
















MICROS PERIPHERALS & DEVELOPMENT TOOLS










ST7 FAMILY 8 BIT MICROCONTROLLER

ST7 Family Products (General Purpose, Automotive, USB, Motor Control, Smart Card)














Device (1)	Pins/Type	Program Memory Type				Memory Size			Peripherals				Package
		ROM	EPROM Version	OTP/FLASH	FAST ROM (2)	Program Memory	RAM	EEPROM	A/D Inputs	Timers (+ WDG) (3)	Serial Interface	I/Os (High Current)	
ST72104G1 (4)	28-32	Yes		FLASH	Yes	4	256			WDG 1x16-Bit (5)	SPI (6)	22(8)	SDIP32/SO28 (7)
ST72104G2 (4)	28-32	Yes		FLASH	Yes	8	256			WDG 1x16-Bit (5)	SPI (6)	22(8)	SDIP32/SO28 (7)
ST72216G1 (4)	28-32	Yes		FLASH	Yes	4	256		6x8-Bit	WDG 1x16-Bit (5)	SPI (6)	22(8)	SDIP32/SO28 (7)
ST72215G2 (4)	28-32	Yes		FLASH	Yes	8	256		6x8-Bit	WDG 2x16-Bit (5)	SPI (6)	22(8)	SDIP32/SO28 (7)
ST72254G1 (4)	28-32	Yes		FLASH	Yes	4	256		6x8-Bit	WDG 2x16-Bit (5)	SPI I2C (8)	22(8)	SDIP32/SO28 (7)
ST72254G2 (4)	28-32	Yes		FLASH	Yes	8	256		6x8-Bit	WDG 2x16-Bit (5)	SPI I2C (8)	22(8)	SDIP32/SO28 (7)
ST72101G1 (9)	28-32	Yes	ST72E251G2	OTP	Yes	4	256			WDG 1x16-Bit (5)	SPI (6)	22(8)	SDIP32/SO28 (7)
ST72101G2 (9)	28-32	Yes	ST72E251G2	OTP	Yes	8	256			WDG 1x16-Bit (5)	SPI (6)	22(8)	SDIP32/SO28 (7)
ST72213G1 (9)	28-32	Yes	ST72E251G2	OTP	Yes	4	256		6x8-Bit	WDG 1x16-Bit (5)	SPI (6)	22(8)	SDIP32/SO28 (7)
ST72212G2 (9)	28-32	Yes	ST72E251G2	OTP	Yes	8	256		6x8-Bit	WDG 2x16-Bit (5)	SPI (6)	22(8)	SDIP32/SO28 (7)
ST72251G1 (9)	28-32	Yes	ST72E251G2	OTP	Yes	4	256		6x8-Bit	WDG 2x16-Bit (5)	SPI I2C (8)	22(8)	SDIP32/SO28 (7)
ST72251G2 (9)	28-32	Yes	ST72E251G2	OTP	Yes	8	256		6x8-Bit	WDG 2x16-Bit (5)	SPI I2C (8)	22(8)	SDIP32/SO28 (7)
ST72321J7 (10)	32-44	Yes (11)		FLASH (11)		48	1.5K		12x10-Bit	WDG 2x16-Bit (5)	SPI SCI I2C (13)	32(12)	TQFP44 (14)

