



## EFM8BB2 Busy Bee STK


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## Revision History

Rev.	Description
A01	Update to new STK platform
A02	P601 Footprint & SW704 Connection Update

 <b>SILICON LABS</b>		Board Name <b>EFM8BB2 Busy Bee STK</b>	
		Page Title <b>Title Page</b>	
Designed <b>AKM</b>	Approved <b>RGU</b>	Board Number <b>BRD5201B</b>	Revision <b>A02</b>
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## C



# B



DISP_ENABLE	Connected	VDISP	BC_DISP_AVAILABLE
1	MCU	VMCU	GND
0	BC	BC_DISP_PWR_ENABLE	3V3

4



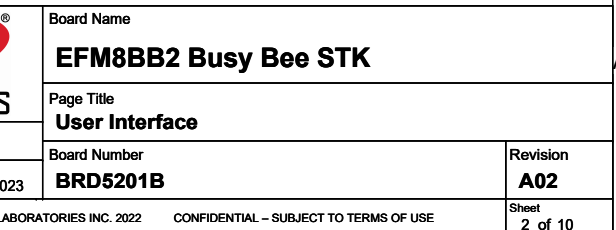
## 2



## C

B

## Analog Joystick



## D



## A



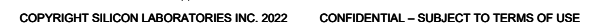
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3

