

NOTE: 20k pullup resistor is due to LM2941S input pin max current limit.

NOTE: Resistors R?, R?, R?, R? and R? must be 0.1% tolerance or greater.

Title **RB25DET - Power Supplies**

Size: **A4**

Number: **A**

Revision: **0.1**

Date: **09-Sep-13**

Time: **11:19:29 AM** Sheet **2** of **14**

Drawn By:
Dan Visser

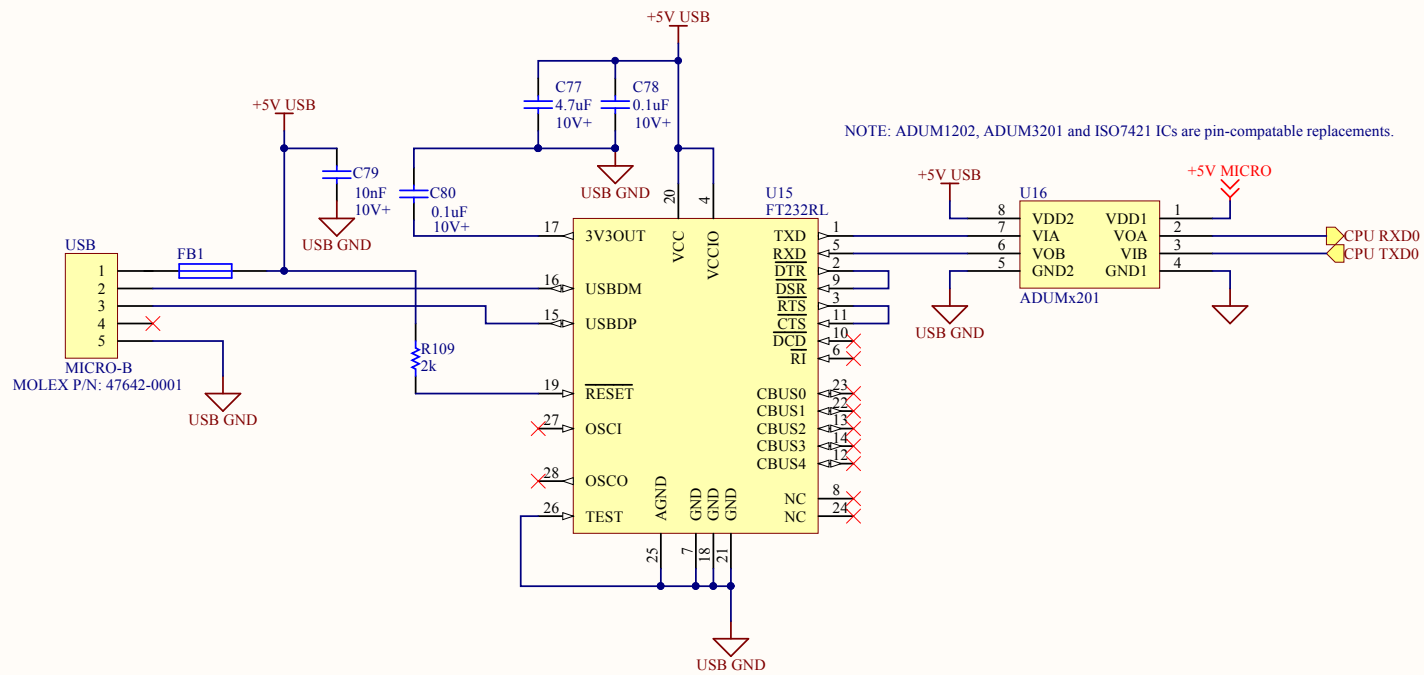


1

2

3

4

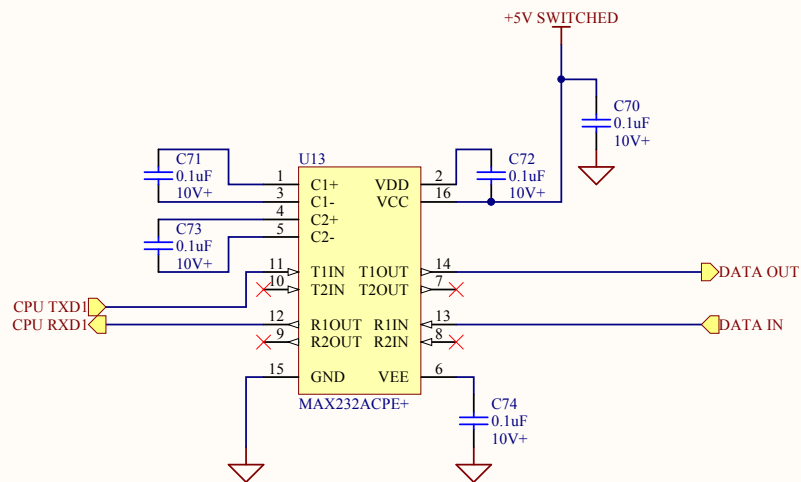
