

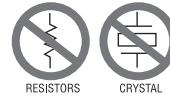
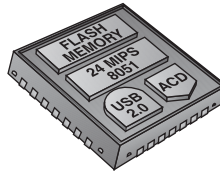
# SILICON LABS Microcontrollers

RoHS Compliant This page of product is compliant.



## USB MICROCONTROLLERS (CONT.)

USB MCUs feature an on-board USB 2.0 function controller with an integrated transceiver and on-chip clock recovery. No external resistors, crystal, voltage regulator, EEPROM or other components are required. On-chip resources include a high-speed 8051 CPU with up to 64 kB Flash, UARTs, SMBus, SPI, timers, counters and PWM generators. On-chip analog features include a multi-channel 10-bit ADC, voltage reference, internal oscillator, comparators and a temperature sensor. Available in 28-pin QFN, 32-pin LQFP or 48-pin TQFP packages, these devices provide a single-chip solution for embedded USB applications.



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For quantities of 100 and up, call for quote.

MOUSER STOCK NO.		Development Kit Part No.	MIPS (Peak)	Flash Mem. (KB)	RAM (bytes)	Digital Port I/O Pins	Serial Buses	Internal Osc	Analog Peripherals	Package	Price Each		
Mfr.	Mfr. Part No.										1	25	50
634	C8051F343-GM	634-C8051F340DK	48	32	2304	25	USB 2.0, UART, I2C, SPI	±1.5%	10-bit ADC, VREF, 2 comparators	QFN 32	8.84	7.37	6.95
634	C8051F343-GQ	634-C8051F340DK	48	32	3328	25	USB 2.0, UART, SMBus, SPI	±1.5%	10-bit ADC, VREF, 2 comparators	LQFP32	8.75	7.43	6.95
634	C8051F344-GQ	634-C8051F340DK	25	64	5376	40	USB 2.0, 2x UART, SMBus, SPI	±1.5%	10-bit ADC, VREF, 2 comparators	TQFP48	9.97	8.47	7.93
634	C8051F345-GQ	634-C8051F340DK	25	32	3328	40	USB 2.0, 2x UART, SMBus, SPI	±1.5%	10-bit ADC, VREF, 2 comparators	TQFP48	8.75	7.43	6.95
634	C8051F346-GM	634-C8051F340DK	25	64	4352	25	USB 2.0, UART, I2C, SPI	±1.5%	10-bit ADC, VREF, 2 comparators	QFN 32	9.64	8.03	7.57
634	C8051F346-GQ	634-C8051F340DK	25	64	5376	25	USB 2.0, UART, SMBus, SPI	±1.5%	10-bit ADC, VREF, 2 comparators	LQFP32	9.53	8.11	7.58
634	C8051F347-GM	634-C8051F340DK	25	32	2304	25	USB 2.0, UART, I2C, SPI	±1.5%	10-bit ADC, VREF, 2 comparators	QFN 32	8.32	6.77	6.39
634	C8051F347-GQ	634-C8051F340DK	25	32	3328	25	USB 2.0, UART, SMBus, SPI	±1.5%	10-bit ADC, VREF, 2 comparators	LQFP32	7.97	6.77	6.33
634	C8051F348-GQ	634-C8051F340DK	25	32	2304	40	I2C, SPI, 2 x UART	±1.5%	-----	TQFP48	8.23	7.06	6.47
634	C8051F349-GM	634-C8051F340DK	25	32	2304	25	USB 2.0, UART, I2C, SPI	±1.5%	VREF, 2 comparators, VREG	QFN 32	7.74	6.30	5.94
634	C8051F349-GQ	634-C8051F340DK	25	32	2304	25	I2C, SPI, 2 x UART	±1.5%	-----	LQFP33	7.93	6.48	5.94
634	C8051F34A-GM	634-C8051F340DK	48	64	4352	25	USB 2.0, 2xUART, I2C, SPI	±1.5%	10-bit ADC, VREF, 2 comparators	LQFP 32	10.37	8.65	8.15
634	C8051F34A-GQ	634-C8051F340DK	48	64	4352	25	USB 2.0 2 x UART I2C, SPI	±1.5%	10-bit, 17ch., 200 kcps ADC	LQFP33	9.88	7.90	7.41
634	C8051F34B-GM	634-C8051F340DK	48	32	2304	25	USB 2.0, 2xUART, I2C, SPI	±1.5%	10-bit ADC, VREF, 2 comparators	LQFP 32	9.01	7.51	7.08
634	C8051F34B-GQ	634-C8051F340DK	48	32	2304	25	USB 2.0, 2 x UART, I2C, SPI	±1.5%	10-bit, 17ch., 200 kcps ADC	LQFP33	8.58	6.86	6.44

## SMALL FORM FACTOR MICROCONTROLLERS

The Small Form Factor family of microcontrollers combines a high-speed 8051 CPU, Flash memory and high-performance analog circuits in remarkably small packages allowing system designers to reduce component count while improving system performance. These highly-integrated devices are optimized for space-constrained, low-power, low-cost applications in consumer, industrial, communications and automotive markets. Development is quick and easy due to low-cost, professional development tools and in-system debug. High integration, small size, high CPU throughput and best-in-class analog peripherals make the Small Form Factor family ideal for a wide range of applications.