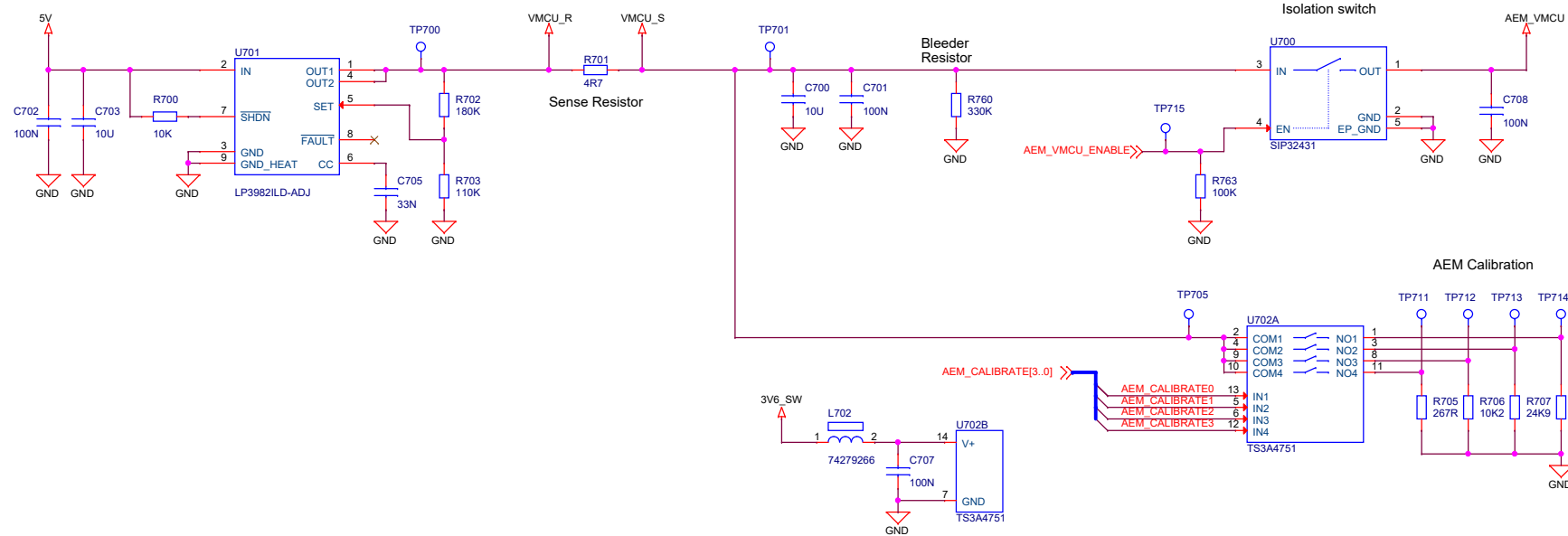
## D



**B**

A

## MCU Power Regulator

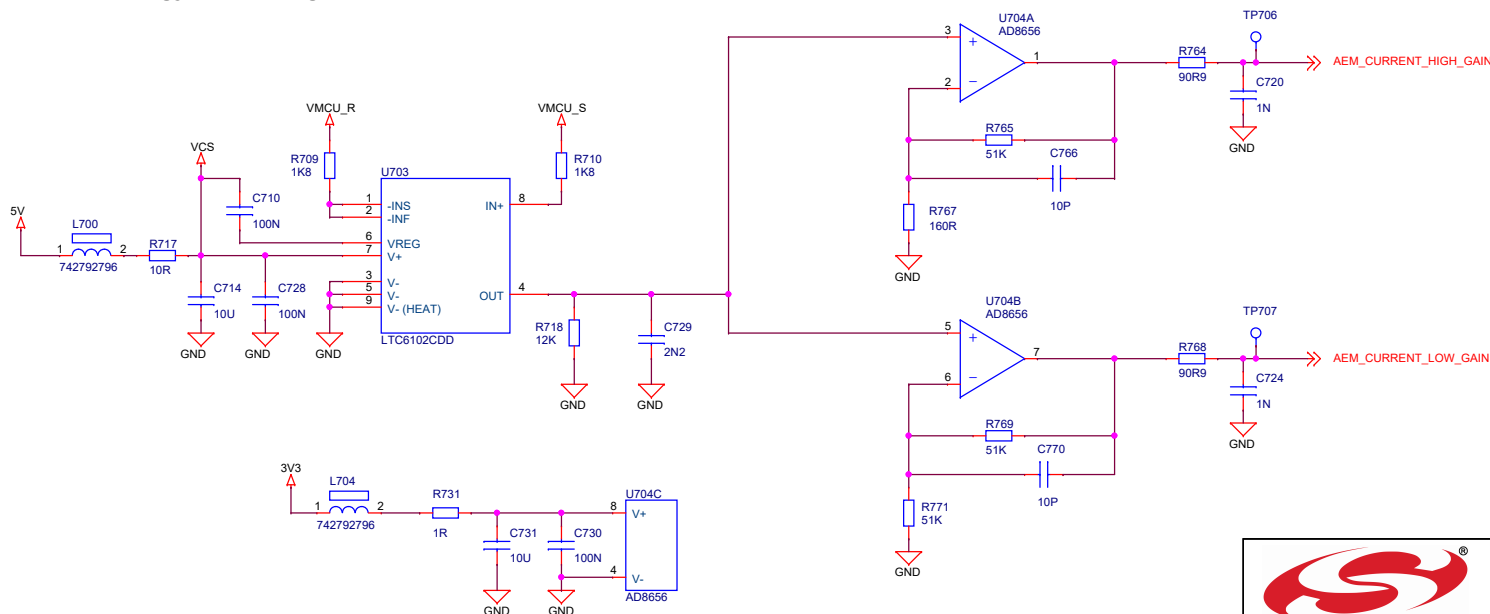



This goes to the slide switch, where it can be selected as the power source.

CALIBRATE	Calibration Current
0x1	3.30 uA
0x2	132.5 uA
0x4	323.5 uA
0x6	456.1 uA
0x8	12.36 mA

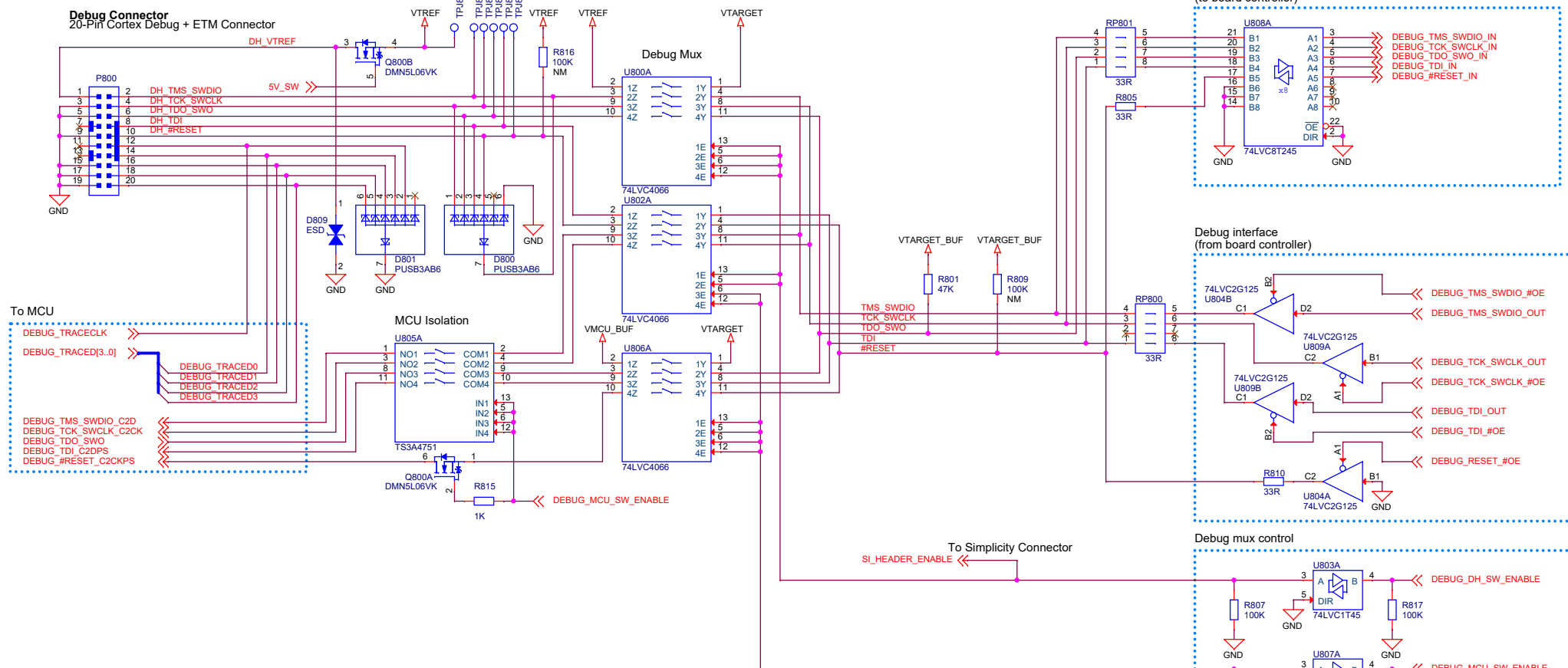
Calibration currents include contribution from sense and bleeder resistors.

