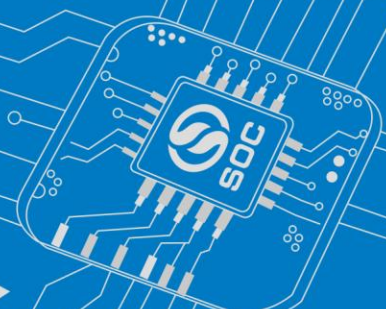




SinOne MCU Series

Product Selection Guide

- 8-bit MCU
 - 32-bit MCU
 - Efficient Ecosystems
- 
- A detailed illustration of a microcontroller chip with the 'SOC' logo on its surface, surrounded by a complex network of white circuit traces and connection points on a blue background.

SHIV ELECTRONICS

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About US

Introduction

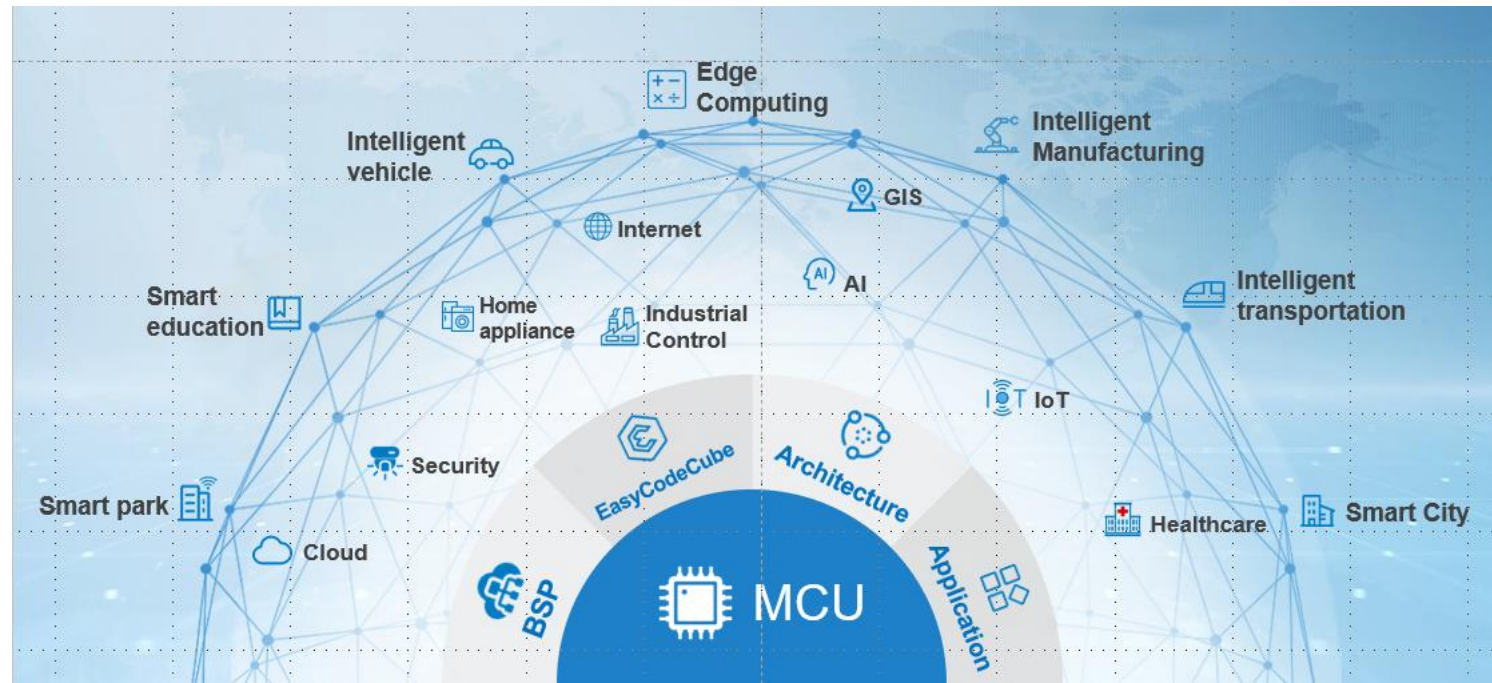
Shenzhen SinOne Microelectronics Co., Ltd. (Known as SinOne) is a high-tech company, which was established in January, 2011. SinOne has professional technical team which has 20-year experience, mainly focusing on Flash MCU IC design.

SinOne has established systematic MCU platform including 8bit and 32bit MCUs and provides hundreds of touch key (TK) and general-purpose (GP) products with fully compatible pins, which have been widely used in home appliances, industrial control, consumer electronics, smart home, IOT, security and other fields.

SinOne has developed software platform over excellent products, EasyCodeCube supports process scheme programming and graphical development environment, which actually achieved accessible and high-efficiency development for MCU. EasyCodeCube integrates development controls of IOT allows no-experience engineers complete a device and connect the cloud in 5 minutes helping traditional enterprise intelligence.

Vision

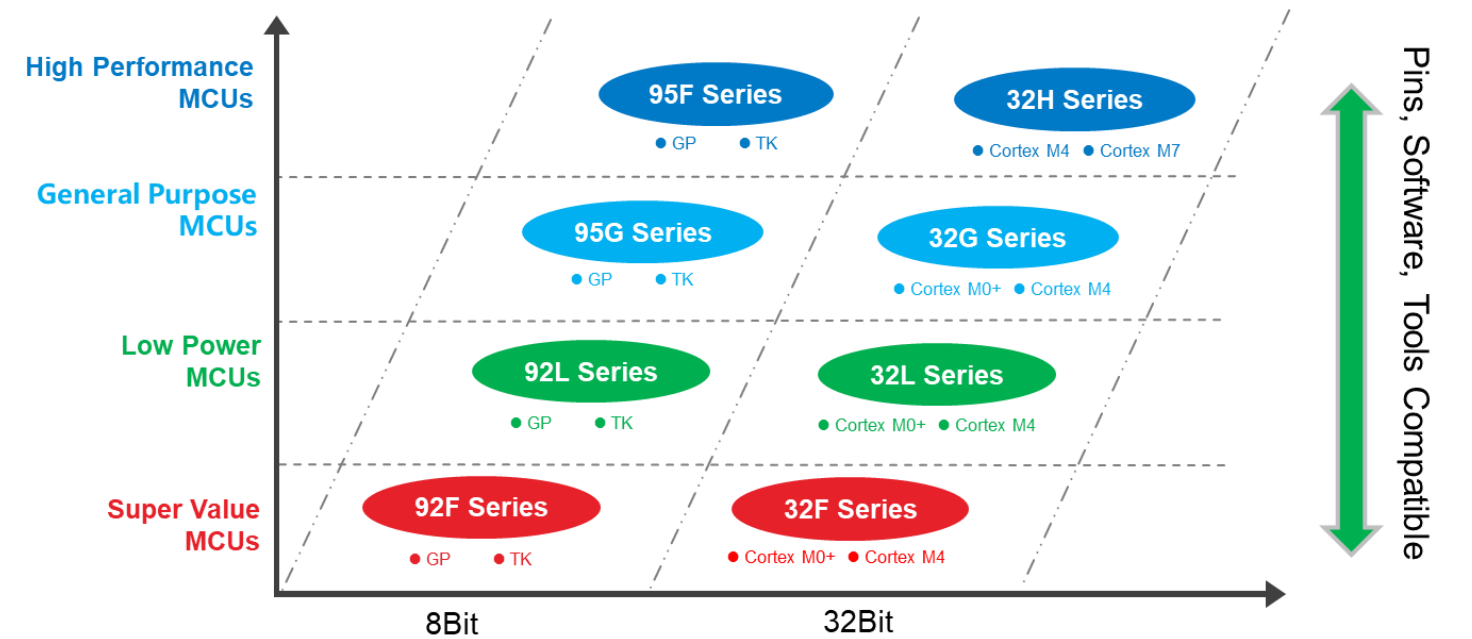
SinOne technology, enlightening the life



