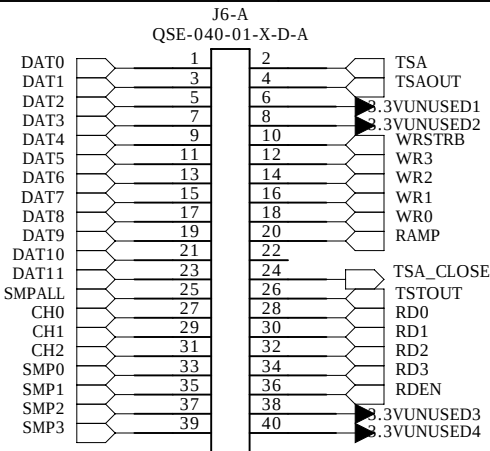
5

4

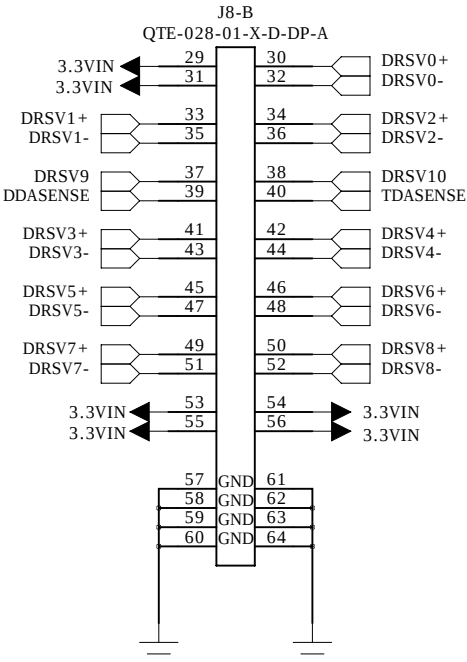
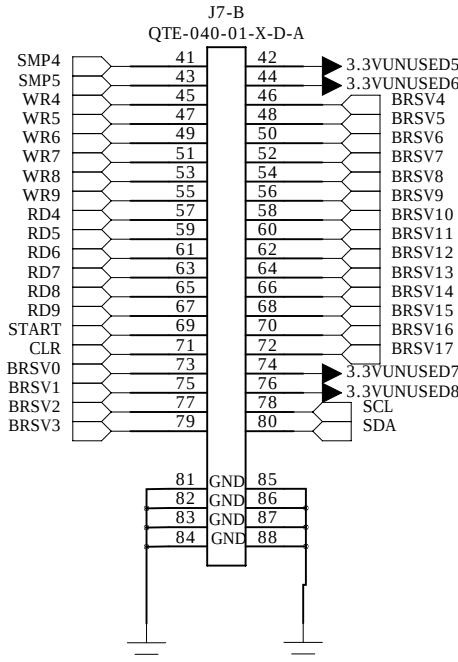
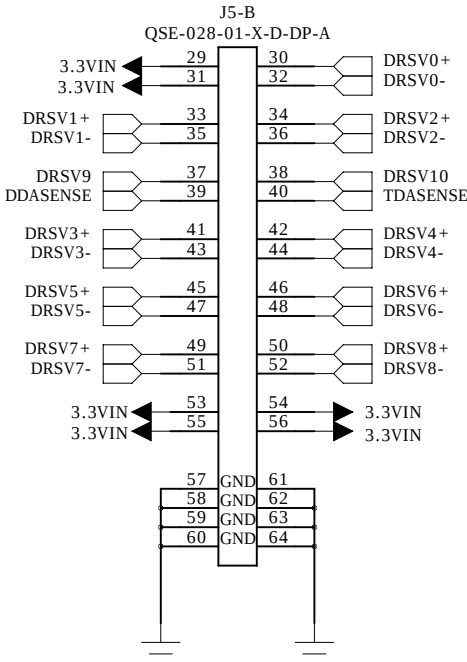
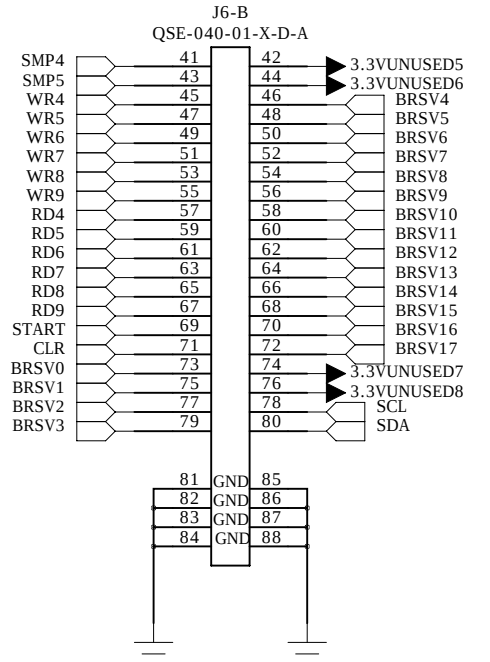
3