## Advanced Energy Monitoring

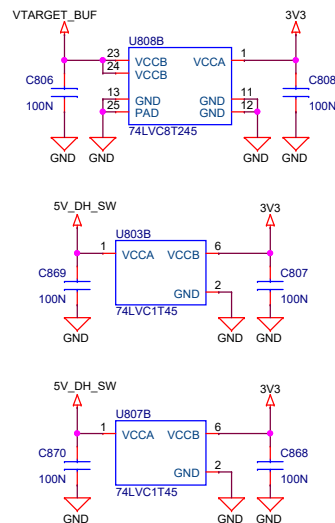
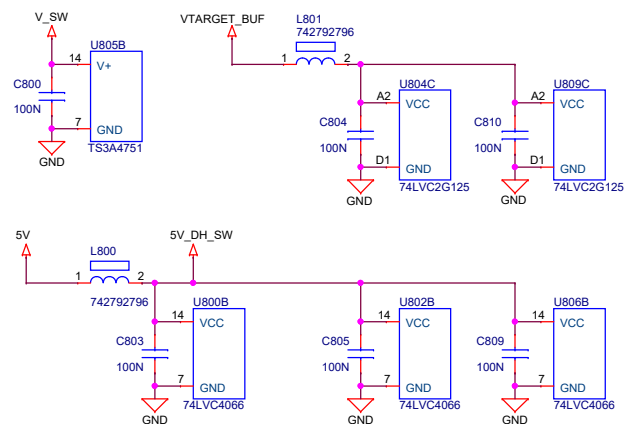


 <b>SILICON LABS</b>		Board Name	
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Designed MAH		Page Title	
Size A3		<b>Target Voltage Supply</b>	
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## Debug Mux



