# Small size, large function, powerful core

XL series PLC has card design, ultra-thin appearance, Equipped with powerful CPU processor, complete functions, high reliability and compact structure, Especially suitable for narrow installation space.

- ① Slim appearance, small and practical
- ② Strong compatibility
- ③ Strong expansion ability
- 4 Outstanding cost performance
- Save more installation space



Economic XL1 series



Standard
XL3 series



Enhanced XL5 series



Ethernet communication

XL5E/XLME series



CAN communication
XL5N series



EtherCAT bus

XLH/XL5H/LC5E series



### XL1 series

The function is relatively simple, which can carry out logic control, data operation and other general functions. XL1 series is equipped with RS232 port, RS485 port, USB port and supports the networking function of X-NET fieldbus. No expansion, high-speed processing

- Program capacity 256KB
   I/O sequential control
   Max I/O 16 points

- 4 Basic instruction 0.02~0.05us
- ⑤ RS232, RS485
- ⑥ X-NET fieldbus
- ① USB port high speed download (max 12Mbps)



### | Performance specification

Product series XL	1-	16T	16T-U			
	Total points	16	16			
Main body I/O	Input points	8	8			
	Output points	8	8			
Max I/O points		16	16			
High speed	General pulse output	-	-			
positioning	Differential pulse output	-	-			
High speed	Single/AB phase mode	-	-			
input	Input mode	-	-			
Expansion	Right expansion module	-	-			
ability	Left expansion module	-	-			
	BD board	-	-			
	External interrupt	6	6			
Interruption	Timing interrupt	20	20			
	Other interrupts	-	-			
Communication	Communication port	2 RS232 ports, 1 RS485 port	1 RS232 port, 1 RS485 port, 1 USB port			
function	Communication protocol	Standard Modbus ASCII/RTU communication, free format communication				
Bus function		X-NET fieldbus				
PWM pulse width	modulation	-				
Frequency measu	ırement	-				
Precise timing		-				
Multi-station con	trol	-				
Program execution	on mode	Cyclic scanning mode				
Programming me	ethod	Command, ladder chart, C language				
Power off holding	5	FlashROM and lithium battery (3V button battery)				
Basic instruction	processing speed	0.02~0.05us				
User program cap	acity (secret download mode)	256KB				

### XL1 series model list

	Model								
		AC power supp	ly	DC power supply					
	Relay output	utput   Transistor output   Transistor relay mixed output		Relay output	Transistor output	Transistor relay mixed output			
NPN type	-	-	-	-	XL1-16T	-			
иги суре	-	-	-	-	XL1-16T-U	-			

Product serie	s XL1-		16T	16T-U				
Security func	ecurity function 6-bit ASCII password encryption, secret downloading			nloading				
Self-diagnosi	function		Power on self-test, monitoring timer, syntax	check				
Real-time clo	ck		Built-in clock, Lithium battery power supply,	with power down memory				
SD expansion	SD expansion card		-					
	Input relay (X)		896 points: X0~X77, X10000~X11177, X20000	~X20177, X30000~X30077				
	Output relay (Y)		896 points: Y0~Y77, Y10000~Y11177, Y20000~	Y20177, Y30000~Y30077				
		General M	8000 points M0~M7999					
	Auxiliary relay	Power off holding HM	960 points HM0~HM959					
Flow	Special SM	2048 points SM0~SM2047						
	General S	1024 points S0~S1023						
	Power off holding HS	128 points HS0~HS127						
component		Specification	100ms timer: 0.1~3276.7s, 10ms timer: 0.01~ 1ms timer: 0.001~32.767s	327.67s,				
	Timer	General T	576 points T0~T575					
		Power off holding HT	96 points HT0~HT95					
	Constant	Specification	16-bit counter: K0~32767 32-bit counter: -2147483648~+2147483647					
	Counter	General C	576 points C0~C575					
		Power off holding HC	96 points HC0~HC95					
	Special coil for	WAIT instruction	32 points SEM0~SEM31					
		General D	8000 points D0~D7999					
	Data register	Power off holding HD	1000 points HD0~HD999					
Word soft		Special SD	2048 points SD0~SD2047					
component	FlashDOM	Power off holding FD	5120 points FD0~FD5119					
	FlashROM register	Special SFD	2000 points SFD0~SFD1999					
	register	Security register FS	48 points FS0~FS47					

<sup>\*</sup>Note: ①The "-" in the table indicates that this model doesn't have this function; ②Special refers to system occupancy, cannot be used for other purposes.

# Standard type

### | XL3 series

It has complete functions. In addition to the general data processing function, it also has special functions such as high-speed pulse output, high-speed counting function, pulse width modulation, frequency measurement and accurate timing. It supports the connection of right expansion module and left expansion module, which can meet various use needs.

- Program capacity 256KB
   I/O sequential control

- 3 Max I/O 352 points4 Basic instruction 0.02~0.05us
- ⑤ RS232, RS485
- ⑥ X-NET fieldbus
- ① USB port high speed download (max 12Mbps)
   ⑧ 3 channels high speed counter (single phase up to 80KHz, AB phase up to 50KHz)
- 9 2-4 channels 100KHz pulse output



### | Performance specification

Product series XL	.3-	16R/T	16T4	32R/T		
	Total points	16	16	32		
Main body I/O	Input points	8	8	16		
	Output points	8	8	16		
Max I/O points		336	336	352		
High speed	General pulse output	2 axes	4 axes	2 axes		
positioning	Differential pulse output	: <del>(-</del> )	iá.	[4]		
High speed	Single/AB phase mode	3 channels	3 channels	3 channels		
input	Input mode	OC	OC	OC		
Expansion	Right expansion module	10	10	10		
ability	Left expansion module	1	1	1		
	BD board	574	ş	<b>%</b> d		
Interruption	External interrupt	6	10	10		
	Timing interrupt	20				
	Other interrupts	High speed counter interrupt, pulse interrupt				
Communication	Communication port	1 RS232 port, 1 RS485 port, 1 USB port				
function	Communication protocol	Standard Modbus ASCII/RTU communication, free format communication				
Bus function		X-NET fieldbus				
PWM pulse width	modulation	Support				
Frequency measu	urement	Support				
Precise timing		26 points ET0~ET25 (Only even	numbers can be used)			
Multi-station con	trol	益				
Program execution	on mode	Cyclic scanning mode				
Programming me	ethod	Command, ladder chart, C lang	guage			
Power off holding	5	FlashROM and lithium battery (	3V button battery)			
Basic instruction	processing speed	0.02~0.05us				
User program cap	acity (secret download mode)	256KB				

### | XL3 series model list

	Model									
		AC power supp	ly		DC powers	supply				
	Relay output	Transistor output	Transistor relay mixed output	Relay output	Transistor output	pply  Fransistor relay mixed output				
NDN type		ň		XL3-16R	XL3-16T					
NPN type	150			XL3-32R	XL3-32T	8				
PNP type	q+8	-		XL3-16PR	n n					
rivir type	\$ <b>±</b> \$	3	8	XL3-32PR	8	£				
PNP &NPN type	:#9	~	=	.er	XL3-16T4	€				