2

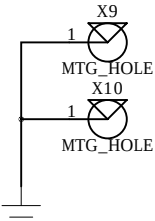
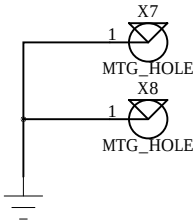
1



REVISION RECORD			
LTR	ECO NO:	APPROVED:	DATE:



Daughterboard connector mounts



COMPANY:				Ohio State University							
TITLE:				DIGITIZING DAUGHTERBOARD FOR ARA (DDA)							
SHEET NAME:				ATRI_BUS							
DRAWN:		DATED:		CODE:		SIZE:		DRAWING NO:		REV:	
CHECKED:		DATED:		B		1		1		B	
QUALITY CONTROL:		DATED:		SCALE:		SHEET: 7		OF 10			
RELEASED:		DATED:									

6

5

4

3

2

1

D

C

B

A

REVISION RECORD			
LTR	ECO NO:	APPROVED:	DATE:

Need ~150 mm2 copper area for adequate heatsinking at 50 C ambient

DRAWN: PSA		DATED: 9/15/2010		COMPANY: Ohio State University			
CHECKED:		DATED:		TITLE: DIGITIZING DAUGHTERBOARD FOR ARA (DDA)			
QUALITY CONTROL:		DATED:		SHEET NAME: POWER			
RELEASED:		DATED:		CODE:	SIZE: B	DRAWING NO: 1	REV: B
SCALE:				SHEET: 8 OF 10			

6

5

4

3

2

1

REVISION RECORD

LTR	ECO NO:	APPROVED:	DATE:

D

C

B

A

U6

tmp102aidrlr

SCL

SDA

1

6

2

GND

3

ALERT

V+

5

4

ADD0

3.3V

CX21

0.1 uF

DDA gets 1001000X for temp sensor address

DRAWN:

PSA

CHECKED:

QUALITY CONTROL:

RELEASED:

DATED:

9/15/2010

DATED:

DATED:

DATED:

COMPANY:

Ohio State University

TITLE:

DIGITIZING DAUGHTERBOARD FOR ARA (DDA)

SHEET NAME:

TEMP

CODE:

SIZE:

B

DRAWING NO:

1

REV:

B

SCALE:

SHEET:

9

OF

10

6

5

4

3

2

1

REVISION RECORD

LTR	ECO NO:	APPROVED:	DATE:

3.3V

C10

0.1 uF

SDA

SCL

7

6

U5

SDA IO0

SCL IO1

IO2

IO3

PCA9536

1

2

3

5

TSTST

TSTCLR

IRS_PWR_EN

SM_LED 2

X2

R33

3.3k

1

2

R32

100k

1

2

3.3V

DRAWN:

PSA

CHECKED:

QUALITY CONTROL:

RELEASED:

DATED:

9/15/2010

DATED:

DATED:

DATED:

COMPANY:

Ohio State University

TITLE:

DIGITIZING DAUGHTERBOARD FOR ARA (DDA)

CODE:	SIZE:	DRAWING NO:	REV:
	B	1	B

SCALE:

SHEET: 10F 10

D

C

B

A

D

C

B

A