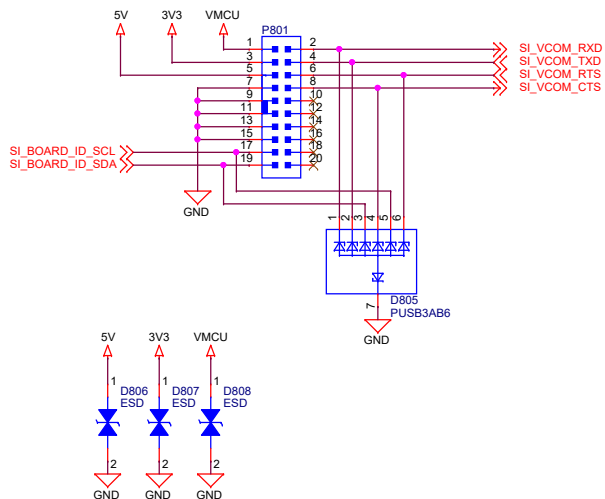
## Power & Decoupling



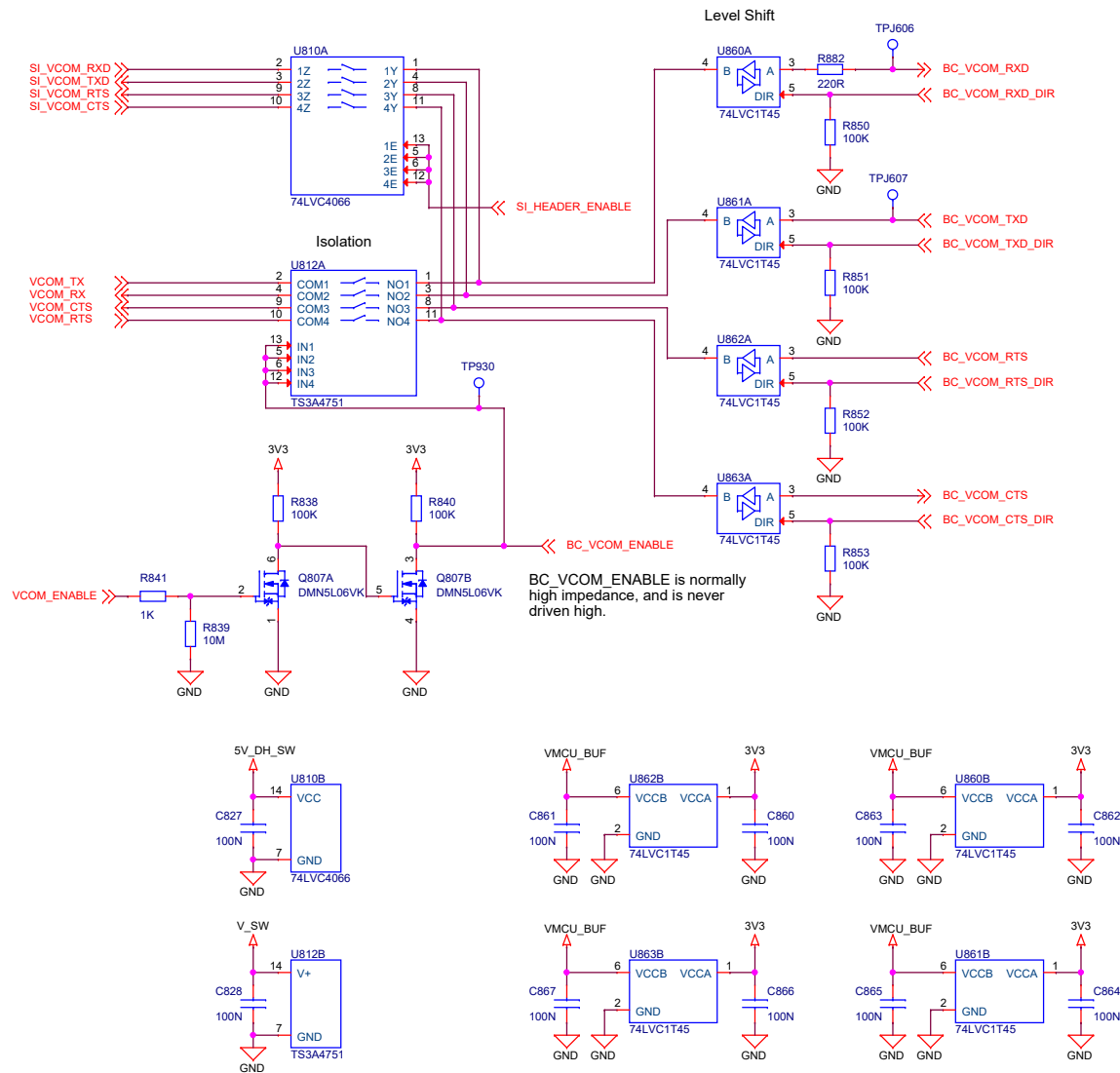
Debug Mode	DH_SW_ENABLE	MCU_SW_ENABLE	Debug Mode	VTARGET Source	VTREF Source
MCU	0	1	MCU	VMCU	None
Debug Out	1	0	Debug Out	VTREF (EXT)	External
Debug In	1	1	Debug In	VMCU	VMCU_BUF
Debug Off	0	0	Debug Off	None	None