Product serie	s XL3-		16R/T	16T4	32R/T				
Security func	tion		6-bit ASCII password encryption, secret downloading						
Self-diagnosi	s function		Power on self-test, monitoring timer, syntax check						
Real-time clo	ck		Built-in clock, Lithium battery	power supply, with power dow	n memory				
SD expansion	card		-						
	Input relay (X)		896 points: X0~X77, X10000~X	11177, X20000~X20177, X30000	~X30077				
	Output relay (Y	')	896 points: Y0~Y77, Y10000~Y11177, Y20000~Y20177, Y30000~Y30077						
		General M	8000 points M0~M7999						
	Auxiliary relay	Power off holding HM	960 points HM0~HM959						
	Special SM	2048 points SM0~SM2047							
	Flow	General S	1024 points S0~S1023	1024 points S0~S1023					
Bit soft component	Power off holding HS	128 points HS0~HS127							
	<b>-</b>	Specification	100ms timer: 0.1~3276.7s, 10ms timer: 0.01~327.67s, 1ms timer: 0.001~32.767s						
	Timer	General T	576 points T0~T575						
		Power off holding HT	96 points HT0~HT95						
		Specification	16-bit counter: K0~32767 32-bit counter: -2147483648~	+2147483647					
	Counter	General C	576 points C0~C575						
		Power off holding HC	96 points HC0~HC95						
	Special coil for	WAIT instruction	32 points SEM0~SEM31						
		General D	8000 pointsD0~D7999						
	Data register	Power off holding HD	1000 points HD0~HD999						
Word soft		Special SD	2048 points SD0~SD2047						
component	Flash DOM	Power off holding FD	5120 points FD0~FD5119						
	FlashROM register	Special SFD	2000 points SFD0~SFD1999						
	register	Security register FS	48 points FS0~FS47		·				

<sup>\*</sup>Note: ①The "-" in the table indicates that this model doesn't have this function; ②Special refers to system occupancy, cannot be used for other purposes.

# Enhanced type

### XL5 series

In addition to all the functions of standard PLC, it has faster processing speed (about 15 times of XC series), larger internal resource space, 2 ~ 4 channels high-speed pulse output, supports the connection of right expansion module and left expansion ED module, and can meet various use requirements.

- Program capacity 512KB
   I/O sequential control

- 3 Max I/O 576 points4 Basic instruction 0.02~0.05us
- ⑤ RS232, RS485
- ⑥ X-NET fieldbus
- ① USB port high speed download (max 12Mbps)
- ® 3~4 channels high speed counter (single phase up to 80KHz, AB phase up to 50KHz)
- 9 2~10 channels 100KHz pulse output



### | Performance specification

Product series XL5-		16T	16T4	32T	32T4	64T10		
	Total points	16	16	32	32	64		
Main body I/O	Input points	8	8	16	16	32		
	Output points	8	8	16	16	32		
Max I/O points	Max I/O points		528	544	544	576		
High speed	General pulse output	2 axes	4 axes	2 axes	4 axes	10 axes		
positioning	Differential pulse output	-	-	-	-	-		
High speed	Single/AB phase mode	3 channels	3 channels	3 channels	4 channels	10 channels		
input	Input mode	OC	ОС	OC	OC	OC		
Expansion	Right expansion module	16	16	16	16	16		
ability	Left expansion module	1	1	1	1	1		
	BD board	-	-	-	-	-		
	External interrupt	6	6	10	10	10		
Interruption	Timing interrupt	20						
	Other interrupts	High speed counter interrupt, pulse interrupt						
Communication	Communication port	1 RS232 port, 1 RS485 port, 1 USB port						
function	Communication protocol	Standard Modbus ASCII/RTU communication, free format communication						
Bus function		X-NET fieldbus						
PWM pulse width	modulation	Support						
Frequency measu	urement	Support						
Precise timing		26 points ET0~E	Γ25 (Only even numl	bers can be used)				
Multi-station con	trol	-						
Program execution	on mode	Cyclic scanning r	node					
Programming me	ethod	Command, ladde	er chart, C language					
Power off holding	9	FlashROM and lit	thium battery (3V bu	tton battery)				
Basic instruction	processing speed	0.02~0.05us	·	<u> </u>	<u> </u>			
User program cap	acity (secret download mode)	512KB						

### XL5 series model list

	Model										
AC power supply					DC powers	supply					
	Relay output	Transistor output	Transistor relay mixed output	Relay output	Transistor output	Transistor relay mixed output					
	-	-	-	-	XL5-16T	-					
	-	-	-	-	XL5-32T	-					
NPN type	-	-	-	-	XL5-32T4	-					
	-	-	-	-	XL5-64T10	-					
NPN type	-	-	-	-	XL5-32PT4	-					
PNP &NPN type	-	-	-	-	XL3-16T4	-					

Product serie	s XL5-		16T	16T4	32T	32T4	64T10	
Security func	tion		6-bit ASCII password encryption, secret downloading					
Self-diagnosis function			Power on self-te	st, monitoring time	r, syntax check			
Real-time clock			Built-in clock, Lit	thium battery powe	er supply, with pow	er down memory		
SD expansion card			-			-		
· ·	Input relay (X)		1280 points: X0~	X77, X10000~X1117	7, X20000~X20177,	X30000~X30077		
	Output relay (Y	′)	1280 points: Y0~	Y77, Y10000~Y1117	7, Y20000~Y20177,	Y30000~Y30077		
		General M	70000 points M0	~M69999				
	Auxiliary relay	Power off holding HM	12000 points HM	ИО~НМ11999				
		Special SM	5000 points SM0	~SM4999				
	Flow	General S	8000 points S0~5	S7999				
Bit soft component	Power off holding HS	1000 points HS0~HS999						
		Specification		100ms timer: 0.1~3276.7s, 10ms timer: 0.01~327.67s, 1ms timer: 0.001~32.767s				
	Timer	General T	5000 points C0~0	C4999				
		Power off holding HT	2000 points HC0	~HC1999				
		Specification	16-bit counter: K 32-bit counter: -:	(0~32767 2147483648~+2147	483647			
	Counter	General C	5000 points C0~0	C4999				
		Power off holding HC	2000 points HT0	~HT1999				
	Special coil for	WAIT instruction	32 points SEM0~	SEM31				
		General D	70000 pointsD0~	-D69999				
	Data register	Power off holding HD	25000 points HD	0~HD24999				
Word soft		Special SD	5000 points SD0	~SD4999				
component	Fl. I DOM	Power off holding FD	8192 points FD0	~FD8191				
	FlashROM register	Special SFD	6000 points SFD	0~SFD5999				
	register	Security register FS	48 points FS0~FS	547				

<sup>\*</sup>Note: ①The "-" in the table indicates that this model doesn't have this function; ②Special refers to system occupancy, cannot be used for other purposes.

# Ethernet communication type

### XL5E series

In addition to all the functions of XL5 series, it has faster processing speed (about 2  $\sim$  3 times that of XDM series), larger internal resource space (1M), RS232, RS485 and Ethernet ports, supports 2  $\sim$  10 channels pulse output, and supports the connection of right expansion module and left expansion module.

