



MT4000 Series MT5000 Series Text Display Series

# Corporate Profile



Kinco Automation is a leading supplier of industrial automation products and solutions from China with full line of automation products including industrial human machine interfaces (HMI), AC servo systems, stepper systems, PLC, VFD and field bus products. Kinco aims to help you achieve a leading position in your market.

#### Reliable partner of your success

- ☐ Gain the competitive edge
- ☐ Support your business
- Serve your needs

#### High standard of quality management

- □ 100% function and reliability test before delivery
- Quality control and tracking go through the full product life cycle
- Certificated process control and quality management capability

#### **Proven performance**

 Customers in over 40 countries and in diverse markets and sectors

#### Perpetual innovation

- ☐ 8% of annual turnover invested in R&D
- □ Experienced international R&D teams
- Patent applications continue to rise every year
- ☐ Market-driven R&D: we organize our R&D
  activities around the voice from the customers



Provide Chinese Automation Solutions for Global Customers

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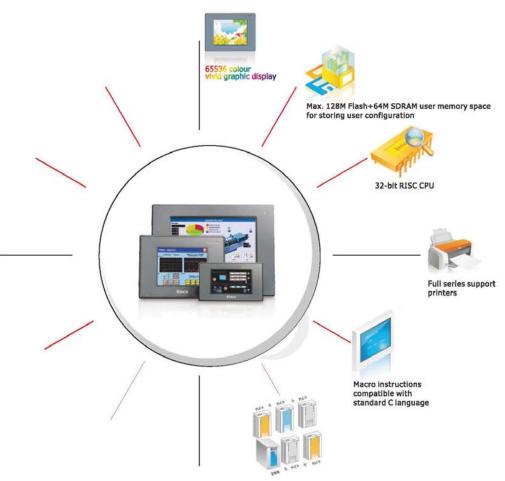
# Text Display MD200/300 Series 25

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# **System Description**

As the industrial competition is getting fiercer, more and more customers demand HMI products featuring more powerful functions, more convenient operation, quicker response speed, and lower cost. As an upgraded version, the MT4000 is designed to meet customer requirements. It derives from our consistent efforts to improve HMI touch screens and represents one of the many high-performance products for industrial applications.

Supporting almost all the mainstream functions for Middle-End applications with high performance, the MT4000 adopts the 32-bit RISC CPU, capable of calling complicated shapes and satisfying the requirements of most customers. It can communicate directly with many PLCs, while no special program is required for data transfer with these PLCs. In addition, it supports such functions as online simulation, super-large storage space for user configurations, and macros compatible with the standard C language. It can perform on-site data collection, processing, monitoring, and output in a quick, effective, and secure way.



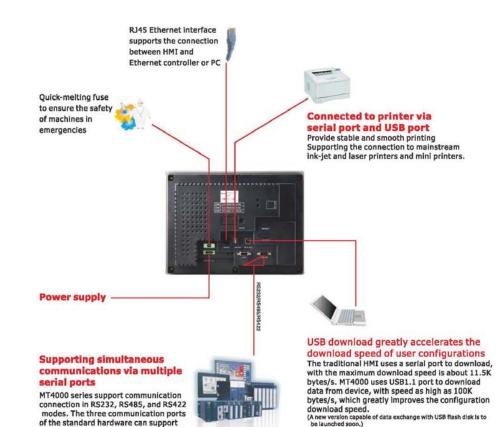
Three serial ports are simultaneously connected to such industrial control devices as PLC, inverter or servo driver

# Hardware Description

different PLC communication protocols at the same time and can be connected to different controllers. The three ports are completely independent. The PLC communication failure of one port will not affect the communication of the other port, featuring high reliability.

Standard configuration

Three high-speed serial ports One USB SLAVE port



## MT4000 Series Features



- > 10M/100M Ethernet interface, supports Ethernet communication based on CS structure, could be used for the setting of system parameters and online simulation of project configuration, multiple HMIs could be linked via Ethernet, could communicate with PC and PLC via Ethernet interface, could exchange data with controller which supports Ethernet communication via OPC software (only applicable to MT4000E series);
- 65536 true color TFT LCD, supports the import multiple windows image formats, such as BMP, JPG, GIF; supports all fonts of windows platform, supports 4 languages of interface display;
- > 32-bit, 400MHz, up to 800MHz RISC CPU;
- 128M Max. FLASH ROM + 64M Max. SDRAM/DDR, larger storage space;
- Compatible with major PLCs and controllers, could provide customer-made communication drive program rapidly;
- Max. 512KB recipe memory, could record data easily, convenient for user to inquire;
- > Supports the timing of a minimum of 100ms, configured with multiple functions such as timing data transfer, value accumulation, decrease and macro instruction;
- Real-time clock, could reserve time for more than 2 years at power-off state;
- > 3 COM ports, supports simultaneous communications with controllers of 3 different protocols, supports RS232/RS422/RS485 mode;
- 1 USB SLAVE port, greatly accelerates the download speed of user configuration;
- Connect to printer via serial port and USB port;
- Powerful configuration software-Kinco HMIware supports macro commands and provides rich drawing library.