 ST72321J9 (10)	32-44	Yes (11)		FLASH (11)		60 2K		12x10- Bit	WDG 2x16- Bit 1x8- Bit RTC (12)	SPI SCI I2C (13)	32(12)	TQFP44 (14)
 ST72324K2 (10)	32-44	Yes (11)		FLASH (11)		8 384		8x10- Bit	WDG 2x16- Bit RTC (12)	SPI SCI (15)	24(10)	SDIP32/TQFP32 (16)
 ST72324K4 (10)	32-44	Yes (11)		FLASH (11)		16 512		8x10- Bit	WDG 2x16- Bit RTC (12)	SPI SCI (15)	24(10)	SDIP32/TQFP32 (16)
 ST72324K6 (10)	32-44	Yes (11)		FLASH (11)		32 1K		8x10- Bit	WDG 2x16- Bit RTC (12)	SPI SCI (15)	24(10)	SDIP32/TQFP32 (16)
 ST72324J2 (10)	42-44	Yes (11)		FLASH (11)		8 384		12x10- Bit	WDG 2x16- Bit RTC (12)	SPI SCI (15)	32(12)	SDIP42/TQFP44 (16)
 ST72324J4 (10)	42-44	Yes (11)		FLASH (11)		16 512		12x10- Bit	WDG 2x16- Bit RTC (12)	SPI SCI (15)	32(12)	SDIP42/TQFP44 (16)
 ST72324J6 (10)	42-44	Yes (11)		FLASH (11)		32 1K		12x10- Bit	WDG 2x16- Bit RTC (12)	SPI SCI (15)	32(12)	SDIP42/TQFP44 (16)
 ST72124J2 (17)	42-44	Yes		FLASH	Yes	8 384			WDG 2x16- Bit RTC (12)	SPI SCI (15)	32(4)	SDIP42/TQFP44 (16)
 ST72314J2 (17)	42-44	Yes		FLASH	Yes	8 384		8x8- Bit	WDG 2x16- Bit RTC (12)	SPI SCI (15)	32(4)	SDIP42/TQFP44 (16)
 ST72314J4 (17)	42-44	Yes		FLASH	Yes	16 512		8x8- Bit	WDG 2x16- Bit RTC (12)	SPI SCI (15)	32(4)	SDIP42/TQFP44 (16)
 ST72334J2 (17)	42-44	Yes		FLASH	Yes	8 384	256	8x8- Bit	WDG 2x16- Bit RTC (12)	SPI SCI (15)	32(4)	SDIP42/TQFP44 (16)
 ST72334J4 (17)	42-44	Yes		FLASH	Yes	16 512	256	8x8- Bit	WDG 2x16- Bit RTC (12)	SPI SCI (15)	32(4)	SDIP42/TQFP44 (16)
 ST72121J2 (18)	42-44		ST72E311J4	OTP	Yes	8 384			WDG 2x16- Bit (5)	SPI SCI (15)	32(4)	SDIP42/TQFP44 (16)