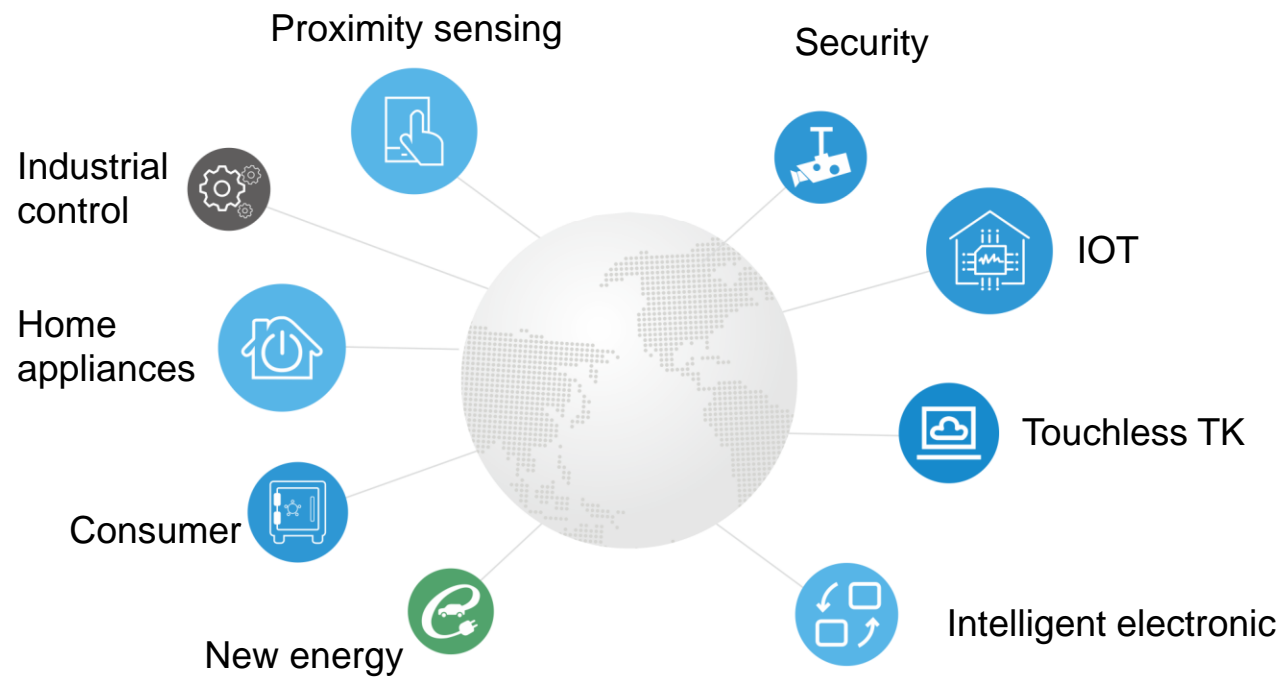
Product line

MCU Platform

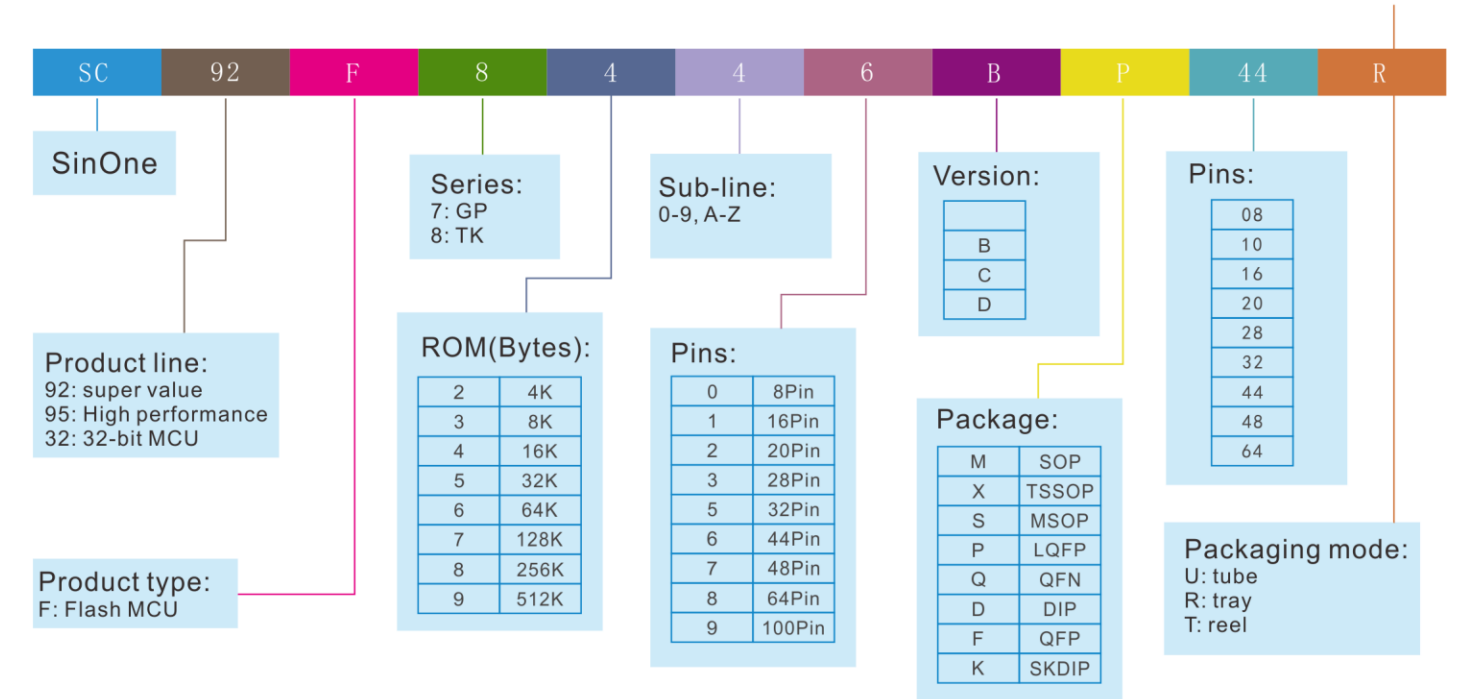
* 2 lines, 8 Series, Pins Compatible



Application Area



Naming rules



Products platform



High performance series

SC95F Series, super high-speed 1T 8051

➤ Main Specification

- Enhanced 1T 8051 core, running up to 32MHz, single cycle instruction, equivalent to Normal 1T 8051 core running at 64MHz
- Up to 128K Bytes Flash ROM and 8K Bytes SRAM
- 2.0-5.5V voltage range and -40-105°C temperature range.
- Up to 17 channels of 1Msps 12bits ADC with 1.024/2.048V reference voltage
- 16*16bits or 32/16bits hardware multiplier/divider, support dual DPTR
- Rich interfaces with one UART and up to 5 USCIs (UART/IIC/SPI)
- Up to 31 channels touch circuits applied in TK, Proximity Sensing, Matrix buttons and other innovative applications
- High security with 96bits UID and User ID

➤ Key Features

1) General Purpose

Frequency up to 32MHz, 2.0-5.5V operating voltage, -40°C to 105°C operating temperature, 1Msps 12-bit ADC, rich interface resource, large memories and high security

2) Touch key

High SNR (>100) and resolution(0.1pF),
High-sensitivity with adaptive algorithm, can be debugged within 5 minutes
Low power, strong anti-interference and multiple derivative applications

3) Proximity Sensing Series

Sensing distance up to 30cm (Lab data)
Two/three-dimensional sensing capability
Strong anti-interference and excellent ability of small signal processing

4) Motor control

Built-in BLDC controlling hardware, 2 channels OPAs and 1 channel CMP
1Msps 12-bit ADC and 6 channels complementary PWM with programmable inserted dead-times
Frequency up to 32MHz with high speed and high efficiency

Target Application: Home Appliances, Industrial Control, Motor Driver, Internet of Things (IOT), Medical Treatment, Wearable Equipment, Consumer Electronics, Security and other application fields.

➤ Roadmap of SC95F series

95F7 High Performance GP MCUs

ROM/RAM Size	SOP8 MSOP10	SOP16	SOP20 TSSOP20 QFN20	SOP28 TSSOP28 QFN28	QFN32 LQFP32 (7*7mm)	LQFP44 (10*10mm)	QFN48 LQFP48 (7*7mm)
128K/8K			95F7762	95F7763	95F7765	95F7766	95F7767
64K/8K			95F7612B	95F7613B	95F7615B	95F7616B	95F7617B
64K/4K		95F7671	95F7672	95F7673	95F7675		
64K/4K		95F7601	95F7602	95F7603			
32K/4K		95F7571	95F7572	95F7573	95F7575		
32K/4K	95F7520	95F7521	95F7522	95F7523			
32K/4K		95F7501	95F7502	95F7503			
	SOP8 MSOP10	SOP16	SOP20 TSSOP20 QFN20	SOP28 TSSOP28 QFN28	QFN32 LQFP32 (7*7mm)	LQFP44 (10*10mm)	QFN48 LQFP48 (7*7mm)

Pin Count →

95F8 High Performance TK MCUs

ROM/RAM Size	SOP8 MSOP10	SOP16	SOP20 TSSOP20 QFN20	SOP28 TSSOP28 QFN28	QFN32 LQFP32 (7*7mm)	LQFP44 (10*10mm)	QFN48 LQFP48 (7*7mm)
128K/8K			95F8762	95F8763	95F8765	95F8766	95F8767
64K/8K			95F8612B	95F8613B	95F8615B	95F8616B	95F8617B
64K/4K		95F8671	95F8672	95F8673	95F8675		
32K/4K		95F8571	95F8572	95F8573	95F8575		
32K/4K	95F8520	95F8521	95F8522	95F8523			
	SOP8 MSOP10	SOP16	SOP20 TSSOP20 QFN20	SOP28 TSSOP28 QFN28	QFN32 LQFP32 (7*7mm)	LQFP44 (10*10mm)	QFN48 LQFP48 (7*7mm)