- Program capacity 1MB
   I/O sequential control
- 3 Max I/O 576 points
- Basic instruction 0.01~0.03us
- ⑤ RS232, RS485, RJ45
- ⑥ X-NET fieldbus
- ⑦ 2~10 channels 100KHz pulse output
- § 3~10 channels high speed counter (single phase up to 80KHz, AB phase up to 50KHz)
  9 Online downloading
- 10 Bipolar input



### | Performance specification

Product series XL5E-		16T	32T	32T4	64T6	64T10		
	Total points	16	32	32	64	64		
Main body I/O	Input points	8	16	16	32	32		
	Output points	8	16	16	32	32		
Max I/O points		528	544	544	576	576		
High speed	General pulse output	2 axes	2 axes	4 axes	6 axes	10 axes		
positioning	Differential pulse output	-	-	-	-	-		
High speed	Single/AB phase mode	3 channels	3 channels	4 channels	6 channels	10 channels		
input	Input mode	OC	OC	OC	ОС	ОС		
Expansion	Right expansion module	16	16	16	16	16		
ability	Left expansion module	1	1	1	1	1		
	BD board	-	-	-	-	-		
	External interrupt	6	10	10	10	10		
Interruption	Timing interrupt	20						
	Other interrupts	High speed counter interrupt, pulse interrupt						
Communication	Communication port	1 RS232 port, 1 RS485 port, 2 RJ45 ports						
function	Communication protocol	Standard Modbu	s ASCII/RTU commu	unication, free forma	at communication			
Bus function		X-NET fieldbus						
PWM pulse width	modulation	Support						
Frequency measu	ırement	Support						
Precise timing		26 points ET0~E	Γ25 (Only even num	bers can be used)				
Multi-station con	trol	Support						
Program execution	on mode	Cyclic scanning r	node					
Programming me	ethod	Command, ladde	er chart, C language					
Power off holding		FlashROM and lit	hium battery (3V bu	itton battery)				
Basic instruction	processing speed	0.01~0.03us	·					
User program cap	acity (secret download mode)	1MB						

### XL5E series model list

	Model									
		AC power supp	ly	DC power supply						
	Relay output Transistor output Transistor relay mixed output				Transistor output	Transistor relay mixed output				
	=	-	=	=	XL5E-16T	=				
	=	-	=	=	XL5E-32T	=				
PNP &NPN type	=	-	=	=	XL5E-32T4	=				
турс	=	-	=	=	XL5E-64T6	=				
	=	-	=	=	XL5E-64T10	=				
PNP type	-	-	=	=	XL5E-32PT4	-				

Product serie	s XI 5F-		16T	32T	32T4	64T6	64T10
Security func			6-bit ASCII password encryption, secret downloading				
Self-diagnosis			•	st, monitoring time			
Real-time clock			, ,	er supply, with pow	er down memory		
SD expansion card		-	71	11 2/ 1			
Input relay (X)		1280 points: X0~	X77, X10000~X1117	77, X20000~X20177,	X30000~X30077		
	Output relay (Y)		1280 points: Y0~	Y77, Y10000~Y1117	7, Y20000~Y20177,	Y30000~Y30077	
		General M	70000 points M0	~M69999	· · · · · · · · · · · · · · · · · · ·		
	Auxiliary relay	Auxiliary relay Power off holding HM		И0~НМ11999			
		Special SM	5000 points SM0	~SM4999			
	El	General S	8000 points S0~5	S7999			
D'1	Flow	Power off holding HS	1000 points HS0	~HS999			
Bit soft component		Specification	100ms timer: 0.1 1ms timer: 0.001	~3276.7s, 10ms tin ~32.767s	ner: 0.01~327.67s,		
	Timer	General T	5000 points C0~	C4999			
		Power off holding HT	2000 points HC0	~HC1999			
		Specification	16-bit counter: k 32-bit counter: -	(0~32767 2147483648~+2147	483647		
	Counter	General C	5000 points C0~	C4999			
		Power off holding HC	2000 points HT0	~HT1999			
	Special coil for	WAIT instruction	32 points SEM0~	SEM31			
		General D	70000 pointsD0	-D69999			
	Data register	Power off holding HD	25000 points HD	0~HD24999			
Word soft		Special SD	5000 points SD0	~SD4999			
component	Fl. I DOM	Power off holding FD	8192 points FD0	~FD8191			
	FlashROM register	Special SFD	6000 points SFD	0~SFD5999			
	register	Security register FS	48 points FS0~FS	S47			

<sup>\*</sup>Note: ①The "-" in the table indicates that this model doesn't have this function; ②Special refers to system occupancy, cannot be used for other purposes.

# CAN communication type

### XL5N series

Compatible with most functions of XL5E series, it has built-in twochannel independent CAN communication, equipped with RS232, RS485, RJ45 port, supports two-channel pulse output, three-channel high-speed counting, and supports the connection of right expansion module and left expansion module.

- ① Program capacity 1MB
- ② I/O sequential control ③ Max I/O 544 points
- Basic instruction 0.01~0.03us
- ⑤ RS232, RS485, Rj45
- © 2 channels CAN communication, support CANopen and CAN free format communication
- Support Ethernet communication
- ® 2 channels 100KHz pulse output
- 3 channels high speed counter (single phase up to 80KHz, AB phase up to 50KHz)
- ① Online downloading



### | Performance specification

Product series XL	5N-	32T
	Total points	32
Main body I/O	Input points	16
	Output points	16
Max I/O points		544
High speed	General pulse output	2 axes
positioning	Differential pulse output	-
High speed	Single/AB phase mode	3 channels
input	Input mode	OC
Evannian	Right expansion module	16
Expansion ability	Left expansion module	1
a a mey	BD board	-
	External interrupt	10
Interruption	Timing interrupt	20
	Other interrupts	High speed counter interrupt, pulse interrupt
Communication	Communication port	1 RS232 port, 1 RS485 port, 2 RJ45 ports
function	Communication protocol	Standard Modbus ASCII/RTU communication, free format communication, Ethernet communication, CAN communication
Bus function		CANbus control, X-NET fieldbus
PWM pulse width	modulation	Support
Frequency measu	urement	Support
Precise timing		Support
Multi-station con	trol	Support
Program execution	on mode	Cyclic scanning mode
Programming me	ethod	Command, ladder chart, C language
Power off holding		FlashROM
Basic instruction	processing speed	0.01~0.03us
User program cap	acity (secret download mode)	1MB

### XL5N series model list

	Model								
AC power supply			DC power supply						
	Relay output	Transistor output	Transistor relay mixed output	Relay output	Transistor output	Transistor relay mixed output			
NPN type	-	-	-	-	XL5N-32T	-			
PNP type	-	-	-	-	XL5N-32PT	-			

Product serie	s XL5N-		32T
Security func	tion		6-bit ASCII password encryption, secret downloading
Self-diagnosis	s function		Power on self-test, monitoring timer, syntax check
Real-time clo	ck		Built-in clock, Lithium battery power supply, with power down memory
SD expansion	card		-
	Input relay (X)		1280 points: X0~X77, X10000~X11177, X20000~X20177, X30000~X30077
	Output relay (Y	7)	1280 points: Y0~Y77, Y10000~Y11177, Y20000~Y20177, Y30000~Y30077
		General M	200000 points M0~M199999
	Auxiliary relay	Power off holding HM	20000 points HM0~HM19999
		Special SM	5000 points SM0~SM4999
	Flow	General S	2000 points S0~S19999
Bit soft	Flow	Power off holding HS	2000 points HS0~HS1999
component		Specification	100ms timer: 0.1~3276.7s, 10ms timer: 0.01~327.67s, 1ms timer: 0.001~32.767s
	Timer	General T	20000 points C0~C4999
		Power off holding HT	2000 points HC0~HC1999
		Specification	16-bit counter: K0~32767 32-bit counter: -2147483648~+2147483647
	Counter	General C	20000 points C0~C19999
		Power off holding HC	2000 points HC0~HT1999
	Special coil for	WAIT instruction	32 points SEM0~SEM31
		General D	500000 pointsD0~D499999
	Data register	Power off holding HD	50000 points HD0~HD49999
Word soft		Special SD	50000 points SD0~SD49999
component	FlashDOM	Power off holding FD	65536 points FD0~FD65535
	FlashROM register	Special SFD	50000 points SFD0~SFD49999
	register	Security register FS	48 points FS0~FS47

<sup>\*</sup>Note: ①The "-" in the table indicates that this model doesn't have this function; ②Special refers to system occupancy, cannot be used for other purposes.