 ST72121J4 (18)	42-44		ST72E311J4	OTP	Yes	16 512			WDG SPI 2x16-SCI Bit (5) (15)	32(4)	SDIP42/TQFP44 (16)
 ST72311J2 (18)	42-44		ST72E311J4	OTP	Yes	8 384		6x8- Bit	WDG SPI 2x16-SCI Bit (5) (15)	32(4)	SDIP42/TQFP44 (16)
 ST72311J4 (18)	42-44		ST72E311J4	OTP	Yes	16 512		6x8- Bit	WDG SPI 2x16-SCI Bit (5) (15)	32(4)	SDIP42/TQFP44 (16)
 ST72331J2 (18)	42-44		ST72E331J4	OTP	Yes	8 384		256 6x8- Bit	WDG SPI 2x16-SCI Bit (5) (15)	32(4)	SDIP42/TQFP44 (16)
 ST72331J4 (18)	42-44		ST72E331J4	OTP	Yes	16 512		256 6x8- Bit	WDG SPI 2x16-SCI Bit (5) (15)	32(4)	SDIP42/TQFP44 (16)
 ST72314N2 (19)	56-64	Yes		FLASH	Yes	8 384		8x8- Bit	WDG SPI 2x16-SCI Bit (15) RTC (12)	44(8)	SDIP56/TQFP64 (16)
 ST72314N4 (19)	56-64	Yes		FLASH	Yes	16 512		8x8- Bit	WDG SPI 2x16-SCI Bit (15) RTC (12)	44(8)	SDIP56/TQFP64 (16)
 ST72334N2 (19)	56-64	Yes		FLASH	Yes	8 384		256 8x8- Bit	WDG SPI 2x16-SCI Bit (15) RTC (12)	44(8)	SDIP56/TQFP64 (16)
 ST72334N4 (19)	56-64	Yes		FLASH	Yes	16 512		256 8x8- Bit	WDG SPI 2x16-SCI Bit (15) RTC (12)	44(8)	SDIP56/TQFP64 (16)
 ST72311N2 (18)	56-64		ST72E311N4	OTP	Yes	8 384		8x8- Bit	WDG SPI 2x16-SCI Bit (15) RTC (12)	44(8)	SDIP56/TQFP64 (16)
 ST72311N4 (18)	56-64		ST72E311N4	OTP	Yes	16 512		8x8- Bit	WDG SPI 2x16-SCI Bit (5) (15)	44(8)	SDIP56/TQFP64 (16)
 ST72331N2 (18)	56-64		ST72E331N4	OTP	Yes	8 384		256 8x8- Bit	WDG SPI 2x16-SCI Bit (5) (15)	44(8)	SDIP56/TQFP64 (16)
 ST72331N4 (18)	56-64		ST72E331N4	OTP	Yes	16 512		256 8x8- Bit	WDG SPI 2x16-SCI Bit (5) (15)	44(8)	SDIP56/TQFP64 (16)
 ST72311R6 (10)	56-64	Yes	ST72E311R9	OTP	Yes	32 1K		8x8- Bit	WDG SPI 2x16-SCI Bit (15) 1x8- Bit RTC (12)	48(12)	TQFP64 (14)
 ST72311R7 (10)	56-64	Yes	ST72E311R9	OTP	Yes	48 1.5K		8x8- Bit	WDG SPI 2x16-SCI Bit (15) 1x8- Bit RTC (12)	48(12)	TQFP64 (14)

 ST72311R9 (10)	56-64	Yes	ST72E311R9	OTP	Yes	60 2K		8x8- Bit	WDG 2x16- Bit 1x8- Bit RTC (12)	SPI SCI (15)	48(12)	TQFP64 (14)
 ST72321M7 (10)	64-80	Yes (11)		FLASH (11)		48 1.5K		16x10- Bit	WDG 2x16- Bit 1x8- Bit RTC (12)	SPI SCI I2C (13)	64(16)	TQFP80 (14)
 ST72321M9 (10)	64-80	Yes (11)		FLASH (11)		60 2K		16x10- Bit	WDG 2x16- Bit 1x8- Bit RTC (12)	SPI SCI I2C (13)	64(16)	TQFP80 (14)
 ST72321R6 (10)	64-80	Yes (11)		FLASH (11)		32 1K		16x10- Bit	WDG 2x16- Bit 1x8- Bit RTC (12)	SPI SCI (15)	48(16)	TQFP64 (14)
 ST72321R7 (10)	64-80	Yes (11)		FLASH (11)		48 1.5K		16x10- Bit	WDG 2x16- Bit 1x8- Bit RTC (12)	SPI SCI I2C (13)	48(16)	TQFP64 (14)
 ST72321R9 (10)	64-80	Yes (11)		FLASH (11)		60 2K		16x10- Bit	WDG 2x16- Bit 1x8- Bit RTC (12)	SPI SCI I2C (13)	48(16)	TQFP64 (14)
 ST72511R6 (20)	CAN (21)		ST72E511R9	OTP	Yes	32 1K		8x8- Bit	WDG 2x16- Bit 1x8- Bit RTC (12)	SPI SCI CAN (22)	48(12)	TQFP64 (14)
 ST72511R7 (20)	CAN (21)		ST72E511R9	OTP	Yes	48 1.5K		8x8- Bit	WDG 2x16- Bit 1x8- Bit RTC (12)	SPI SCI CAN (22)	48(12)	TQFP64 (14)
 ST72511R9 (20)	CAN (21)		ST72E511R9	OTP	Yes	60 2K		8x8- Bit	WDG 2x16- Bit 1x8- Bit RTC (12)	SPI SCI CAN (22)	48(12)	TQFP64 (14)