#### MT4000 Series

# **Technical Specifications**





MT4210T

MT4220TE

Model	MT4210T	MT4220TE			
Performance specification					
Display	117/	TFT			
Resolution		72 pixels			
Color	65536 colors				
Backlight		ED			
Brightness	3000	cd/m²			
Backlight life		00 hr.			
Touch Panel	4-wire precision re	esistance network			
Processor	32-bit RISC CPU 400MHz	32-bit RISC CPU 800MHz			
Memory	128M FLASH -	+ 64M SDRAM			
Expandable memory	None	1 USB host, 1 SD card			
Recipe memory & RTC	512KB	+ RTC			
Printer port	Serial port	Serial port/USB port			
Ethernet	None	Support			
Program download	USB SLAVE/Serial port	USB SLAVE/Serial port/Ethernet port			
COM port	COM0:RS232/RS485-2/	RS485-4, COM2:RS232			
Electrical specification					
Rated power	4.8	3 W			
Rated voltage	DC	24V			
Input range	12~28VDC				
Power down allowed	<5	ims			
Insulation resistance	Greater than 50	M Ω @ 500V DC			
Dielectric strength test	500VAC	1 minute			
Structure specification					
Shell color	Bla	ack			
Shell material	Al	BS			
Dimensions(mm)	154×8	89×60			
Cutout size(mm)	145	×81			
Weight	0.3	4kg			
Environment specification					
Operating temperature	-20~	∙55℃			
Operating humidity	10~90% nor	n-condensing			
Storage temperature	-25~	<b>60℃</b>			
Storage humidity	10~90% nor	n-condensing			
Shockproof test	10~25Hz (X, Y, Z direct	ction, 2G, 30 minutes)			
Cooling method	Natural a	ir cooling			
Certification					
Degree of protection	IP65 (front panel)				
CE certification	Comply with EN61000-6-2:2005	and EN61000-6-4:2007standards			
FCC compatibility	Complies with	h FCC Class A			
UL certification	Comply with UL 508	None			

# MT4000 Series

# **Technical Specifications**



MT4300C/MT4300CE

Model	MT4300C	MT4300CE			
Performance specification					
Display	5.6	" TFT			
Resolution	320×234 pixels				
Color	6553	6 colors			
Backlight		LED			
Brightness	300	Ocd/m²			
Backlight life	500	000 hr.			
Touch Panel	4-wire precision	resistance network			
Processor	32-bit RISC CPU 400MHz	32-bit RISC CPU 800MHz			
Memory	128M Flash	+64M SDRAM			
Expandable memory	N	lone			
Recipe memory & RTC	512K	B & RTC			
Printer port	Seri	al port			
Ethernet	None	Support			
Program download	USB SLAVE/ Serial port	USB SLAVE/Serial port/ Ethernet port			
COM port		RS485-2/RS485-4, L/RS485-4, COM2:RS232			
Electrical specification	1 4000 000 1000 100 100 100 100 100 100	MIDDA STORE STATE OF			
Rated power		ŧ W			
Rated voltage	D	C24V			
Input range	12~	28VDC			
Power down allowed	<	5ms			
Insulation resistance	Greater than 5	50M 2 @ 500V DC			
Dielectric strength test	500V A0	C 1 minute			
Structure specification					
Shell color	В	lack			
Shell material	-	ABS			
Dimensions(mm)	204×	150×52			
Cutout size(mm)	192	×138			
Weight	0.	85kg			
Environment specification					
Operating temperature	0~	-50°C			
Operating humidity	10~90% no	on-condensing			
Storage temperature	-10~60°C				
Storage humidity	10~90% no	10~90% non-condensing			
Shockproof test	10~25Hz (X, Y, Z direction, 2G, 30 minutes)				
Cooling method		air cooling			
Certification					
Degree of protection	IP65 (fr	ont panel)			
CE certification		and EN61000-6-4:2007standards			
FCC compatibility	Complies with FCC Class A				

# MT4000 Series

# **Technical Specifications**





HT4404T/MT4424TE

MT4414TE-CAN

Model	MT4404T	MT4414T	HT4414	TE+	MT4424TE	
Performance specification						
Display			7" 16:9 TFT			
Resolution		800×480 pixels				
Color			65536 colors			
Backlight			LED			
Brightness			300cd/m <sup>2</sup>			
Backlight life			50000 hr.			
Touch Panel		4-wire prec	ision resistance netwo	ork		
Processor	32-bit RISC CP	U 400MHz			32-bit RISC CPU 800MH	
Memory	128M Flash+64M DDR2	128M I	LASH+64M SDRAM		128M Flash+64M DDR	
Expandable memory	None	- (10.00)	1 USB host		1 USB host, 1 SD card	
Recipe memory & RTC			512KB & RTC			
Printer port	Serial po	ort		USB/S	Serial port	
Ethernet	None	None	Suppor	t	Support	
Program download	USB SLAVE/Se	rial port	USB SLA	VE/Seria	al port/Ethernet port	
COM port	COM0:RS232/RS485-2/ RS485-4, COM1:RS232/ RS485-2/RS485-4, COM2:RS232	COM0:RS	232/RS485-2/RS485- COM2:RS232		COM0:RS232/RS485-2/ RS485-4, COM1:RS232/ RS485-2/RS485-4, COM2:RS232	
Electrical specification						
Rated power	8W		4W		8W	
Rated voltage	DC24V		DC24V		DC24V	
Input range	21~28VDC, In-built isolated power a	upply.	12~28VDC	21~28VDC, In-built Isolated power		
Power down allowed	<5ms		<3ms	<5ms		
Insulation resistance		Greater t	han 50M 0 @ 500V DO	:		
Dielectric strength test		50	OV AC 1 minute			
Structure specification						
Shell color			Black			
Shell material			ABS			
Dimensions(mm)	206.8 × 124.2 × 45.1		204×150×37		206.8 × 124.2 × 45.1	
Cutout size(mm)	193.5 × 112.5		192×138		193.5 × 112.5	
Weight	0.8kg		0.75kg		0.8kg	
<b>Environment specification</b>	- All	110				
Operating temperature			0~50℃			
Operating humidity		10~90	% non-condensing			
Storage temperature		-10~60°C				
Storage humidity	10~90% non-condensing					
Shockproof test		10~25Hz (X, Y, Z direction, 2G, 30 minutes)				
Cooling method	Natural air cooling					
Certification	10		3.5			
Degree of protection		IP	65 (front panel)			
CE certification	Comply wit		2005 and EN61000-6	-4:2007	standards	
FCC compatibility		NAME AND ADDRESS OF THE OWNER, WHEN PERSONS AND	es with FCC Class A			
UL certification		None		1 1	Comply with UL 508	

<sup>\*</sup> MT4414TE-CAN with CANopen interface, other specifications are same with MT4414TE.

