SCHEMATIC	CONTENT	PAGE
Power	5V, 3.3V, 2.5V, 1.5V, 1.2V, 1.0V, 0.75V	3
Bank Power	Bank 0_1 : ADJ (3.3V, 2.5V)  Bank 2_3 : 3.3V  Bank 4_5_6 : 1.5V  Bank 7 : ADJ (3.3V, 2.5V, 1.2V)	4
Bank0_1	LVDS, GPIO, CLK, LED	5
Bank2	PHY1, JTAG, SMA	6
Bank3	PHY2, Flash, SD Card, MODE, DONE, RECONFIG, READY, RST	7
Bank4_5_6	DDR3, KEY, SW	8
Bank7	GPIO_3.3V, Backup Power	9

Copyright (c) 2018 by Gowin Semiconductor Corporation, Ltd

Title

DK\_START\_GW2A-LV18PG256C8I7

Size
A3

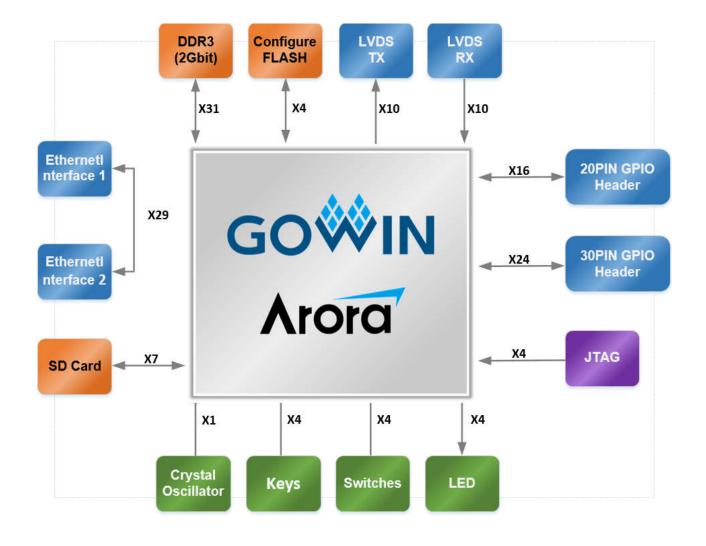
COVER PAGE

Date: Friday, September 07, 2018

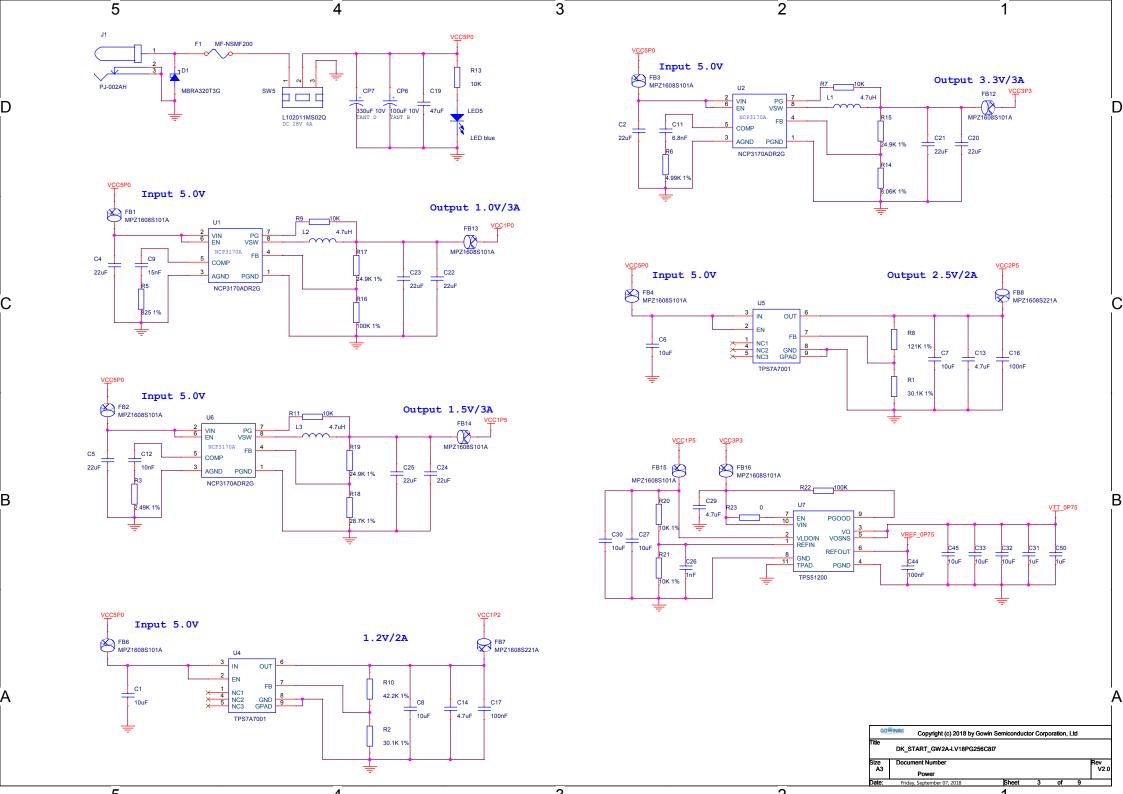
Sheet 1 of 9

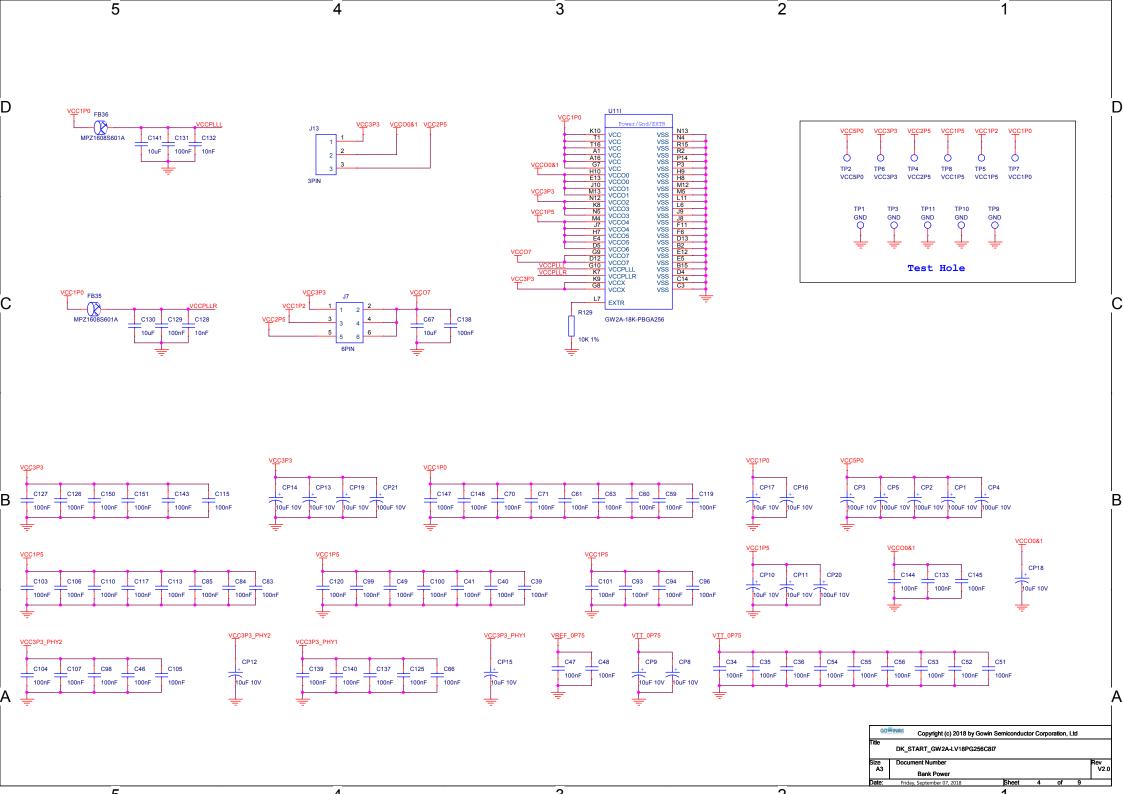
\_\_\_

