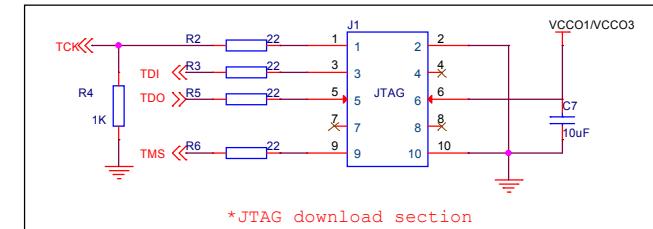
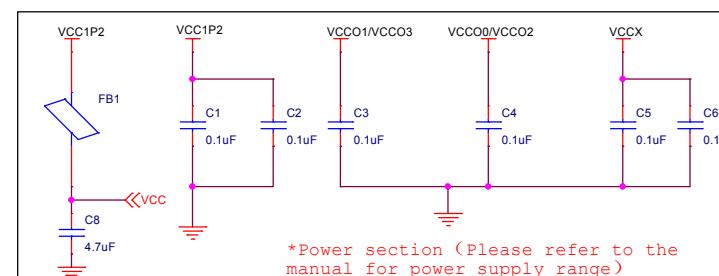


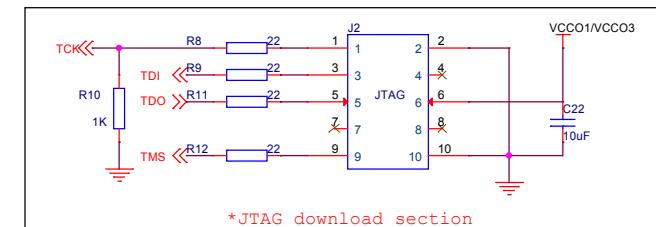
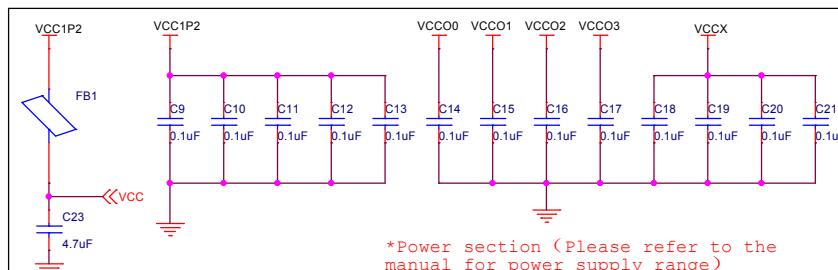
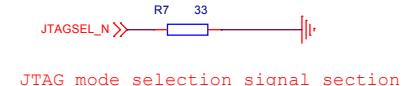
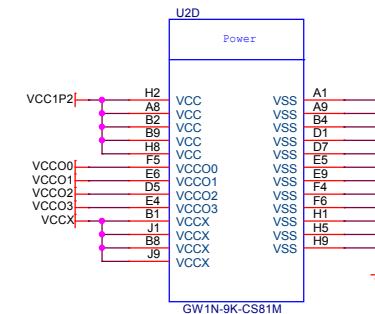
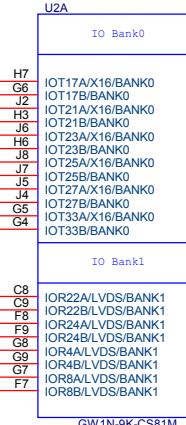
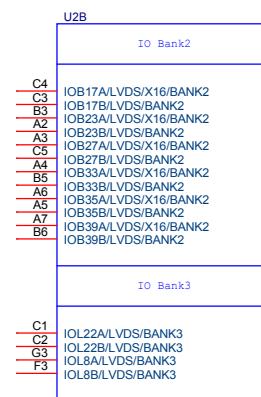
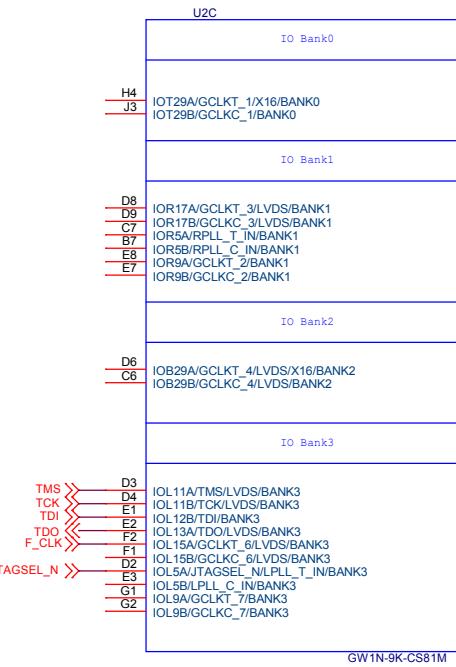
JTAG mode selection signal section



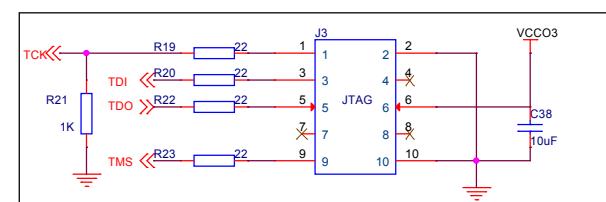
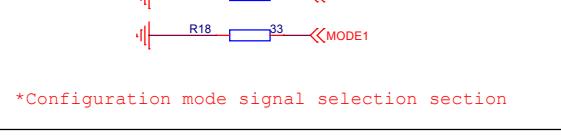
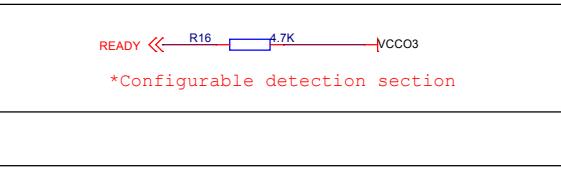
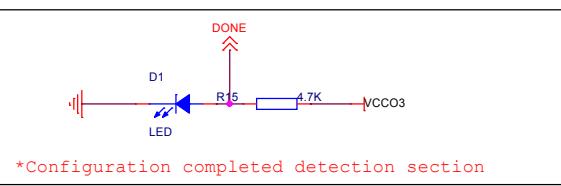
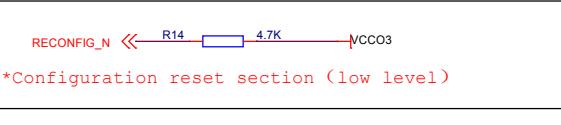
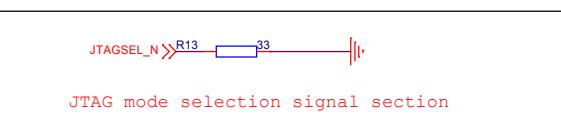
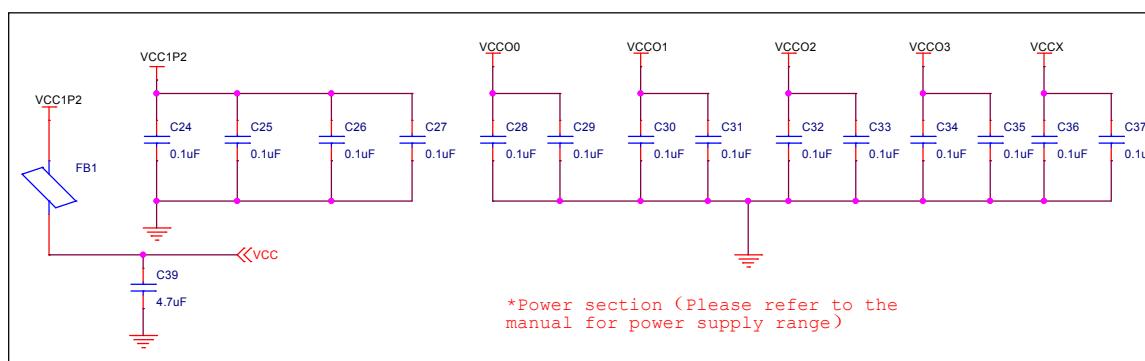
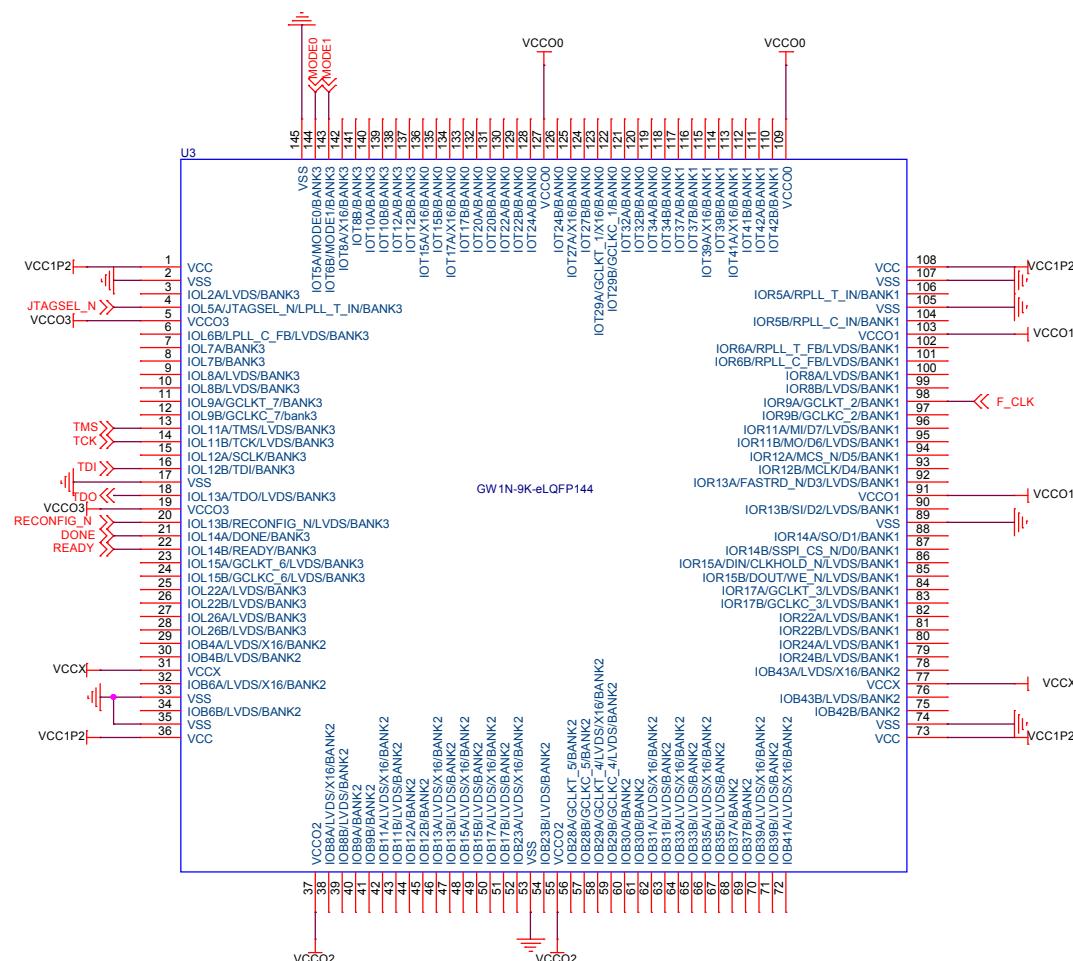
*JTAG download section