# **MT4000 Series**

# **Technical Specifications**





MT4403T/MT4403TE

MT4512T/MT4512TE MT4522T/MT4522TE

Model	MT4403T	MT4403TE	MT4512T	MT4512TE	MT4522T	MT4522TE	
Performance specification							
Display	8"	TFT	10.1" 1	6:9 TFT	10.1" 1	6:9 TFT	
Resolution	800 × 6	00 pixels	800 × 4	80 pixels	800 × 480 pixels		
Color	65536	colors	65536	colors	65536	colors	
Backlight	L	ED	L	ED	L	ED	
Brightness	250	cd/m²	320	cd/m²	320	cd/m²	
Backlight life			500	00 hr.			
Touch Panel		4	-wire precision	resistance networ	k	100000	
Processor	32-1	of RISC CPU 400M	4Hz	32-1	oit RISC CPU 800	MHz	
Memory		10101010121101111	128M FLASH	+64M SDRAM			
Expandable memory		None	COMMERCIAL VOID	1 USB host	1 USB Hos	t, 1 SD Card	
Recipe memory & RTC	256KE	& RTC	512KE	& RTC	512KE	& RTC	
Printer port	Seria	l port	Serial port		USB/Serial port		
Ethernet	None	Support	None	Support	None	Support	
Program download	USB SLAVE/ Serial port	USB SLAVE/ Serial port/ Ethernet port	USB SLAVE/ Serial port	USB SLAVE/ Serial port/ Ethernet port	USB SLAVE/ Serial port	USB SLAVE/ Serial port/ Ethernet port	
COM port	COM0:RS232/R COM1:RS232/R COM2	S485-2/RS485-4, S485-2/RS485-4, :RS232	COM0:RS232/RS485-2/RS485-4, COM2:RS232		COM0:RS232/RS485-2/RS485-4 COM1:RS232/RS485-2/RS485-4 COM2:RS232		
Electrical specification	*						
Rated power	8	W	8	W	5.5W		
Rated voltage	DC	24V	DC24V		DC24V		
Input range	12~28VDC, in-built isolated power supply.		12~28VDC		21~2	8VDC	
Power down allowed		<5ms					
Insulation resistance			Greater than 50	MΩ@ 500V DC			
Dielectric strength test		500V AC 1 minute					
Structure specification							
Shell color	BI	ack	Bla	ack	Black		
Shell material	A	BS	A	ABS		BS	
Dimensions(mm)	235 × 1	72 × 53	310 × 230 × 55		310×230×55		
Cutout size(mm)	224	× 161	298 × 218		298×218		
Weight	1.	3kg	2kg		1.47kg		
Environment specification	4						
Operating temperature	-10-	-50℃	0~!	50°C	0~!	50°C	
Operating humidity		10~90% non-condensing					
Storage temperature	-20-	-60℃	-10~60°C		-10^	60°C	
Storage humidity		10~90% non-condensing					
Shockproof test		10~2	5Hz (X, Y, Z dire	ction, 2G, 30 min	utes)		
Cooling method			The same of the sa	ir cooling			
Certification							
Degree of protection			IP65 (fro	int panel)			
CE certification		Comply with EN6			:2007standards		
FCC compatibility			Complies wit	h FCC Class A			