Pin Count →

SC95F7 High Performance GP MCUs

Series	PKG Type	P/N	Flash ROM	IAP(100K)	BootLoader	RAM (Bytes)	Voltage (V)	2%IRC MHz 32K Autocorrection	Ipd (uA)	UART	USCI (UART/SPI/IIC)	LCD/LED	EXT Crystal	ADC	PWM (with dead-time insertion)	CMP
752	MSOP10/SOP8	SC95F7520	32KB	0/1/2/32KB	1K	4KB	2.0-5.5	32/16/8/4 24/12/6/3	2.5	1	1	-	-	12bit*3ch	16bit*1ch	-
	SOP16	SC95F7521	32KB	0/1/2/32KB	1K	4KB	2.0-5.5	32/16/8/4 24/12/6/3	2.5	1	2	-	-	12bit*6ch	16bit*5ch	-
	SOP20/ TSSOP20/QFN20	SC95F7522	32KB	0/1/2/32KB	1K	4KB	2.0-5.5	32/16/8/4 24/12/6/3	2.5	1	3	-	-	12bit*7ch	16bit*8ch	-
	SOP28 / TSSOP28/QFN28	SC95F7523	32KB	0/1/2/32KB	1K	4KB	2.0-5.5	32/16/8/4 24/12/6/3	2.5	1	3	-	32K	12bit*11ch	16bit*8ch	-
750	SOP16	SC95F7501	32KB	0/1/2/32KB	0/1/2/4K	4KB	2.0-5.5	32/16/8/4	2.5	1	2	-	-	12bit*8ch	12bit*5ch	-
	SOP20/ TSSOP20/QFN20	SC95F7502	32KB	0/1/2/32KB	0/1/2/4K	4KB	2.0-5.5	32/16/8/4	2.5	1	3	-	-	12bit*9ch	12bit*6ch	-
	SOP28 / TSSOP28/QFN28	SC95F7503	32KB	0/1/2/32KB	0/1/2/4K	4KB	2.0-5.5	32/16/8/4	2.5	1	3	-	2-16M	12bit*13ch	12bit*8ch	-
757	SOP16	SC95F7571	32KB	0/1/2/32KB	0/1/2/4K	4KB	2.0-5.5	32/16/8/4	2.5	1	2	-	-	12bit*8ch	12bit*5ch	-
	SOP20/ TSSOP20/QFN20	SC95F7572	32KB	0/1/2/32KB	0/1/2/4K	4KB	2.0-5.5	32/16/8/4	2.5	1	3	-	-	12bit*9ch	12bit*6ch	-
	SOP28 / TSSOP28/QFN28	SC95F7573	32KB	0/1/2/32KB	0/1/2/4K	4KB	2.0-5.5	32/16/8/4	2.5	1	3	-	2-16M	12bit*13ch	12bit*8ch	-
	LQFP32/QFN32	SC95F7575	32KB	0/1/2/32KB	0/1/2/4K	4KB	2.0-5.5	32/16/8/4	2.5	1	3	-	2-16M	12bit*13ch	12bit*8ch	-
760	SOP16	SC95F7601	64KB	0/1/2/32KB	0/1/2/4K	4KB	2.0-5.5	32/16/8/4	2.5	1	2	-	-	12bit*8ch	12bit*5ch	-
	SOP20/ TSSOP20/QFN20	SC95F7602	64KB	0/1/2/32KB	0/1/2/4K	4KB	2.0-5.5	32/16/8/4	2.5	1	3	-	-	12bit*9ch	12bit*6ch	-
	SOP28 / TSSOP28/QFN28	SC95F7603	64KB	0/1/2/32KB	0/1/2/4K	4KB	2.0-5.5	32/16/8/4	2.5	1	3	-	2-16M	12bit*13ch	12bit*8ch	-
767	SOP16	SC95F7671	64KB	0/1/2/64KB	0/1/2/4K	4KB	2.0-5.5	32/16/8/4	2.5	1	2	-	-	12bit*8ch	12bit*5ch	-
	SOP20/ TSSOP20/QFN20	SC95F7672	64KB	0/1/2/64KB	0/1/2/4K	4KB	2.0-5.5	32/16/8/4	2.5	1	3	-	-	12bit*9ch	12bit*6ch	-
	SOP28 / TSSOP28/QFN28	SC95F7673	64KB	0/1/2/64KB	0/1/2/4K	4KB	2.0-5.5	32/16/8/4	2.5	1	3	-	2-16M	12bit*13ch	12bit*8ch	-
	LQFP32/QFN32	SC95F7675	64KB	0/1/2/64KB	0/1/2/4K	4KB	2.0-5.5	32/16/8/4	2.5	1	3	-	2-16M	12bit*13ch	12bit*8ch	-
761B	SOP20/TSSOP20/QFN20	SC95F7612B	64KB	0/1/2/64KB	0/1/2/4K	8KB	2.0-5.5	32/16/8/4	2.5	1	2	-	-	12bit*9ch	16bit*6ch	Y
	SOP28/TSSOP28	SC95F7613B	64KB	0/1/2/64KB	0/1/2/4K	8KB	2.0-5.5	32/16/8/4	2.5	1	4	4*16	-	12bit*9ch	16bit*8ch	Y
	LQFP32/QFN32	SC95F7615B	64KB	0/1/2/64KB	0/1/2/4K	8KB	2.0-5.5	32/16/8/4	2.5	1	4	4*16	32K	12bit*9ch	16bit*12ch	Y
	LQFP44	SC95F7616B	64KB	0/1/2/64KB	0/1/2/4K	8KB	2.0-5.5	32/16/8/4	2.5	1	5	8*24/6*26/5*27/4*28	32K	12bit*17ch	16bit*14ch	Y
	LQFP48/QFN48	SC95F7617B	64KB	0/1/2/64KB	0/1/2/4K	8KB	2.0-5.5	32/16/8/4	2.5	1	6	8*28/6*26/5*27/4*28	32K	12bit*17ch	16bit*14ch	Y
776	SOP20/TSSOP20/QFN20	SC95F7762	128KB	0/1/2/128KB	0/1/2/4K	8KB	2.0-5.5	32/16/8/4	2.5	1	2	-	-	12bit*9ch	16bit*6ch	Y
	SOP28/TSSOP28	SC95F7763	128KB	0/1/2/128KB	0/1/2/4K	8KB	2.0-5.5	32/16/8/4	2.5	1	4	4*16	-	12bit*9ch	16bit*8ch	Y
	LQFP32/QFN32	SC95F7765	128KB	0/1/2/128KB	0/1/2/4K	8KB	2.0-5.5	32/16/8/4	2.5	1	4	4*16	32K	12bit*9ch	16bit*12ch	Y
	LQFP44	SC95F7766	128KB	0/1/2/128KB	0/1/2/4K	8KB	2.0-5.5	32/16/8/4	2.5	1	5	8*24/6*26/5*27/4*28	32K	12bit*17ch	16bit*14ch	Y
	LQFP48/QFN48	SC95F7767	128KB	0/1/2/128KB	0/1/2/4K	8KB	2.0-5.5	32/16/8/4	2.5	1	6	8*28/6*26/5*27/4*28	32K	12bit*17ch	16bit*14ch	Y

SC95FW High Performance Multiple-PWM Flash MCUs

Series	PKG Type	P/N	Flash ROM	IAP(100K)	BootLoader	RAM (Bytes)	Voltage (V)	2%IRC MHz 32K Autocorrection	Ipd (uA)	UART	USCI (UART/SPI/IIC)	LCD/LED	EXT Crystal	ADC	PWM (with dead-time insertion)	CMP
95FW	TSSOP20	SC95FW16	64KB	1/2/4/64KB	1K	4KB	2.0-5.5	32/16/8/4	2.5	1	3	-	-	12bit*8ch	12bit*16ch	Y
	TSSOP28	SC95FW24	64KB	1/2/4/64KB	1K	4KB	2.0-5.5	32/16/8/4	2.5	1	3	-	-	12bit*8ch	12bit*24ch	Y
	LQFP48	SC95FW40	64KB	1/2/4/64KB	1K	4KB	2.0-5.5	32/16/8/4	2.5	1	3	-	-	12bit*16ch	12bit*40ch	Y

SC95F8 High Performance TK MCUs

Series	PKG Type	P/N	Flash ROM	IAP(100K)	BootLoader	RAM (Bytes)	Voltage (V)	2%IRC MHz 32K Autocorrection	TK Channels (Max)	ADC	PWM (with dead-time insertion)	LCD/LED	UART	USCI (UART/SPI/IIC)	TK Application Type	Touch Key Performance
852	MSOP10/SOP8	SC95F8520	32KB	0/1/2/32KB	1K	4KB	2.0-5.5	32/16/8/4	7/5	12bit*3ch	16bit*1ch	-	1	1	Spring Buttons Touchless Buttons Proximity Sensing Full touch ITO LCD Matrix buttons	10V dynamic CS EFT 4KV
	SOP16	SC95F8521	32KB	0/1/2/32KB	1K	4KB	2.0-5.5	32/16/8/4	13	12bit*6ch	16bit*5ch	-	1	2		
	SOP20/ TSSOP20/QFN20	SC95F8522	32KB	0/1/2/32KB	1K	4KB	2.0-5.5	32/16/8/4	17	12bit*7ch	16bit*8ch	-	1	3		
	SOP28 / TSSOP28/QFN28	SC95F8523	32KB	0/1/2/32KB	1K	4KB	2.0-5.5	32/16/8/4	23	12bit*11ch	16bit*8ch	-	1	3		
857	SOP16	SC95F8571	32KB	0/1/2/32KB	0/1/2/4K	4KB	2.0-5.5	32/16/8/4	13	12bit*8ch	16bit*5ch	-	1	2		
	SOP20/ TSSOP20/QFN20	SC95F8572	32KB	0/1/2/32KB	0/1/2/4K	4KB	2.0-5.5	32/16/8/4	17	12bit*9ch	16bit*8ch	-	1	3		
	SOP28 / TSSOP28/QFN28	SC95F8573	32KB	0/1/2/32KB	0/1/2/4K	4KB	2.0-5.5	32/16/8/4	23	12bit*13ch	16bit*8ch	-	1	3		
	LQFP32/QFN32	SC95F8575	32KB	0/1/2/32KB	0/1/2/4K	4KB	2.0-5.5	32/16/8/4	27	12bit*13ch	16bit*8ch	-	1	3		
867	SOP16	SC95F8671	64KB	0/1/2/64KB	0/1/2/4K	4KB	2.0-5.5	32/16/8/4	13	12bit*8ch	16bit*5ch	-	1	2		
	SOP20/ TSSOP20/QFN20	SC95F8672	64KB	0/1/2/64KB	0/1/2/4K	4KB	2.0-5.5	32/16/8/4	17	12bit*9ch	16bit*8ch	-	1	3		
	SOP28 / TSSOP28/QFN28	SC95F8673	64KB	0/1/2/64KB	0/1/2/4K	4KB	2.0-5.5	32/16/8/4	23	12bit*13ch	16bit*8ch	-	1	3		
	LQFP32/QFN32	SC95F8675	64KB	0/1/2/64KB	0/1/2/4K	4KB	2.0-5.5	32/16/8/4	27	12bit*13ch	16bit*8ch	-	1	3		
861B	SOP20/TSSOP20/QFN20	SC95F8612B	64KB	0/1/2/64KB	0/1/2/4K	8KB	2.0-5.5	32/16/8/4	13	12bit*9ch	16bit*6ch	-	1	2		
	SOP28/TSSOP28	SC95F8613B	64KB	0/1/2/64KB	0/1/2/4K	8KB	2.0-5.5	32/16/8/4	19	12bit*9ch	16bit*8ch	4*16	1	4		
	LQFP32/QFN32	SC95F8615B	64KB	0/1/2/64KB	0/1/2/4K	8KB	2.0-5.5	32/16/8/4	19	12bit*9ch	16bit*12ch	4*16	1	4		
	LQFP44	SC95F8616B	64KB	0/1/2/64KB	0/1/2/4K	8KB	2.0-5.5	32/16/8/4	31	12bit*17ch	16bit*14ch	8*24/6*26/5*27/4*28	1	5		
	LQFP48/QFN48	SC95F8617B	64KB	0/1/2/64KB	0/1/2/4K	8KB	2.0-5.5	32/16/8/4	31	12bit*17ch	16bit*14ch	8*28/6*26/5*27/4*28	1	6		
876 (Upcoming)	SOP20/TSSOP20/QFN20	SC95F8762	128KB	0/1/2/128KB	0/1/2/4K	8KB	2.0-5.5	32/16/8/4	13	12bit*9ch	16bit*6ch	-	1	2		
	SOP28/TSSOP28	SC95F8763	128KB	0/1/2/128KB	0/1/2/4K	8KB	2.0-5.5	32/16/8/4	19	12bit*9ch	16bit*8ch	4*16	1	4		
	LQFP32/QFN32	SC95F8765	128KB	0/1/2/128KB	0/1/2/4K	8KB	2.0-5.5	32/16/8/4	19	12bit*9ch	16bit*12ch	4*16	1	4		
	LQFP44	SC95F8766	128KB	0/1/2/128KB	0/1/2/4K	8KB	2.0-5.5	32/16/8/4	31	12bit*17ch	16bit*14ch	8*24/6*26/5*27/4*28	1	5		
	LQFP48/QFN48	SC95F8767	128KB	0/1/2/128KB	0/1/2/4K	8KB	2.0-5.5	32/16/8/4	31	12bit*17ch	16bit*14ch	8*28/6*26/5*27/4*28	1	6		