Title		
GOWIN Minimum System Diagram		
Size	Document Number	Rev
A3	GW1N-LV9-CM64	1.0
Date:	Thursday, September 30, 2021	Sheet 1 of 18

D



Title		GOWIN Minimum System Diagram	
Size	Document Number		
		Rev 1.0	
A3	GW1N-LV9-CS81M		
Date:	Thursday, September 30, 2021	Sheet	2 of 18



Title		GOWIN Minimum System Diagram
Size	Document Number	Rev
A3	GW1N-LV9-EQ144	1.0
Date:	Thursday, September 30, 2021	Sheet 3 of 18

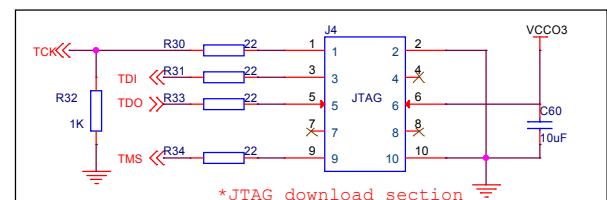
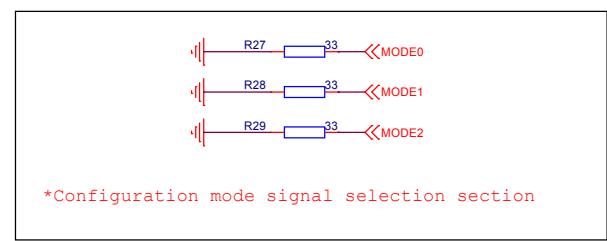
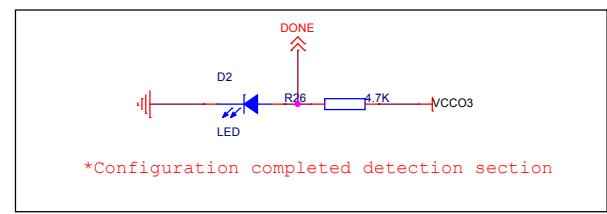
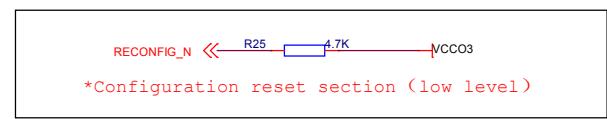
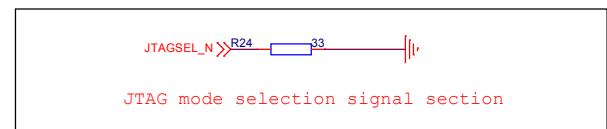
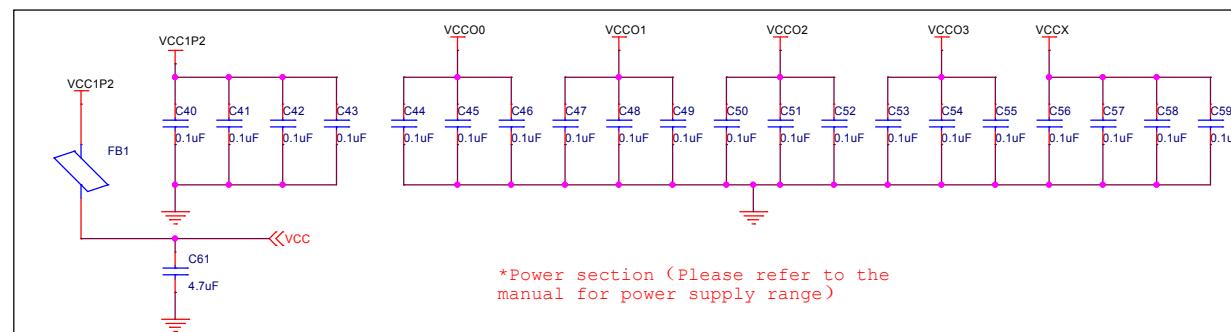
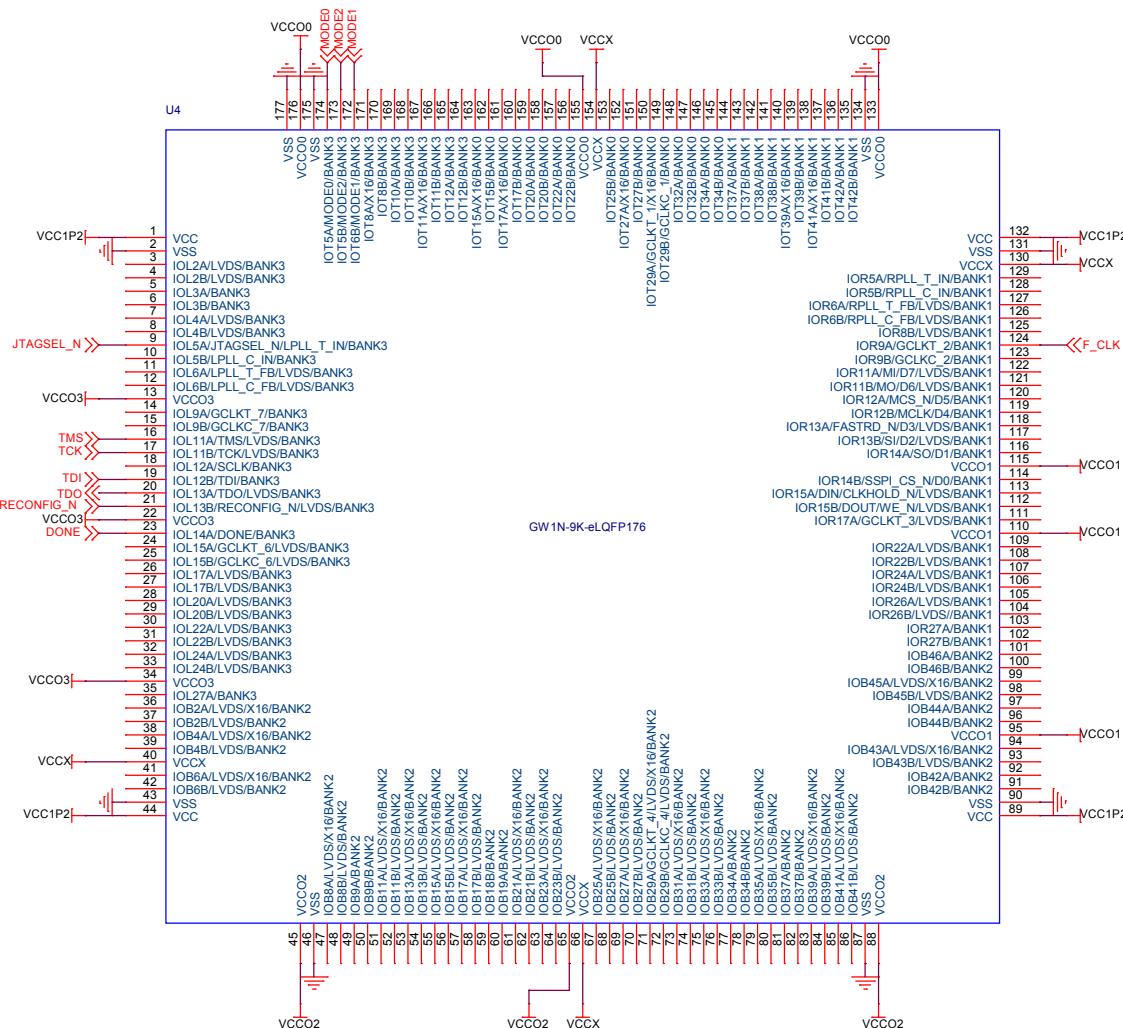
5

4

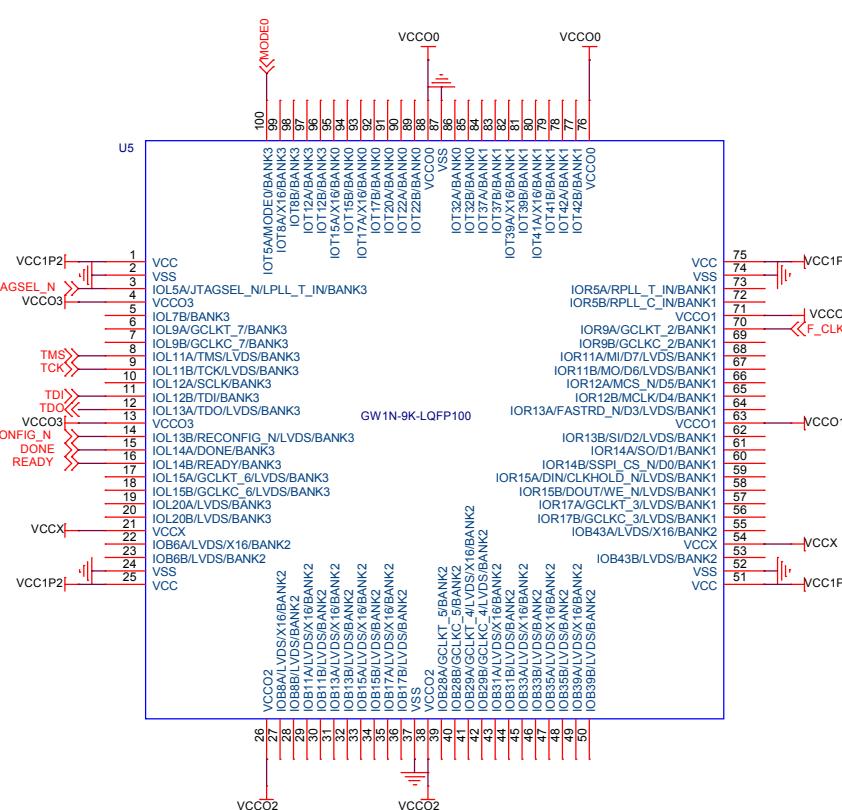
3

2

1



Title		GOWIN Minimum System Diagram		
Size		Document Number GW1N-9K-EQ176		
Rev				1.0
Date:	Thursday, September 30, 2021	Sheet	4	of 18