 ST72521M7 (20)	CAN (21)	Yes (11)		FLASH (11)		48 1.5K		16x10- Bit	WDG 2x16- Bit 1x8- Bit RTC (12)	SPI SCI I2C CAN (23)	64(16)	TQFP80 (14)
 ST72521M9 (20)	CAN (21)	Yes (11)		FLASH (11)		60 2K		16x10- Bit	WDG 2x16- Bit 1x8- Bit RTC (12)	SPI SCI I2C CAN (23)	64(16)	TQFP80 (14)
 ST72521R6 (20)	CAN (21)	Yes (11)		FLASH (11)		32 1K		16x10- Bit	WDG 2x16- Bit 1x8- Bit RTC (12)	SPI SCI CAN (22)	48(16)	TQFP64 (14)
 ST72521R7 (20)	CAN (21)	Yes (11)		FLASH (11)		48 1.5K		16x10- Bit	WDG 2x16- Bit 1x8- Bit RTC (12)	SPI SCI I2C CAN (23)	48(16)	TQFP64 (14)
 ST72521R9 (24)	CAN (21)	Yes (11)		FLASH (11)		60 2K		16x10- Bit	WDG 2x16- Bit 1x8- Bit RTC (12)	SPI SCI I2C CAN (23)	48(16)	TQFP64 (14)
 ST72589BW5 (25)	LCD (26)	Yes (11)	ST72E589BW5	OTP	Yes	24 1K		5x8- Bit	WDG 2x16- Bit 1x10- Bit RTC (12)	SPI SCI I2C CAN (23)	31	PQFP128 (27)
 ST72389BW4 (28)	LCD (26)	Yes	ST72E589BW5	OTP	Yes	16 512		5x8- Bit	WDG 2x16- Bit RTC (12)	SPI SCI (22)	31	PQFP128 (27)
 ST72141K2 (29)	MC (30)	Yes (11)	ST72E141K2	OTP		8 256		8x8- Bit	WDG 2x16- Bit (5)	SPI (6)	26(3)	SDIP32/SO34 (7)
 ST72171K2 (31)	OP (32)			FLASH		8 256		8x8- Bit	WDG 1x16- Bit 1x8- Bit (5)	SPI SCI (15)	22(5)	SDIP32/SO34 (7)
 ST72611F1 (33)	USB (34)	Yes (11)		FLASH (11)	Yes (11)	4 256			WDG 1x8- Bit (5)	USB (35)	11(8)	SO20/DIP20 (36)
 ST72623F2 (37)	USB (34)	Yes (11)		FLASH (11)	Yes (11)	8 384		3x10- Bit	WDG 2x8- Bit (5)	USB (35)	11(8)	SO20/DIP21 (36)
 ST72622K2 (37)	USB (34)	Yes (11)		FLASH (11)	Yes (11)	8 384		8x10- Bit	WDG 2x8- Bit (5)	USB SPI (38)	21(8)	SDIP32 (39)