Title **RB25DET - USB Comms**Size: **A4**Number: **A**Revision: **0.1**Date: **09-Sep-13**Time: **11:19:29 AM** Sheet **3** of **14**Drawn By:
Dan Visser


1

2

3

4



Title RB25DET - RS232 Comms			Drawn By: Dan Visser	
Size: A4	Number: A	Revision: 0.1		
Date: 09-Sep-13	Time: 11:19:29 AM	Sheet 4 of 14		

1

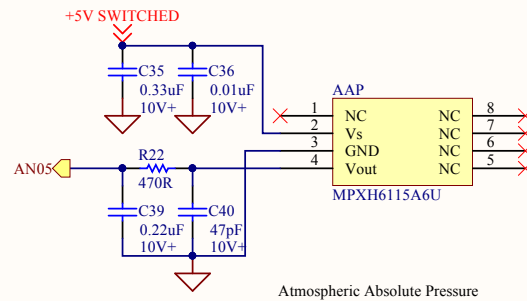
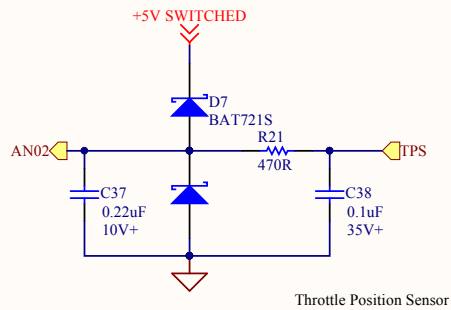
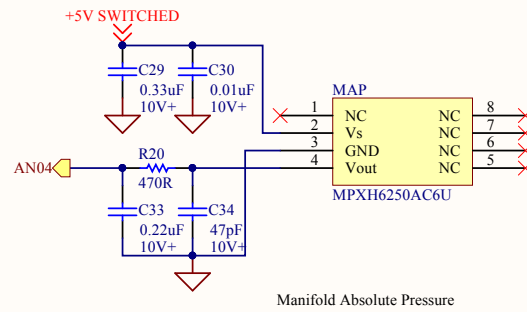
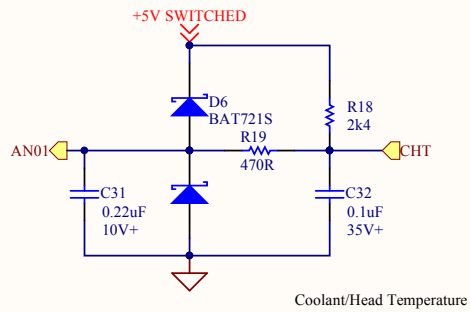
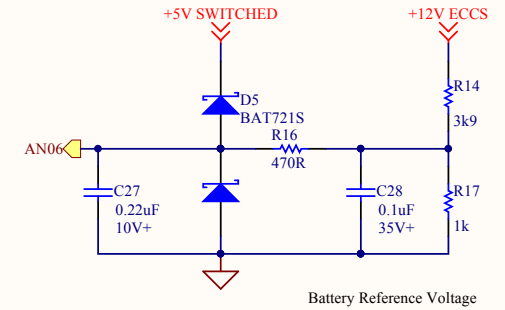
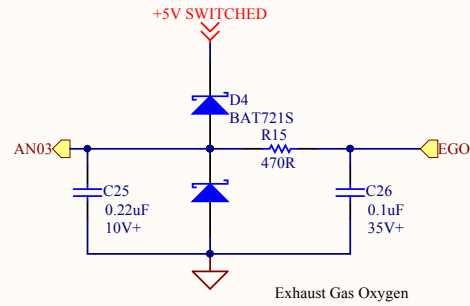
2

