

November 13, 2012

Product Specifications of the RL78/G1C Group of MCUs

Item	Specification			
Group name	RL78/G1C			
Package	32-pin LQFP 32-pin WQFN		48-pin LQFP 48-pin WQFN	
Product name	R5F10JBC	R5F10KBC	R5F10JGC	R5F10KGC
Code flash (Byte)	32K ^{*1}			
Data flash (Byte)	2K			
RAM (Byte)	5.5K			
Main system clock	External main system clock input 1 to 20 MHz: VDD = 2.7 to 5.5 V, 1 to 16 MHz: VDD = 2.4 to 5.5 V High-speed on-chip oscillator clock 1 to 24 MHz: VDD = 2.7 to 5.5 V, 1 to 16 MHz: VDD = 2.4 to 5.5 V PLL clock ^{*2} 6, 12, 24 MHz: VDD = 2.4 to 5.5 V			
Sub system clock	-		32.768 kHz (TYP.): VDD = 2.4 to 5.5 V	
Low-speed on-chip oscillator	15 kHz (TYP.): VDD = 2.4 to 5.5 V			
CPU	RL78 CPU			
I/O	22		38	
Timer	16-bit timer: 4 ch 12-bit interval timer: 1 ch			
8/10-bit A/D converter	8 ch		9 ch	
Serial I/F ^{*3}	CSI: 2 ch / UART: 1 ch / simplified I2C: 2 ch			
I2C bus	1 ch			

Item	Specification			
USB	Host 2 ch or Host 1 ch + Function 1 ch	Function 1 ch	Host 2 ch or Host 1 ch + Function 1 ch	Function 1 ch
External interrupt sources	8		10	
DMA	2 ch			
Key interrupt	-		6	
Other features	Low voltage detection (LVD), power-on reset (POR), safety function		Low voltage detection (LVD), power-on reset (POR), safety function, real-time clock (RTC)	
Power supply voltage	2.4 to 5.5 V			
Operating ambient temperature	-40°C to 85°C, -40°C to 105°C			

*1: Products with up to 128 KB of flash ROM and 64-pin packages are under planning.

*2: During PLL clock 48 MHz operation, the system clock is divided by 2, 4, or 8.

*3: Maximum value when used by itself.