 ST72622L2 (37)	USB (34)	Yes (11)		FLASH (11)	Yes (11)	8 384		8x10-Bit	WDG USB 2x8-SPI (38) Bit (5)	23(8)	SO34 (40)
 ST72621K4 (37)	USB (34)	Yes (11)		FLASH (11)	Yes (11)	16 768		8x10-Bit	WDG USB 2x8-SPI Bit (5) SCI (41)	21(8)	SDIP32 (39)
 ST72621L4 (37)	USB (34)	Yes (11)		FLASH (11)	Yes (11)	16 768		8x10-Bit	WDG USB 2x8-SPI Bit (5) SCI (41)	23(8)	SO34 (40)
 ST72621J2 (37)	USB (34)	Yes (11)		FLASH (11)	Yes (11)	8 384		8x10-Bit	WDG USB 2x8-SPI Bit (5) SCI (41)	31(8)	TQFP44/SDIP42 (42)
 ST72621J4 (37)	USB (34)	Yes (11)		FLASH (11)	Yes (11)	16 768		8x10-Bit	WDG USB 2x8-SPI Bit (5) SCI (41)	31(8)	TQFP44/SDIP42 (42)
 ST72633K1 (43)	USB (34)	Yes	ST72E631K4	OTP	Yes	4 256		8x8-Bit	WDG USB 1x16-SCI Bit (5)	19(10)	SDIP32/SO34 (16)
 ST72632K2 (43)	USB (34)	Yes	ST72E631K4	OTP	Yes	8 256		8x8-Bit	WDG USB 1x16-SCI Bit (5) (44)	19(10)	SDIP32/SO34 (16)
 ST72631K4 (43)	USB (34)	Yes	ST72E631K4	OTP	Yes	16 512		8x8-Bit	WDG USB 1x16-SCI Bit (5) I2C (45)	19(10)	SDIP32/SO34 (16)
 ST7263BK1 (46)	USB (34)	Yes (11)		FLASH (11)	Yes (11)	4 384		8x8-Bit	WDG USB 1x16-SCI Bit (5)	31(10)	SDIP32/SO34 (16)
 ST7263BK2 (46)	USB (34)	Yes (11)		FLASH (11)	Yes (11)	8 384		8x8-Bit	WDG USB 1x16-SCI Bit (5) (44)	31(10)	SDIP32/SO34 (16)
 ST72F63BK4 (46)	USB (34)			FLASH (11)	Yes (11)	16 512		8x8-Bit	WDG USB 1x16-SCI Bit (5) I2C (45)	31(10)	SDIP32/SO34 (16)
 ST72651R4 (47)	USB (34)	Yes (11)		FLASH (11)	Yes (11)	16 6.5K			WDG USB 1x16-DTC Bit (5) (48)	47(11)	TQFP64 (14)
 ST72651R6 (49)	USB (34)			FLASH (11)	Yes (11)	32 6.5K		2x8-Bit	WDG USB 1x16-DTC Bit (5) I2C (50)	47(11)	TQFP64 (14)

1) Special Features

2) Fast Advanced Service Technique ROM

3) WDG = 1x7-Bit Watchdog Timer

4) 3 level LVD (Low Voltage Detector), RC Oscillator, CSS (Clock Security System), ISP (In-Situ Programming), ROP (Read-out Protection), Direct LED/Triac Driving (upgrade of ST72101/112/113 & ST72251)

5) WDG:1x7-Bit Watchdog Timer

6) SPI: Serial Peripheral Interface

7) SDIP: Shrink Dual In Line, SO: Small Outline

8) SPI: Serial Peripheral Interface I2C: Inter Integrated Circuit

9) Direct LED/Triac Driving

10) Nested Interrupts, TLI (External Top Level Interrupt), LVD (Low Voltage Detector), ROP (Read-out Protection), 4 low power modes with Active-HALT, Direct LED/Triac Driving, Beep (Audio square wave generator)

11) Under Development

12) WDG:1x7-Bit Watchdog Timer, RTC:Real Time Clock Timer

13) SPI: Serial Peripheral Interface SCI: Serial Communications Interface I2C: Inter integrated Circuit