# Ethernet communication type

### **XLME** series

In addition to all the functions of XDM series small-sized PLC, it has faster processing speed (about 2 ~ 3 times that of XDM series), larger internal resource space (1M), supports up to 10 channels pulse output, is equipped with RS232, RS485 port and 2 RJ45 ports, and supports the connection of right expansion module and left expansion module.

- Program capacity 1MB
   I/O sequential control
- 3 Max I/O 576 points
- 4 Basic instruction 0.01~0.03us
- ⑤ RS232, RS485, Rj45
- ⑥ X-NET fieldbus
- ® 4~10 channels high speed counter (single phase up to 80KHz, AB phase up to 50KHz)
- 9 Linear/arc interpolation
- 10 Follow-up function
- ① Online downloading



### | Performance specification

Product series XLME-		16T4	32T4	64T10			
	Total points	16	32	64			
Main body I/O	Input points	8	16	32			
	Output points	8	16	32			
Max I/O points		528	544	576			
High speed	General pulse output	4 axes	4 axes	10 axes			
positioning	Differential pulse output	-	-	-			
High speed	Single/AB phase mode	4 channels	4 channels	10 channels			
input	Input mode	OC	OC	OC			
Expansion	Right expansion module	16	16	16			
ability	Left expansion module	1	1	1			
	BD board	-	-	-			
	External interrupt	10	10	10			
Interruption	Timing interrupt	20					
	Other interrupts	High speed counter interrupt, pulse interrupt					
Communication	Communication port	1 RS232 port, 1 RS485 port, 2 RJ45 ports					
function	Communication protocol	Standard Modbus ASCII/RTU communication, free format communication, Ethernet communication					
Bus function		X-NET fieldbus					
PWM pulse width	modulation	Support					
Frequency measu	ırement	Support					
Precise timing		26 points ET0~ET25 (only even numbers can be used)					
Multi-station con	trol	Support					
Program execution	on mode	Cyclic scanning mode					
Programming me	ethod	Command, ladder chart, C lan	guage				
Power off holding		FlashROM and lithium battery (3V button battery)					
Basic instruction	processing speed	0.01~0.03us					
User program cap	acity (secret download mode)	1MB					

### | XLME series model list

	Model								
AC power supply			DC power supply						
	Relay output	Transistor output	Transistor relay mixed output	Relay output	Transistor output	Transistor relay mixed output			
					XLME-16T4				
PNP &NPN	-	-	-	-	XLME-32T4	-			
type	-	-	-	-	XLME-64T10	-			

Product serie	s XLME-		16T4	32T4	64T10			
Security func	Security function		6-bit ASCII password encryption, secret downloading					
Self-diagnosi	s function		Power on self-test, monitorin	g timer, syntax check				
Real-time clo	ck		Built-in clock, Lithium batter	y power supply, with power dow	n memory			
SD expansion	card		-					
	Input relay (X)		1280 points: X0~X77, X10000~	~X11177, X20000~X20177, X30000	)~X30077			
	Output relay (Y	)	1280 points: Y0~Y77, Y10000~	Y11177, Y20000~Y20177, Y30000	~Y30077			
		General M	70000 points M0~M69999					
	Auxiliary relay	Power off holding HM	12000 points HM0~HM11999					
		Special SM	5000 points SM0~SM4999					
	Flow	General S	8000 points S0~S7999					
Bit soft	Flow	Power off holding HS	1000 points HS0~HS999					
component	<b>T</b>	Specification	100ms timer: 0.1~3276.7s, 10ms timer: 0.01~327.67s, 1ms timer: 0.001~32.767s					
	Timer	General T	5000 points C0~C4999					
		Power off holding HT	2000 points HT0~HT1999					
		Specification	16-bit counter: K0~32767 32-bit counter: -2147483648~+2147483647					
	Counter	General C	5000 points C0~C4999					
		Power off holding HC	2000 points HC0~HC1999					
	Special coil for	WAIT instruction	32 points SEM0~SEM31					
		General D	70000 pointsD0~D69999					
	Data register	Power off holding HD	25000 points HD0~HD24999					
Word soft		Special SD	5000 points SD0~SD4999					
component	Fl. I DOM	Power off holding FD	8192 points FD0~FD8191					
zzponene	FlashROM register	Special SFD	6000 points SFD0~SFD5999					
	register	Security register FS	48 points FS0~FS47					

<sup>\*</sup>Note: ①The "-" in the table indicates that this model doesn't have this function; ②Special refers to system occupancy, cannot be used for other purposes.

# EtherCAT bus type

### XLH series

Compatible with most functions of XLME, it has larger program capacity and faster processing speed, supports Ethernet communication, EtherCAT bus, motion control commands such as interpolation and follow-up, can connect expansion module and left expansion ED module.

- Program capacity 2~4MB
   Max I/O 542 points
- 3 Basic instruction 0.01~0.05us
- ④ RS232, RS485, RJ45
- ⑤ Ethernet communication
- ⑥ X-NET fieldbus
- ② EtherCAT bus control
- 8 4 channels 100KHz pulse output
- 9 4 channels high speed counter (up to 200KHz)
- Follow-up function
- ① 3 axes linear/acr interpolation
- ② 16 channels electronic cam (XLH-24A16L/XLH-30A32L not supported)
- Bipolar input



### | Performance specification

Product series XLH-		24A16	24A16L	30A32	30A32L		
	Total points	24	24	30	30		
Main body I/O	Input points	12	12	14	14		
	Output points	12	12	16	16		
Max I/O points		536	536	542	542		
High speed	General pulse output	4 axes	4 axes	4 axes	4 axes		
positioning	Differential pulse output	-	-	-	-		
	Single/AB phase mode	4 channels	4 channels	4 channels	4 channels		
High speed input	Input mode	ОС	ОС	2 channels differential signal + 2 channels OC	2 channels differential signal 2 channels OC		
	Right expansion module	16	16	16	16		
Expansion ability	Left expansion module	1	1	1	1		
ability	BD board	-	-	-	-		
	External interrupt	10	10	10	10		
Interruption	Timing interrupt	20	20	20	20		
	Other interrupts	High speed counter interrupt, pulse interrupt					
	Communication port	1 RS232 port, 1 RS485 port, 2 RJ45 ports					
Communication function	Communication protocol	Standard Modbus ASCII/RTU communication, free format communication, Ethernet communication, CAN communication (only 30A32 support)					
	Single axis	Support	Support	Support	Support		
EtherCAT bus function	Axis group	Support	Support	Support	Support		
bus fulletion	Electronic cam	Support	-	Support	-		
PWM pulse width	modulation	Support					
Frequency measu	rement	-					
Precise timing		26 points ET0~ET25 (cannot support this function)					
Multi-station cont	rol	Support					
Program execution mode		Cyclic scanning mode					
Programming met	thod	LD、ST、C、I	L				
Power off holding		FlashROM		<u> </u>	<u> </u>		
Basic instruction p	processing speed	0.02~0.05us 0.01~0.03us					
User program capa	acity (secret download mode)	2MB 4MB					