3

4

A

A



SENSOR GND

B

B

C

C

D

D

Title **RB25DET - Core Analogue Inputs**

Size: **A4**

Number: **A**

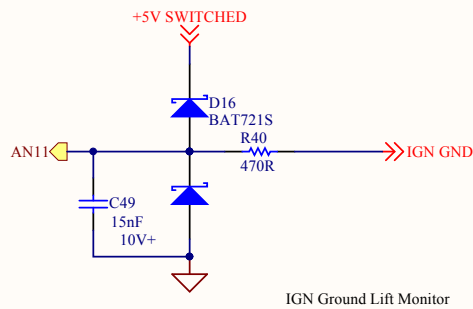
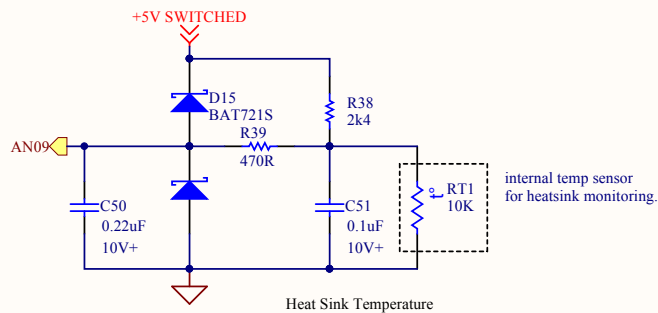
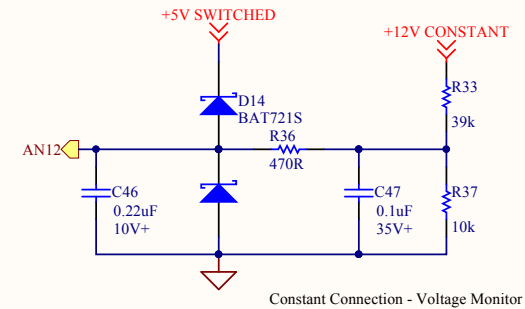
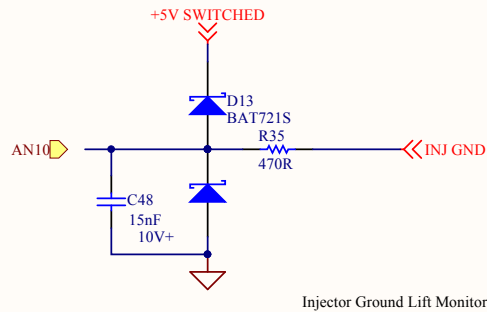
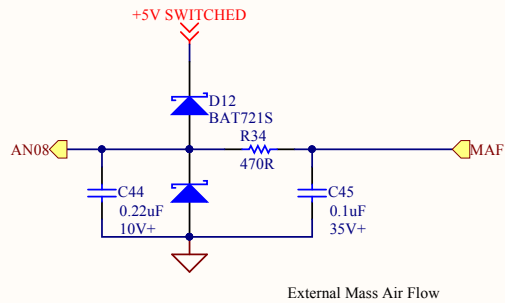
Revision: **0.1**