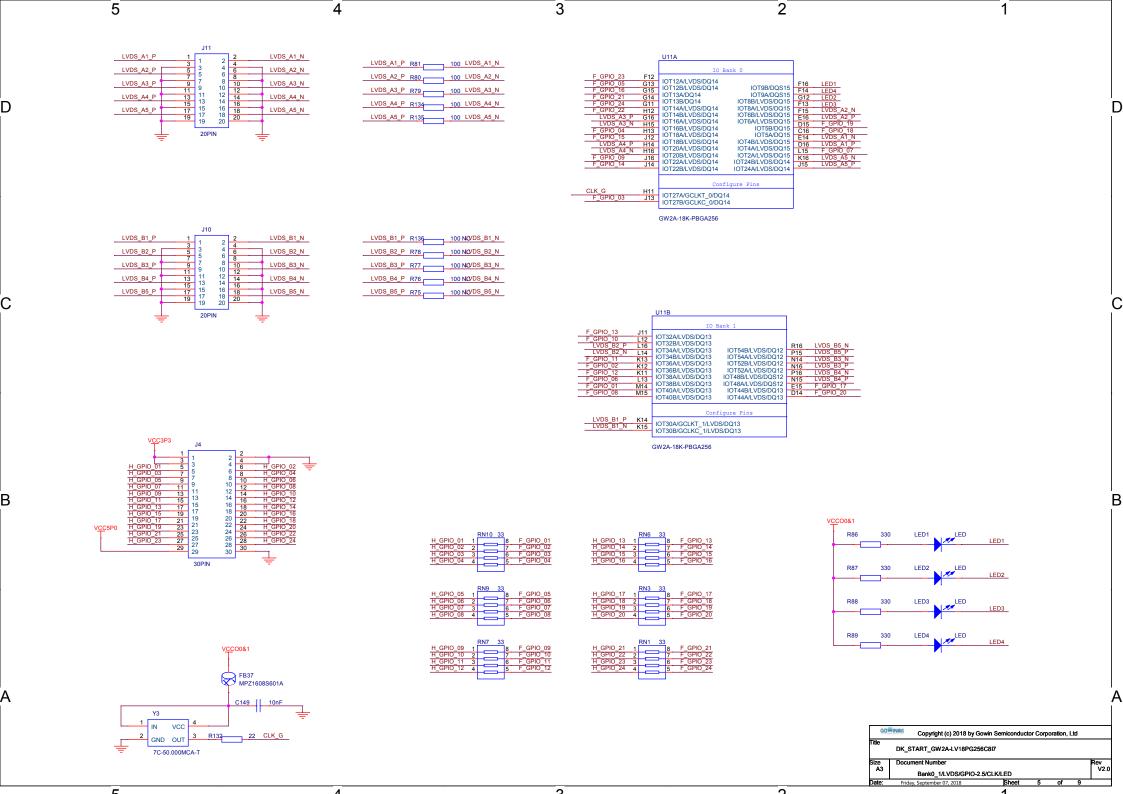
5 4 3

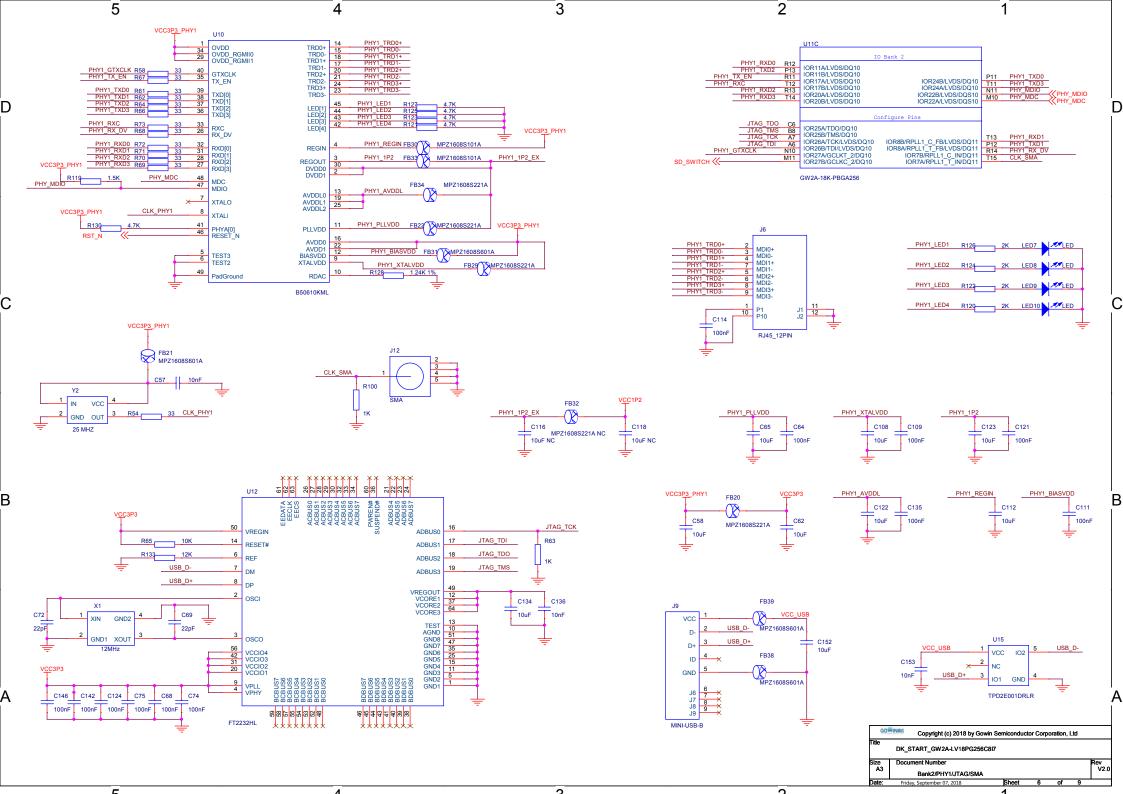


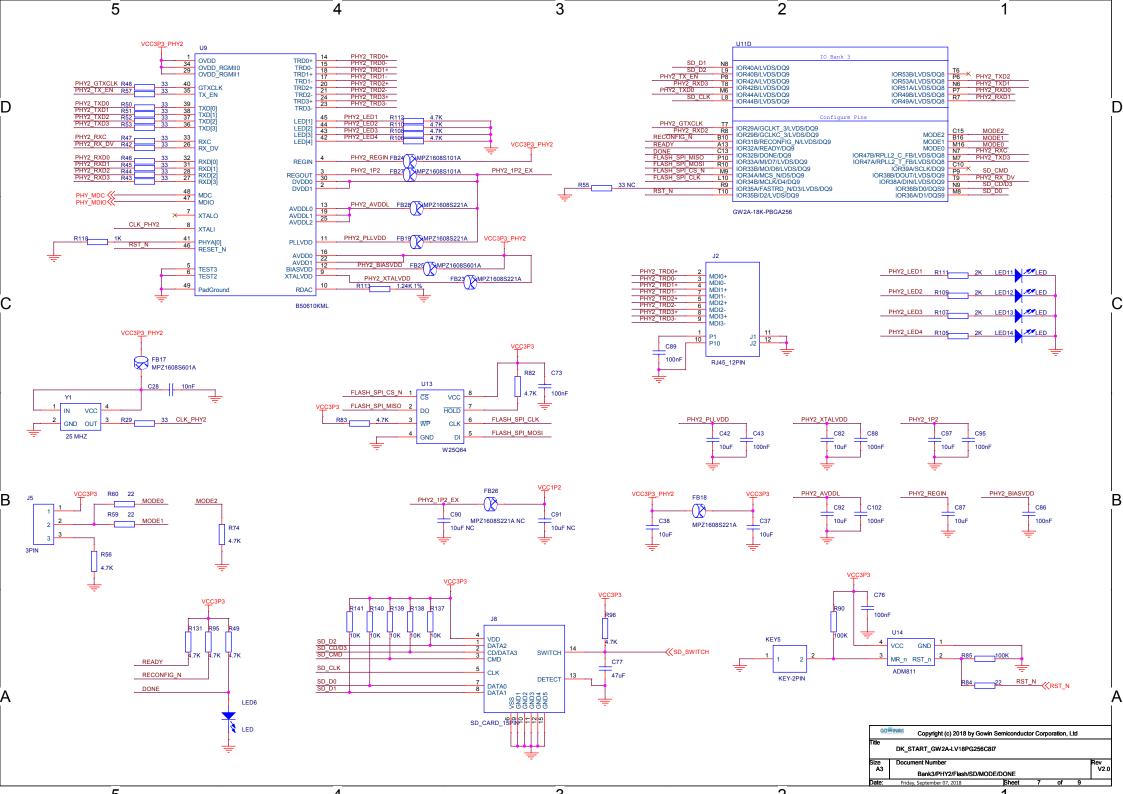
Copyright (c) 2018 by Gowin Semiconductor Corporation, Ltd DK\_START\_GW2A-LV18PG256C8I7 Rev V2.0 Block Diagram