Proximity Sensing Flash MCUs

Series	PKG Type	P/N	Flash ROM	IAP(100K)	BootLoader	RAM(Bytes)	Voltage (V)	2%IRC MHz 32K Autocorrection	TK channels (Max)	ADC	PWM (with dead-time insertion)	LCD/LED	UART	USCI (UART/SPI/IIC)	Proximity Sensing (Max)
FS Proximity Series	MSOP10/SOP8	SC95FS520	32KB	0/1/2/32KB	1K	4KB	2.0-5.5	32/16/8/4	7/5	12bit*3ch	16bit*1ch	-	1	1	5
	SOP16	SC95FS521	32KB	0/1/2/32KB	1K	4KB	2.0-5.5	32/16/8/4	13	12bit*6ch	16bit*5ch	-	1	2	5
	SOP20/ TSSOP20/QFN20	SC95FS522	32KB	0/1/2/32KB	1K	4KB	2.0-5.5	32/16/8/4	17	12bit*7ch	16bit*8ch	-	1	3	5
	SOP28 / TSSOP28/QFN20	SC95FS523	32KB	0/1/2/32KB	1K	4KB	2.0-5.5	32/16/8/4	23	12bit*11ch	16bit*8ch	-	1	3	5



Super value series

SC92F Series

➤ Main Specification

- Under 0.5µA of type current consumption in Stop mode
- ESD 6KV, EFT 4KV and latch up 200mA
- Operating at 1.8V to 5.5V
- Rich interfaces with one UART and up to 5 USCs (UART/IIC/SPI)
- Built-in programable 1K/2K/4K bootloader
- 16bits 8-ch complementary PWM with programmable inserted dead-times
- Debugging a touchless TK device in 5 minutes

➤ Key Features

- Built-in LED/LCD hardware driver
- 3 Timers with 16bits 8-ch complementary PWM
- 16*16bits or 32/16bits Hardware multiplier/divider
- 12bits 17-ch ADC with 1.024/2.048V reference voltage
- 16-48pins
- Package type: SOP/TSSOP/QFN/LQPF
- 1.8-5.5V voltage range
- -40-105°C temperature range
- Hardware and software tools
- EasyCodeCube 3.0
- Product platform with fully compatible pins and similar specification define
- Touchless Buttons, Proximity Sensing, Matrix buttons, Wheel and Slider support touch LIB .
- Ultra-low-power TK: 12keys, 125ms, @3.3V $i < 10\mu A$

Such features as low voltage, low power, small package (TSSOP/QFN) can be applied in Industrial Control, Wearable Equipment, Consumer Electronics, Security and other fields.

Target Application: Communication, Security, Medical Treatment, New Energy, Internet of Things (IOT), Smart Device, Wearable Equipment and other application fields

➤ Roadmap of SC92F series

92F7/F5 Super-Value GP MCUs

ROM/RAM Size	SOP8	SOP16	SOP20 TSSOP20 QFN20	SOP28 TSSOP28 QFN28	LQFP32 (7*7mm)	LQFP44 (10*10mm)	LQFP48 (7*7mm)
32K/2K				92F7543	92F7545	92F7546	92F7547
32K/2K				92F7593	92F7595	92F7596	92F7597
16K/2.25K		92F5461	92F5462	92F5463	92F5465		
16K/2.25K		92F5421	92F5422	92F5423			
16K/2K		92F7481	92F7482	92F7483			
16K/1K					92F7445B	92F7446B	92F7447B
16K/1K					92F74A5	92F74A6	92F74A7
16K/1K		92F7461B	92F7462B	92F7463B			
16K/1K		92F74A1	92F74A2	92F74A3			
16K/1K		92F7401	92F7402				
16K/1K			92F8003				
16K /512	92F7420	92F7421	92F7422	92F7423			
8K/2.25K		92F5361	92F5362	92F5363	92F5365		
8K/2.25K		92F5321	92F5322	92F5323			
8K /1K		92F73A1	92F73A2	92F73A3			
8K/512	92F7320	92F7321	92F7322	92F7323			
8K/256	92F7350	92F7351	92F7352				

92F8/F6 Super-Value TK MCUs

ROM/RAM Size	SOP8	SOP16	SOP20 TSSOP20 QFN20	SOP28 TSSOP28 QFN28	LQFP32 (7*7mm)	LQFP44 (10*10mm)	LQFP48 (7*7mm)
32K/2K		92F8541	92F8542	92F8543	92F8545	92F8546	92F8547
32K/2K				92F8593	92F8595	92F8596	92F8597
16K/2.25K		92F6461	92F6462	92F6463	92F6465		
16K/2K		92F8481	92F8482	92F8483			
16K/1K					92F8445B	92F8446B	92F8447B
16K/1K		92F84A1	92F84A2	92F84A3	92F84A5	92F84A6	92F84A7
16K/1K		92F8461B	92F8462B	92F8463B			
8K/2.25K		92F6361	92F6362	92F6363	92F6365		
8K/1K		92F8361B	92F8362B	92F8363B			
8K /1K		92F83A1	92F83A2	92F83A3			
8K/384	92F8370	92F8371	92F8372				