# **MT4000 Series**

# **Technical Specifications**



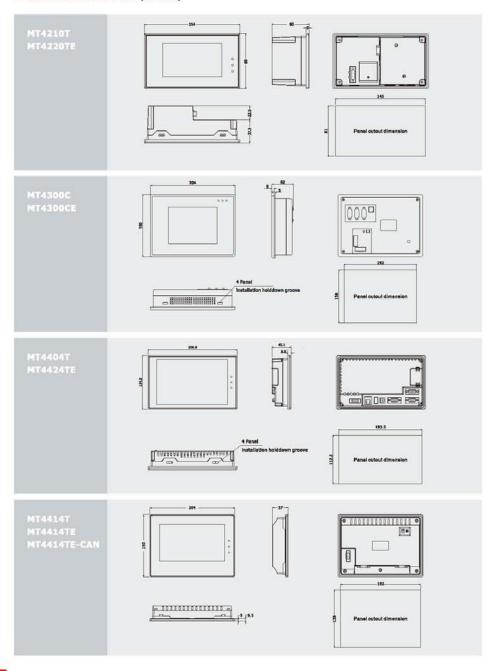


MT4513T/MT4513TE MT4523T/MT4523TE

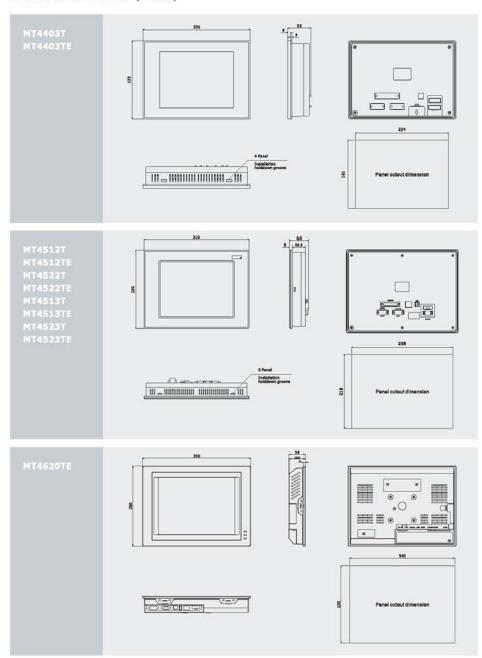
MY4620TE

Model	MT4513T	MT4513TE	MT4523T	MT4523TE	MT4620TE		
Performance specification	163		8		20		
Display	10.4	'TFT	10.4	12.1" TFT			
Resolution	800 × 60	800 × 600 pixels		00 pixels	800 × 600 pixel		
Color	65536	colors	65536	colors	65536 colors		
Backlight	LE	D	L	ED	LED		
Brightness	3000	d/m²	3000	cd/m²	450cd/m <sup>2</sup>		
Backlight life			50000 hr.		V		
Touch Panel		4-wire	precision resistance	network			
Processor	400MHz RISC	800MHz RISC	520MF	tz RISC	800MHz RISC		
Memory	128M FLASH	+64M DDR2	128M FLASH	+64M SDRAM	128M FLASH+ 64M DDR		
Expandable memory	None	1 USB HOST	1 SD Card.	1 USB HOST	1 SD Card, 1 USB HOS		
Recipe memory & RTC	512KB	& RTC		& RTC	128KB & RTC		
Printer port	Serial port	USB SLAVE/ Serial port	USB SLAVE	/Serial port	USB SLAVE/Serial por Ethernet port		
Ethernet	None	Support	None	Support	Support		
Program download	USB SLAVE/ Serial port	USB SLAVE/ Serial port/ Ethernet port	USB SLAVE/ Serial port	USB SLAVE/ Serial port/ Ethernet port	USB SLAVE/ Serial port/ Ethernet port		
COM port	COM0:RS232/RS485-2/RS485-4, COM2:RS232 COM0:RS232/RS485-2/RS485-4, COM1:RS232/RS485						
Electrical specification			Control Contro				
Rated power	8	w	12	W	10 W		
Rated voltage		24V	DC	24V	DC24V		
Input range	10~2	8VDC	21~28VDC	, in-built isolated po	ower supply.		
Power down allowed		<5ms					
Insulation resistance		Grea	ter than 50M Q @ 50	OV DC	-		
Dielectric strength test			500V AC 1 minute				
Structure specification			_				
Shell color	Dark	gray	Bla	ack	Cold gray		
Shell material		ABS	A	PC			
Dimensions(mm)	310×2	30×55	310×2	350×260×54			
Cutout size(mm)	298>	<218	298×218		340×250		
Weight	21	kg .	2kg		2kg		
<b>Environment specification</b>							
Operating temperature	0~5	0°C	0~!	50°C	-10~55℃		
Operating humidity		10	~90% non-condens	ing	71-77-77-77		
Storage temperature	-10~60℃		-10~60°C		-20~60℃		
Storage humidity		10	~90% non-condens	ing			
Shockproof test		10~25Hz (	X, Y, Z direction, 2G,	30 minutes)			
Cooling method	-		Natural air cooling				
Certification							
Degree of protection			IP65 (front panel)				
CE certification	Cor	Comply with EN61000-6-2:2005 and EN61000-6-4:2007standards					
FCC compatibility		Compiles with FCC Class A					

# Dimensions (Unit:mm)

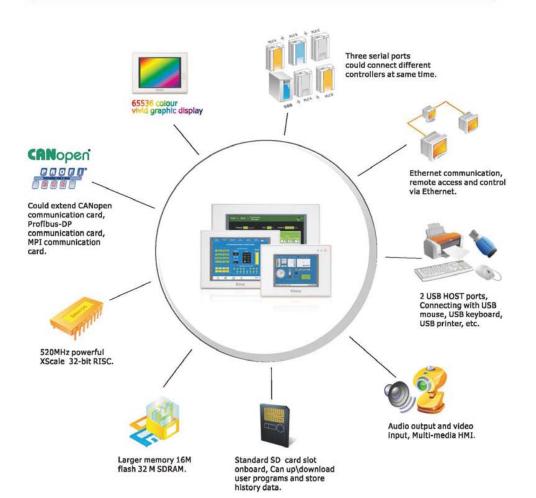


# Dimensions (Unit:mm)



# **System Description**

MT5000 series HMI use INTEL 520MHz RISC CPU and LINUX operating system, have the easy learning configuration software, maintain the classic HMI design. It supports USB HOST function and SD card, and could manage data and preserve parameters online, you can quickly up/download user programs, and integrate the audio output; MT5000 series HMI integrate industry Ethernet and Fieldbus interface, could be linked with other screens in eView protocol, could communicate with other controllers via Ethernet interface in MODBUS TCP/IP protocol, could exchange data with controller via OPC software, could extend CANopen communication card and Profibus-DP communication card, connecting to the field bus network.



# **Hardware Description**

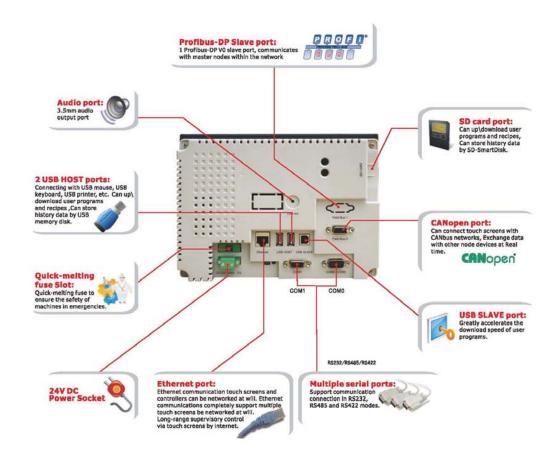
#### **Standard Configuration:**

Three RS-232/485/422 ports Two USB-HOST ports One USB SLAVE port One Ethernet Interface One Audio Output Interface Two Video input interface