JTAG mode selection signal section

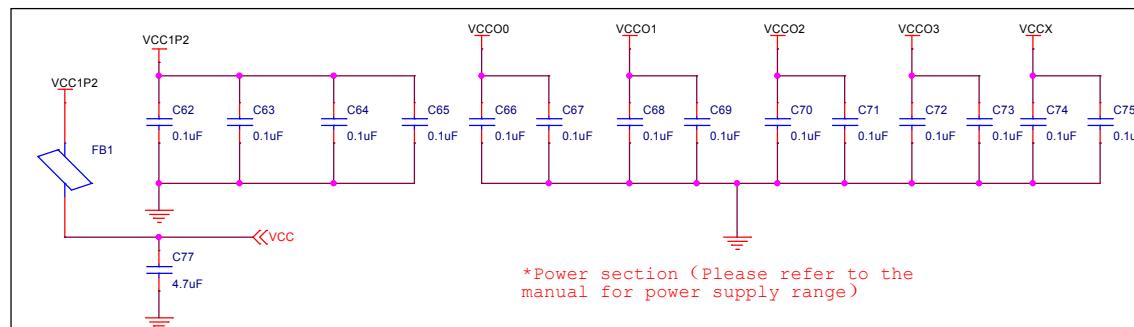
*Configuration reset section (low level)

*Configuration completed detection section

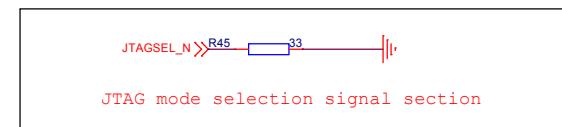
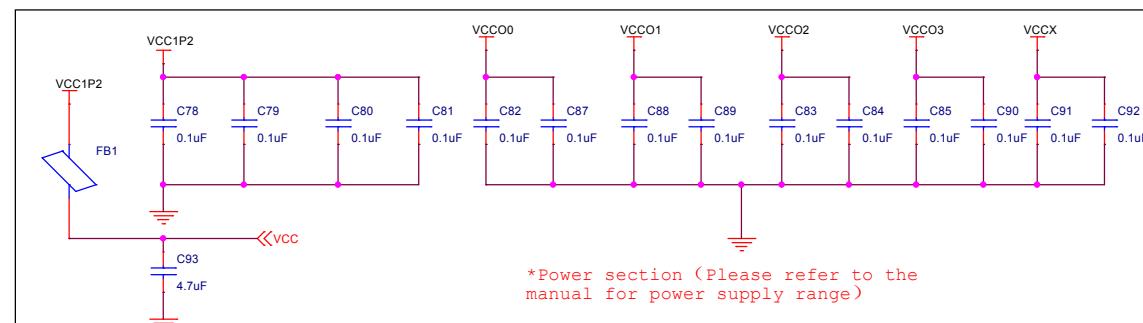
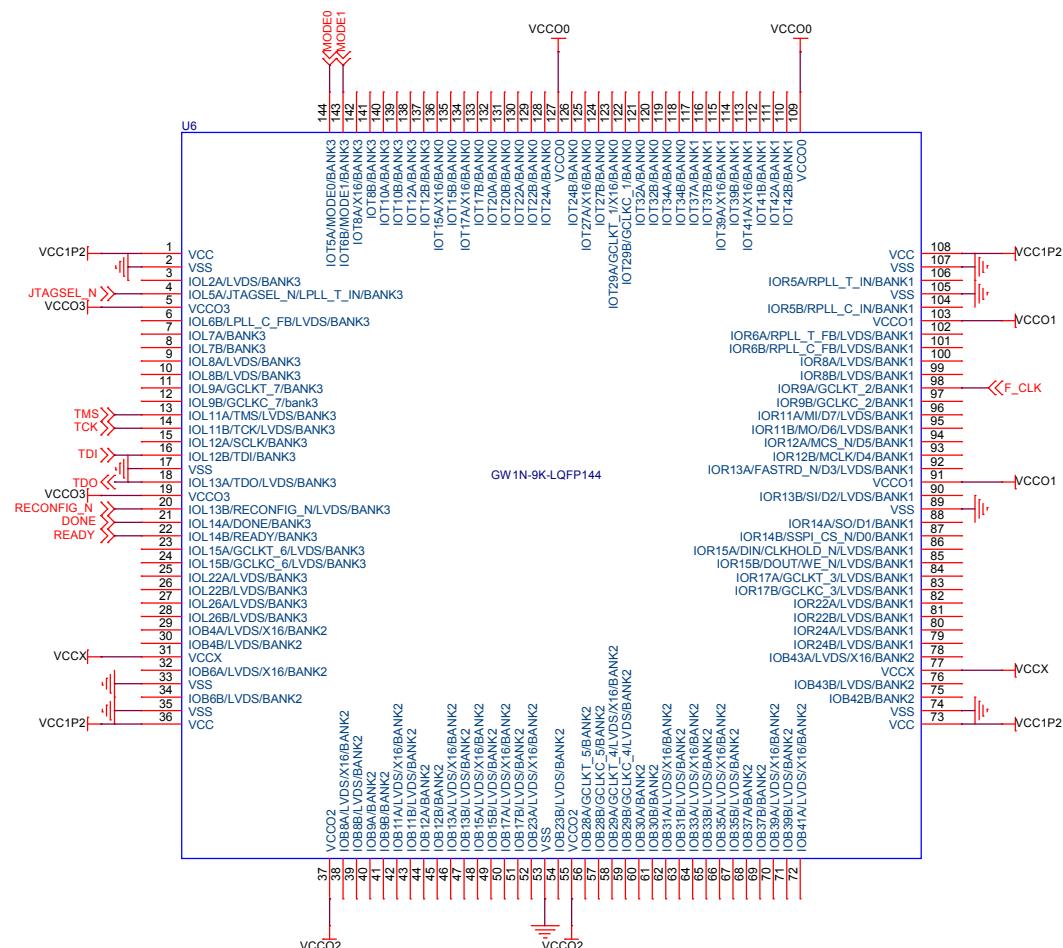
*Configurable detection section

*Configuration mode signal selection section

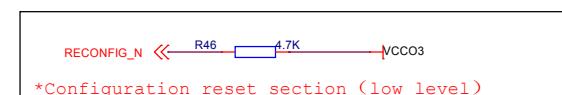
* JTAG download section



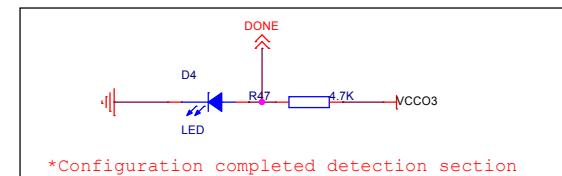
Title		GOWIN Minimum System Diagram	
Size	Document Number	GW1N-LV9-LQ100	
Date:	Rev	Thursday, September 30, 2021	1.0



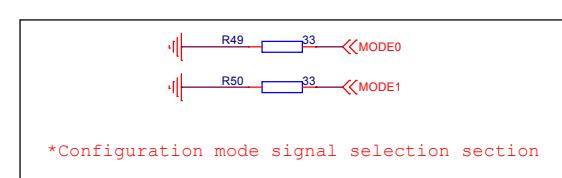
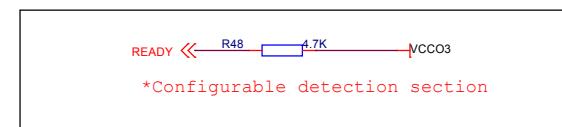
JTAG mode selection signal section



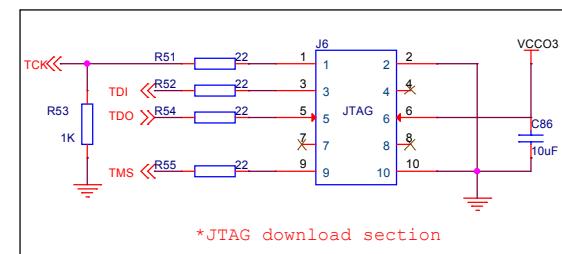
*Configuration reset section (low level)



*Configuration completed detection section



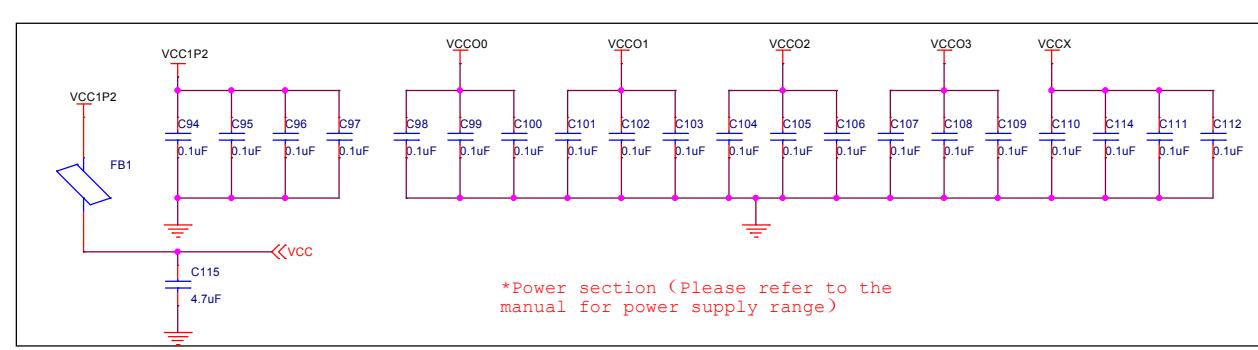
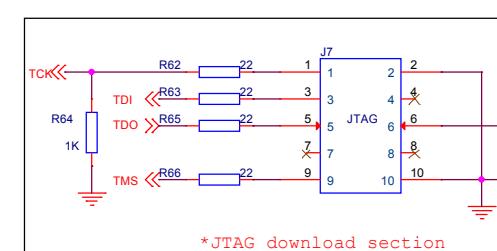
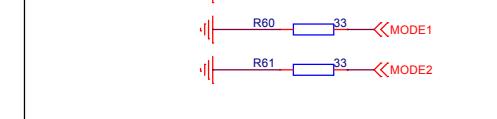
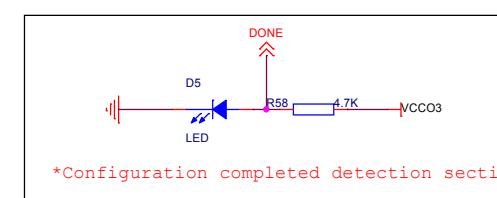
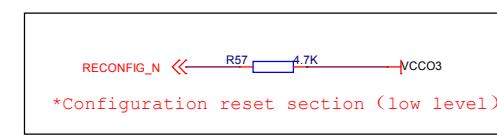
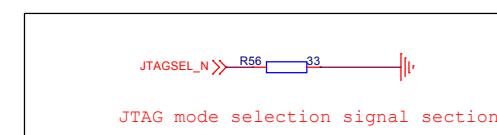
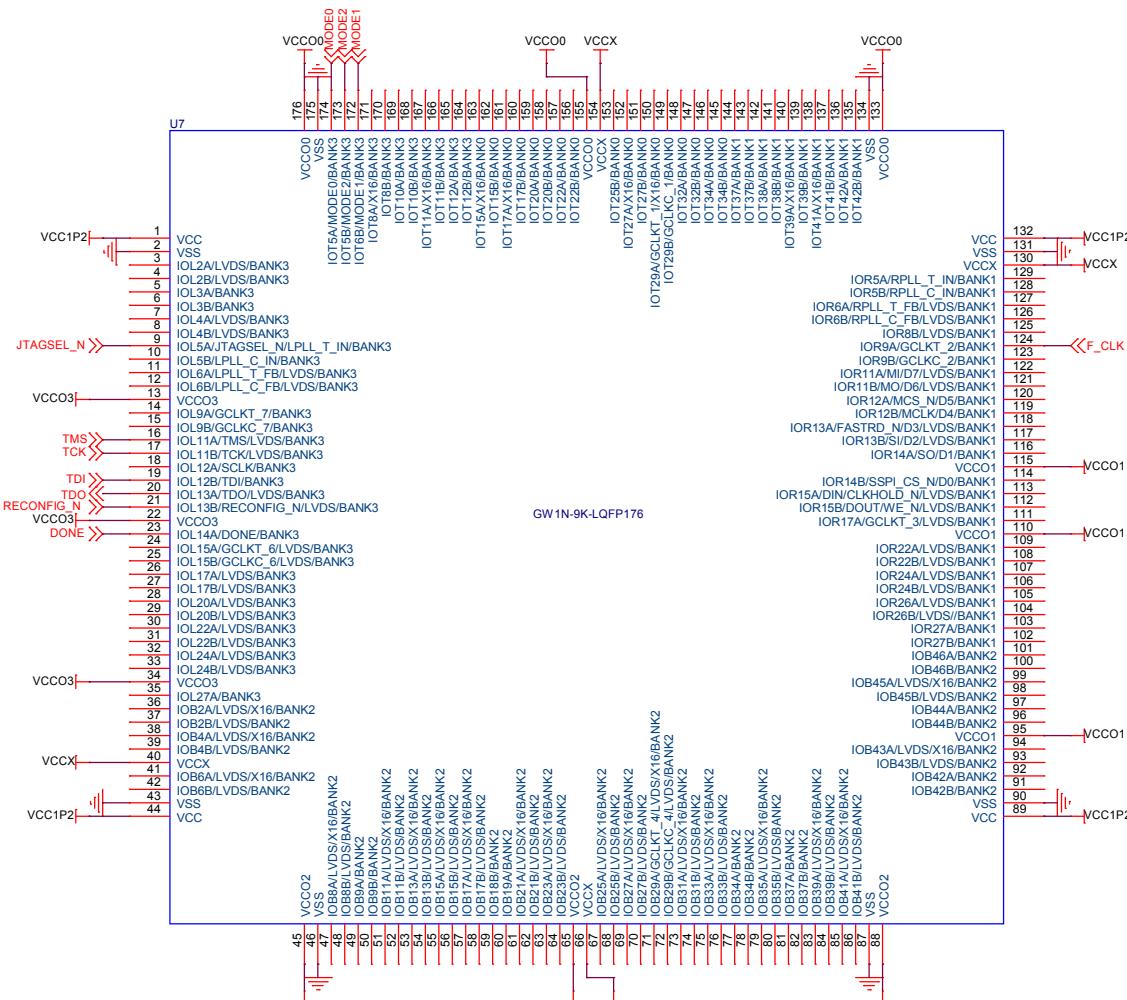
*Configuration mode signal selection section