14) TQFP: Thin Quad Flat Pack

15) SPI: Serial Peripheral Interface SCI: Serial Communications Interface

- 16) SDIP: Shrink Dual In Line, TQFP: Thin Quad Flat Pack
- 17) 3 level LVD (Low Voltage Detector), RC Oscillator, CSS (Clock Security System), ISP (In-Situ Programming), ROP (Read-out Protection), 4 low power modes with Active-HALT, Direct LED/Triac Driving, Beep (Audio square wave generator) (upgrade)
- 18) LVD (Low Voltage Detector), Direct LED/Triac Driving
- 19) 3 level LVD (Low Voltage Detector), RC Oscillator, CSS (Clock Security System), ISP (In-Situ Programming), ROP (Read-out Protection), 4 low power modes with Active-HALT, Direct LED/Triac Driving, Beep (Audio square wave generator), (upgrad
- 20) Nested Interrupts, TLI (External Top Level Interrupt), LVD (Low Voltage Detector), ROP (Read-out Protection), 4 low power modes with Active-HALT, Direct LED/Triac Driving, Beep (Audio square wave generator), CAN peripheral (Controller Area Network)
- 21) CAN:Controller Area Network
- 22) SPI: Serial Peripheral Interface SCI: Serial Communications Interface CAN: Controller Area Network
- 23) SPI: Serial Peripheral Interface SCI: Serial Communications Interface I2C: Inter integrated Circuit CAN: Controller Area Network
- 24) Nested Interrupts, TLI (External Top Level Interrupt), LVD (Low Voltage Detector), ROP (Read-out Protection), 4 low power modes with Active-HALT, Direct LED/Triac Driving, Beep (Audio square wave generator), CAN peripheral (Controller Area Network)
- 25) 60x8 Dot Matrix LCD (Liquid Crystal Display), CAN peripheral (Controller Area Network), Nested Interrupts, TLI (External Top Level Interrupt), Beep (Audio square wave generator)
- 26) LCD:Liquid Crystal Display
- 27) PQFP: Thin Quad Flat Pack
- 28) 60x8 Dot Matrix LCD (Liquid Crystal Display), Nested Interrupts, TLI (External Top Level Interrupt), Beep (Audio square wave generator)
- 29) LVD (Low Voltage Detector), Sensorless brushless permanent magnet DC Motor Controller in 6 step mode, Emergency input
- 30) MC:Motor Control
- 31) 3 level LVD (Low Voltage Detector), 3 Op-Amps, Programmable gain
- 32) OP:Operational Amplifiers
- 33) Under Developement, LVD (Low Voltage Detector), 3 Low Speed USB endpoints, ROP (Read-out Protection)
- 34) USB:Universal Serial Bus
- 35) USB: Universal Serial Bus
- 36) SO: Small Outline DIP: Dual In Line
- 37) Under Developement, LVD (Low Voltage Detector), 3 Low Speed USB endpoints, ISP (In-Situ Programming), ROP (Read-out Protection)
- 38) USB: Universal Serial Bus SPI: Serial Peripheral Interface
- 39) SDIP: Shrink Dual In Line
- 40) SO: Small Outline
- 41) USB: Universal Serial Bus SPI: Serial Peripheral Interface SCI: Serial Communications Interface
- 42) TQFP: Thin Quad Flat Pack, SDIP: Shrink Dual In Line
- 43) LVD (Low Voltage Detector), 3 Low Speed USB endpoints
- 44) USB: Universal Serial Bus SCI: Serial Communications Interface
- 45) USB: Universal Serial Bus SCI: Serial Communications Interface I2C: Inter Integrated Circuit
- 46) Under Developement, LVD (Low Voltage Detector), 3 Low Speed USB endpoints, ICP (In-Circuit Programming), IAP (In-Application Programming), ROP (Read-out Protection)
- 47) Under Developement, LVD (Low Voltage Detector), 4 Full Speed USB endpoints, PVR (Programmable Voltage Regulator), ROP (Read-out Protection) 2.7V, DTC (Data Transfer Coprocessor)
- 48) USB: Universal Serial Bus DTC: Data Transfer Coprocessor
- 49) Under Developement, LVD (Low Voltage Detector), 4 Full Speed USB endpoints, DSC (Dual Supply Control), PVR (Programmable Voltage Regulator), ROP (Read-out Protection) 2.7V, DTC (Data Transfer Coprocessor)
- 50) USB: Universal Serial Bus DTC: Data Transfer Coprocessor I2C: Inter Integrated Circuit

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