One SD Card

#### **Expandable Configuration:**

Profibus-DP Communication Card CANopen Communication Card MPI Communication Card



## MT5000 Series Features



- Higher performance and efficiency thanks to the 520MHz powerful XScale® 32-bit RISC processor;
- Larger and expansible memory for more complicated user application and data storage;
- Dual USB host ports compatible with peripherals like mouse, keyboard, printer and USB disk. Users can upload/download application and recipes data from/to the panel by using USB disk. Historical data can also be stored in the USB disk;
- Standard SD® card slot onboard Just like the USB disk, SD® card can be used for uploading/downloading application and recipes data from/to the panel. Also, historical data can be stored in the card;
- 3.5mm audio output port for external speaker;
- 10.4 above models support two-channel PAL video input interface, they can be used real-time monitoring on industrial fields;
- RJ45 Ethernet interface through which the panel can communicate with controllers and other panels, users can remotely get access to the panel via the internet also, Via Kinco OPC software, user can realize factory automation network monitoring;
- Optional CANopen interface makes it possible for using the panel as a CAN node. With proper drivers, the panel can be used as a host or client. With MT5020, you CAN;
- > The panel can exchange data with Profibus-DP node with the optional Profibus Interface;
- With optional MPI interface, the panel can communicate with Siemens S7-300/400 without any costly adapters;
- 1 USB slave port for downloading application data from the PC faster than via serial port;
- 65536 color TFT LCD ensures vivid graphic display, supports the import multiple windows image formats, such as BMP, JPG, GIF; supports all fonts of windows platform, supports 4 languages of interdace display;
- 3 COM ports, supports simutaneous communications with controllers of 3 different protocols, supports RS232/RS422/RS485 modes, supports exchange serial ports by software.

#### MT5000 Series

# **Technical Specifications**





Model	MT5320C	MT5320C -DP	MT5320C -CAN	MT5320C -MPI	MT5323T	MT5323T -DP	MT5323T -CAN	MT5323 -MPI
Performance specific	ation				,			
Display		5.6"	TFT		5.7" TFT			
Resolution		320 × 23	34 pixels		640 × 480 pixels			
Color		65536 colors				65536	colors	
Backlight		LI	ED				ED	
Brightness		3000	cd/m²			700	cd/m²	
Backlight life		5000	00 hr.			500	00 hr.	
Touch Panel	4-w	ire precision r	esistance net	work	4-v	vire precision	esistance net	work
Processor		The second section of the second section is a second section of the section o	CPU 520MHz			The second secon	CPU 520MHz	
Memory			16M SDRAM				+32M SDRAM	
Recipe memory & RTC			& RTC				& RTC	
Expandable memory	15	D Card (≤2G		OST	15	SD Card (≤20	Charles and a second	OST
Printer port			rial port		-	and the common destal advances in the particular and an extension	erial port	-
Ethernet		The second secon	Base-T				Base-T	
Audio interface		The state of the s	ne ne			A STATE OF THE PARTY OF T	one	
Vedio interface		4000	ne				one	
Program download	111000	SLAVE port/Se		met nert	1 1100	SLAVE port/Se		mat nort
COM port		OMO:RS232/RS						
COM port		232/RS485-2			COM0:RS232/RS485-2/RS485-4, COM1:RS232/RS485-2/RS485-4, COM2:RS			
Expansion port	None	Profibus-DP	CANopen	MPI	None	Profibus-DP	CANopen	MPI
Electrical specification	п							
Rated power		7.2	2 W			10	W	
Rated voltage		DC	24V		DC24V			
Input range		21~2	8VDC		12~28VDC			
Momentary power-off		<3	ims		<3ms			
Insulation resistance	G	reater than 50	MΩ@ 500V	C	Greater than 50MΩ@ 500V DC			
Dielectric strength test			1 minute		500V AC 1 minute			
Structure specification	n							
Shell color	Acr.	Light	-gray			Ligh	t-gray	
Shell material		10.0700	BS		ABS			
Dimensions(mm)		19.0	50×56.7		204 × 150 × 56.7			
Cutout size(mm)			× 138		192 × 138			
Weight			6kg		0.96kg			
Environment specific	ation	0.5	ong		_	0	okg	
Operating temperature	(1312/11)	n <sub>~</sub>	15°C	-		-20-	√70℃	
Operating temperature  Operating humidity			n-condensing					
Storage temperature					10~90% non-condensing -30~80℃			-
Storage temperature Storage humidity		-30~80℃ 10~90% non-condensing				n-condensing		
Shockproof test	10.35			minutes!	10-25	Hz (X, Y, Z dire		minutant
Cooling method	10~25Hz (X, Y, Z direction, 2G, 30 minutes) Natural air cooling		10~25		air cooling	minutes)		
		Natural a	iii cooling			Natural a	air cooling	
Cartification		TOGE CO.				TRACE CO.	-11	
Degree of protection			nt panel)				ont panel)	
CE certification		omply with EN d EN61000-6-			Comply with EN61000-6-2:2005 and EN61000-6-4:2007standards			
FCC compatibility			h FCC Class A		Complies with FCC Class A			