*JTAG download section

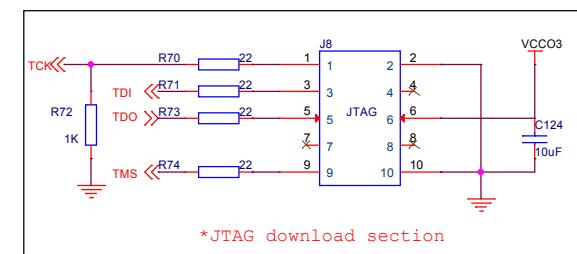
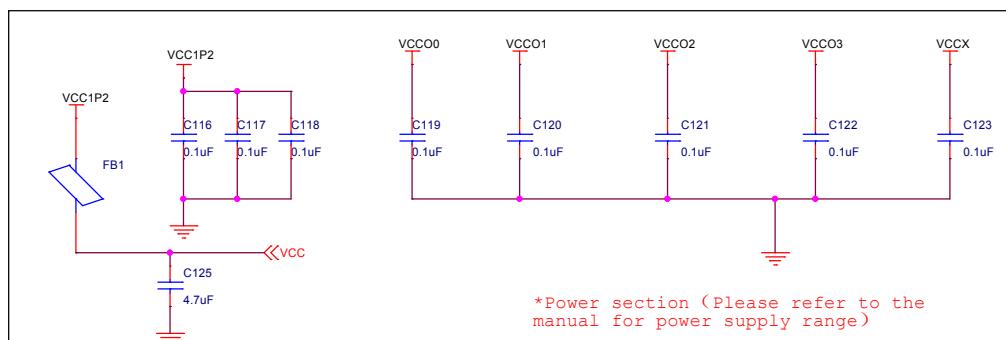
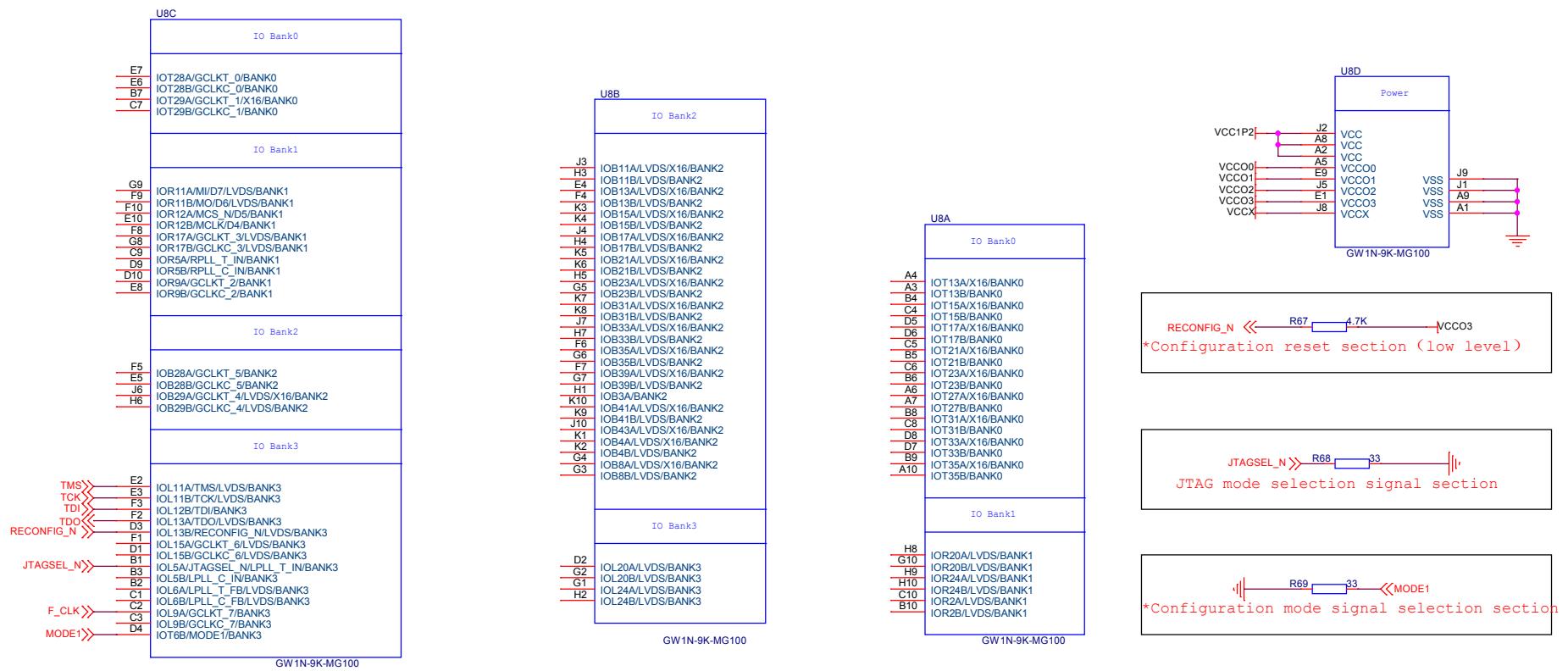
Title				
GOWIN Minimum System Diagram				
Size A3	Document Number GW 1N-LV9-LQ144	Rev 1.0		
Date: Thursday, September 30, 2021	Sheet 6	of 18		

D

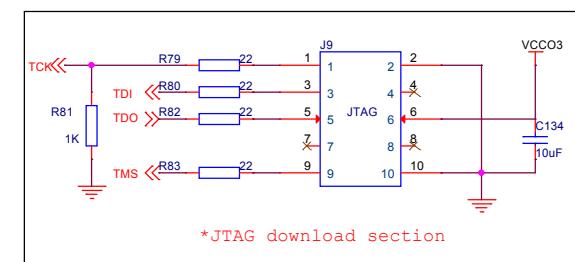
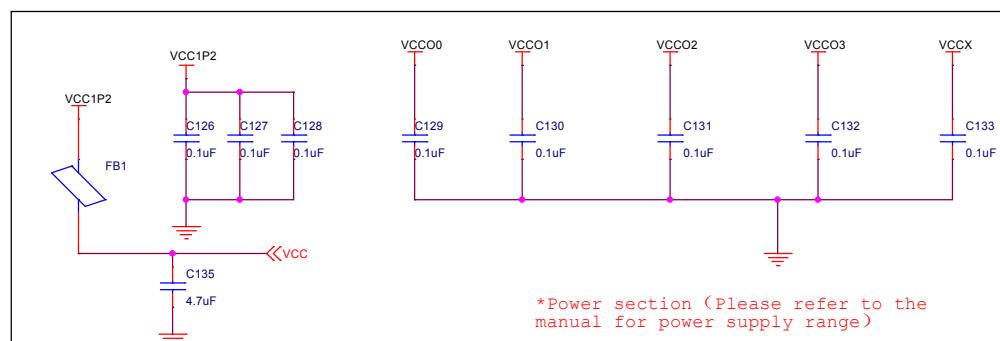
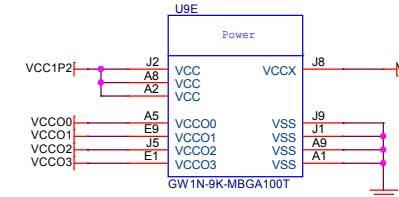
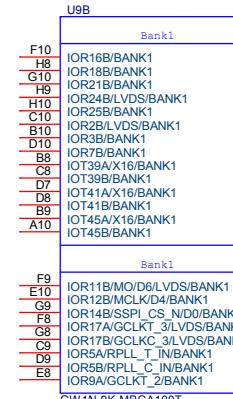
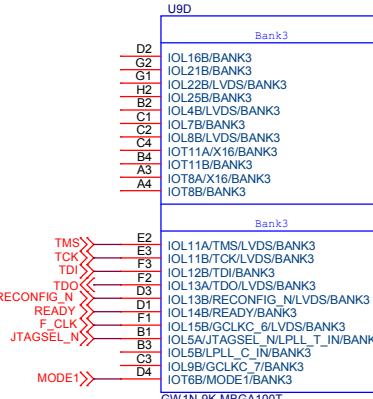
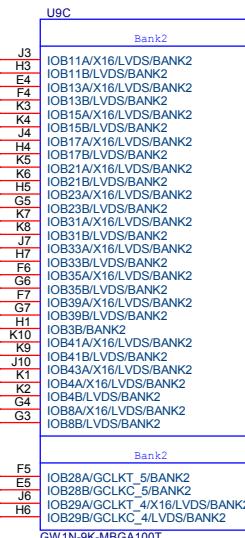