RoHS Compliant

For quantities of 1000 and up, call for quote.

MOUSER STOCK NO.		Development Kit Part No.	MIPS (Peak)	Flash Mem. (KB)	RAM (bytes)	Digital Port I/O Pins	Serial Buses	Internal Osc	Analog Peripherals	Package	Price Each		
Mfr.	Mfr. Part No.										1	100	500
634	C8051F206-GQ	634-C8051F206DK	25	8	1280	32	UART, SPI	±20%	12-bit ADC, comparators	TQ48	4.96	3.73	3.56
634	C8051F220-GQ	634-C8051F226DK	25	8	256	32	UART, SPI	±20%	8-bit ADC, comparators	TQ48	4.32	3.09	2.93
634	C8051F221-GQ	634-C8051F226DK	25	8	256	22	UART, SPI	±20%	8-bit ADC, comparators	TQ32	3.85	2.75	2.61
634	C8051F226-GQ	634-C8051F226DK	25	8	1280	32	UART, SPI	±20%	8-bit ADC, comparators	TQ48	4.56	3.26	3.10
634	C8051F230-GQ	634-C8051F226DK	25	8	256	32	UART, SPI	±20%	2 comparators	TQ48	4.06	2.90	2.77
634	C8051F231-GQ	634-C8051F226DK	25	8	256	22	UART, SPI	±20%	2 comparators	TQ32	3.66	2.61	2.49
634	C8051F236-GQ	634-C8051F300DK	25	8	1280	32	UART, SPI	±20%	2 comparators	TQ48	4.24	3.03	2.89
634	C8051F300-GM	634-C8051F300DK	25	8	256	8	UART, SMBus	±2%	8-bit ADC, comparator	QFN11	3.06	2.04	1.97
634	C8051F301-GM	634-C8051F300DK	25	8	256	8	UART, SMBus	±2%	comparator	MLP11	2.82	2.01	1.91
634	C8051F302-GM	634-C8051F300DK	25	8	256	8	UART, SMBus	±20%	8-bit ADC, comparator	MLP11	2.76	1.96	1.87
634	C8051F303-GM	634-C8051F300DK	25	8	256	8	UART, SMBus	±20%	comparator	MLP11	2.65	1.90	1.80
634	C8051F304-GM	634-C8051F300DK	25	4	256	8	UART, SMBus	±20%	comparator	MLP11	2.35	1.68	1.60
634	C8051F305-GM	634-C8051F300DK	25	2	256	8	UART, SMBus	±20%	comparator	MLP11	2.30	1.64	1.56
634	C8051F310-GQ	634-C8051F310DK	25	16	1280	29	UART, SMBus, SPI	±2%	10-bit ADC, comparators	LQ32	5.92	4.05	3.86
634	C8051F311-GM	634-C8051F310DK	25	16	1280	25	UART, SMBus, SPI	±2%	10-bit ADC, comparators	MLP28	5.25	3.61	3.44
634	C8051F312-GQ	634-C8051F310DK	25	8	1280	29	UART, SMBus, SPI	±2%	10-bit, 21Ch, 200kspcs ADC	LQFP32	4.57	3.15	2.99
634	C8051F313-GM	634-C8051F310DK	25	8	1280	25	UART, SMBus, SPI	±2%	10-bit, 17Ch, 200kspcs ADC	QFN28	4.24	2.92	2.78
634	C8051F314-GQ	634-C8051F310DK	25	8	1280	29	UART, SMBus, SPI	±2%	-----	LQFP32	3.85	2.64	2.52
634	C8051F315-GM	634-C8051F310DK	25	8	1280	25	UART, SMBus, SPI	±2%	-----	QFN28	3.58	2.47	2.34
634	C8051F316-GM	634-C8051F310DK	25	16	1280	21	UART, SMBus, SPI	±2%	10-bit, 13Ch, 200kspcs, compts	QFN24	4.48	3.26	3.10
634	C8051F317-GM	634-C8051F310DK	25	16	1280	21	UART, SMBus, SPI	±2%	2 comparators	QFN24	3.97	2.89	2.75
634	C8051F330-GM	634-C8051F330DK	25	8	768	17	UART, SMBus, SPI	±2%	10-bit ADC, 10-bit DAC	MLP20	4.40	3.02	2.88
634	C8051F330-GP	634-C8051F330DK	25	8	768	17	UART, SMBus, SPI	±2%	10-bit, 16Ch, 200kspcs	DIP20	4.91	3.31	3.15