Date: **09-Sep-13**

Time: **11:19:29 AM** Sheet **5** of **14**

Drawn By:
Dan Visser

Altium



Title **RB25DET - Extra Analogue Inputs**

Size: **A4**

Number: **A**

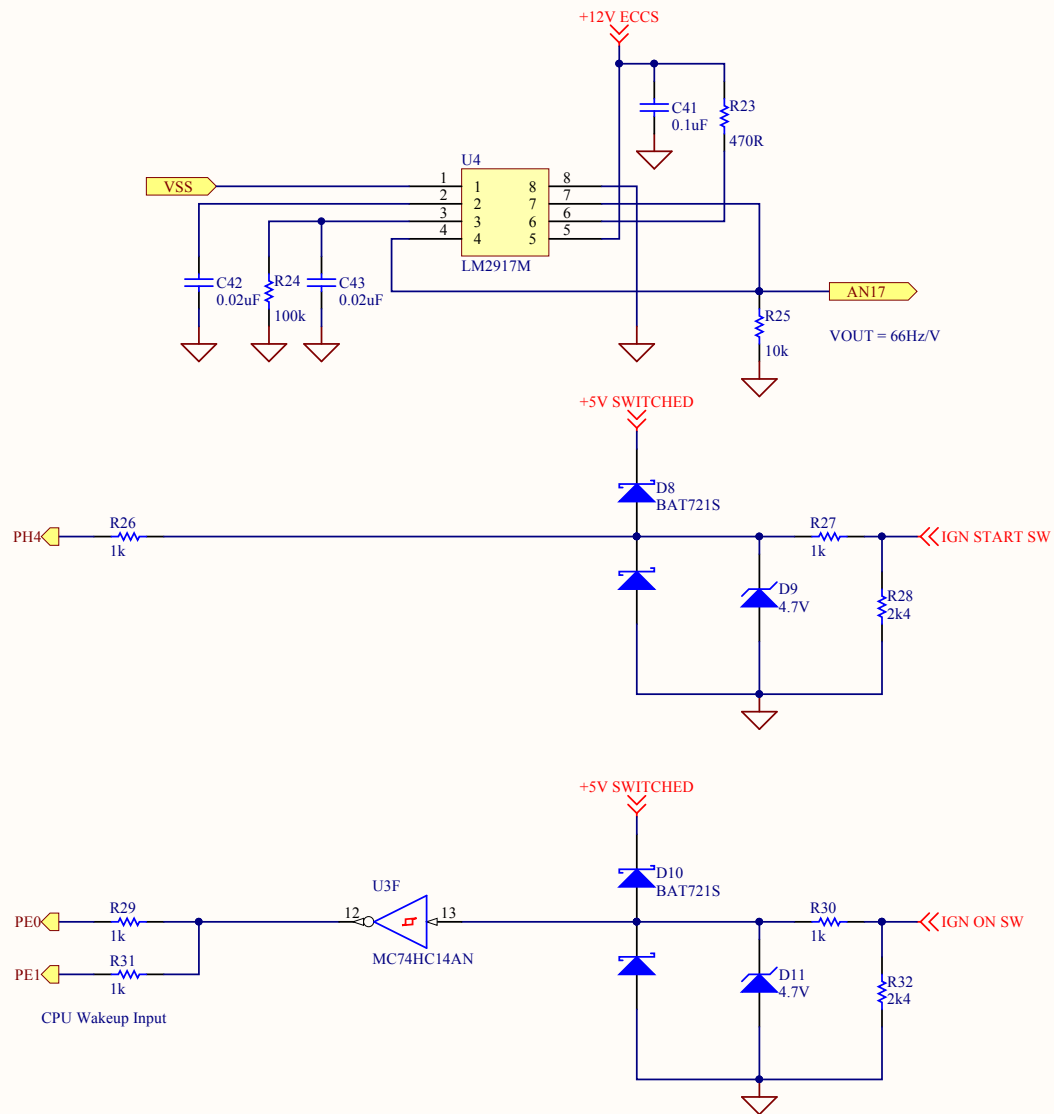
Revision: **0.1**

Date: **09-Sep-13**

Time: **11:19:29 AM** Sheet **6** of **14**

Drawn By:
Dan Visser