### XLH series model list

	Model									
	AC power supply				DC powers	supply				
	Relay output	Transistor output	Transistor relay mixed output	Relay output	Transistor output	Transistor relay mixed output				
	-	-	-	-	XLH-24A16	-				
NDN +upo	-	-	-	-	XLH-24A16L	-				
NPN type	-	-	-	-	XLH-30A32	-				
	-	-	-	-	XLH-30A32L	-				
	-	-	-	-	XLH-24PA16	-				
PNP type	-	-	-	-	XLH-24PA16L	-				
	-	-	-	-	XLH-30PA32	-				

	Product series XLH-			24A16         24A16L         30A32         30A32L           6 bit ASCII password protection, secret download				
	Security function			6-bit ASCII password protection, secret download				
Self-diagnosi			Power on self-test, mo					
Real-time clo			Built-in clock, Lithium	battery	, power off mem	ory		
SD expansion	card		-					
	Input relay (X)		1280 points: X0~X77, X					
	Output relay (Y	í .	1280 points: Y0~Y77, Y		/11177, Y20000~`	/20177, Y30000	)~Y30077	
		General M	200000 points M0~M19					
	Auxiliary relay	Power off holding HM	20000 points HM0~HM	119999				
		Special SM	50000 points SM0~SM					
	Flow	General S	20000 points S0~S199					
	Tiow	Power off holding HS	2000 points HS0~HS19	999				
Bit soft	T:	Specification	100ms timer: 0.1~3276.7s, 10ms timer: 0.01~327.67s, 1ms timer: 0.001~32.767s					
component	Timer	General T	20000 points T0~T199	99				
		Power off holding HT	2000 points HT0~HT1999					
		Precise timing	40 points ET0~ET39					
		Specification	16-bit counter: 0~3276 32-bit counter: -21474		+2147483647			
	Counter	General C	20000 points C0~C199	99				
		Power off holding HC	2000 points HC0~HC19	999				
		High speed counter	40 points HSC0~HSC3	9				
	Special coil for	WAIT instruction	32 points SEM0~SEM3	1				
		General D	500000 points D0~D49	9999	500000 points	D0~D499999	1000000 points	D0~D999999
	Data register	Power off holding HD	50000 points HD0~HD	49999	50000 points H	D0~HD49999	100000 points H	D0~HD99999
Word soft		Special SD	50000 points SD0~SD4	19999				
component	51 1 5014	Power off holding FD	65536 points FD0~FD6	5535				
	FlashROM register	Special SFD	50000 points SFD0~SF	D49999				
	register	Security register FS	48 points FS0~FS47					

<sup>\*</sup>Note: ①The "-" in the table indicates that this model doesn't have this function; ②Special refers to system occupancy, cannot be used for other purposes.

# EtherCAT bus type

### XL5H series

It is compatible with most functions of XL5E, supports EtherCAT bus, is equipped with RS232, RS485 and RJ45 ports, supports 2-channel pulse output, 3-channel high-speed counting, and supports the connection of right expansion module and left expansion module.

- Program capacity 1M
   Max I/O 536 points
- 3 Basic instruction 0.01~0.05us
- ④ RS232, RS485, RJ45
- ⑤ Ethernet communication
- ⑥ X-NET fieldbus
- ① EtherCAT bus control
- ® 2 channels 100KHz pulse output
- 9 3 channels high speed counter (single phase max 80K, AB phase max 50K)
- 10 Follow-up function
- ① Online downloading
- ② Bipolar input



### | Performance specification

Product series XL	.5H-	24A8L	24A8L			
Total points		24	24			
Main body I/O	Input points	12	12			
	Output points	12	12			
Max I/O points		536	536			
High speed	General pulse output	2 axes	2 axes			
positioning	Differential pulse output	-	-			
High speed	Single/AB phase mode	3 channels	3 channels			
input	Input mode	OC	OC			
Expansion	Right expansion module	16	16			
ability	Left expansion module	1	1			
	BD board	-	<del>-</del>			
	External interrupt	10	10			
Interruption	Timing interrupt	2	0			
	Other interrupts	High speed counting interrupt, pulse interrupt				
Communication	Communication port	1 RS232 port, 1 RS485 port, 1 EtherCAT port, 1 Ethernet port				
function	Communication protocol	Standard Modbus ASCII/RTU, free format communication, Modbus-TCP Client/Server, TCP/UDP				
EtherCAT	Single axis	Support	Support			
bus function	Axis group	Support	Support			
	Electronic cam	Support	-			
PWM pulse width	modulation	Sup	port			
Frequency measu	urement	3 cha	nnels			
Precise timing		Sup	port			
Multi-station con	trol	Sup	port			
Program execution	on mode	Cyclic scanning mode				
Programming me		Command, ladder chart, C language				
Power off holding	2	FlashROM and lithium battery (3V button battery)				
Basic instruction	processing speed	0.01~0.05us				
User program cap	acity (secret download mode)	1M	1B			

### XL5H series model list

	Model								
AC power supply				DC power supply					
	Relay output	Transistor output	Transistor relay mixed output	Relay output	Transistor output	Transistor relay mixed output			
PNP &NPN	-	-	-	-	XL5H-24A8	-			
type	-	-	-	-	XL5H-24A8L	-			

Product serie	s XL5H-		24A8	24A8L				
Security func	tion		6-bit ASCII password protection, secret download					
Self-diagnosi	s function		Power on self-test, monitoring timer, syntax of	check				
Real-time clo	ck		Built-in clock, Lithium battery, power off mer	mory				
SD expansion	card		-					
	Input relay (X)		1280 points: X0~X77, X10000~X11177, X20000	)~X20177, X30000~X30077				
	Output relay (Y	"	1280 points: Y0~Y77, Y10000~Y11177, Y20000	~Y20177, Y30000~Y30077				
		General M	70000 points M0~M69999					
	Auxiliary relay	Power off holding HM	12000 points HM0~HM11999					
		Special SM	5000 points SM0~SM4999					
	Flow	General S	8000 points S0~S7999					
	Flow	Power off holding HS	1000 points HS0~HS999					
Bit soft		Specification	100ms timer: 0.1~3276.7s, 10ms timer: 0.01~1ms timer: 0.001~32.767s	327.67s,				
component	Timer	General T	5000 points T0~T4999					
		Power off holding HT	2000 points HT0~HT1999					
		Precise timing	40 points ET0~ET39					
		Specification	16-bit counter: 0~32767 32-bit counter: -2147483648~+2147483647					
	Counter	General C	5000 points C0~C4999					
		Power off holding HC	2000 points HC0~HC1999					
		High speed counter	40 points HSC0~HSC39					
	Special coil for	WAIT instruction	32 points SEM0~SEM31					
		General D	70000 points D0~D69999					
	Data register	Power off holding HD	25000 points HD0~HD24999					
Word soft		Special SD	5000 points SD0~SD4999					
component		Power off holding FD	8192 points FD0~FD8191	<u> </u>				
	FlashROM	Special SFD	6000 points SFD0~SFD5999					
	register	Security register FS	48 points FS0~FS47					

<sup>\*</sup>Note: ①The "-" in the table indicates that this model doesn't have this function; ②Special refers to system occupancy, cannot be used for other purposes.