634	C8051F331-GM	634-C8051F330DK	25	8	768	17	UART, SMBus, SPI	±2%	10-bit ADC, 10-bit DAC	MLP20	3.91	2.69	2.56
634	C8051F332-GM	634-C8051F330DK	25	4	768	17	UART, SMBus, SPI	±2%	VREF, comparator	QFN20	3.25	2.24	2.13
634	C8051F333-GM	634-C8051F330DK	25	4	768	17	UART, SMBus, SPI	±2%	comparator	QFN20	2.98	2.04	1.95
634	C8051F334-GM	634-C8051F330DK	25	2	768	17	UART, SMBus, SPI	±2%	VREF, comparator	QFN20	2.76	1.90	1.81
634	C8051F335-GM	634-C8051F330DK	25	2	768	17	UART, SMBus, SPI	±2%	comparator	QFN20	2.47	1.69	1.61
634	C8051F336-GM	634-C8051F336DK	25	16 kB	768	17	UART, I2C, SPI	±2%	10-bit, 16ch, 200 kspcs ADC, 10-bit DAC	QFN20	5.13	3.50	3.36
634	C8051F337-GM	634-C8051F336DK	25	16 kB	768	17	UART, I2C, SPI	±2%	-	QFN20	4.36	2.97	2.85
634	C8051F338-GM	634-C8051F336DK	25	16 kB	768	21	UART, I2C, SPI	±2%	10-bit, 16ch, 200 kspcs ADC, 10-bit DAC	QFN24	5.33	3.56	3.32
634	C8051F339-GM	634-C8051F336DK	25	16 kB	768	21	UART, I2C, SPI	±2%	-	QFN24	4.50	3.00	2.80
634	C8051F360-GQ	634-C8051F360DK	100	32	1280	39	UART, SMBus, SPI	±2%	10-bit ADC, 10-bit DAC, 16x16 MAC	TQFP48	9.38	6.51	6.25
634	C8051F361-GQ	634-C8051F360DK	100	32	1280	27	UART, SMBus, SPI	±2%	10-bit ADC, 10-bit DAC, 16x16 MAC	LQFP32	8.88	6.05	5.88
634	C8051F362-GM	634-C8051F360DK	100	32	1280	24	UART, SMBus, SPI	±2%	10-bit ADC, 10-bit DAC, 16x16 MAC	QFN28	7.35	5.10	4.90
634	C8051F363-GQ	634-C8051F360DK	100	32 kB	1280	39	UART, I2C, SPI	±2%	2 Comparators, 16x16 MAC	TQFP48	7.79	5.57	5.34
634	C8051F364-GQ	634-C8051F360DK	100	32 kB	1280	27	UART, I2C, SPI	±2%	2 Comparators, 16x16 MAC	LQFP32	7.41	5.30	5.08
634	C8051F365-GM	634-C8051F360DK	100	32 kB	1280	24	UART, I2C, SPI	±2%	2 Comparators, 16x16 MAC	QFN28	6.43	4.59	4.41
634	C8051F366-GQ	634-C8051F360DK	50	32 kB	1280	29	UART, I2C, SPI	±2%	10-bit ADC/DAC, Temp Snsr, COMP., VREF, MAC	LQFP32	7.10	5.07	4.87
634	C8051F367-GM	634-C8051F360DK	50	32 kB	1280	25	UART, I2C, SPI	±2%	10-bit ADC/DAC, Temp Snsr, COMP., VREF, MAC	QFN28	6.13	4.38	4.20
634	C8051F368-GQ	634-C8051F360DK	50	16 kB	1280	29	UART, I2C, SPI	±2%	10-bit ADC/DAC, Temp Snsr, COMP., VREF, MAC	LQFP32	6.76	4.83	4.64
634	C8051F369-GM	634-C8051F360DK	50	16 kB	1280	25	UART, I2C, SPI	±2%	10-bit ADC/DAC, Temp Snsr, COMP., VREF, MAC	QFN28	5.86	4.19	4.02
634	C8051F410-GQ	634-C8051F410DK	50	32	2304	24	UART, SMBus, SPI	±2%	12-bit, 20Ch, 200kspcs	LQFP32	8.20	5.79	5.12
634	C8051F411-GM	634-C8051F410DK	50	32	2304	20	UART, SMBus, SPI	±2%	12-bit, 20Ch, 200kspcs	QFN28	6.46	4.45	4.11
634	C8051F412-GQ	634-C8051F410DK	50	16	1280	24	UART, SMBus, SPI	±2%	12-bit, 20Ch, 200kspcs	LQFP32	7.21	5.13	4.72
634	C8051F413-GM	634-C8051F410DK	50	16	1280	20	UART, SMBus, SPI	±2%	12-bit, 20Ch, 200kspcs	QFN28	5.95	4.24	3.90