Title **RB25DET - Digital Inputs**

Size: A4

Number: A

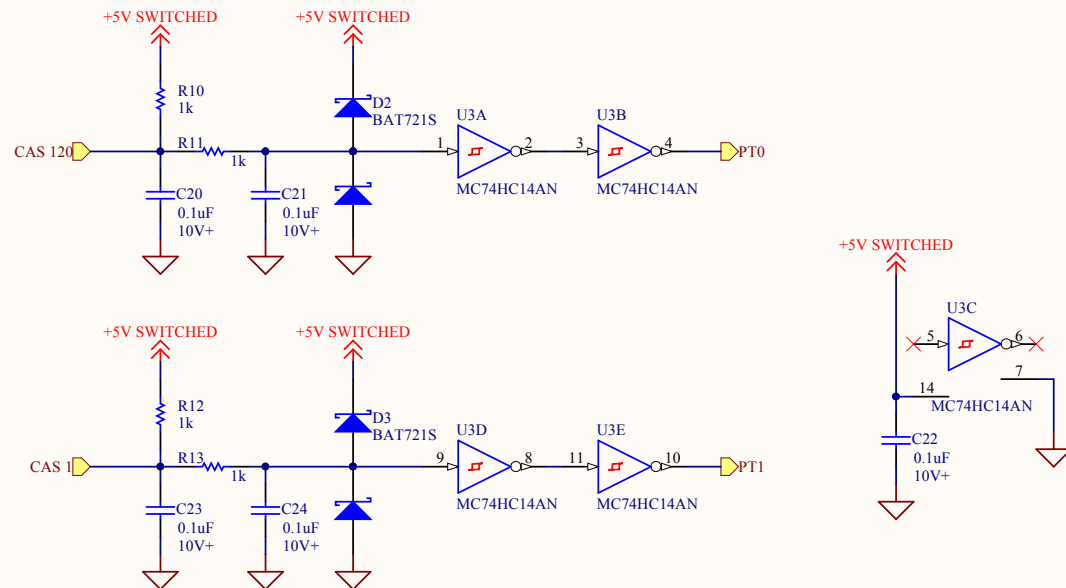
Revision: 0.1

Date: 09-Sep-13

Time: 11:19:30 AM Sheet 7 of 14

Drawn By:
Dan Visser





Title **RB25DET - CAS Interface**

Size: **A4**

Number: **A**

Revision: **0.1**

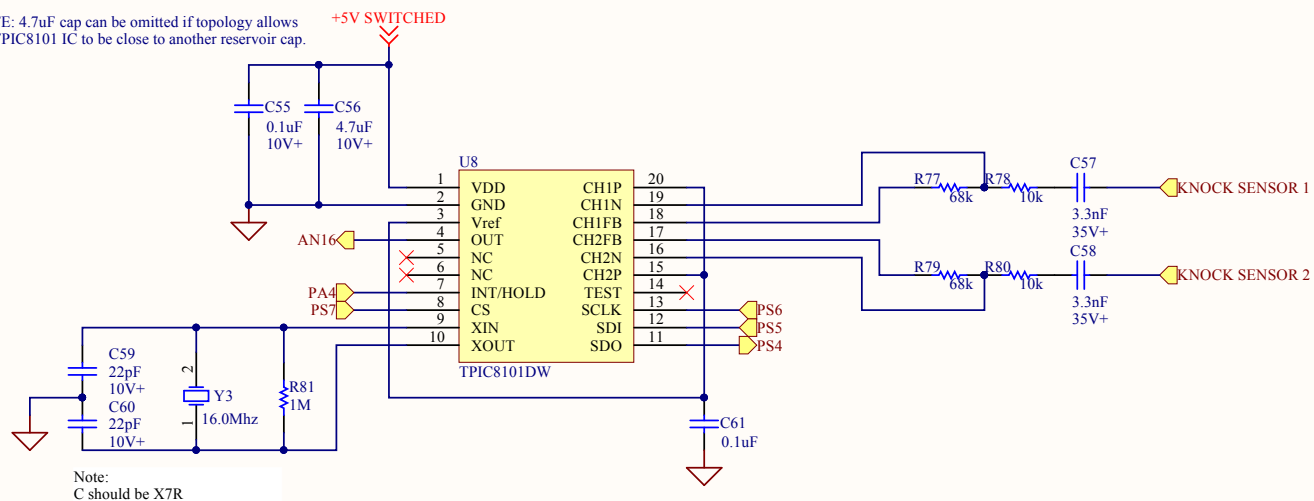
Date: **09-Sep-13**