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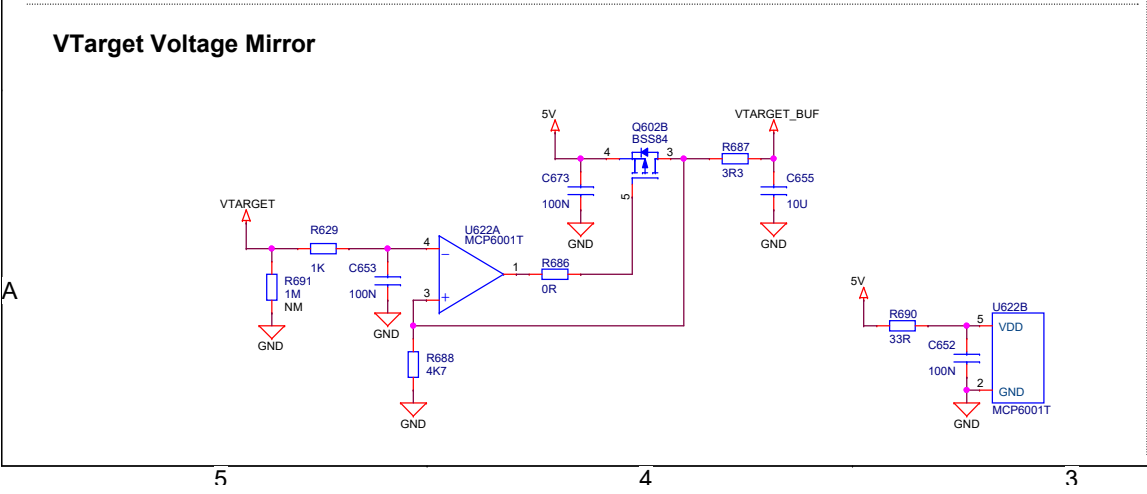
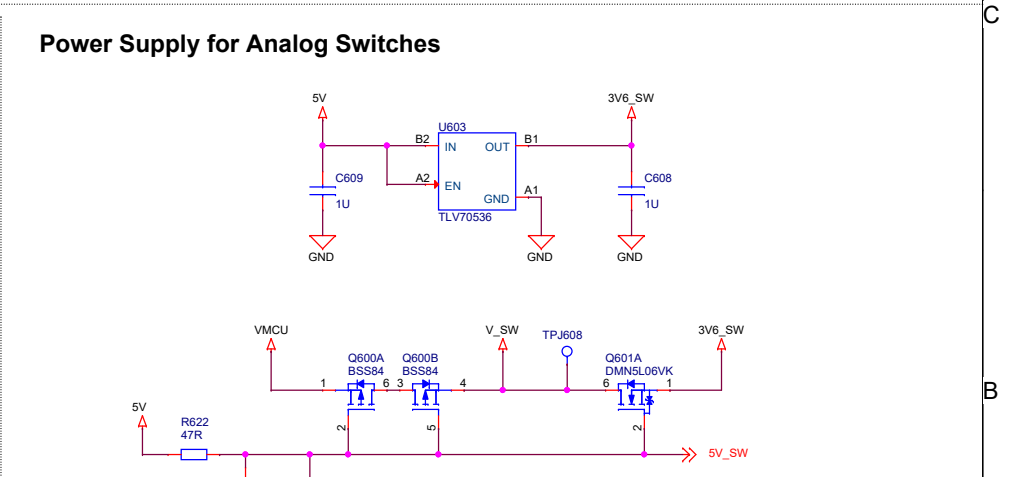