# MT5000 Series

# **Technical Specifications**





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	800 × 60	and all the same of the same o			10.4	'TET			
		800 × 600 pixels				640 × 480 pixels			
	65536					36			
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	300c					d/m²			
	5000				5000	-			
4-wi	re precision re		vork	4-w	ire precision re		work		
	32-bit RISC					CPU 520MHz			
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	1 USB SI CO COM1:RS. None  Gi	16M FLASH+ 512KB 1 SD Card ⟨ ≤2G USB/Se 10/100 1 Audio outp No 1 USB SLAVE port/Ser COM0:RS232/RS COM1:RS232/RS485-2/ None Profibus-DP  8 DC: 12~2  <3 Greater than 50 500V AC  Light Ai 235 × 17 224+ 1.2  tion 10~90% nor -10~ 10~95Hz (X, Y, Z direc Natural a  IP65 (fro Comply with EN and EN61000-6-	16M FLASH+32M SDRAM	16M FLASH+32M SDRAM 512KB & RTC  1 SD Card (≤2GB), 2 USB HOST USB/Serial port 10/100 Base-T 1 Audio output interface None  1 USB SLAVE port/Serial port/Ethernet port COM0:R5232/R5485-2/R5485-4, COM1:R5232/R5485-2/R5485-4, COM1:R5232/R5485-2/R5485-4, COM1:R5232/R5485-2/R5485-4, COM2:R5232/R5485-2/R5485-4, COM2:R5232/R5485-2/R5485-4, COM2:R5232/R5485-2/R5485-4, COM2:R5232/R5485-2/R5485-4, COM2:R5232/R5485-2/R5485-4, COM2:R5232/R5485-2/R5485-4, COM2:R5232/R5485-2/R5485-4, COM2:R5232/R5485-4, COM2:R5232	16M FLASH+32M SDRAM	16M FLASH+32M SDRAM 512KB & RTC 512KB 1 SD Card ( ≤2GB) , 2 USB HOST 1 SD Card ( ≤2GB) , 2 USB HOST 1 SD Card ( ≤2GB) , 2 USB HOST 1 SD Card ( ≤2GB) , 2 USB HOST 1 SD Card ( ≤2GB) , 2 USB HOST 1 USB/Serial port 1 USB/Serial port 1 USB/Serial port 1 USB/Serial port 1 USB SLAVE port/Serial port/Ethernet port/Serial port/Ethernet port 1 USB SLAVE port/Serial port/Ethernet port 1 USB SLAVE port/Serial port/Ethernet port 1 USB SLAVE port/Serial port/Serial port/Serial port/Serial port/Serial port/Serial port/Serial port/Serial port/Serial	16M FLASH+32M SDRAM		



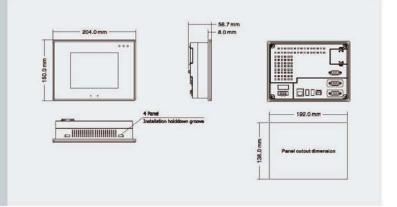


Model	MT5620T	MT5620T -DP	MT5620T -CAN	MT5620T -MPI	MT5720T	MT5720T -DP	MT5720T -CAN	MT5720
Performance specific	ation				2.0			
Display		12.1	"TFT		15" TFT			
Resolution		800 × 60	00 pixels		1024 × 768 pixels			
Color		65536				65	536	
Backlight	-	20	CFL			20	CCFL	
Brightness		2500	cd/m²			250	cd/m²	
Backlight life		5000	00 hr.			500	00 hr.	
Touch Panel	4-w	ire precision r	esistance net	work	4-v	vire precision	resistance net	work
Processor		32-bit RISC	CPU 520MHz			32-bit RISC	CPU 520MHz	0.000
Memory		16M FLASH	-32M SDRAM			16M FLASH	+32M SDRAM	
Recipe memory & RTC		512KB	& RTC			512KE	8 & RTC	
Expandable memory	15	D Card (≤2G	B), 2 USB H	OST	15	SD Card (≤20	B), 2 USB H	OST
Printer port		USB/Se	rial port			USB/Se	erial port	
Ethernet		10/100	Base-T			10/100	Base-T	
Audio interface		1 Audio out	put interface			1 Audio out	put interface	
Vedio interface	2 PAL sign	al video input	the state of the s	connector	2 PAL sign	nal video input		connector
Program download		SLAVE port/Se				SLAVE port/Se		
COM port	COM0:RS232/RS485-2/RS485-4, COM1:RS232/RS485-2/RS485-4, COM2:RS232				COM0:RS232/RS485-2/RS485-4, COM1:RS232/RS485-2/RS485-4, COM2:RS23			i-4,
Expansion port	None		CANopen	MPI	None	Profibus-DP		MPI
Electrical specification		CONTRACTOR OF THE PARTY	-	100000	1011000	A CONTRACTOR OF THE PARTY OF TH		
Rated power		15.	6 W	1	16.8 W			
Rated voltage			24V		DC24V			
Input range			8VDC		21~28VDC			
Momentary power-off		<3	Ims		<3ms			
Insulation resistance	G	reater than 5	0MΩ@ 500V I	OC.	Greater than 50MΩ@ 500V DC			
Dielectric strength test			1 minute		500V AC 1 minute			
Structure specification				- 1	100			
Shell color	T .	BI	ack		T .	BI	ack	
Shell material			etal		Metal			
Dimensions(mm)		350 × 20	54 × 48.7		406. 5 × 313. 5 × 48.3			
Cutout size(mm)			× 241		387.5×294.5			
Weight		4.	3kg		5.1kg			
Environment specific	ation				407			
Operating temperature		-10-	-60°C		T	0~	50°C	
Operating humidity	10~90% non-condensing					10~90% no	n-condensing	
Storage temperature	-	-20~70°C			-20~60°C			
Storage humidity		10~90% non-condensing			10~90% non-condensing			
Shockproof test	10~25Hz (X, Y, Z direction, 2G, 30 minutes)			10~25Hz (X, Y, Z direction, 2G, 30 minutes)				
Cooling method			ir cooling				air cooling	,
Certification	10				400			
Degree of protection		IP65 (fro	ont panel)		1	IP65 (fre	ont panel)	
CE certification	(	omply with EN	61000-6-2:20	5.000	Comply with EN61000-6-2:2005			The state of the s
ECC compatibility	and EN61000-6-4:2007standards and EN61000-6-4:2007standards							
FCC compatibility	bility Complies with FCC Class A Complies with FCC Class A							

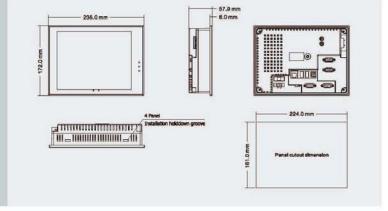
# Dimensions (Unit:mm)

MT5320C-DP MT5320C-CAN MT5320C-MPI

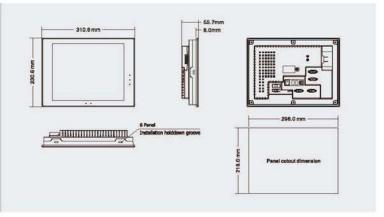
MT5323T MT5323T-DP MT5323T-CAI MT5323T-MP