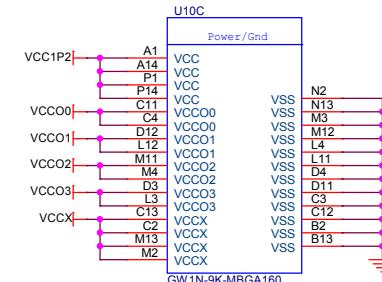
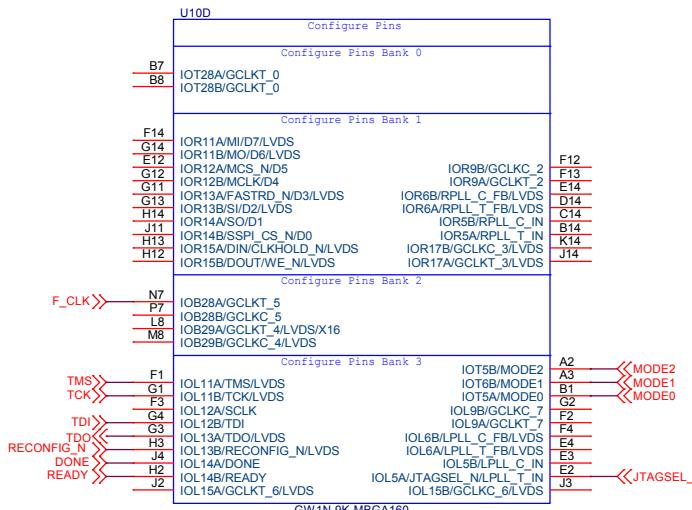
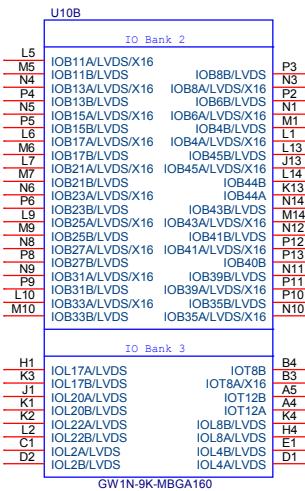
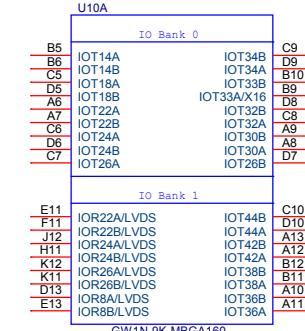
Title		GOWIN Minimum System Diagram
Size	Document Number	Rev
A3	GW1N-LV9-LQ176	1.0
Date:	Thursday, September 30, 2021	Sheet 7 of 18

D



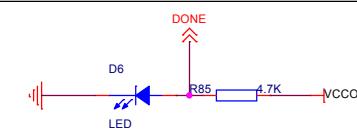
D





RECONFIG_N \llcorner R84 4.7K VCC03

*Configuration reset section (low level)



*Configuration completed detection section

JTAGSEL_N \gg R86 33

JTAG mode selection signal section

READY \llcorner R90 4.7K VCC03

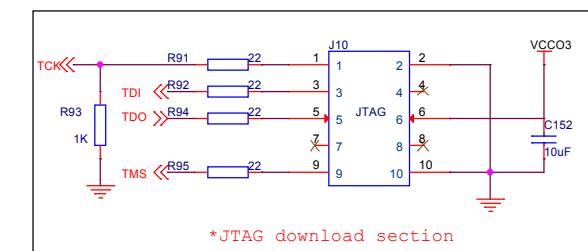
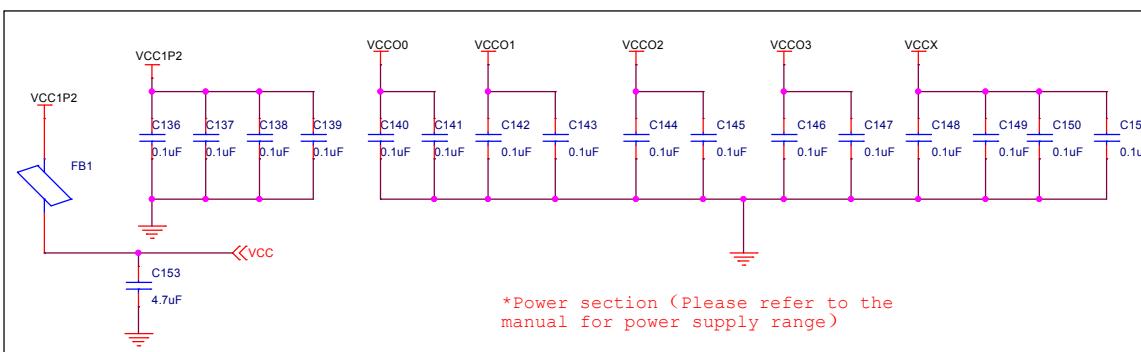
*Configurable detection section

R87 33 \llcorner MODE0

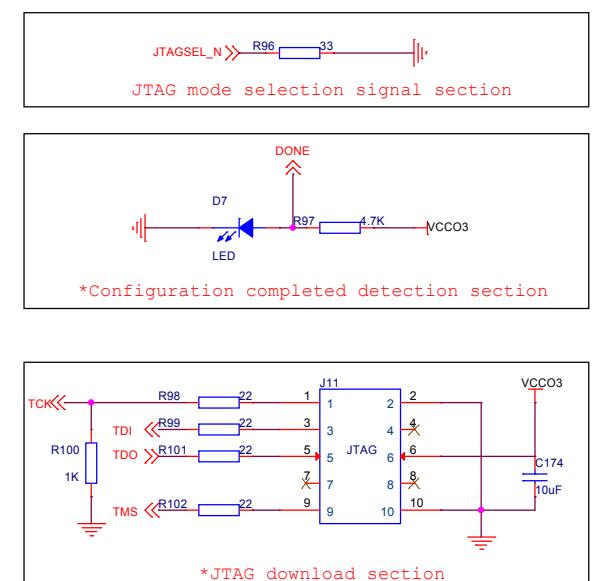
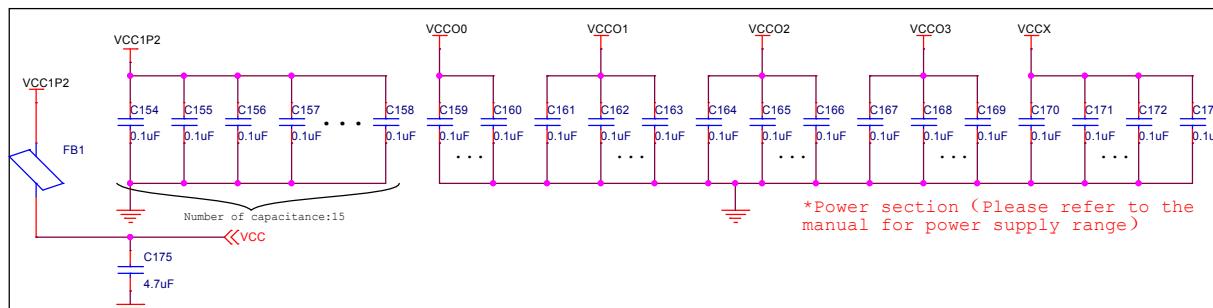
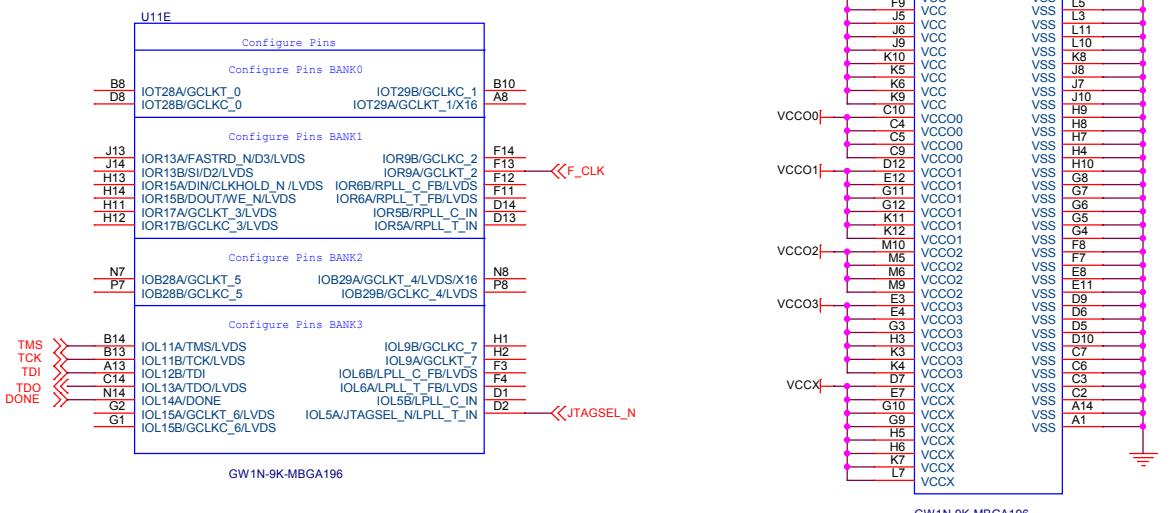
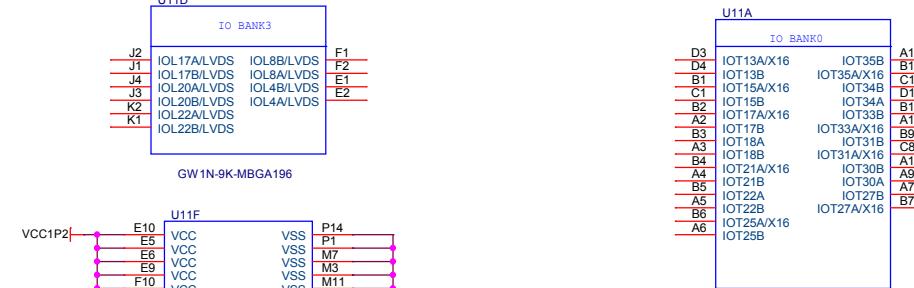
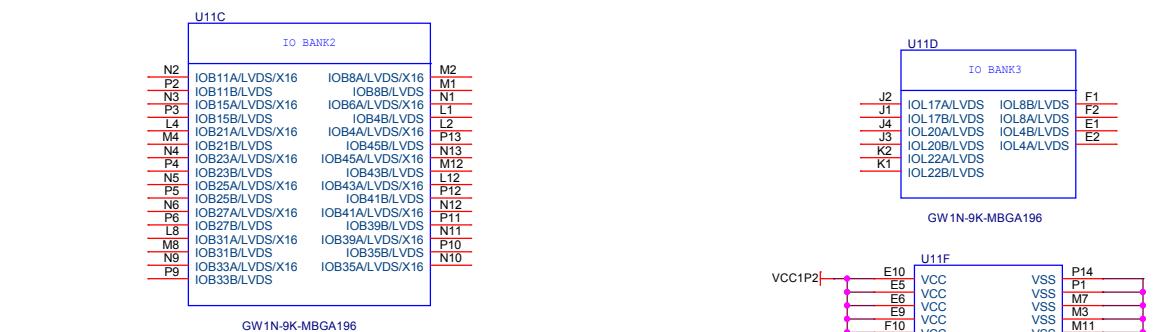
R88 33 \llcorner MODE1