SC92F7/F5 Super-Value GP MCUs

Series	PKG Type	P/N	Flash ROM	IAP(100K)	BootLoader	EEPROM (100K)	RAM (Bytes)	Voltage (V)	1%IRC MHz	Ipd (uA)	UART	SSI (UART/SPI/IIC)	LCD/LED	EXT Crystal	ADC	PWM	CMP
735	SOP8	SC92F7350	8KB	0/0.5/1/8KB	-	128B	256	2.4-5.5	24/12/6/2	<1	1	-	-	-	12bit*5ch	8bit*2ch	-
	SOP16	SC92F7351	8KB	0/0.5/1/8KB	-	128B	256	2.4-5.5	24/12/6/2	<1	1	-	-	-	12bit*7ch	8bit*4ch	-
	SOP20/ TSSOP20/QFN20	SC92F7352	8KB	0/0.5/1/8KB	-	128B	256	2.4-5.5	24/12/6/2	<1	1	-	1/2Bias 5COM(SW)	-	12bit*9ch	8bit*6ch	-
732	SOP8	SC92F7320	8KB	0/0.5/1/8KB	-	128B	512	2.4-5.5	24/12/6/2	<1	1	-	-	-	12bit*5ch	(8+2)bit*2ch	-
	SOP16	SC92F7321	8KB	0/0.5/1/8KB	-	128B	512	2.4-5.5	24/12/6/2	<1	1	-	1/2Bias 4COM(SW)	-	12bit*7ch	(8+2)bit*3ch	-
	SOP20/ TSSOP20/QFN20	SC92F7322	8KB	0/0.5/1/8KB	-	128B	512	2.4-5.5	24/12/6/2	<1	1	-	1/2Bias 5COM(SW)	-	12bit*9ch	(8+2)bit*3ch	-
740	SOP28 / TSSOP28	SC92F7323	8KB	0/0.5/1/8KB	-	128B	512	2.4-5.5	24/12/6/2	<1	1	-	1/2Bias 5COM(SW)	32K	12bit*11ch	(8+2)bit*3ch	-
	SOP16	SC92F7401	16KB	0/0.5/1/16KB	-	128B	1K	2.4-5.5	16/8/4/1.33	<1	1	1	-	2-16M	12bit*6ch	10bit*5ch (Support complementary mode)	-
	SOP20/ TSSOP20	SC92F7402	16KB	0/0.5/1/16KB	-	128B	1K	2.4-5.5	16/8/4/1.33	<1	1	1	-	2-16M	12bit*8ch	10bit*7ch (Support complementary mode)	-
742	SOP8	SC92F7420	16KB	0/0.5/1/16KB	-	128B	512	2.4-5.5	16/8/4/1.33	<1	0	2	-	-	12bit*5ch	8bit*2ch	-
	SOP16	SC92F7421	16KB	0/0.5/1/16KB	-	128B	512	2.4-5.5	16/8/4/1.33	<1	0	2	1/2Bias 4COM(SW)	-	12bit*7ch	8bit*3ch	-
	SOP20/ TSSOP20/QFN20	SC92F7422	16KB	0/0.5/1/16KB	-	128B	512	2.4-5.5	16/8/4/1.33	<1	0	2	1/2Bias 5COM(SW)	-	12bit*9ch	8bit*6ch	-
746B	SOP28 / TSSOP28	SC92F7423	16KB	0/0.5/1/16KB	-	128B	512	2.4-5.5	16/8/4/1.33	<1	0	2	1/2Bias 5COM(SW)	32K	12bit*11ch	8bit*6ch	-
	SOP16	SC92F7461B	16KB	0/0.5/1/16KB	-	128B	1K	2.4-5.5	16/8/4/1.33	<1	1	1	1/2Bias 2COM(SW)	-	12bit*6ch	10bit*4ch (Support complementary mode)	-
	SOP20 / TSSOP20	SC92F7462B	16KB	0/0.5/1/16KB	-	128B	1K	2.4-5.5	16/8/4/1.33	<1	1	1	1/2Bias 5COM(SW)	-	12bit*7ch	10bit*6ch (Support complementary mode)	-
744B	SOP28 / TSSOP28	SC92F7463B	16KB	0/0.5/1/16KB	-	128B	1K	2.4-5.5	16/8/4/1.33	<1	1	1	1/2Bias 5COM(SW)	2-16M	12bit*11ch	10bit*6ch (Support complementary mode)	-
	LQFP32	SC92F7445B	16KB	0/0.5/1/16KB	-	128B	1K	2.4-5.5	16/8/4/1.33	<1	1	1	-	-	12bit*12ch	12bit*3ch	Y
	LQFP44	SC92F7446B	16KB	0/0.5/1/16KB	-	128B	1K	2.4-5.5	16/8/4/1.33	<1	1	1	8*24/6*26/5*27/4*28	32K	12bit*17ch	12bit*8ch	Y
754	LQFP48	SC92F7447B	16KB	0/0.5/1/16KB	-	128B	1K	2.4-5.5	16/8/4/1.33	<1	1	1	8*24/6*26/5*27/4*28	32K	12bit*17ch	12bit*8ch	Y
	SOP28 / TSSOP28	SC92F7543	32KB	0/0.5/1/32KB	-	128B	2K	2.4-5.5	16/8/4/1.33	<1	1	1	8*15/4*19	-	12bit*12ch	12bit*3ch	Y
	LQFP32	SC92F7545	32KB	0/0.5/1/32KB	-	128B	2K	2.4-5.5	16/8/4/1.33	<1	1	1	-	-	12bit*12ch	12bit*3ch	Y
748	LQFP44	SC92F7546	32KB	0/0.5/1/32KB	-	128B	2K	2.4-5.5	16/8/4/1.33	<1	1	1	8*24/6*26/5*27/4*28	32K	12bit*17ch	12bit*8ch	Y
	LQFP48	SC92F7547	32KB	0/0.5/1/32KB	-	128B	2K	2.4-5.5	16/8/4/1.33	<1	1	1	8*24/6*26/5*27/4*28	32K	12bit*17ch	12bit*8ch	Y
	SOP16	SC92F7481	16KB	0/1/2/16KB	0/1/2/4K	1KB	2K	2.0-5.5	32/16/8/2.66	2.5	1	1	1/2Bias 2COM(SW)	-	12bit*6ch	10bit*4ch (Support complementary mode)	-
759	SOP20 / TSSOP20	SC92F7482	16KB	0/1/2/16KB	0/1/2/4K	1KB	2K	2.0-5.5	32/16/8/2.66	2.5	1	1	1/2Bias 5COM(SW)	-	12bit*7ch	10bit*6ch (Support complementary mode)	-
	SOP28 / TSSOP28	SC92F7483	16KB	0/1/2/16KB	0/1/2/4K	1KB	2K	2.0-5.5	32/16/8/2.66	2.5	1	1	1/2Bias 5COM(SW)	-	12bit*11ch	10bit*6ch (Support complementary mode)	-
	SOP28 / TSSOP28	SC92F7593	32KB	0/1/2/32KB	0/1/2/4K	1KB	2K	2.0-5.5	32/16/8/2.66	2.5	1	1	8*15/4*19	-	12bit*12ch	12bit*3ch	Y
536 (Upcoming)	LQFP32	SC92F7595	32KB	0/1/2/32KB	0/1/2/4K	1KB	2K	2.0-5.5	32/16/8/2.66	2.5	1	1	-	-	12bit*12ch	12bit*3ch	Y
	LQFP44	SC92F7596	32KB	0/1/2/32KB	0/1/2/4K	1KB	2K	2.0-5.5	32/16/8/2.66	2.5	1	1	8*24/6*26/5*27/4*28	32K	12bit*17ch	12bit*8ch	Y
	LQFP48	SC92F7597	32KB	0/1/2/32KB	0/1/2/4K	1KB	2K	2.0-5.5	32/16/8/2.66	2.5	1	1	8*24/6*26/5*27/4*28	32K	12bit*17ch	12bit*8ch	Y
546 (Upcoming)	SOP16	SC92F5361	8KB	0/0.5/1/8KB	0/1/2/4K	-	2.25K	2.4-5.5	24/12/6/2	3.5	1	2	-	2-16M	12bit*8ch	16bit*(5ch+4ch)	-
	SOP20/TSSOP20/QFN20	SC92F5362	8KB	0/0.5/1/8KB	0/1/2/4K	-	2.25K	2.4-5.5	24/12/6/2	3.5	1	3	-	2-16M	12bit*9ch	16bit*(8ch+4ch)	-
	SOP28/TSSOP28/QFN28	SC92F5363	8KB	0/0.5/1/8KB	0/1/2/4K	-	2.25K	2.4-5.5	24/12/6/2	3.5	1	3	-	2-16M	12bit*13ch	16bit*(8ch+6ch)	-
532 (Upcoming)	LQFP32/QFN32	SC92F5365	8KB	0/0.5/1/8KB	0/1/2/4K	-	2.25K	2.4-5.5	24/12/6/2	3.5	1	3	-	2-16M	12bit*13ch	16bit*(8ch+6ch)	-
	SOP16	SC92F5461	16KB	0/0.5/1/16KB	0/1/2/4K	-	2.25K	2.4-5.5	24/12/6/2	3.5	1	2	-	2-16M	12bit*8ch	16bit*(5ch+4ch)	-
	SOP20/TSSOP20/QFN20	SC92F5462	16KB	0/0.5/1/16KB	0/1/2/4K	-	2.25K	2.4-5.5	24/12/6/2	3.5	1	3	-	2-16M	12bit*9ch	16bit*(8ch+4ch)	-
542 (Upcoming)	SOP28/TSSOP28/QFN28	SC92F5463	16KB	0/0.5/1/16KB	0/1/2/4K	-	2.25K	2.4-5.5	24/12/6/2	3.5	1	3	-	2-16M	12bit*13ch	16bit*(8ch+6ch)	-
	LQFP32/QFN32	SC92F5465	16KB	0/0.5/1/16KB	0/1/2/4K	-	2.25K	2.4-5.5	24/12/6/2	3.5	1	3	-	2-16M	12bit*13ch	16bit*(8ch+6ch)	-
	SOP16	SC92F5321	8KB	0/0.5/1/8KB	0/1/2/4K	-	2.25K	2.4-5.5	24/12/6/2	3.5	1	2	-	2-16M	12bit*8ch	16bit*(5ch+4ch)	-
542 (Upcoming)	SOP20/TSSOP20/QFN20	SC92F5322	8KB	0/0.5/1/8KB	0/1/2/4K	-	2.25K	2.4-5.5	24/12/6/2	3.5	1	3	-	2-16M	12bit*9ch	16bit*(8ch+4ch)	-
	SOP28/TSSOP28/QFN28	SC92F5323	8KB	0/0.5/1/8KB	0/1/2/4K	-	2.25K	2.4-5.5	24/12/6/2	3.5	1	3	-	2-16M	12bit*13ch	16bit*(8ch+6ch)	-
	SOP16	SC92F5421	16KB	0/0.5/1/16KB	0/1/2/4K	-	2.25K	2.4-5.5	24/12/6/2	3.5	1	2	-	2-16M	12bit*8ch	16bit*(5ch+4ch)	-
542 (Upcoming)	SOP20/TSSOP20/QFN20	SC92F5422	16KB	0/0.5/1/16KB	0/1/2/4K	-	2.25K	2.4-5.5	24/12/6/2	3.5	1	3	-	2-16M	12bit*9ch	16bit*(8ch+4ch)	-
	SOP28/TSSOP28/QFN28	SC92F5423	16KB	0/0.5/1/16KB	0/1/2/4K	-	2.25K	2.4-5.5	24/12/6/2	3.5	1	3	-	2-16M	12bit*13ch	16bit*(8ch+6ch)	-