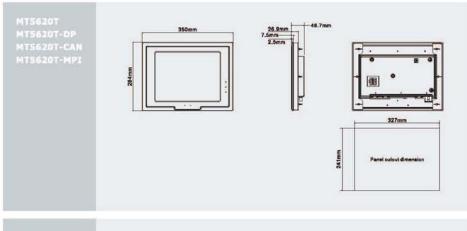
MT5423T MT5423T-DP MT5423T-CAN MT5423T-MPI



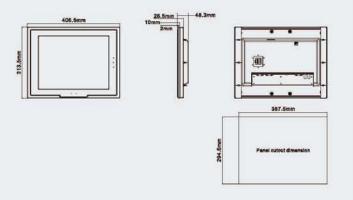
MT5520T MT5520T-DP MT5520T-CAN MT5520T-MPI



# Dimensions (Unit:mm)





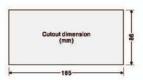


# Text Display MD200/300 Series

#### **MD204L**







	The second of th
Shell color	Grey
Display	4.3" STN
Resolution	192×64 Pixel (Supporting display of 4lines 12 Chinese characters)
Color	Monochromatic
Brightness	60cd/m²
Contrast	Adjustable by Potentiometer
Backlight	Long Service life Yellow/Green LED
LCM life time	Greater than 50,000 Hours at 25±2°C, 65±10%RH
Panel	Non-touch screen
CPU	8-bit processor
Memory	64KB Flash ROM
Recipe memory	None
RTC	None
Function key	20 keys, customizable (including 10 Numeric Input Keys)
COM port	COM0:PC RS232&PLC RS485/422&PLC RS232
CE	EN61000-6-2:2005, EN61000-6-4:2007

Power supply 21~28VDC MAX 150mA@24V DC Interference immunity test Voltage 1500Vp-p, Pulse cycle 1µs, duration 1µs Dielectric strength 500V AC (1min) Isolation resistance Exceed 10MO at 500V DC Vibration endurance 10~25Hz (X, Y, Z Direction, 2G, 30 minutes) Protection class IP65 Front Panel Operating temperature 0~50°C Storage temperature -20~70℃ 20~90%RH (non-condensing) Operating humidity Engineering plastic ABS+PC Shell material 172×95×30 mm Dimensions(W×H×D) Display size(W×H) 101×36 mm Panel cutout dimension 165×86 mm Cooling method Natural air cooling Weight 0.3 kg

#### **MD214L**





Cutout dimension (mm)	-78
165	

Shell color	Silver white	Power su
Display	4.3° FSTN	Current
Resolution	192×64 Pixel (Supporting display of 4lines 12 Chinese characters)	Interfere
Color	Monochromatic	Dielectri
Brightness	97cd/m³	Isolation
Contrast	Adjustable by Potentiometer	Vibration
Backlight	White LED	Protectio
LCM life time	Greater than 50,000 Hours at 25±2°C, 65±10%RH	Operatir
Panel	Non-touch screen	Storage
CPU	8-bit processor	Operatir
Memory	64KB Flash ROM	Shell ma
Recipe memory	None	Dimensi
RTC	None	Display :
Function key	19 keys, customizable (including 10 Numeric Input Keys)	Panel cu
COM port	COM0:PC RS232&PLC RS485/422&PLC RS232	Cooling
CE	EN61000-6-2:2005, EN61000-6-4:2007	Weight

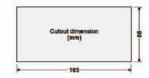
21~28VDC MAX 150mA@24V DC ence immunity test Voltage 1500Vp-p, Pulse cycle 1µs, duration 1µs 500V AC (1min) n resistance Exceed 10MΩ at 500V DC on endurance 10~25Hz (X, Y, Z Direction, 2G, 30 minutes) ion class IP65 Front Panel ing temperature -20-70℃ temperature ing humidity 20~90%RH (non-condensing) Engineering plastic ABS+PC aterial 175×90×26 mm sions(W×H×D) size(W×H) 101×36 mm utout dimension 165×78 mm method Natural air cooling 0.3 kg

# Text Display MD200/300 Series

## MD224L







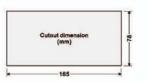
Shell color	Silver white
Display	4.3" STN
Resolution	192×64 Pixel (Supporting display of 4lines 12 Chinese characters)
Color	Monochromatic
Brightness	60cd/m³
Contrast	Adjustable by Potentiometer
Backlight	Long Service life Yellow/Green LED
LCM life time	Greater than 50,000 Hours at 25±2°C, 65±10%RH
Panel	Non-touch screen
CPU	8-bit processor
Memory	64KB Flash ROM
Recipe memory	None
RTC	None
Function key	20 keys, customizable (including 10 Numeric Input Keys)
COM port	COM0:PC RS232&PLC RS485/422&PLC RS232
CE	EN61000-6-2:2005, EN61000-6-4:2007

	720 023021
Power supply	21~28VDC
Current	MAX 150mA@24V DC
Interference immunity test	Voltage 1500Vp-p, Pulse cycle 1µs, duration 1µs
Dielectric strength	500V AC (1min)
Isolation resistance	Exceed 10MΩ at 500V DC
Vibration endurance	10~25Hz (X, Y, Z Direction, 2G, 30 minutes)
Protection class	IP65 Front Panel
Operating temperature	0~50°C
Storage temperature	-20~70°C
Operating humidity	20~90%RH (non-condensing)
Shell material	Engineering plastic ABS+PC
Dimensions(W×H×D)	172×95×30 mm
Display size(W×H)	101×36 mm
Panel cutout dimension	165×86 mm
Cooling method	Natural air cooling
Weight	0.3 kg