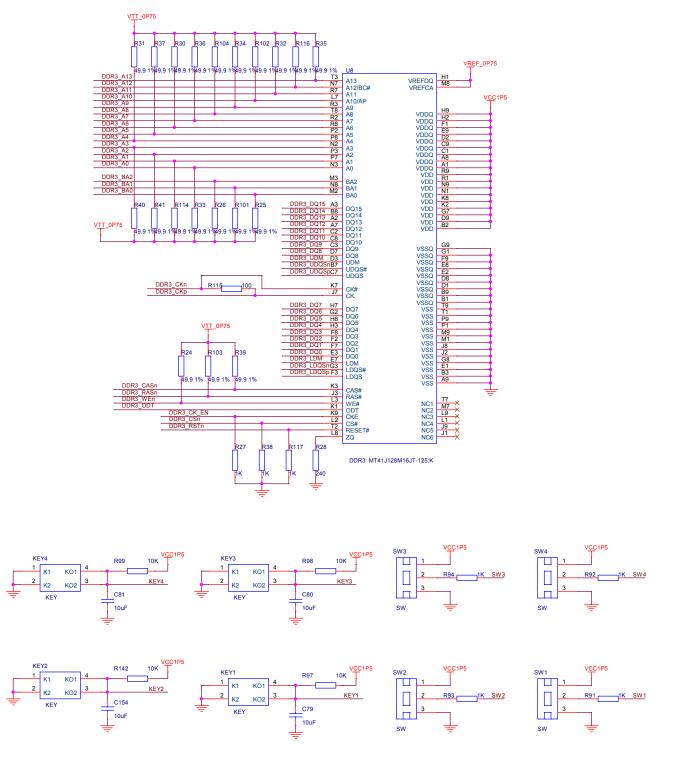


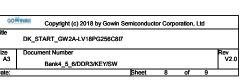


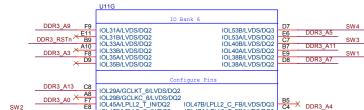


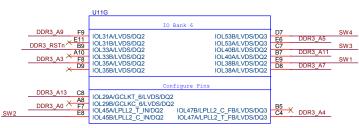


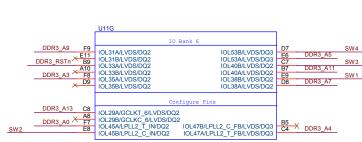












U11E

IOB32A/LVDS/DQ6

IOB34B/LVDS/DQ6

IOB35A/DQ6 IOB35B/DQ6 IOB36A/LVDS/DQ6

IOB37A/DQS6

IOB37B/DQS6

IOB39A/DO6

IOB41A/DQ6

P1 IOB41A/DQ6

U11F

IOB38A/LVDS/DQ6

IOB38B/LVDS/DQ6

IOB40A/I VDS/DQ6

IOB40B/LVDS/DQ6

M1 IOB30A/GCLKT\_4/LVDS/DQ6
IOB30B/GCLKC\_4/LVDS/DQ6

GW2A-18K-PBGA256

IOB12A/LVDS/DQ5

IOB12B/I VDS/DQ5

IOB14A/LVDS/DQ5

IOB16A/LVDS/DQ5

IOB16B/LVDS/DQ5 IOB18A/LVDS/DQ5

IOB20A/I VDS/DQ5

IOB20B/LVDS/DQ5

IOB27A/GCLKT 5/DQ5

GW2A-18K-PBGA256

GW2A-18K-PBGA256

IOB19A/DQ5

H6 IOB22A/LVDS/DQ5 IOB22B/LVDS/DQ5

IOB54B/LVDS/DQ7 R6

IOB45B/DQ6

IOB45A/DQ6

IOB9B/DQS4

IOB9A/DOS4

IOB8B/LVDS/DQ4

IOB8A/LVDS/DQ4 IOB7B/DQ4

IOB7A/DQ4 IOB4B/LVDS/DQ4

IOB4A/LVDS/DQ4

IOB2A/LVDS/DQ4

IOB26A/LVDS/DQ5

IOB24B/LVDS/DQ5 IOB24A/LVDS/DQ5

IOB3B/DQ4

IOB3A/DQ4

IOB3A/DQ4 IOB2B/LVDS/DQ4 A4