# Basic unit specification

### | General specification

Item	Specification
Insulation voltage	Above DC500V 2MΩ
Anti-noise	Noise voltage 1000Vp-p 1us pulse 1 minute
Air	No corrosive and combustible gas
Ambient temperature	0°C~55°C
Ambient humidity	5%RH~95%RH (no condensation)
Installation	Directly mounted on the guide rail
Grounding	The third kind of grounding (not common grounding with strong current system)

### | Power supply specification

### ■ DC power supply

Item	Specification
Rated voltage	DC24V
Allowable voltage range	DC21.6V~26.4V
Rated frequency	120mA DC24V
Allowable instantaneous power off time	10ms DC24V
Impact current	10A DC26.4V
Max power consumption	15W (16 points) / 30W (24 points and up)
Power supply for sensor	24VDC±10% 16 points max 200mA, 32 points max 400mA

### | Input specification

■ NPN mode

#### ■ PNP mode

#### ■ Differential mode

Item	Specification	Item	Specification	Item	Specification
Input signal voltage	DC24V±10%	Input signal voltage	DC24V±10%	Input signal	5V differential signal
Input signal current	7mA/DC24V	Input signal current	7mA/DC24V	Input max frequency	1M <b>F</b> z
Input ON current	Above 4.5mA	Input ON current	Above 4.5mA	Cincolt in collection	Photoelectric coupling
Input OFF current	out OFF current Below 1.5mA		Below 1.5mA	Circuit insulation	insulation
Input response time	About 10ms	Input response time	About 10ms	Input action display	LED lights when input is ON
Input signal format	Contactor input or NPN open collector transistor	Input signal format	Contactor input or PNP open collector transistor		
Circuit insulation	Photoelectric coupling insulation	Circuit insulation	Photoelectric coupling insulation		
Input action display	LED lights when input is ON	Input action display	LED lights when input is ON		

Note: XL5/XL5E/XLME series 64 points models have no "input ON current", "input OFF current", and its input ON voltage is below 9V, input OFF voltage is above 19V.

### | Output specification

### ■ Relay output

External power supply		Below AC250V, DC30
Circuit insulation		Mechanical insulation
Action indicator		LED light
	Resistive load	3A
Max load	Inductive load	80VA
	Lamp load	100W
Min load		DC5V 10mA
Response	OFF→ON	10ms
time	ON→OFF	10ms
		1

### ■ Transistor output

External power supply		DC5~30V
Circuit insulation		Optocoupler insulation
Action inc	licator	LED light
	Resistive load	0.3A
Max load	Inductive load	7.2W/DC24V
	Lamp load	1.5W/DC24V
Min load		DC5V 2mA
Open circuit leakage		Below 0.1mA
current		
Response	OFF→ON	Below 0.2ms
time	ON→OFF	Below 0.2ms

#### ■ High speed pulse output

Model	T   T4   T6   T10
High speed pulse output terminal	Y0~Y1 Y0~Y3 Y0~Y5 Y0~Y11
External power supply	Below DC5~30V
Action indicator	LED light
Max current	50mA
Pulse max output frequency	100KHz

### | Serial port (RS232/RS485) communication parameter specification

Item	Parameter
Communication mode	Half duplex
Baud rate	4800bps, 9600bps, 19200bps(default), 38400bps, 57600bps, 115200bps
Data type	Data bit: 5, 6, 7, 8 (default), 9. Stop bit: 1 (default), 1.5, 2. Parity bit: none, odd, even (default)
Mode	RTU (default), ASCII, free format
Station no.	1~255 (default 1)
Delay before sending	1~100ms (default 3ms)
Reply timeout	1~1000ms (default 300ms)
Retry count	1~20 times (default 3 times)

### | General specification

•	
Item	Specification
Using environment	No corrosive gas
Ambient temperature	0°C~55°C
Storage temperature	-20 ~ 70°C
Ambient humidity	5~95%RH
Storage humidity	5 ~ 95%RH
Installation	It is directly installed on the guide rail of DIN46277 (35mm width)

# Expansion unit

# Right expansion module

### | I/O expansion module

When the number of main body points cannot meet the use requirements, this type of expansion module can be used to expand the I/O points to 576 points at most.







European terminal: 16/32 points Horn terminal: 16/32 points

External terminal strip is required

### | Digital input module

Model		Function description	Specification	
NPN input	PNP input	runction description	Specification	
XL-E16X	XL-E16PX	16 channels digital input	DC24V power supply Input filter time 1~50ms optional	
XL-E32X	XL-E32PX	32 channels digital input	External wiring method: 16X, 32X: built-in terminal strip 32X-A, 32PX-A: external terminal	
XL-E32X-A	XL-E32PX-A	32 channels digital input, horn terminals	block is required The wiring method is same to PLC main body	

### | Digital output module

Model	Function description	Specification
XL-E16YR	16 channels relay output, no power supply required	The module does not require power supply R: output relay
XL-E16YT	16 channels transistor output, no power supply required	T: output transistor R response time is below 10ms T response time is below 0.2ms
XL-E16YT-A	16 channels transistor output, no power supply required, horn terminals	R max load: resistive 3A inductive 80VA T max load: each point max output current is 0.3A
XL-E32YT	32 channels transistor output, no power supply required	External wiring method: 16YR, 16YT, 32YT: built-in terminal strip 16YT-A, 32YT-A: external terminal block is required
XL-E32YT-A	32 channels transistor output, no power supply required, horn terminals	The wiring method is same to PLC main body

### | Digital I/O module

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Model		Function description	Specification	
NPN input	PNP input	Function description	Specification	
XL-E8X8YR	XL-E8PX8YR	8 channels digital input, 8 channels relay output	DC 24V power supply Input filter time 1~50ms optional	
XL-E8X8YT	XL-E8PX8YT	8 channels digital input, 8 channels transistor output	R: output relay T: output transistor R response time is below 10ms	
XL-E16X16YT	XL-E16PX16YT	16 channels digital input, 16 channels transistor output	T response time is below 0.2ms R max load: resistive 3A inductive 80VA T max load: each point max output current is 0.3A	
-	XL-E16PX16YT	16 channels digital input, 16 channels transistor output (PNP type)	External wiring method: 8X8YR, 8X8YT, 16X16YT: built-in terminal strip 16X16YT-A, 16PX16YT-A: external	
XL-E16X16YT-A	XL-E16PX16YT-A	16 channels digital input, 16 channels transistor output, horn terminals	terminal block is required The wiring method is same to PLC main body	

### Analog and temperature expansion module

It has D/A and A/D conversion functions. XD/XL series PLC can be applied to temperature, flow, liquid level, pressure and other process control systems by expanding analog input/output module and temperature control module.