### **MD304L**







Shell color	Silver white
Display	4.3" FSTN
Resolution	192×64 Pixel (Supporting display of 4lines 12 Chinese characters)
Color	Monochromatic
Brightness	97cd/m³
Contrast	Adjustable by Potentiometer
Backlight	White LED
LCM life time	Greater than 50,000 Hours at 25±2°C, 65±10%RH
Panel	Non-touch screen
CPU	8-bit processor
Memory	64KB Flash ROM
Recipe memory	2KB EEPROM
RTC	Accuracy 30PPM
Function key	19 keys, customizable (including 10 Numeric Input Keys)
COM port	COM0:PC RS232&PLC RS485/422&PLC RS232
CE	EN61000-6-2:2005, EN61000-6-4:2007

lower supply	21~28VDC
Current	MAX 150mA@24V DC
nterference immunity test	Voltage 1500Vp-p, Pulse cycle 1µs, duration 1µs
Dielectric strength	500V AC (1min)
solation resistance	Exceed 10MΩ at 500V DC
ibration endurance	10~25Hz (X, Y, Z Direction, 2G, 30 minutes)
rotection class	IP65 Front Panel
perating temperature	0~50°C
torage temperature	-20~70°C
perating humidity	20~90%RH (non-condensing)
hell material	Engineering plastic ABS+PC
Dimensions(W×H×D)	175×90×26 mm
Display size(W×H)	101×36 mm
anel cutout dimension	165×78 mm
Cooling method	Natural air cooling
Veight	0.3 kg

# Software Description

Kinco HMIware is suitable for MT4000/MT5000 series HMIs.



A simple and practical platformfor project design and editing

-Completing all functions from editing components library and simulation compliation, to download; -Browse various project information and make better adjustment in time.

#### **Project file window**

All windows can be dragged freely,

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B. B

Facilitate in modifying components library

- Click an image library file, and the user can browse and edit the file;
- · Visual understanding of the HMI quantity used.

and a user can create individualized operation

22.2

interfaces according to his/her own habits.



Menu bar:

True color icon, visual and convenient navigation

- Familiar icon style for most users easy to use:
- · Simple and visual function.

#### Compilation information window

Display compilation progress After compliation display,

the user can download files.

#### Project structure window

Master the conditions of the entire project

Master the HMI. HMI components and PLC type used for the entire project.



#### Components library window

Five components libraries, meeting design requirements



Communication

99 B 12 0 0 <u>B</u> <u>B</u>

Touch screen



PLC













PLC components Functional components

## Software Description



#### **Completely support contrast** and brightness adjustment

The contrast and brightness of the LCD can be adjusted online through setting special register without the need to adjust them by means of jumper switch or potentiometer.

#### Rich components library resources Facilitate in making beautiful configuration interfaces

The original components libraries of the HMIware can meet design requirements in most cases. If a customer has special requirement, he can build own graph library with the drawing tools of HMIware software. HMIware has a huge number of 3D effect components which facilitate in making mobile 3D graphics and animation.

#### Digital photos/Corporate logo import

The HMIware supports the import of multiple Windows image formats, such as JPEG, GIF and BMP. The user can import their own logo or other images as initial screen.

#### Supporting all fonts of the Windows platform

In graphic mode, static text can be displayed in any fonts supported by the windows system on the configuration interface. The user has more choice for fonts now.

#### Recipe editing function

Providing Max.256K Words recipe memory, without any loss upon power failure, facilitating the setting and modification of initial values of the equipment, capable of providing multiple different recipes for the controller.

#### Perfect event log function

It can store records of events occurred during production, without any loss upon power failure, facilitating invocation anytime; if necessary, this function can be used to learn the operational history of the equipment and improve the design of the process flow.

#### Powerful vector graphic function, supporting drawing of arcs, sectors, scales and pointers

Eight line width options

Three-level zoom-in/zoom-out display

Supporting drawing of various vector-based image

Wer-defined color filling in multiple modes

#### **Password** protection

16 different authority levels, authorized operators can execute necessary setting and operations according to their authority level. The security performance of the system is greatly enhanced.

#### Multi-language application environment

Any language supported by Windows can be displayed on the panel. The user can use up to 4 languages within a project, which makes it possible for global users to share their wisdom with their clients worldwide.



Bitmap image

Vector graph







# Software Description



#### Learn compiling macro commands in ten minutes

Macro codes compatible with standard C language can be triggered in multiple methods, featuring powerful function and flexible use.

#### In the past

Most HMIs in the market use respectively defined script languages, lack of versatility, which are hard to learn since there is no sufficient reference resources, and furthermore they cannot be implanted into other HMI panels.

#### Present

The HMIware provides unique macro instruction compilation fully compatible with the standard C language. If you are familiar with the C language, you can learn how to code macro instructions in ten minutes. The rich reference documents, powerful function, and easy portability greatly enhance the macro command function of the HMIware.





Powerful online networking and synchronous communication function and rapid processing speed have simplified the complicated process flow design.

#### Powerful timer function

- The timer of MT4000/MT5000 can implement the timing of a minimum of 100 ms, featuring accurate timing;
- Configured with multiple functions such as timed data transfer,
   value settings, accumulation, decrease, and timed macro instruction;
- Multiple trigger modes such as register trigger and initialization trigger, to facilitate users in implementing flexible configuration programming.

#### Customizable startup LOGO window

Different from other HMIs which do not have any screen display upon startup, the MT4000/MT5000 can immediately display a user-defined LOGO upon power-on until the configuration window finishes startup, lasting about five seconds. The user can freely edit and modify the startup window.

#### **Provide Chinese Automation Solutions for Global Customers**





Kinco provide total CANopen solution in Corrugated paper slitting machine

System: Kinco MTS000 Series HMI+Kinco F1 PLC+Kinco FD Series Servo Features: -High efficiency, high accuracy -Facy programming



Kinco provides servo system in Wood-Carving machine

System: Kinco CD Series Servo Features: -High efficiency,high accuracy



Kinco provides CANopen servo system in Plasma cutting machine

System: Kinco JD Series Servo Features: -High efficiency,high accuracy -Simple wiring,more stable.