Time: **11:19:30 AM** Sheet **8** of **14**

Drawn By:
Dan Visser



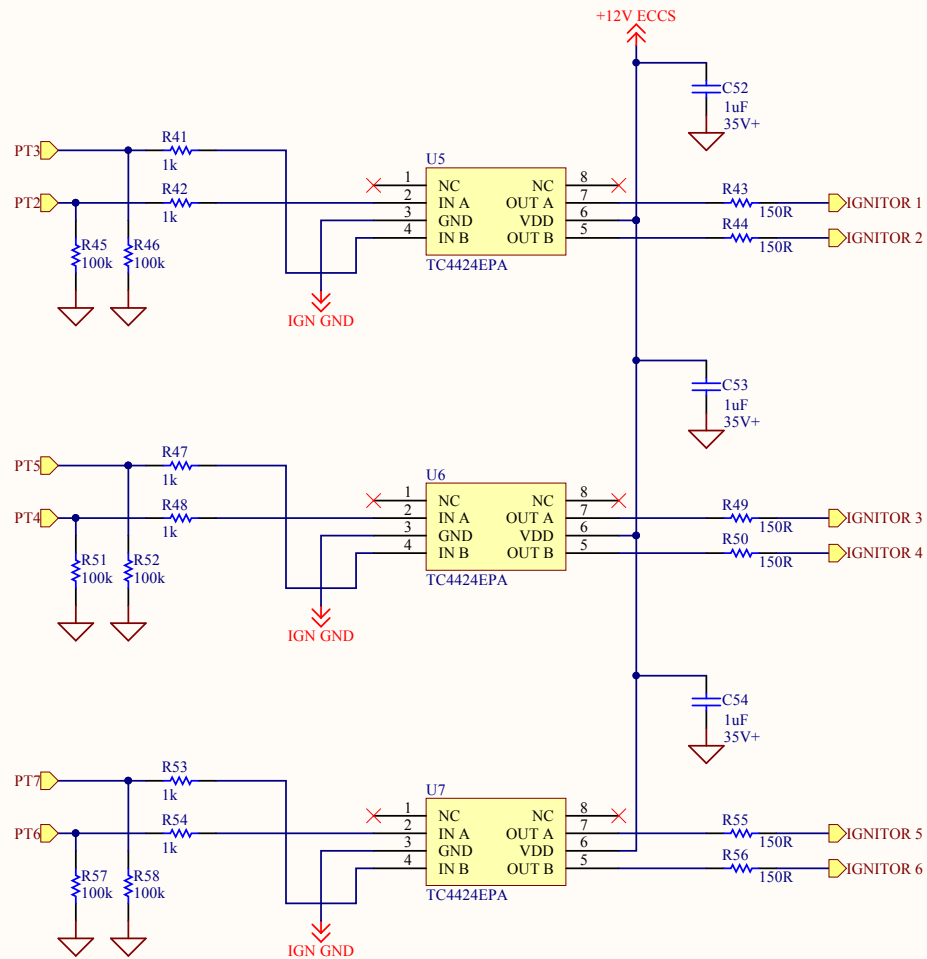
NOTE: 4.7uF cap can be omitted if topology allows the TPIC8101 IC to be close to another reservoir cap.



Title RB25DET - Knock Sensing		
Size: A4	Number: A	Revision: 0.1
Date: 09-Sep-13	Time: 11:19:30 AM Sheet 9 of 14	