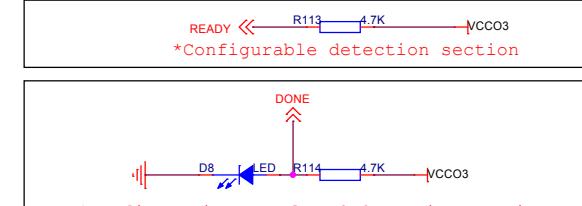
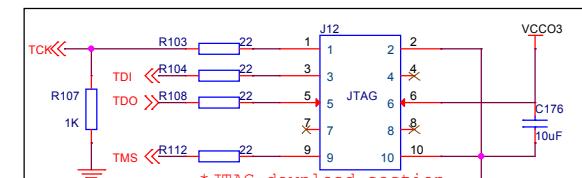
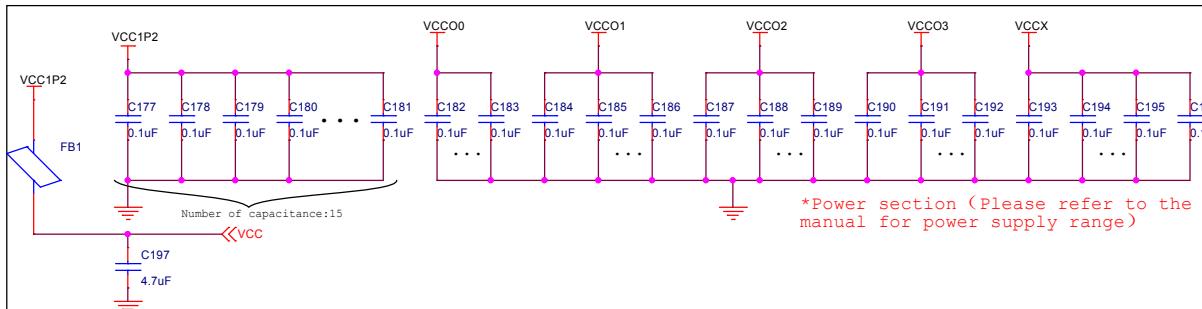
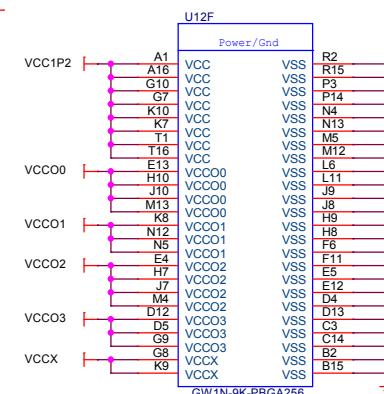
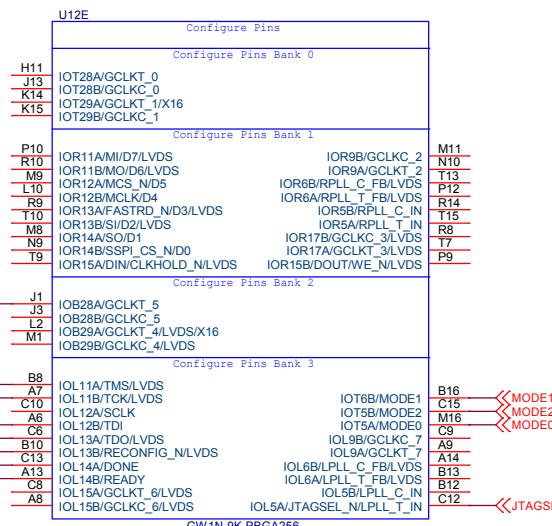
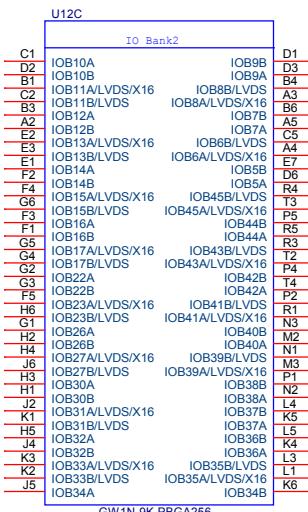
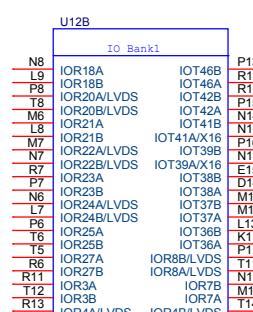
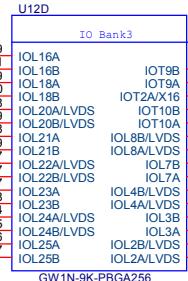
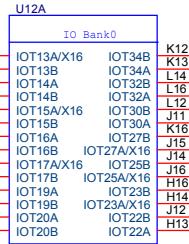
R89 33 \llcorner MODE2

*Configuration mode signal selection section



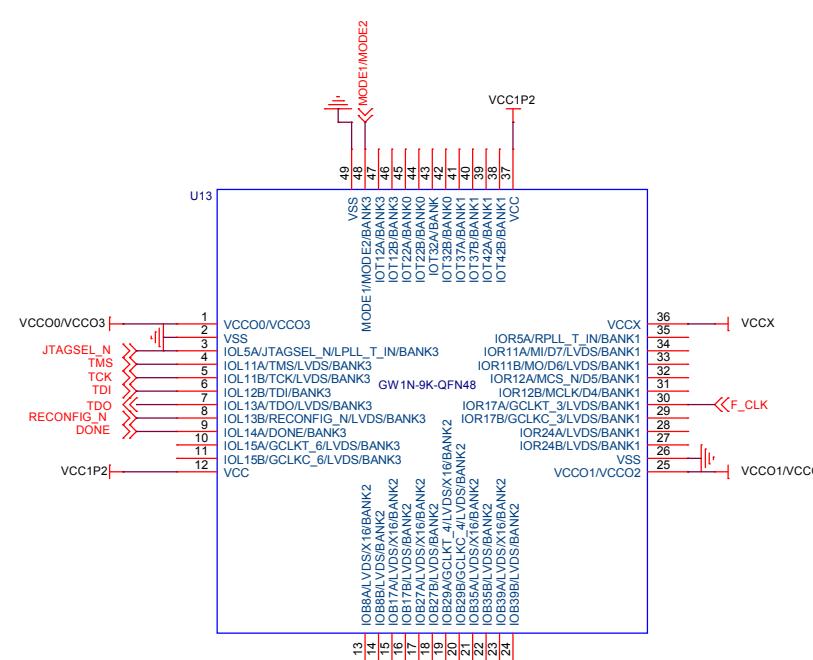
Title		GOWIN Minimum System Diagram	
Size	Document Number	GW1N-LV9-MG160	
Date:	Rev.	Thursday, September 30, 2021	1.0
			Sheet 10 of 18





Title		GOWIN Minimum System Diagram	
Size	Document Number	Rev 1.0	
A3	GW1N-LV9-PG256		
Date:	Tuesday, November 23, 2021	Sheet	12 of 18

D



RECONFIG_N \ll R115 4.7K \rightarrow VCCO0/VCCO3

*Configuration reset section (low level)

JTAGSEL_N \gg R116 33 \rightarrow GND

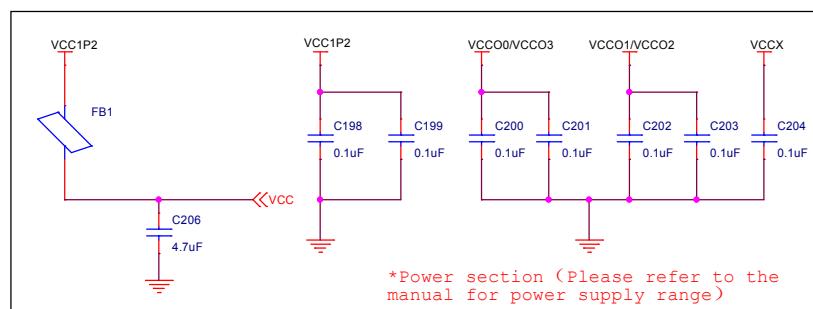
JTAG mode selection signal section

D9 \rightarrow LED \rightarrow R117 4.7K \rightarrow VCCO0/VCCO3

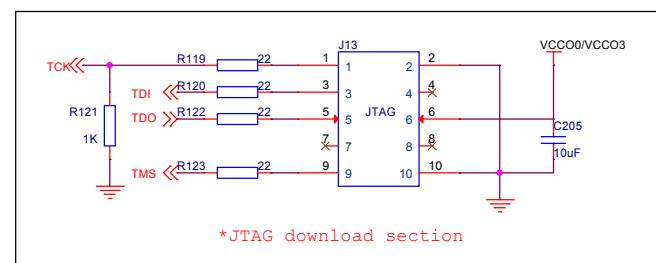
*Configuration completed detection section

R118 33 \rightarrow MODE1/MODE2

*Configuration mode signal selection section



*Power section (Please refer to the manual for power supply range)