SC92F8/F6 Super-Value TK MCUs

Series	PKG Type	P/N	Flash ROM	IAP	BootLoader	EEPROM (100K)	RAM(Bytes)	Voltage (V)	1%IRC MHz	TK Channels (Max)	ADC	PWM	LCD/LED	UART	SSI (UART/SPI/IIC)	TK Application mode	Touch Key Performance
837	SOP8	SC92F8370	8KB	0/0.5/1/8KB	-	128B	384B	2.4-5.5	12/6/2	5	-	8bit*1ch	-	-	1	Spring Buttons Touchless Buttons Proximity Sensor Full touch screen ITO LCD Matrix buttons	10V dynamic CS EFT 4KVV
	SOP16	SC92F8371	8KB	0/0.5/1/8KB	-	128B	384B	2.4-5.5	12/6/2	12	-	8bit*2ch	-	-	1		
	SOP20 TSSOP20	SC92F8372	8KB	0/0.5/1/8KB	-	128B	384B	2.4-5.5	12/6/2	16	-	8bit*4ch	-	-	1		
836B	SOP16	SC92F8361B	8KB	0/0.5/1/8KB	-	128B	1KB	2.4-5.5	12/6/2	13	12bit*6ch	10bit*4ch (Support complementary mode)	2COM	1	1		
	SOP20/TSSOP20	SC92F8362B	8KB	0/0.5/1/8KB	-	128B	1KB	2.4-5.5	12/6/2	17	12bit*7ch	10bit*6ch (Support complementary mode)	5COM	1	1		
	SOP28/TSSOP28	SC92F8363B	8KB	0/0.5/1/8KB	-	128B	1KB	2.4-5.5	12/6/2	23	12bit*11ch	10bit*6ch (Support complementary mode)	5COM	1	1		
846B	SOP16	SC92F8461B	16KB	0/0.5/1/16KB	-	128B	1KB	2.4-5.5	12/6/2	13	12bit*6ch	10bit*4ch (Support complementary mode)	2COM	1	1		
	SOP20/TSSOP20	SC92F8462B	16KB	0/0.5/1/16KB	-	128B	1KB	2.4-5.5	12/6/2	17	12bit*7ch	10bit*6ch (Support complementary mode)	5COM	1	1		
	SOP28/TSSOP28/QFN28	SC92F8463B	16KB	0/0.5/1/16KB	-	128B	1KB	2.4-5.5	12/6/2	23	12bit*11ch	10bit*6ch (Support complementary mode)	5COM	1	1		
844B	LQFP32	SC92F8445B	16KB	0/0.5/1/16KB	-	128B	1KB	2.4-5.5	16/8/4/1.33	22	12bit*12ch	12bit*3ch	-	1	1		
	LQFP44	SC92F8446B	16KB	0/0.5/1/16KB	-	128B	1KB	2.4-5.5	16/8/4/1.33	31	12bit*17ch	12bit*8ch	8*24/6*26/5*27/4*28	1	1		
	LQFP48	SC92F8447B	16KB	0/0.5/1/16KB	-	128B	1KB	2.4-5.5	16/8/4/1.33	31	12bit*17ch	12bit*8ch	8*24/6*26/5*27/4*28	1	1		
854	SOP20/TSSOP20	SC92F8542	32KB	0/0.5/1/32KB	-	128B	2KB	2.4-5.5	16/8/4/1.33	13	12bit*9ch	12bit*4ch	-	1	1		
	SOP28/TSSOP28	SC92F8543	32KB	0/0.5/1/32KB	-	128B	2KB	2.4-5.5	16/8/4/1.33	22	12bit*12ch	12bit*3ch	4*19/8*15	1	1		
	LQFP32	SC92F8545	32KB	0/0.5/1/32KB	-	128B	2KB	2.4-5.5	16/8/4/1.33	22	12bit*12ch	12bit*3ch	-	1	1		
	LQFP44	SC92F8546	32KB	0/0.5/1/32KB	-	128B	2KB	2.4-5.5	16/8/4/1.33	31	12bit*17ch	12bit*8ch	8*24/6*26/5*27/4*28	1	1		
	LQFP48	SC92F8547	32KB	0/0.5/1/32KB	-	128B	2KB	2.4-5.5	16/8/4/1.33	31	12bit*17ch	12bit*8ch	8*24/6*26/5*27/4*28	1	1		
848	SOP16	SC92F8481	16KB	0/1/2/16KB	0/1/2/4K	1KB	2KB	2.0-5.5	32/16/8/2.66	13	12bit*6ch	10bit*4ch (Support complementary mode)	2COM	1	1		
	SOP20 / TSSOP20	SC92F8482	16KB	0/1/2/16KB	0/1/2/4K	1KB	2KB	2.0-5.5	32/16/8/2.66	17	12bit*7ch	10bit*6ch (Support complementary mode)	5COM	1	1		
	SOP28 / TSSOP28	SC92F8483	16KB	0/1/2/16KB	0/1/2/4K	1KB	2KB	2.0-5.5	32/16/8/2.66	23	12bit*11ch	10bit*6ch (Support complementary mode)	5COM	1	1		
859	SOP28 / TSSOP28	SC92F8593	32KB	0/1/2/32KB	0/1/2/4K	1KB	2KB	2.0-5.5	32/16/8/2.66	22	12bit*12ch	12bit*3ch	4*19/8*15	1	1		
	LQFP32	SC92F8595	32KB	0/1/2/32KB	0/1/2/4K	1KB	2KB	2.0-5.5	32/16/8/2.66	22	12bit*12ch	12bit*3ch	-	1	1		
	LQFP44	SC92F8596	32KB	0/1/2/32KB	0/1/2/4K	1KB	2KB	2.0-5.5	32/16/8/2.66	31	12bit*17ch	12bit*8ch	8*24/6*26/5*27/4*28	1	1		
	LQFP48	SC92F8597	32KB	0/1/2/32KB	0/1/2/4K	1KB	2KB	2.0-5.5	32/16/8/2.66	31	12bit*17ch	12bit*8ch	8*24/6*26/5*27/4*28	1	1		
636 (Upcoming)	SOP16	SC92F6361	8KB	0/0.5/1/8KB	0/1/2/4K	-	2.25K	2.4-5.5	24/12/6/2	13	12bit*8ch	16bit*(5ch+4ch)	-	1	2		
	SOP20/TSSOP20/QFN20	SC92F6362	8KB	0/0.5/1/8KB	0/1/2/4K	-	2.25K	2.4-5.5	24/12/6/2	17	12bit*9ch	16bit*(8ch+4ch)	-	1	3		
	SOP28/TSSOP28/QFN28	SC92F6363	8KB	0/0.5/1/8KB	0/1/2/4K	-	2.25K	2.4-5.5	24/12/6/2	23	12bit*13ch	16bit*(8ch+6ch)	-	1	3		
	LQFP32/QFN32	SC92F6365	8KB	0/0.5/1/8KB	0/1/2/4K	-	2.25K	2.4-5.5	24/12/6/2	27	12bit*13ch	16bit*(8ch+6ch)	-	1	3		
646 (Upcoming)	SOP16	SC92F6461	16KB	0/0.5/1/16KB	0/1/2/4K	-	2.25K	2.4-5.5	24/12/6/2	13	12bit*8ch	16bit*(5ch+4ch)	-	1	2		
	SOP20/TSSOP20/QFN20	SC92F6462	16KB	0/0.5/1/16KB	0/1/2/4K	-	2.25K	2.4-5.5	24/12/6/2	17	12bit*9ch	16bit*(8ch+4ch)	-	1	3		
	SOP28/TSSOP28/QFN28	SC92F6463	16KB	0/0.5/1/16KB	0/1/2/4K	-	2.25K	2.4-5.5	24/12/6/2	23	12bit*13ch	16bit*(8ch+6ch)	-	1	3		
	LQFP32/QFN32	SC92F6465	16KB	0/0.5/1/16KB	0/1/2/4K	-	2.25K	2.4-5.5	24/12/6/2	27	12bit*13ch	16bit*(8ch+6ch)	-	1	3		

Strong Anti-interference GP MCUs

Series	PKG Type	P/N	Flash ROM	IAP (100K)	EEPROM (100K)	RAM (Bytes)	Voltage (V)	1%IRC MHz	Ipd (uA)	UART	SSI (UART/SPI/IIC)	LCD /LED	EXT Crystal	ADC	PWM	CMP
73A	SOP16	92F73A1	8KB	0/0.5/1/16KB	128B	1K	2.4~5.5	16/8/4/1.33	<1	1	1	1/2Bias 2COM(SW)	-	12bit*6ch	10bit*4ch (Support complementary mode)	-
	SOP20 / TSSOP20	92F73A2	8KB	0/0.5/1/16KB	128B	1K	2.4~5.5	16/8/4/1.33	<1	1	1	1/2Bias 5COM(SW)	-	12bit*7ch	10bit*6ch (Support complementary mode)	-
	SOP28 / TSSOP28	92F73A3	8KB	0/0.5/1/16KB	128B	1K	2.4~5.5	16/8/4/1.33	<1	1	1	1/2Bias 5COM(SW)	2-16M	12bit*11ch	10bit*6ch (Support complementary mode)	-
74A	SOP16	92F74A1	16KB	0/0.5/1/16KB	128B	1K	2.4~5.5	16/8/4/1.33	<1	1	1	1/2Bias 2COM(SW)	-	12bit*6ch	10bit*4ch (Support complementary mode)	-
	SOP20 / TSSOP20	92F74A2	16KB	0/0.5/1/16KB	128B	1K	2.4~5.5	16/8/4/1.33	<1	1	1	1/2Bias 5COM(SW)	-	12bit*7ch	10bit*6ch (Support complementary mode)	-
	SOP28 / TSSOP28	92F74A3	16KB	0/0.5/1/16KB	128B	1K	2.4~5.5	16/8/4/1.33	<1	1	1	1/2Bias 5COM(SW)	2-16M	12bit*11ch	10bit*6ch (Support complementary mode)	-
	LQFP32	92F74A5	16KB	0/0.5/1/16KB	128B	1K	2.4~5.5	16/8/4/1.33	<1	1	1	-	-	12bit*12ch	12bit*3ch	Y
	LQFP44	92F74A6	16KB	0/0.5/1/16KB	128B	1K	2.4~5.5	16/8/4/1.33	<1	1	1	8*24/6*26/5*27/4*28	32K	12bit*17ch	12bit*8ch	Y
	LQFP48	92F74A7	16KB	0/0.5/1/16KB	128B	1K	2.4~5.5	16/8/4/1.33	<1	1	1	8*24/6*26/5*27/4*28	32K	12bit*17ch	12bit*8ch	Y

Strong Anti-interference TK MCUs

Series	PKG Type	P/N	Flash ROM	IAP(10K)	EEPROM (100k)	RAM(Bytes)	Voltage (V)	1%IRC MHz	TK Channels (Max)	ADC	PWM	LCD/LED	UART	SSI (UART/SPI/IIC)	TK Application mode	Touch Key Performance
83A	SOP16	SC92F83A1	8KB	0/0.5/1/8KB	128B	1KB	2.4~5.5	12/6/2	13	12bit*6ch	10bit*4ch (Support complementary mode)	2COM	1	1	Springloaded Buttons Touchless Buttons Proximity Sensing Full Touch Digital screen TFT TK ITO LCD Matrix buttons	3V static CS 10V dynamic CS EFT 4KV
	SOP20/TSSOP20	SC92F83A2	8KB	0/0.5/1/8KB	128B	1KB	2.4~5.5	12/6/2	17	12bit*7ch	10bit*6ch (Support complementary mode)	5COM	1	1		
	SOP28/TSSOP28	SC92F83A3	8KB	0/0.5/1/8KB	128B	1KB	2.4~5.5	12/6/2	23	12bit*11ch	10bit*6ch (Support complementary mode)	5COM	1	1		
84A	SOP16	SC92F84A1	16KB	0/0.5/1/16KB	128B	1KB	2.4~5.5	12/6/2	13	12bit*6ch	10bit*4ch (Support complementary mode)	2COM	1	1		
	SOP20/TSSOP20	SC92F84A2	16KB	0/0.5/1/16KB	128B	1KB	2.4~5.5	12/6/2	17	12bit*7ch	10bit*6ch (Support complementary mode)	5COM	1	1		
	SOP28/TSSOP28/QFN28	SC92F84A3	16KB	0/0.5/1/16KB	128B	1KB	2.4~5.5	12/6/2	23	12bit*11ch	10bit*6ch (Support complementary mode)	5COM	1	1		
	LQFP32	SC92F84A5	16KB	0/0.5/1/16KB	128B	1KB	2.4~5.5	16/8/4/1.33	22	12bit*12ch	12bit*3ch	-	1	1		
LQFP44	SC92F84A6	16KB	0/0.5/1/16KB	128B	1KB	2.4~5.5	16/8/4/1.33	31	12bit*17ch	12bit*8ch	8*24/6*26/5*27/4*28	1	1			
LQFP48	SC92F84A7	16KB	0/0.5/1/16KB	128B	1KB	2.4~5.5	16/8/4/1.33	31	12bit*17ch	12bit*8ch	8*24/6*26/5*27/4*28	1	1			

