

Boot Time Configuration

Name	Chip	Pin	Signal	Pol	Enable	Disable	Description
Serial Enable	U19	AA04	VGPIO1	L	JP1	R58	OFW disables camera port and enables the main processor serial port when enabled at boot time.
Memory ID	U19	AL10	GPIO9	H	R89	R90	When enabled (H), select a CL value of 4 (800MHz DDR2 memory chip). When disabled (L), use a CL value of 3 (600 MHz DDR2 memory chip).
Mem Bus Width (MEM ID 1)	U19	AF10	GPIO14	H	R94	R95	When enabled (H), selects a 32b memory bus (four DRAM chips). When disabled (L), selects a 64b memory bus (eight DRAM chips).
DCON on CRT I2C	U17	126 128	DCONSDATA DCONSCLK		R273 R272	R228 R232	When enabled, the DCON control bus is driven by the VX855 CRT I2C. When disabled, it is driven by the VX855 GPIO0/1.
DCON Display Control	PR114 PU11 PU9 PQ19	1 4 4 2	DBC BACKLIGHT VDDEN VGH_EN		R221 R219 R223 R222	R42 R37 R47 R50	When enabled, the DCON controls these signals. When disabled, they are controlled by the VX855.
CPU Frequency	U22	1 6 12	FSLA FSLB FSLC	H H H	R302 R317 R333	R304 R316 R329	Using [FSLA, FSLB, FSLC], the values are 000 => 266 MHz, 001 => 333 MHz, 010 => 200 MHz, 011 => 400 MHz, 100 => 133 MHz, 101 => 100 MHz , 110 => 166 MHz, 111 => 200 MHz. Only allowed values on CL1B are 101 (100 MHz) and 111 (200 MHz).
FSB Frequency	U19	AM11 AL11 AJ09	GPIO10 GPIO11 GPIO12	H H H	R361 R358 R263	R363 R355 R264	Using GPIO[12, 11, 10], acceptable values are: 000 => 100 MHz, 001 => 133 MHz, 010 => 200 MHz, 011 => 266 MHz, 111 => Auto mode . Other values are reserved.
VX855 Debug Mode	U19	J19	TP2	H	R25	R27	Enables VX855 Debug mode
GTL Pull up	U19	AK10	GPIO13	L	R267	R266	GTL pullups enabled when low
IOQ Depth	U19	AH03	PDA0	L	R46	R35	Enables an IOQ depth of 12 when low
PLL OK Source	U19	AH04	PDA1	H	R45		Enable OK from logic ctr. Always enabled
Debug Mode	U19	AJ10	SPKR/GPO0	H	R86	R87	Enables VX855 debug mode on reset
SPI/LPC ROM	U19	AG10	AZBITCLK	H		R82	Disable (L) selects LPC boot ROM. Enable (H) selects SPI Boot ROM.
System Auto Reboot	U19	AF09	AZSDOUT	L	R73	R72	Enable VX855 watchdog reset when pulled low
LPC FWH Command	U19	AJ07	AZSYNC	L	R78	R77	Enable use of FWH commands when pulled low
IDE Controller	U19	AM06 AK06	MSPISS1 MSPISS0	H H		R270 R54	Using [MSPISS1, MSPISS0], 00 => IDE , 01 => NFC ROM, 10 => CE ATA. Other values reserved
Boot ROM I/F	U19	AJ08	MSPISS2	H		R83	Always low for SPI/LPC ROM
Debug Link	U19	AK08	TDO	H		R269	Pull low to disable Debug, enable SDIO2
PCI Master Mode	U19	AJ03	PDA2	H		R34	
DVP1TVCLKR	U19	Y1	GFRDATA4	L	R67		Via request
Required	U19	AD06	PIXDATA7	L	R69		VX855 datasheet requires this
	U19	AC05	-	L	R75		
	U19	AD03	-	L	R84		
	U19	M28	CKEA0	L	R152		VX855 errata requires this

These are boot options specified by the chip manufacturers. Additional boot options specified by software are specified in the GPIO mapping.

"Pol" indicates the polarity of the boot option. If H, the option is enable when pulled to a high voltage. If L, the option is enabled by pulling to a low voltage. If blank, the option switches between two signal sources.

Enable or Disable resistors indicated in bold are those which are currently populated.