*JTAG download section

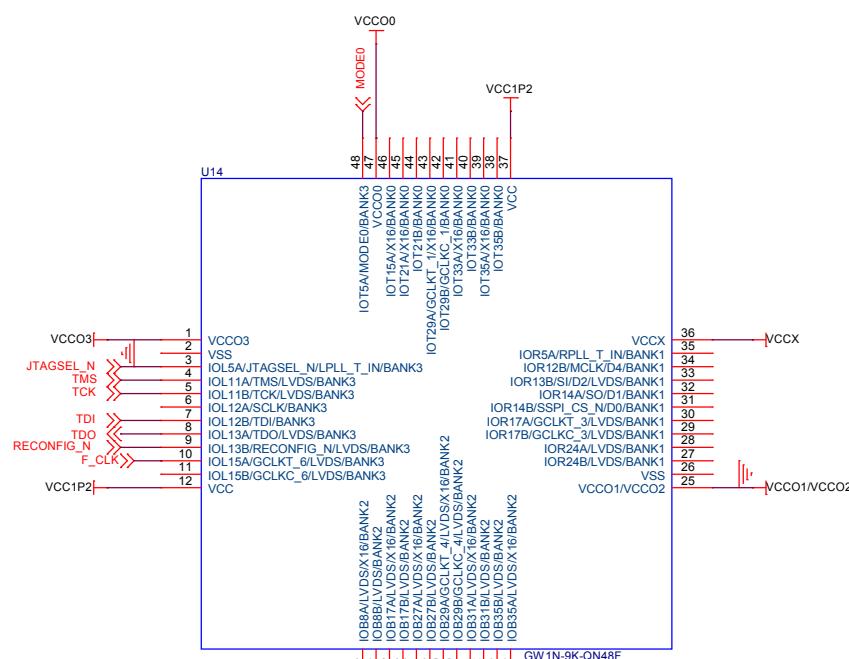
Title	
GOWIN Minimum System Diagram	
Size	Document Number
A3	GW1N-LV9-QN48
Date:	Thursday, September 30, 2021
Rev	1.0

D

C

B

A

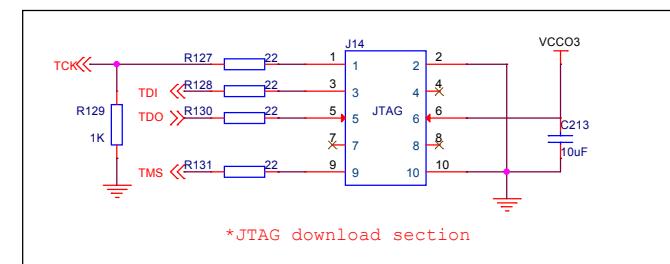
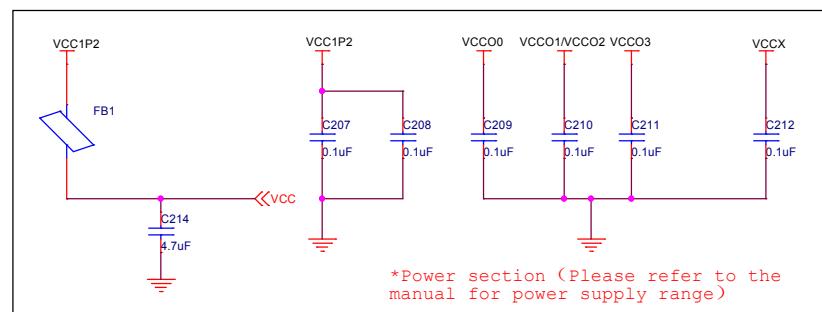


RECONFIG_N ⇐ R124 4.7K VCCO3
*Configuration reset section (low level)

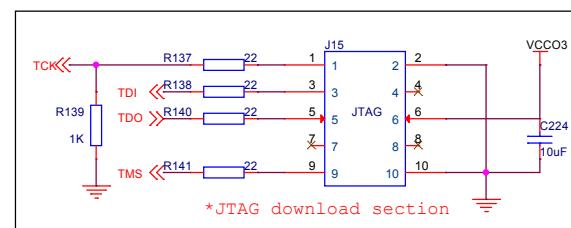
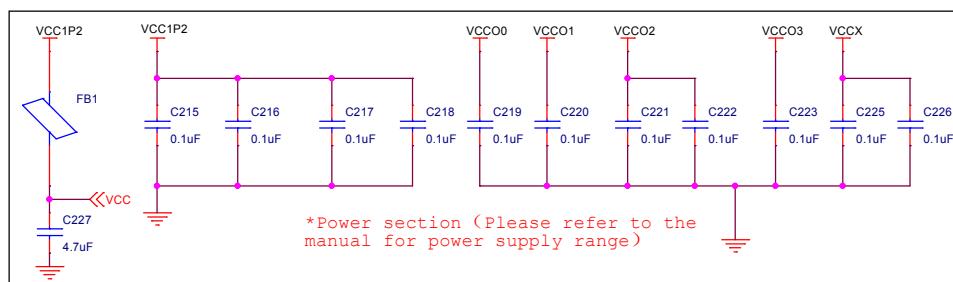
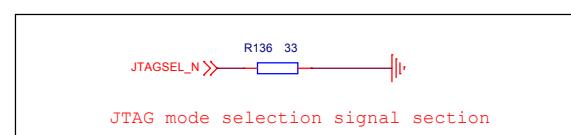
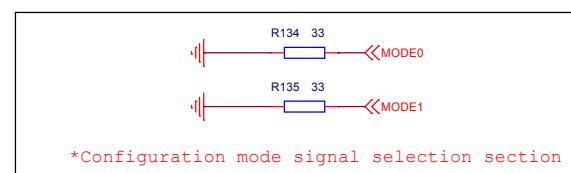
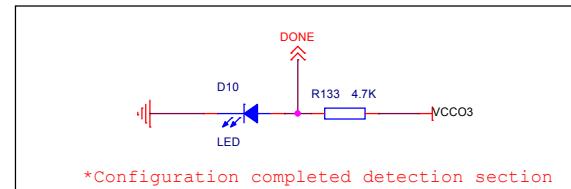
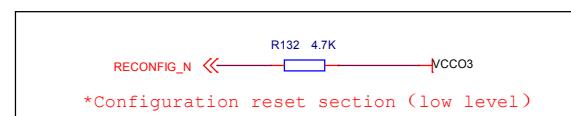
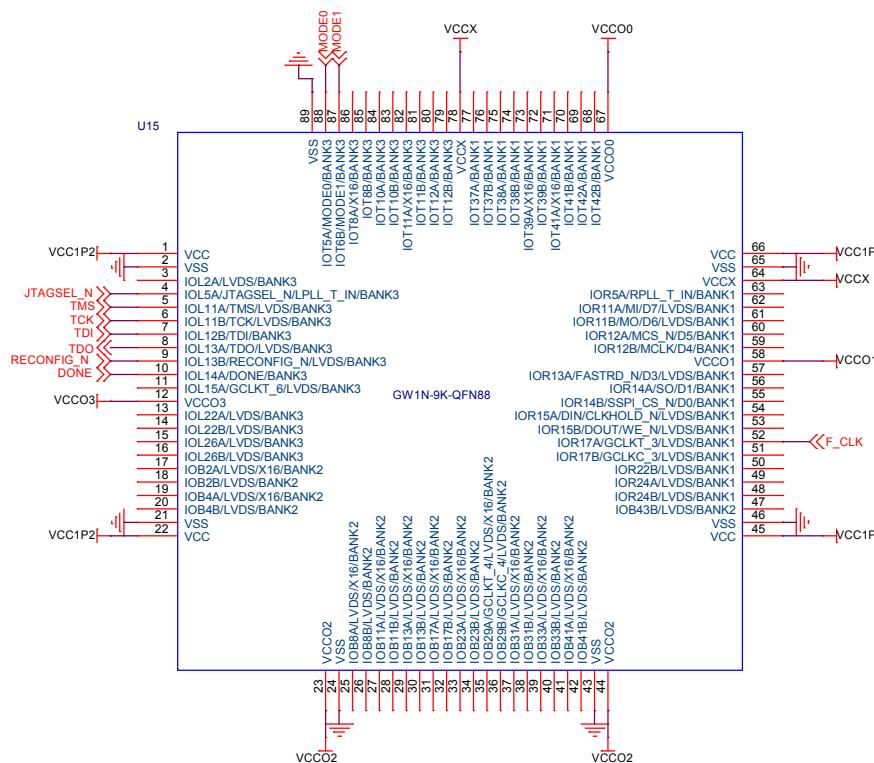
JTAGSEL_N ⇒ R125 33 VCCO3
JTAG mode selection signal section

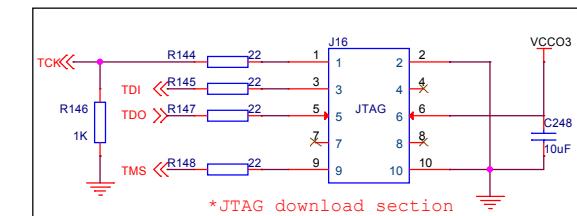
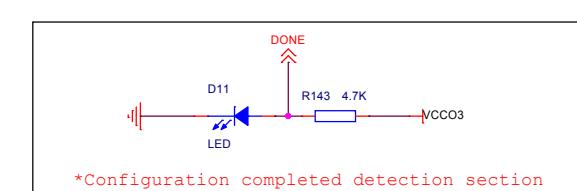
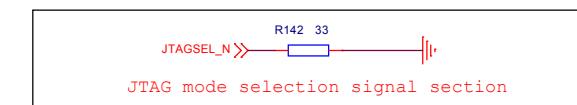
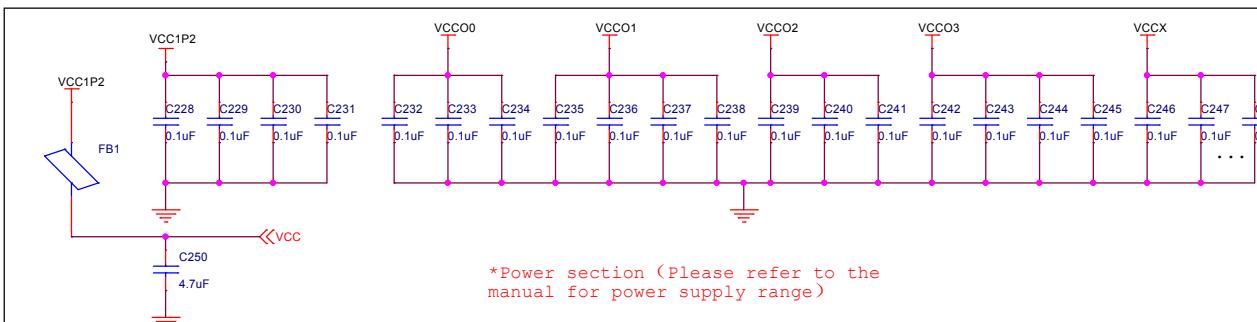
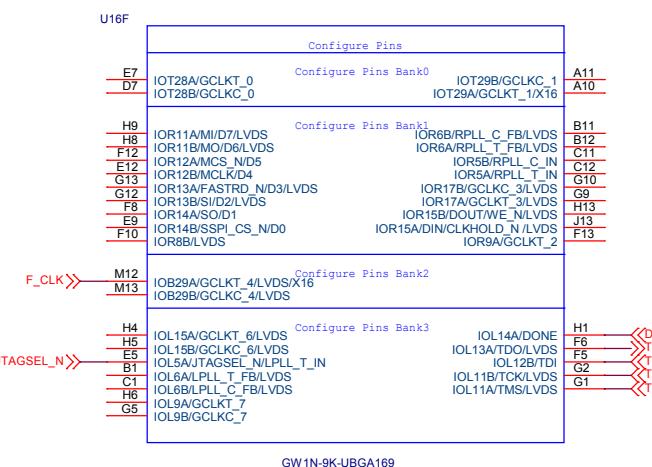
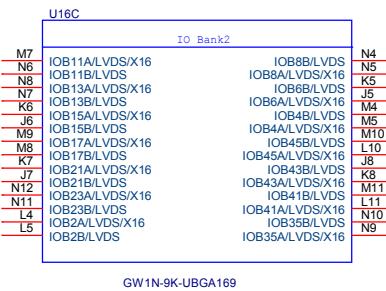
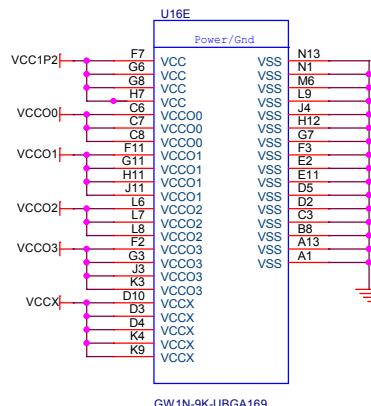
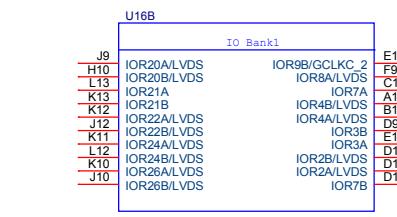
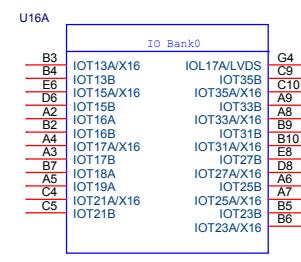
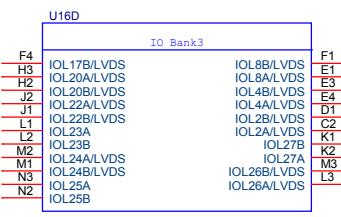
R126 33 ⇐ MODE0
*Configuration mode signal selection section