TK Standards

P/N	PKG Type	TK Channels (Max)	Low-power	Communication Interface	Single KEY Tuning	Single KEY Tuning	Function	LED	Touch Key Performance
SCT80L16B	SOP16	6	Yes	TTL	EEPROM	EEPROM	TTL Standard Touch Key	-	3V static CS 10V dynamic CS
SCT80S16B	SOP16	8	Yes	UART/IIC	EEPROM	EEPROM	UART/IIC Standard Touch Key	-	3V static CS 10V dynamic CS

003

Series	PKG Type	P/N	Flash ROM	IAP (100K)	EEPROM (100K)	RAM (Bytes)	Voltage (V)	1%IRC MHz	Ipd (uA)	UART	SSI (UART/SPI/IIC)	LCD /LED	EXT Crystal	ADC	PWM	CMP
8003	TSSOP20 / QFN20	92F8003	16KB	0/0.5/1/16KB	128B	1K	2.4~5.5	16/8/4/1.33	<1	1	1	-	2-16M	12bit*8ch	10bit*7ch (Support complementary mode)	-



Low power series

SC92L Series

> Main Specification

- Up to 32K Bytes Flash ROM and 2K Bytes SRAM
- ESD 8KV, EFT 5KV and latch up 200mA
- 0.6µA of type current consumption in Stop mode
- Debugging a TK device only needs 3 steps in 5 minutes by TK development and debugging platform.
- Rich interfaces with one UART and one SSI(UART/SPI/IIC)

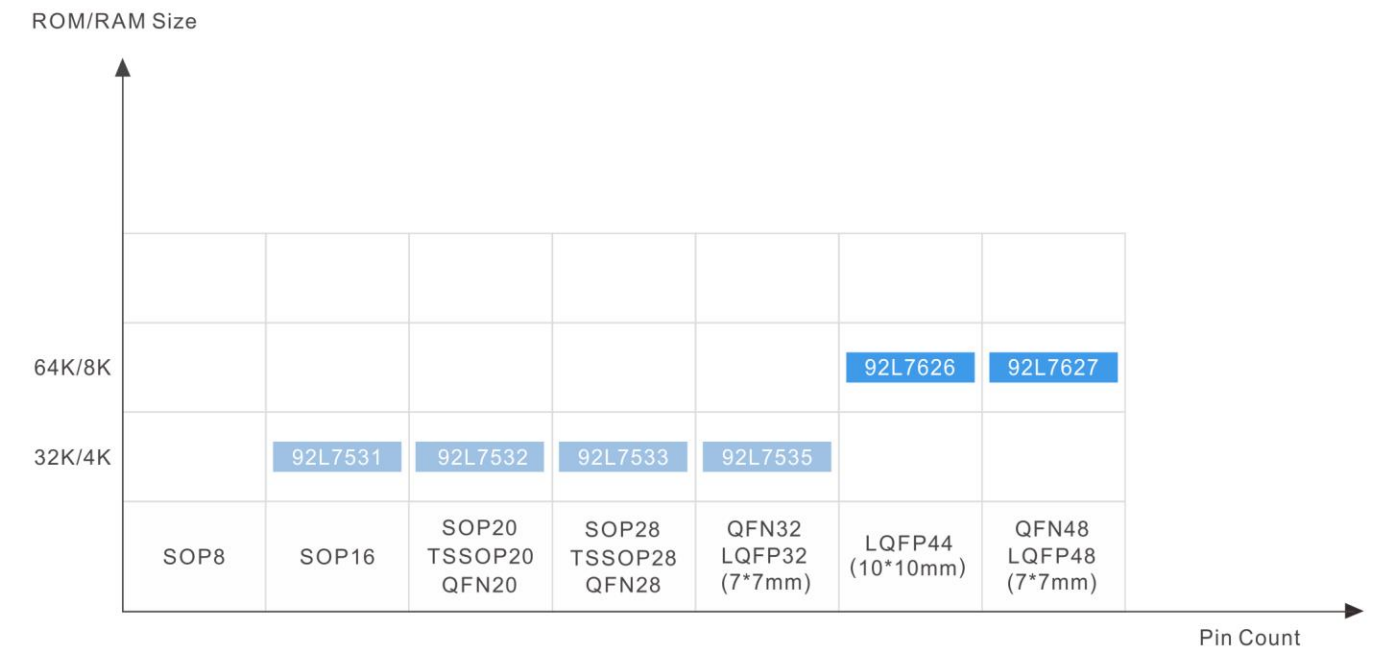
> Key Features

- 3 Timers
- 16*16bits or 32/16bits hardware multiplier/divider
- 12bits 17ch-ADC, with 2.4V reference voltage
- Up to 46 I/Os in 48 pins
- 2.0-5.5V voltage range and -40-85°C temperature range
- High-speed 1T 8051
- Hardware and software tools, EasyCodeCube 3.0
- Product platform with fully compatible pins and similar specification define
- Built-in LED/LCD hardware driver
- Touchless Buttons
- Analog comparator
- 12bits 8-ch complementary PWM, independent Timers

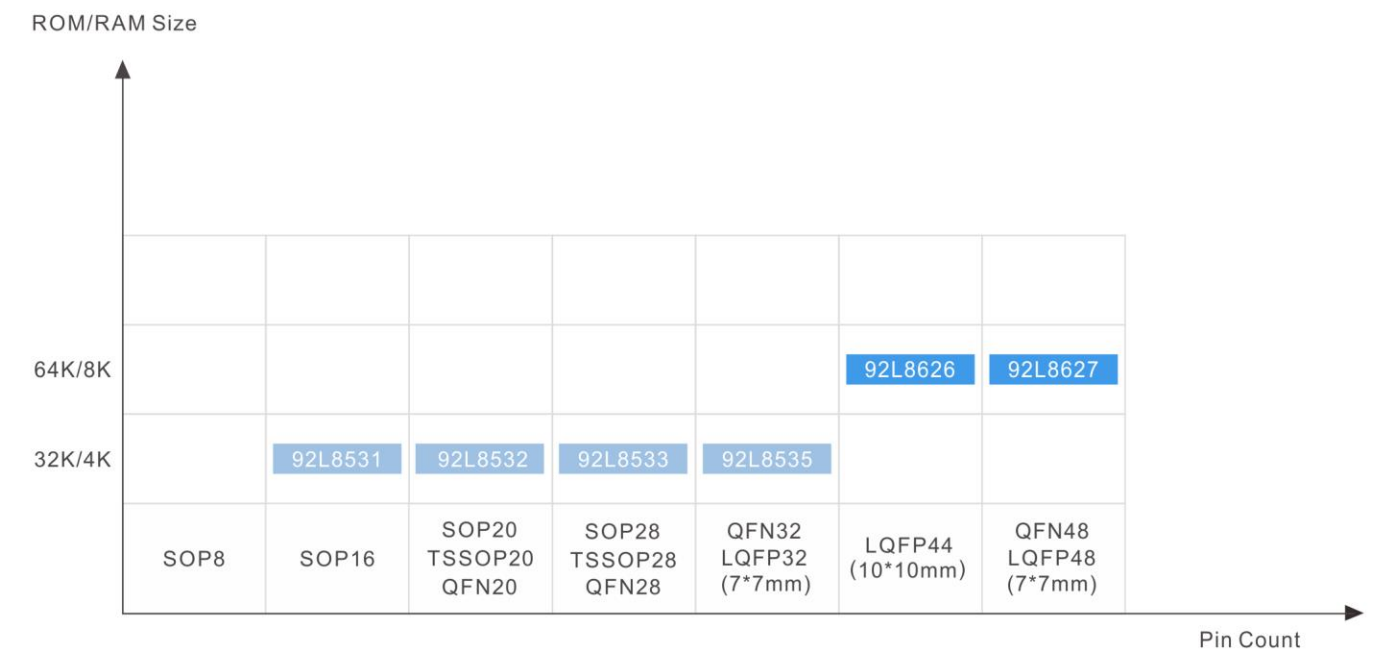
Target Application: Home Appliances, Industrial Control, Internet of Things (IOT), Lighting, Medical Treatment, Wearable Equipment, Consumer Electronics, Security and other application fields.

> Roadmap of SC9L series

92L7 Low Power GP MCU



92L8 Low Power TK MCU



SC92L7 Low Power GP MCUs

Series	PKG Type	P/N	Flash ROM	IAP (100K)	BootLoader	EEPROM (100k)	RAM (Bytes)	Voltage (V)	2%IRC MHz 32K Autocorrection	lpd (uA)	UART	USCI (UART/SPI/IIC)	LCD /LED	EXT Crystal	ADC	LPD	PWM (Full Function)	CMP
753	SOP16	SC92L7531	32KB	0/1/2/32KB	Built-in 0/1/2/4K	1KB	4KB	1.8-5.5	16/8/4/2	1	1	2	-	-	12bit*6ch	8 levels	16bit*5ch	-
	SOP20/ TSSOP20/QFN20	SC92L7532	32KB	0/1/2/32KB	Built-in 0/1/2/4K	1KB	4KB	1.8-5.5	16/8/4/2	1	1	3	4*14	-	12bit*7ch	8 levels	16bit*8ch	-
	SOP28 / TSSOP28/QFN28	SC92L7533	32KB	0/1/2/32KB	Built-in 0/1/2/4K	1KB	4KB	1.8-5.5	16/8/4/2	1	1	3	4*20	32K	12bit*11ch	8 levels	16bit*8ch	-
	LQFP32/QFN32	SC92L7535	32KB	0/1/2/32KB	Built-in 0/1/2/4K	1KB	4KB	1.8-5.5	16/8/4/2	1	1	3	8*20/6*22/5*23/4*24	32K	12bit*11ch	8 levels	16bit*8ch	-
762	LQFP44	SC92L7626	64KB	0/1/2/64KB	Built-in 0/1/2/4K	1KB	8KB	1.8-5.5	16/8/4/2	1	1	5	8*24/6*26/5*27/4*28	32K	12bit*17ch	8 levels	16bit*8ch	Y
	LQFP48/QFN48	SC92L7627	64KB	0/1/2/64KB	Built-in 0/1/2/4K	1KB	8KB	1.8-5.5	16/8/4/2	1	1	5	8*24/6*26/5*27/4*28	32K	12bit*17ch	8 levels	16bit*8ch	Y