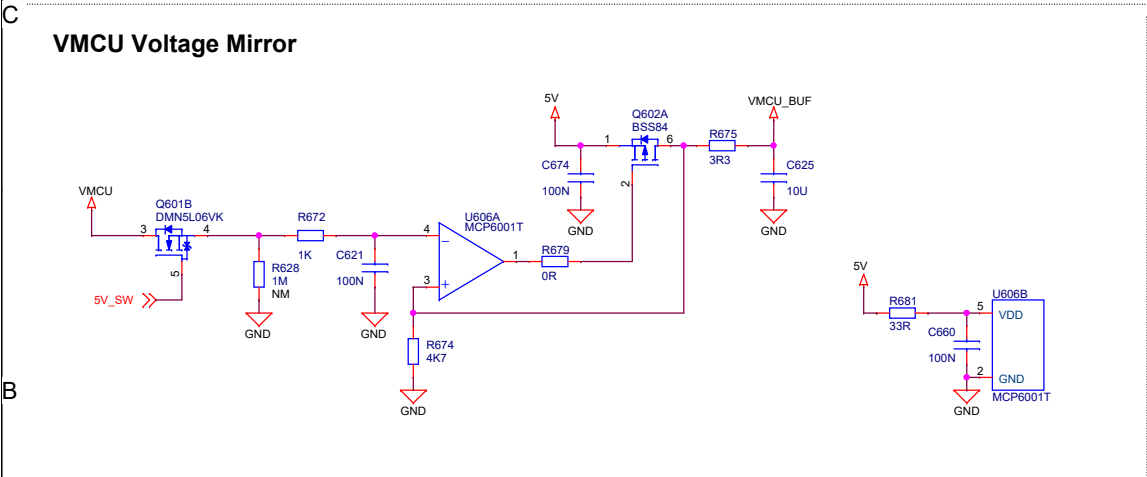
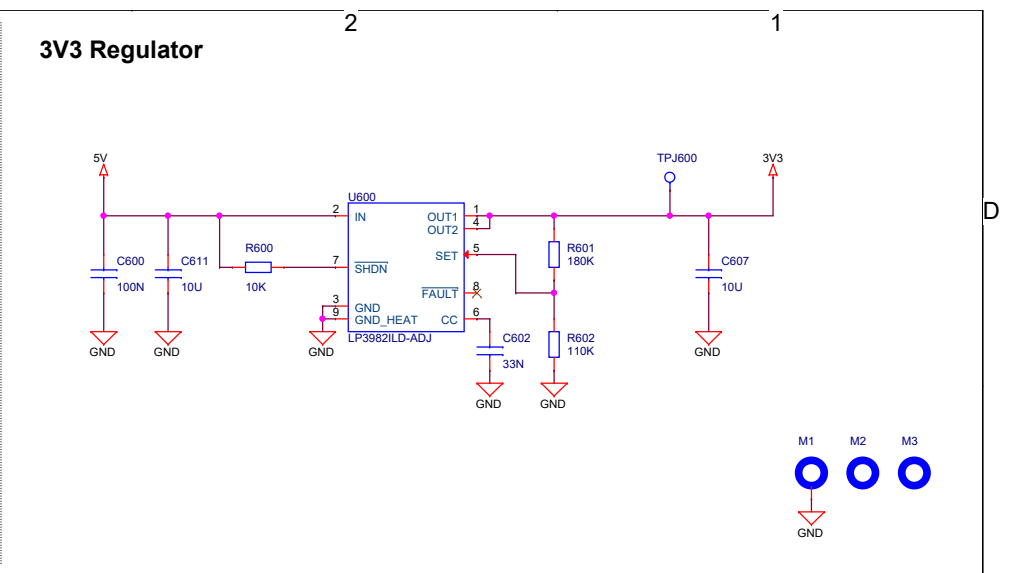
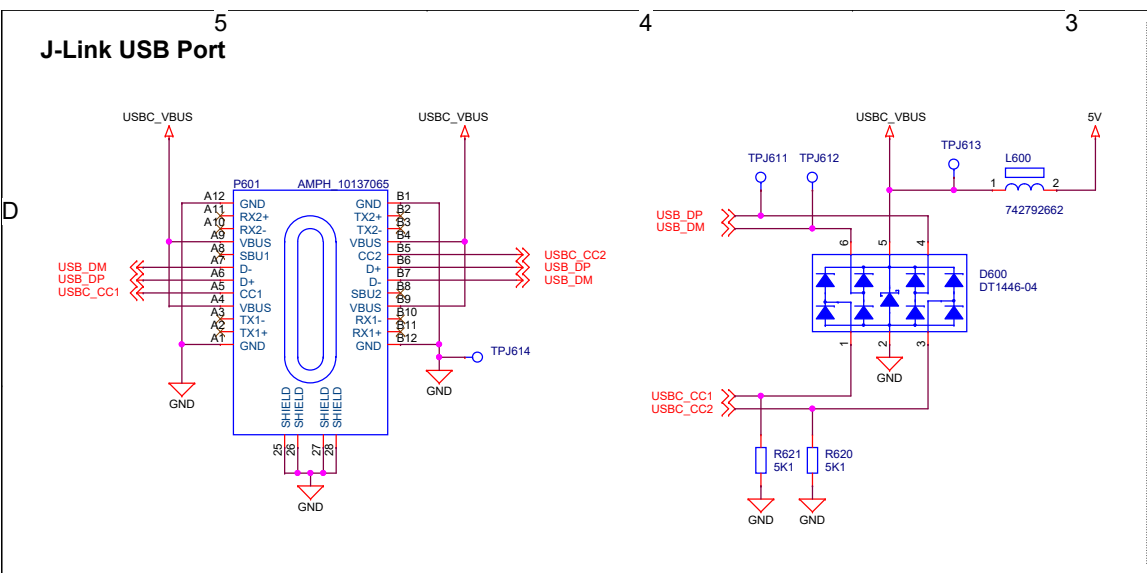
# Simplicity Connector