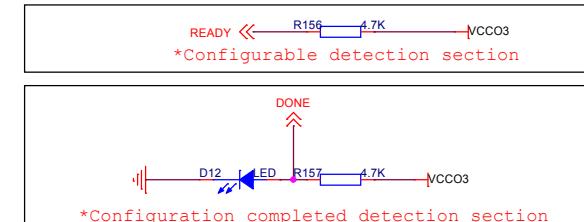
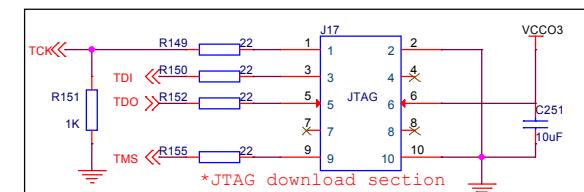
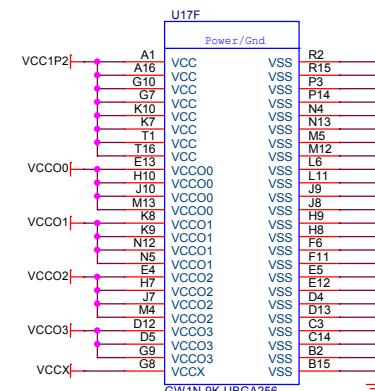
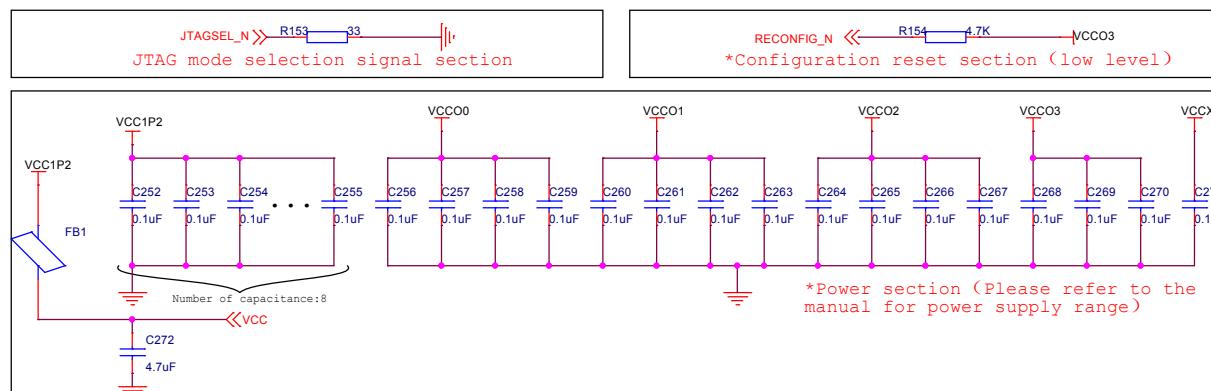
*JTAG download section

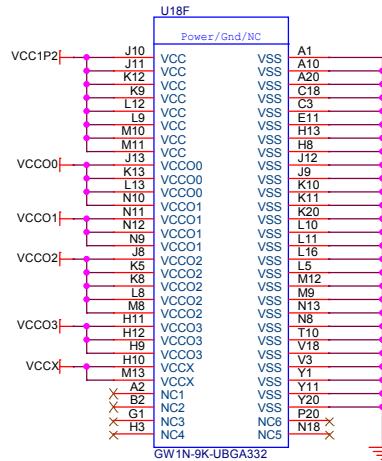
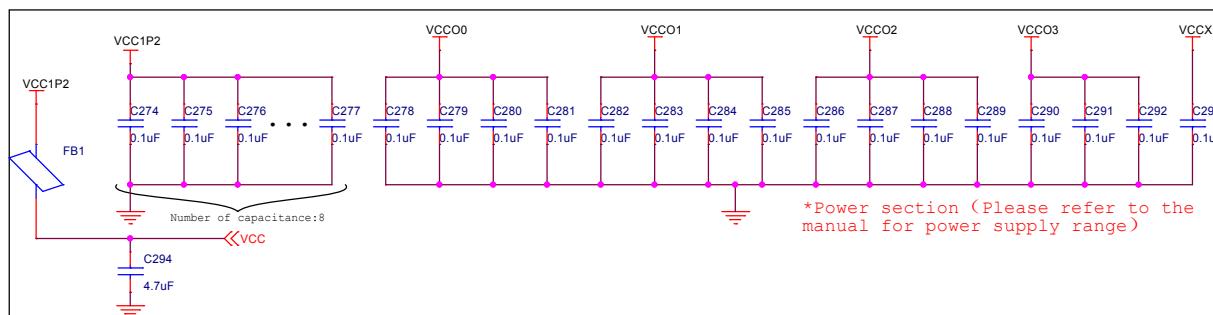
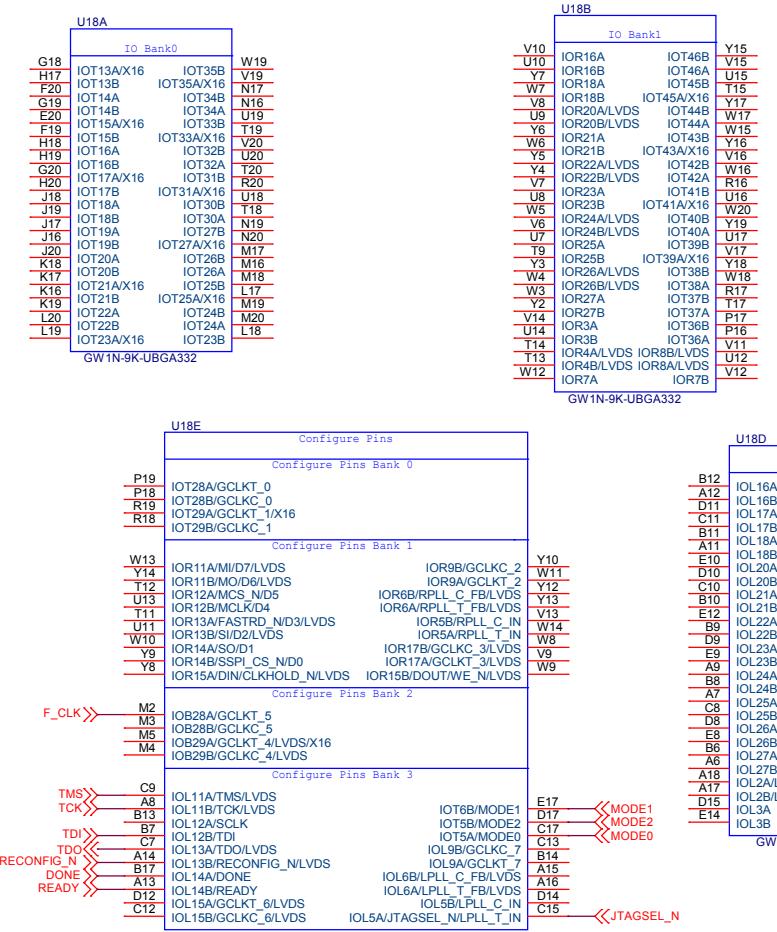
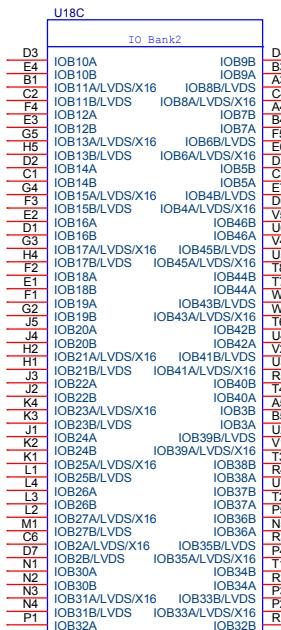


Title GOWIN Minimum System Diagram		
Size A3	Document Number GW1N-LV9-QN48F	Rev 1.0
Date: Thursday, September 30, 2021	Sheet 14 of 18	









JTAGSEL_N >> R158 -> 33

JTAG mode selection signal section

RECONFIG_N << R159 -> 4.7K -> VCC03

***Configuration reset section (low level)**

R160 -> 33 -> MODE0

R161 -> 33 -> MODE1

R162 -> 33 -> MODE2

***Configuration mode signal selection**

TCK << R163 -> 22 -> 1

TDI << R164 -> 22 -> 3

TDO >> R166 -> 22 -> 5

JTAG -> 1 -> 2 -> 4 -> 6 -> 7 -> 8 -> 9 -> 10

C273 -> 10uF -> 6

***JTAG download section**

READY << R168 -> 4.7K -> VCC03

***Configurable detection section**

D13 -> ED -> R169 -> 4.7K -> VCC03

DONE << R169 -> 4.7K -> VCC03

***Configuration completed detection section**

Title		GOWIN Minimum System Diagram	
Size	Document Number	Rev 1.0	
Date: Thursday, September 30, 2021		Sheet 18 of 18	