| OB43B/DQ6 | Mz | IOB43A/DQ6 | N1 | M3 × DDR3\_DQ8 | M3 × DDR3

IOB54A/LVDS/DQ7 IOB52B/LVDS/DQ7

IOB52A/LVDS/DQ7 IOB50B/LVDS/DQ7

IOB50A/LVDS/DQ7

IOB48B/LVDS/DQS7

IOB48A/LVDS/DQS7

IOR44R/LVDS/DO6

IOB44A/LVDS/DQ6

IOB42B/LVDS/DQ6 IOB42A/LVDS/DQ6

DDR3\_CASn

DDR3\_ODT

DDR3 DQ14

M2 × DDR3\_DQ15

D3 × DDR3\_BA1

A5

IOB2A/LVDS/DQ4 IOB26B/LVDS/DQ5 H4 DDR3\_BA0

→ DDR3\_A8

→ DDR3\_A12

→ DDR3\_A1

D6 × DDR3\_A2

H2 DDR3\_LDM

KEY2

KEY1

H3

DDR3\_CK\_EN J2 | IOB32B/LVDS/DQ6 K1 | IOB34A/LVDS/DQ6

DDR3\_DQ13

DDR3\_BA2 × N1

DDR3\_A10 K3

DDR3\_UDQSp J5 DDR3\_UDQSn K6

DDR3\_DQ9 X K4

DDR3\_UDM × L5

DDR3\_DQ10 × L4

DDR3\_DQ11

DDR3\_WEn

DDR3\_DQ4

DDR3 DQ7 × B3

DDR3\_DQ2 × F2 F4 DDR3\_DQ3 × F3

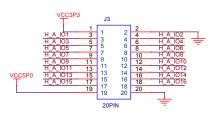
DDR3\_DQ0 G5

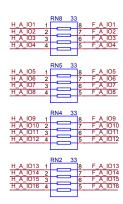
DDR3 DQ5 × C1 IOB13B/DQ5

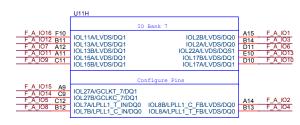
DDR3 LDQSp G2 IOB208/LVDS//
DDR3 LDQSn G3 IOB218/DQS5
DDR3 DQ1 F5 IOB218/DQS5

J3

DDR3\_DQ6 × E1 IOB14A/LVDS/DQ5







GW2A-18K-PBGA256