Drawn By:
Dan Visser





Title **RB25DET - Ignitor Outputs**

Size: A4

Number: A

Revision: 0.1

Date: 09-Sep-13

Time: 11:19:30 AM Sheet 10 of 14

Drawn By:
Dan Visser

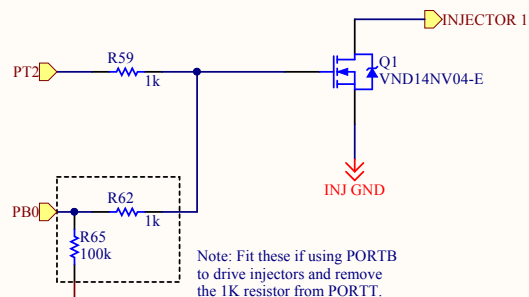


1

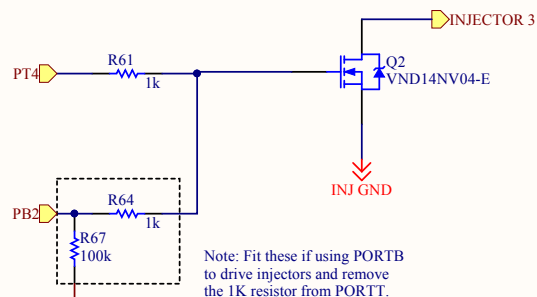
2

3

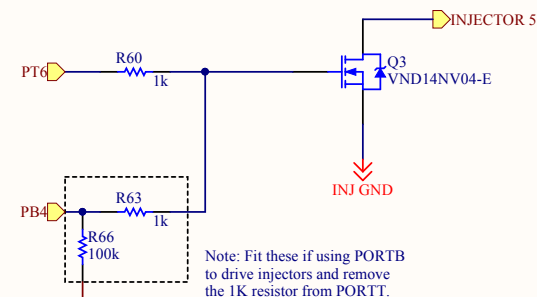
4



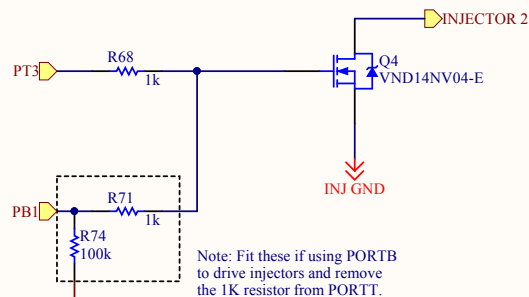
Injector 1 Driver



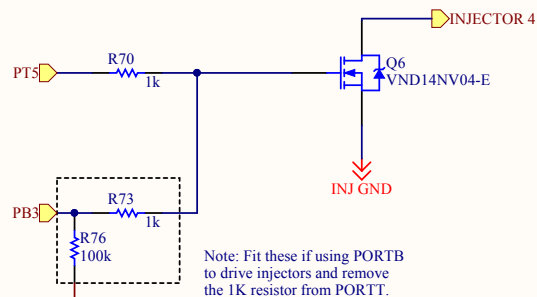
Injector 3 Driver



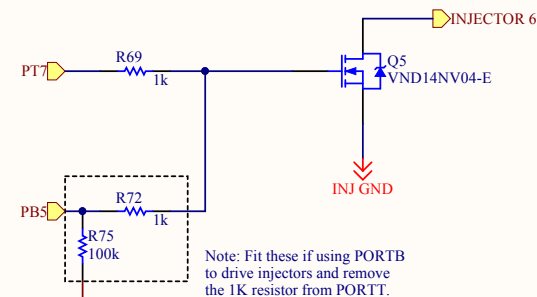
Injector 5 Driver



Injector 2 Driver



Injector 4 Driver



Injector 6 Driver