Adding PID regulation function, it has wider and more flexible use and higher control accuracy. Only four parameters need to be set.

Each channel of the temperature control module can carry out PID control independently, which can be self-tuning, and exchange information with the main body through FROM and TO instructions.



### | Temperature control module (PT&TC type)

Model	Channel	Input signal	Specification
XL-E4PT3-P	4	Pt100, PT1000 platinum thermistor (three-wire system) Measurement temperature range -100°C~500°C	Analog power supply DC24V±10%, 50mA; Resolution: 0.1°C Comprehensive accuracy: ±0.5% (relative maximum value) Conversion speed: 450ms/4 channels Filter coefficient: 0-254 Each channel is independently PID controlled and supports self-tuning function Capable of detecting power outages, disconnections, and exceeding the range
XL- E4TC-P	4	Temperature measurement range of K, S, E, N, B, T, J, and R-type thermocouples: K-type 0.0°C~1300.0°C B-type 0.0°C~1800.0°C S-type 0.0°C~1800.0°C J-type 0.0°C~1700.0°C N-type 0.0°C~1700.0°C T-type 0.0°C~400.0°C R-type 0.0°C~1700.0°C	Analog power supply DC24V±10%, 50mA Resolution: 0.1°C Comprehensive accuracy: ±1% (relative maximum value) Conversion speed: 420ms/4 channels Each channel is independently PID controlled and supports self-tuning function Capable of detecting power outages, disconnections, and exceeding the range
XL- E4PT3-P-H		1.PT100, PT1000, CU50, CU100 thermistor temperature measurement range: -200.0°C~850.0°C (PT100, PT1000) -50.0°C~150.0°C (CU50, CU1000)	Analog power supply DC24V±10%, 50mA; Resolution: 0.1°C, 0.01°C optional Comprehensive accuracy: 0.2% (relative maximum value) Conversion speed: 50ms/all channels; Filter coefficient: 0-254 Each channel is independently PID controlled and supports self-tuning function Capable of detecting power outages, disconnections, and exceeding the range Isolation between channels

### | Analog input module (AD type)

Model	Channel	Input signal	Specification	
XL-E4AD	4	Current input: 0~20mA/4~20mA/-20~20mA Voltage input: 0~5V/0~10V/-5~5V/-10~10V	Power supply for analog DC24V ±10%, 150mA Conversion speed 2ms/channel	
XL-E8AD-A	8	Current input: 0~20mA/4~20mA/-20~20mA	Resolution:  XL-E4AD, XL-E8AD-A, XL-E8AD-V: 1/16383 (14-bit)	
XL-E8AD-V	8	Voltage input: 0~5V/0~10V/-5~5V/-10~10V	XL-E8AD-A-S, XL-E8AD-V-S: $1/65536$ (16-bit) Comprehensive accuracy $\pm 1\%$	
XL-E8AD-A-S	8	Current input: 0~20mA/4~20mA/-20~20mA	AD filter coefficient 0~254 Channel enable bit is added AD channel has the functions of short circuit,	
XL-E8AD-V-S	8	Voltage input: 0~5V/0~10V/-5~5V/-10~10V	open circuit and over range detection	

### | Analog output module (DA type)

Model	Channel	Output signal	Specification
XL-E4DA	4	Voltage output: $0\sim5V/0\sim10V/-5\sim5V/-10\sim10V$ (external load resistor $2k\Omega\sim1M\Omega$ ) Current output: $0\sim20mA/4\sim20mA$ (external load resistor less than $500\Omega$ )	Power supply for analog DC24V $\pm 10\%$ , 150mA Conversion speed 2ms/channel Resolution 1/4095 (12-bit) Comprehensive accuracy $\pm 1\%$ Channel enable bit is added

### | Analog output module (DA type)

Model	Channel Input Output		Input/output signal	Specification
Model			input/output signat	Specification
XL-E4AD2DA	4	2	Current input: $0\sim20$ mA/ $4\sim20$ mA/ $-20\sim20$ mA Voltage input: $0\sim5$ V/ $0\sim10$ V/ $-5\sim5$ V/ $-10\sim10$ V Voltage output: $0\sim5$ V/ $0\sim10$ V/ $-5\sim5$ V/ $-10\sim10$ V (external load resistor $2$ k $\Omega\sim1$ M $\Omega$ ) Current output: $0\sim20$ mA/ $4\sim20$ mA (external load resistor less than $500$ $\Omega$ )	Power supply for analog DC24V ±10%, 150mA Conversion speed 2ms/channel Input resolution 1/16383 (14-bit) Output resolution 1/4095 (12-bit) Comprehensive accuracy ±1% AD filter coefficient 0-254 Channel enable bit is added AD channel has the functions of short circuit, open circuit and over range detection

control

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Stepping

Vision

# Expansion unit

### | Weighing extension module

It is used to convert the analog signal of the load cell into digital signal. The weighing module has the characteristics of dynamic weighing, small volume, stable performance, simple and applicable operation.

It can be widely used in seed, chemical industry, grain, feed weight control and other occasions.

- ① New algorithm, comprehensive optimization of hardware system, faster and more accurate weighing control
- ② Up to 4 analog voltage signals of load cells can be collected at the same time
- ③ High performance AD conversion, sampling speed up to 450 times/s
- 4 Display accuracy up to 1/300000
- ⑤ Automatic zero tracking function
- ⑥ The real-time data communicates with PLC at high speed through the bus, which does not affect the conversion speed





XL-E4WT-D

Item	Specification
Model	XL-E1WT-D,XL-E2WT-D,XL-E4WT-D
Analog input range	DC-20~20mV
AD actual resolution	1/8388607 (23Bit)
Max display resolution	1/500000
Nonlinear	0.01%F.S
Conversion speed	150 times/s, 300 times/s, 450 times/s
Power supply	DC24V±10%
Sensor excitation power supply	5VDC/120mA, four 350 $\Omega$ load cells can be connected in parallel

## Left expansion ED module

XL series left expansion ED module has the type of DA, AD conversion, temperature measurement, RS232, RS485 communication. XL series basic unit can connect 1 ED module (XL1 cannot support).