# VCOM Interface



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**Power Supply for Analog Switches**

J-Link USB Cable	Q600 State	Q601A State	V_SW	VMCU_SENSE
Connected	OFF	ON	3.6V VMCU	VMCU Isolated
Disconnected	ON	OFF	3.6V VMCU	VMCU Isolated

Isolation switches are powered by 3V6\_SW when the USB cable is connected, otherwise by VMCU.

**SILICON LABS**

Board Name

**EFM8BB2 Busy Bee STK**

Page Title

**Power**

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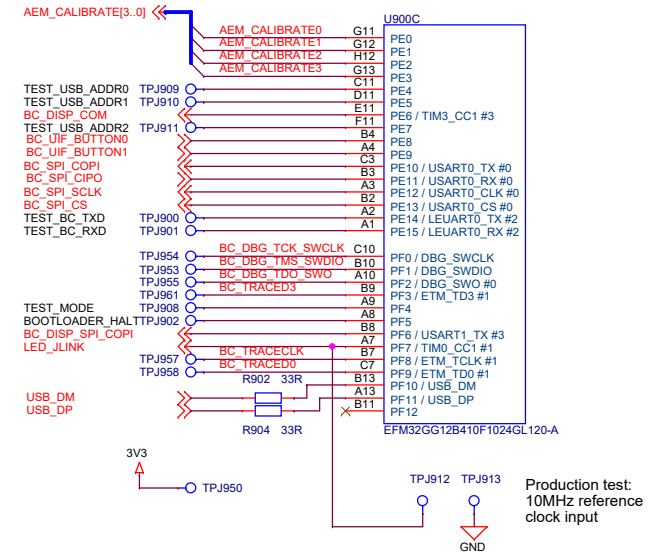
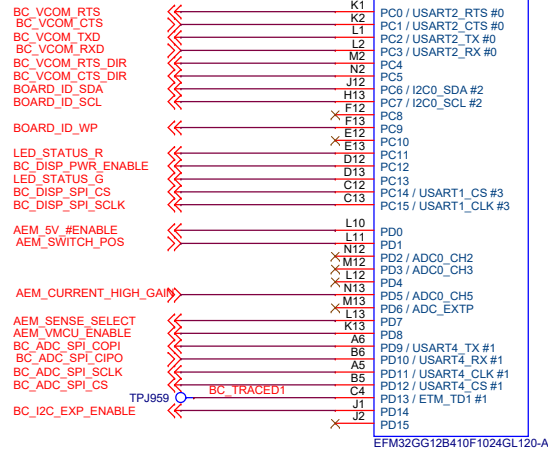
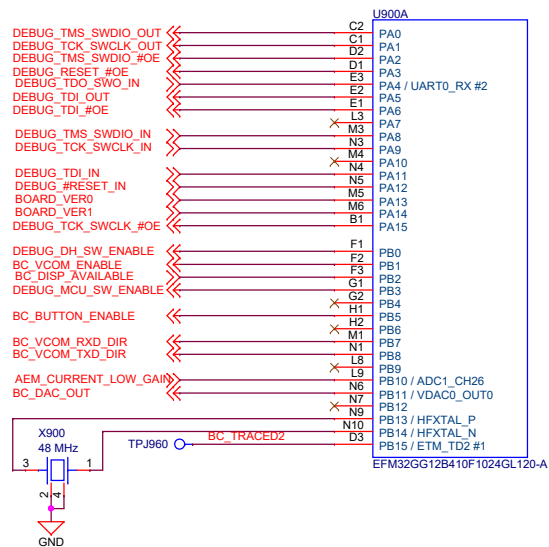
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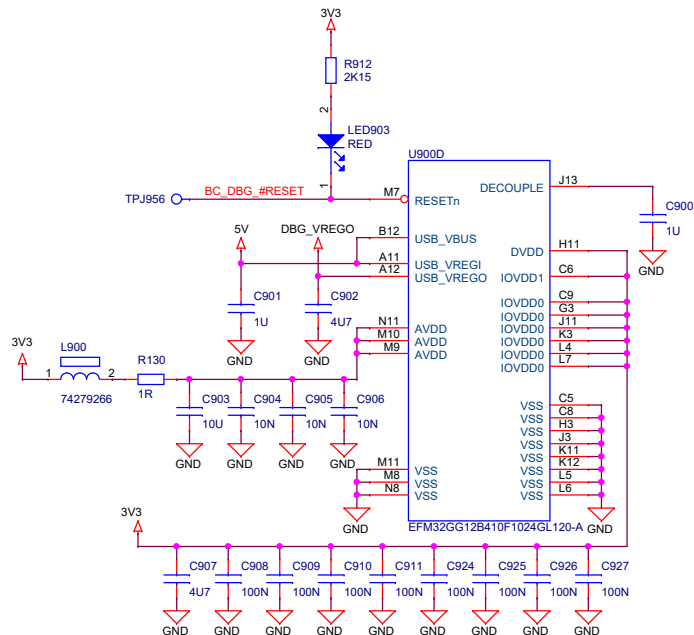
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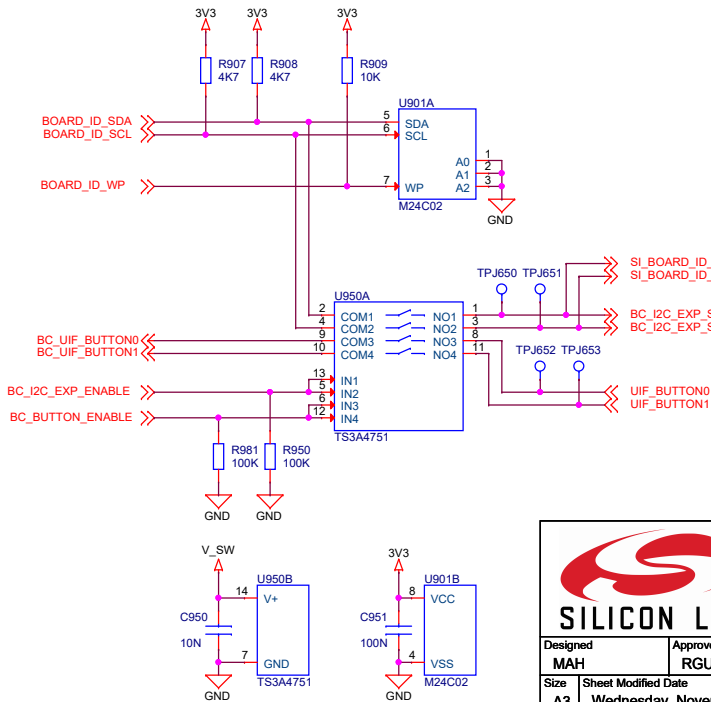
## Board Controller