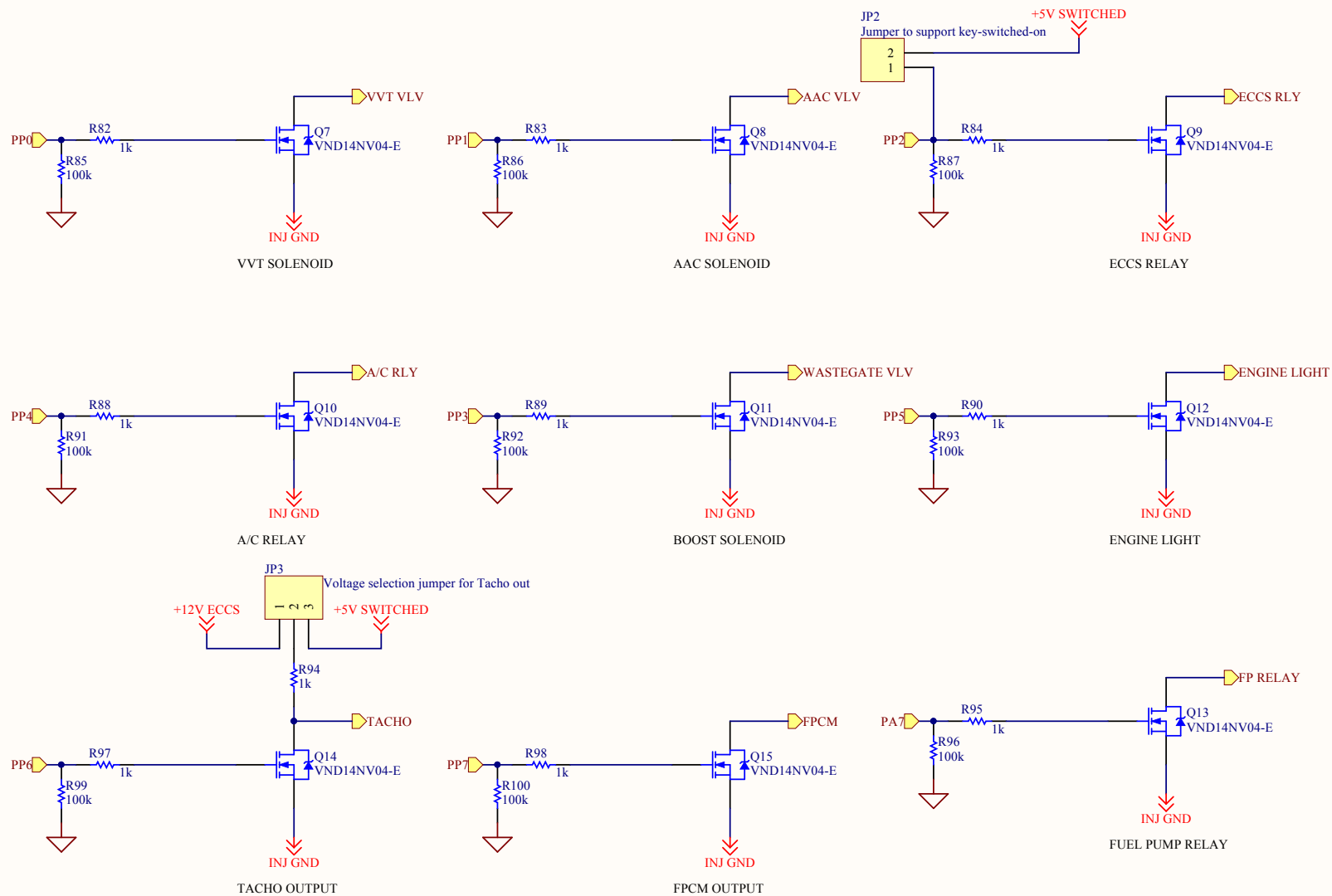
Title **RB25DET - Injectors**Size: **A4**Number: **A**Revision: **0.1**Date: **09-Sep-13**Time: **11:19:30 AM** Sheet **11** of **14**Drawn By:
Dan Visser**Altium**

1

2

3

4



Title **RB25DET - Low Side Drivers**

Size: **A4**

Number: **A**

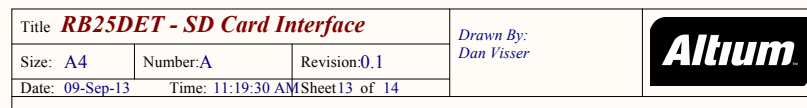
Revision: **0.1**

Date: **09-Sep-13**


Time: **11:19:30 AM** Sheet **12** of **14**

Drawn By:
Dan Visser







Title RB25DET - Connector			Drawn By: Dan Visser	
Size: A4	Number: A	Revision: 0.1		
Date: 09-Sep-13	Time: 11:19:30 AM Sheet 14 of 14			