### Analog and temperature expansion ED module

Model	Input/output signal	Specification
XL-4AD-A-ED	4 channels current input: 0~20mA/4~20mA	
XL-4AD-V-ED	4 channels voltage input: 0~5V/0~10V	Power supply of module: DC24V±10%, 150mA Conversion speed: 10ms (all the channels)
XL-4DA-A-ED	4 channels current output: 0~20mA/4~20mA	Conversion speed. Toms (all the chainless)
XL-4DA-V-ED	4 channels voltage output: 0~5V/0~10V	AD/DA:
XL-2AD2DA-A-ED	2 channels current input: 0~20mA/4~20mA 2 channels current output: 0~20mA/4~20mA	Current/voltage input resolution: 1/4095 (12-bit) Current/voltage output resolution: 1/1023 (10-bit)
XL-2AD2DA-V-ED	2 channels voltage input: 0~5V/0~10V 2 channels voltage output: 0~5V/0~10V	AD/DA conversion comprehensive accuracy: ±1% AD filter coefficient: 0~254
XL-2AD2PT-A-ED	2 channels current input: 0~20mA/4~20mA 2 channels temperature input: PT100 platinum thermistor	PT: Temperature measurement range: -100~500°C
XL-2AD2PT-V-ED	2 channels voltage input: 0~5V/0~10V 2 channels temperature input: PT100 platinum thermistor	Digital output range: -1000~5000 PT filter 0~254
XL-2PT2DA-A-ED	2 channels current output: 0~20mA/4~20mA 2 channels temperature input: PT100 platinum thermistor	Temperature input resolution: 0.1°C PT channel comprehensive accuracy: ±0.8% of the full scale
XL-2PT2DA-V-ED	2 channels voltage output: 0~5V/0~10V 2 channels temperature input: PT100 platinum thermistor	of the fall scale

### | Communication expansion ED module

Model	Description
XL-NES-ED For the XL series PLC left side to expand RS232 or RS485 port. Only one can be used between RS232 and RS485, serial port is COM3	
XL-COBOX-ED	CANopen communication module. ① The communication speed can up to 1Mbps ② 64 communication nodes ③ Support master station and slave station mode ④ The reliability of the system is improved ⑤ Heartbeat protection ⑥ Simple wiring

# Accessories

#### Basic unit accessories list

Name	Model	Description	Product drawing
Communication/ programming cable	XVP/DVP	For communication and program uploading/downloading	0
USB to serial port convertor	USB-COM	For the conversion of DB9 female port and USB port	Xehur C
USB print cable	JC-UA-15	Special USB download cable for Xinje products (except the products without USB-B port)Black, with double magnetic rings to improve anti-interference ability	-9
DB9 to RS485 cable	JC-EB-length	DB9 to RS485 cable, for the RS485 communication between HMI and PLC, There are three models for selection: JC-EB-3 (3m), JC-EB-5 (5m), JC-EB-8 (8m)	<b>3</b>
X-NET fieldbus cable	JC-EA-length	Used together with XD-NE-BD or XD-NES-BD There are 7 models: JC-EA-1 (1m), JC-EA-05 (5m), JC-EA-10 (10m), JC-EA-20 (20m), JC-EA-30 (30m), JC-EA-50 (50m), JC-EA-100 (100m)	

### | Special power supply module

#### ■ XL-P50-E

XL independent power supply ensures the normal operation of PLC in a good and reliable power supply system, which can prolong the service

Specification
AC85-265V
DC24V
2A
No corrosive and combustible gas
0°C~60°C
5%RH~95%RH (no condensation)
Directly mounted on the guide rail
The third kind of grounding (not common

grounding with strong current system)



#### XL series terminal resistance

#### ■ XL-ETR

XL series terminal resistance module is required when external right expansion module is connected. Only for expansion module hardware version H3.1 and up.



#### XL series external terminal block

Some basic units and expansion modules need external terminal blocks, Xinje provide adapter terminal and connecting cable required by the following products.

Product model	Terminal block model	Adaptive connecting cable
XL5-64T10	JT-E32X+JT-E32YT	
XL5E-64T6	JT-E32X+JT-E32YT	
XL5E-64T10	JT-E32X+JT-E32YT	
XLME-64T10	JT-E32X+JT-E32YT	
XL-E32X-A	JT-E32X	JC-TE32-NN05 (0.5m) JC-TE32-NN10 (1.0m)
XL-E32PX-A	JT-E32X	JC-TE32-NN15 (1.5m)
XL-E16X16YT-A	JT-E16X16YT	
XL-E16PX16YT-A	JT-E16X16YT	
XL-E32YT-A	JT-E32YT	
XI-F16YT-A	JT-F16YT-A	





### \*Note: ① When connecting, the end closing to the transparent heat shrinkable tube and wrapping the model is connected to the PLC or module, and the other end is connected to the terminal block, which can not be reversed!!!

② One 64 points basic unit needs 2 special terminal blocks and 2

### | Program donwloader

### ■ JD-P03

- ① Without computer, it can be used for program and data transfer and download between multiple Xinje PLCs. It must be used together with JC-ED-25 and USB-COM (hardware version H2).
- ② Suitable PLC: uploading requires the XD/XL/XG2 series PLC or ZG/ZP series integrated controller firmware version v3.4.6 or v3.5.3 (Ethernet models) and up. Downloading requires the PLC firmware v3.4 and up.
- ③ JD-P03 has small size and footprint.
- \*Note: please refer to the manual for details. XDH, XC series PLC are not supported temporarily.

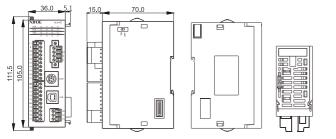


92

Slim type PLC -

# Dimension drawing (Unit: mm)

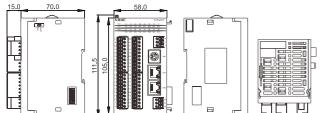
### XL series PLC basic unit



#### Suitable mo els

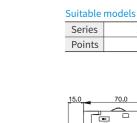
Series	XL1	XL3	XL5	XL5E
Points	16 points			

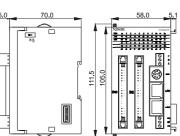
Note: the location of USB port for XL1-16T is RS232 port.



#### Suitable models

Series	XL5E	XL5N	XLME
Points	32	points	





32 points

XL3

bla madals	1105.0 106.0 1	

XLME

XSLH

XL5

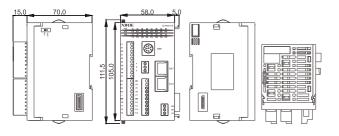
Series XL5 XL5E
Points 64 points

XLH

30 points

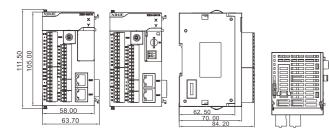
Series

\*Note: XL5-64 doesn't have two Ethernet ports.



#### Suitable models

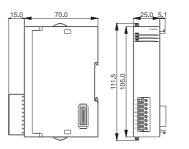
Series	XLH	XL5H
Points	24 p	oints

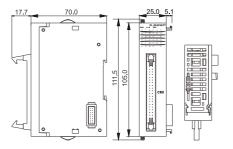


### Suitable models

Series	XSLH
Points	24 points

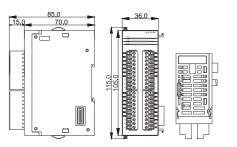
### | XL series right expansion module





16X16Y-A

32X-A 32YT-A



itab	e m	ode	s
icub		ouc	i J

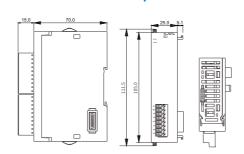
	Module type	Digital value	Analog value
	Models	8X/8Y	
		16X	All
		16Y	

Module type | Digital value | 16YT-A

Models

Suitable models		
Module type	Digital value	Analog value
	16X16Y	
Models	32X	4WT-D
	32Y	

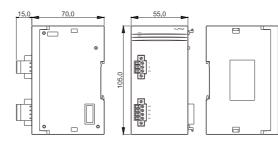
### | XL series left expansion ED module



#### Suitable models

Module type	Analog value	Communication
Models	All	XL-NES-ED

### | XL series power supply module



### | JT series external terminal block