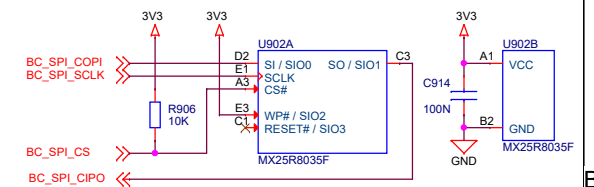
## Power & Decoupling



## Board ID & Button Isolation




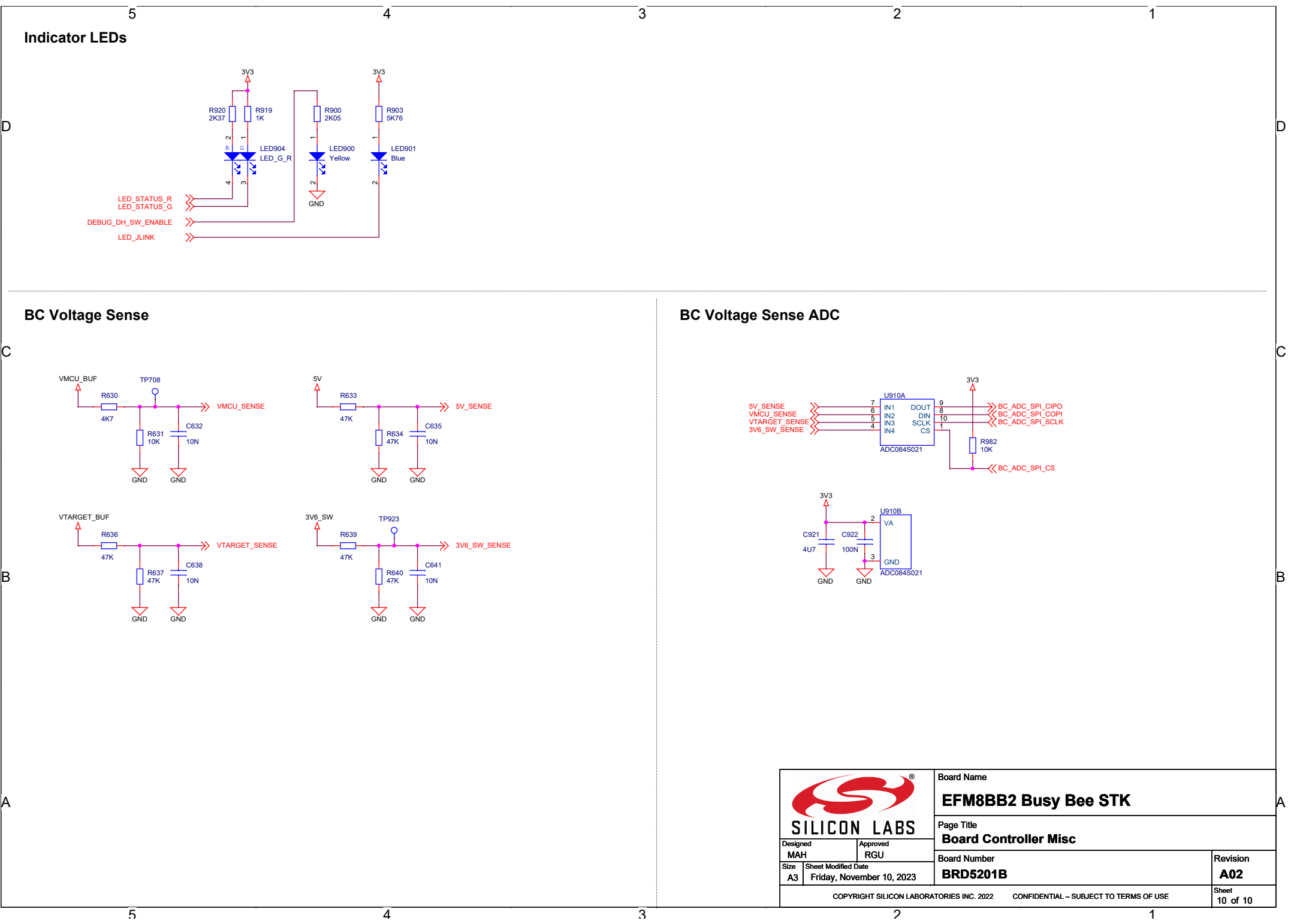
## BC Serial Flash




## Board Version



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