SC92L8 Low Power TK MCUs

Series	PKG Type	P/N	Flash ROM	IAP(100K)	BootLoader	EEPROM (100k)	RAM(Bytes)	Voltage (V)	2%IRC (MHz)	TK channels (Max)	ADC	PWM (Full Function)	LCD/LED	UART	USCI (UART/SPI/IIC)	TK Application	Touch Key Performance
853	SOP16	SC92L8531	32KB	0/1/2/32KB	Built-in 0/1/2K/4K	1KB	4KB	1.8-5.5	24/12/6/3	13	12bit*6ch	16bit*5ch		1	2	Spring Buttons Touchless Buttons Proximity Sensing Flat lamp ITO LCD Matrix buttons	10V Dynamic CS EFT 4KV
	SOP20/TSSOP20/QFN20	SC92L8532	32KB	0/1/2/32KB	Built-in 0/1/2K/4K	1KB	4KB	1.8-5.5	24/12/6/3	17	12bit*7ch	16bit*8ch	4*14	1	3		
	SOP28/TSSOP28/QFN28	SC92L8533	32KB	0/1/2/32KB	Built-in 0/1/2K/4K	1KB	4KB	1.8-5.5	24/12/6/3	23	12bit*11ch	16bit*8ch	4*20	1	3		
	LQFP32/QFN32	SC92L8535	32KB	0/1/2/32KB	Built-in 0/1/2K/4K	1KB	4KB	1.8-5.5	24/12/6/3	27	12bit*11ch	16bit*8ch	8*20/6*22/5*23/4*24	1	3		
862	LQFP44	SC92L8626	64KB	0/1/2/64KB	Built-in 0/1/2K/4K	1KB	8KB	1.8-5.5	24/12/6/3	32	12bit*17ch	16bit*8ch	8*24/6*26/5*27/4*28	1	5		
	LQFP48/QFN48	SC92L8627	64KB	0/1/2/64KB	Built-in 0/1/2K/4K	1KB	8KB	1.8-5.5	24/12/6/3	32	12bit*17ch	16bit*8ch	8*24/6*26/5*27/4*28	1	5		

Noncontact Water Level Detection Flash MCUs

Series	PKG Type	P/N	Flash ROM	IAP(10K)	EEPROM (100k)	RAM(Bytes)	Voltage (V)	1%IRC (MHz)	Water Level Detecting Channels(Max)	ADC	PWM	LCD/LED	UART	USCI (UART/SPI/IIC)	Application	Water Level Detecting Performance
92WL	SOP16	SC92WL461	16KB	0/0.5/1/16KB	128B	1KB	2.4-5.5	16/8/4/1.33	4	12bit*6ch	10bit*4ch	2COM	1	1	Water Level Detecting+ MCU	3V static CS 10V dynamic CS EFT 4KV
	SOP20/TSSOP20	SC92WL462	16KB	0/0.5/1/16KB	128B	1KB	2.4-5.5	16/8/4/1.33	4	12bit*7ch	10bit*6ch	5COM	1	1		
	SOP28/TSSOP28	SC92WL463	16KB	0/0.5/1/16KB	128B	1KB	2.4-5.5	16/8/4/1.33	4	12bit*11ch	10bit*6ch	5COM	1	1		


Noncontact Water Level Detection Standards

P/N	PKG Type	Detecting Channels (Max)	Low-power	Communication Interface	Sensitivity	Function	LED	Detecting Performance
SCW8916B	SOP16	4 water levels	No	TTL/UART	Online/EEPROM	4 water levels detection	-	3V static CS 10V dynamic CS 6KV ES 4KV EFT

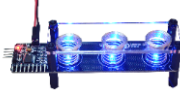




Development platform

Hardware development platform


Debugger & Programmer

Picture	Tool	Feature	Adapter
	SC LINK PRO	Online Debug Online Programming Mass Programming (support multi-code) TK Debug Parameter Display	SC92 Series SC93 Series SC95 Series


SinOne TK Evaluation Board

Picture	Name	Feature	IC
	LB1010-92F8462B LB1210-95F8522 (Spring buttons with 10V Dynamic CS)	1. Spring buttons; 3mm acrylic plates; 2. 3-ch TK ; 3. 3 LEDs;	SC92F846XB SC92F836XB SC92F837X SC92F827X SC95F852X
	LB1011-92F8462B LB1211-95F8522 (Touchless of 3mm)	1. Pad touchless buttons; 3mm acrylic plates; 2. 3-ch TK ; 3. 3 LEDs;	
	LB1012-92F8462B LB1212-95F8522 (Copper PAD)	1. Pad buttons; 3mm acrylic plates; 2. 3-ch TK ; 3. 3 LEDs;	
	LB1013-92F8462B LB1213-95F8522 (Plug in Rubber Rings)	1. Rubber buttons; 3mm acrylic plates; 2. 3-ch TK ; 3. 3 LEDs;	
	MB0021B (Wheel and Slider Evaluation Board)	1. Slider and 360 degrees of Wheel by 3 TK channels 2. 2 bits of digital tube display resolution 3. LED display resolution	SC92F8596


Proximity Sensing Evaluation Board

Picture	Name	Feature	IC
	LB1018-95FS520 (Proximity Sensing Evaluation Board)	1. A channel of Proximity Sensing 2. Sensing distance up to 30cm 3. Replacing the traditional infrared detection	SC95FS520


Noncontact Water Level Detection Evaluation Board

Picture	Name	Feature	IC
	LB1014 Noncontact Water Level Detection Evaluation Board	1. 2 channels water level detection 2. Two output communication protocols of water level detection: Electrical Level one-to-one and UART 3. 8 levels of sensitivity adjustment: Adjusting by resistance in electrical level one-to-one output mode; Setting sensitivity by communication in UART 4. 2 Calibration modes: Online Calibration with or without water	SCW8916B






IOT Evaluation Board

Picture	Name	Feature	IC
	IOT Evaluation Board	1. IOT functions evaluation and testing 2. Connecting to WIFI or Zigbee 3. Dimming remotely by TuYa APP 4. Evaluation and testing of Wheel or slider dimming	SC95F8613

92F8003 Evaluation Board

Picture	Name	Feature	IC
	SinOne 92F8003 Evaluation Board	1. Functions testing	SC92F8003

SDK Learning Board

Base Board	Key Board	IC	Feature	Support Devices	Application
SDK1010 	SDK1011 SDK1211 	SC92F8547P48R SC95F8617P48R	48Pin; TK; GP;	SC92F854x/SC92F754x SC92F8447B/SC92F7447B SC95F861X/SC95F761X	1. Demonstrating and learning 2. Getting started quickly (a) Getting up to TK debugging and general functions. (b) Building product development and application platform. 3. Performance Test; (a) Performance index; (b) Real experience;
	SDK1012 SDK1212 	SC92F8446BP44R SC95F8616P44R	44Pin; TK; GP;	SC92F844xB/SC92F744xB SC95F861X/SC95F761X	
	SDK1013 SDK1213 	SC92F8463BM28U SC95F8523M28U	28Pin; TK; GP;	SC92F846xB/SC92F836xB/SC92F746xB/SC95F852X/SC95F752X (If you want to use 92F837x/ 92F827x, you can debug the software of 92F836x at first, Then, just modify some register)	
	SDK1014 	SC92F7423M28U	28Pin; GP;	SC92F742x/92F732x/ 92F735x/92F725x	

 Purchase way
Taobao Store



➤ Introduction

EasyCodeCube is a high-efficiency software development platform with graphical development tool and process scheme programming, allows engineers to quickly complete project development without reading datasheets or specifications. Actually, achieves accessible and high-efficiency development for MCU.

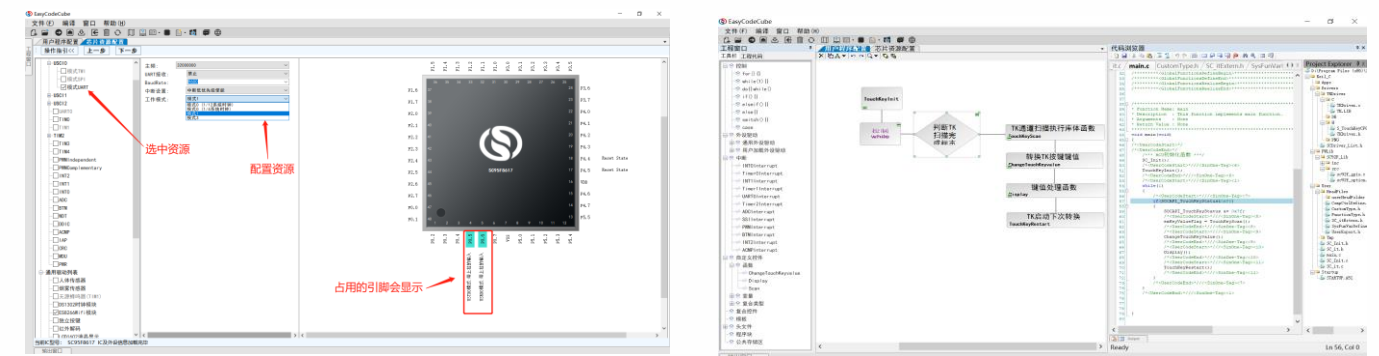
- EasyCodeCube integrates all necessary functions in a project development, including product selection, code editing, TK debugging, software compilation and code programming.
- Automatically load the TK library and load the parameters into project code after tuning the parameters when debug a TK device.
- It is a growing software platform of EasyCodeCube as a variety of functions is been adding.
- Integrates development controls of IOT, which allows no-experience engineers complete a product and connect the cloud in 5 minutes.
- Open source code allows user modify and edit.

➤ Main Features

- Streamline business logic
- Reusable code and easy transplantation
- Quickly configure Pin functions
- Easy selection
- Sustainable iteration
- High-efficiency project management
- Reliable project file
- Complete the entire project in one software

➤ Function demonstration

1. Configure all resource of MCU in one click, and multiplexing function is mutually exclusive to avoid confrontations.
2. Supports easily programing with clear software architecture as you can draw flowcharts, which making project management review simpler.



3. Integrates development controls of IOT allows no-experience engineers complete a device and connect the cloud in 5 minutes.
4. Complete example projects of IOT and detailed instructions.

