

VC Series PLC



Official Website

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About us



PLC series product planning

VEICHI PLC is divided into several series of single module type, general-purpose type, bus-type, high-performance type, motion control type and industrial Ethernet type.

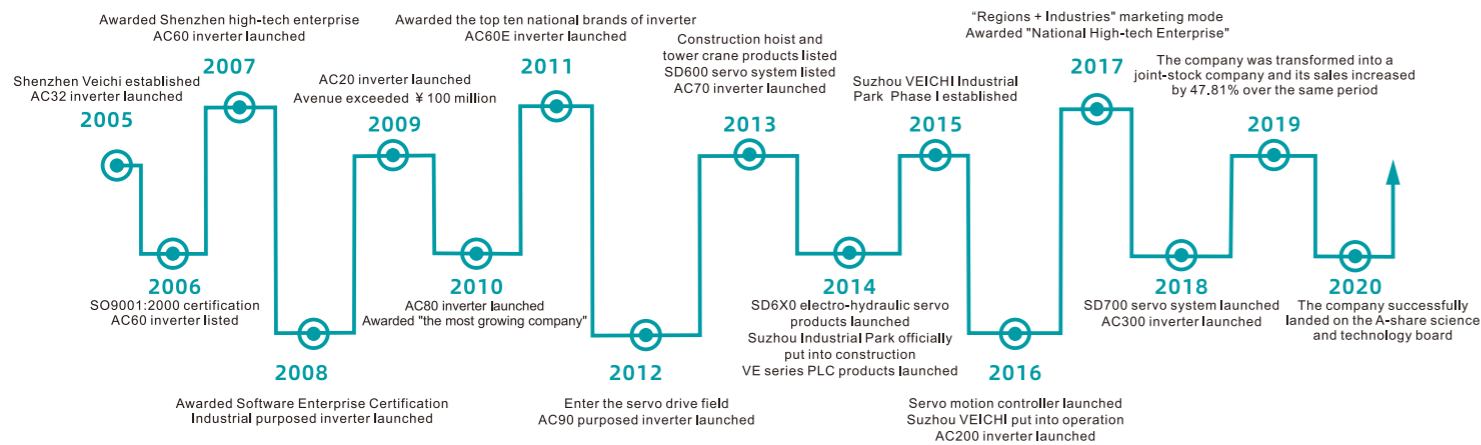
VC1 and VC1S are designed for the high cost-effective applications of logic control below three pulses;

VC2 is designed for applications based on the CANOpen bus control;

VC3 is designed for applications of multi-channel pulse control;

VC3M is designed for the pulse-based motion control;

VC5 is designed for industrial Ethernet applications based on the EtherCAT protocol.

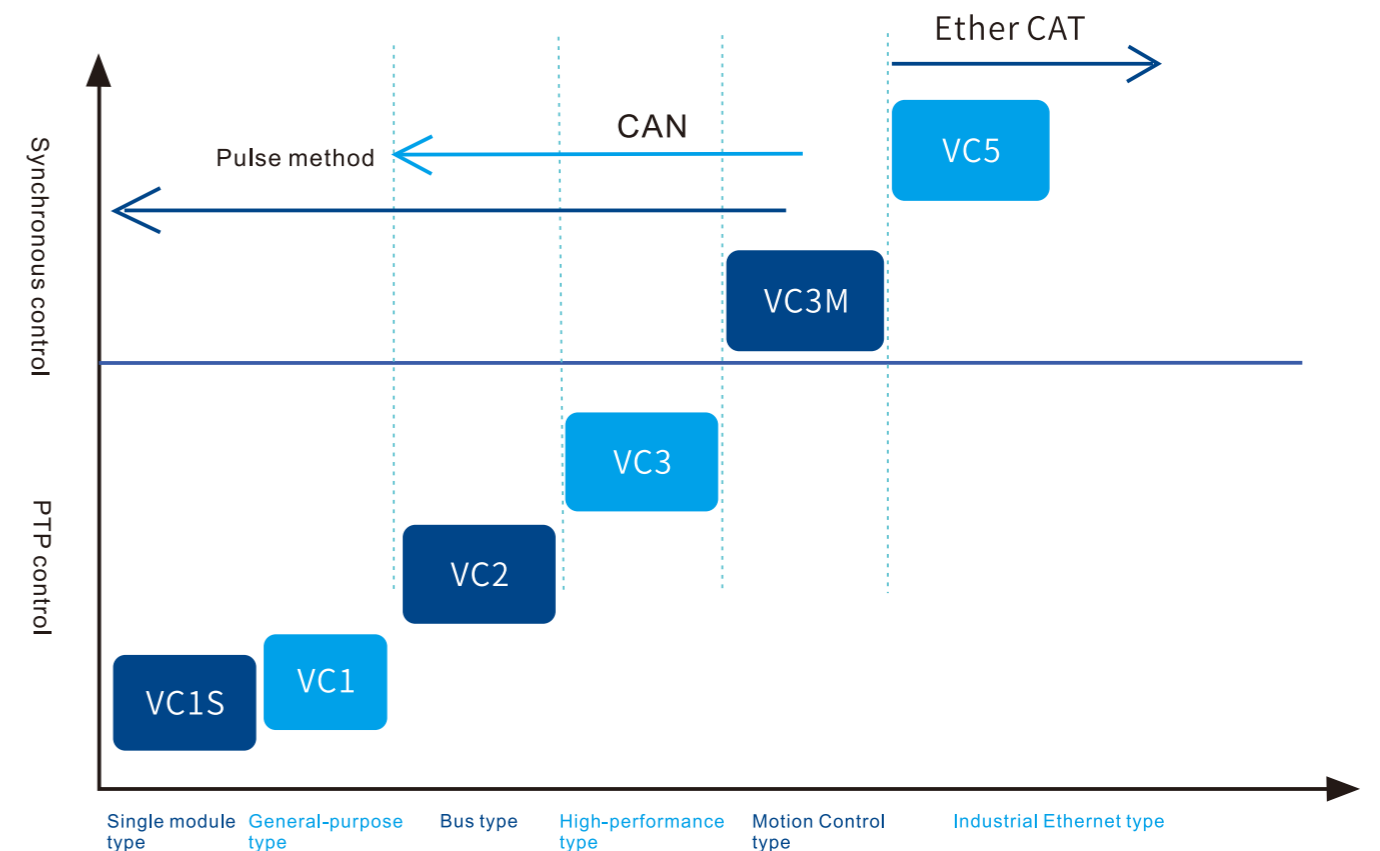


VEICHI Electric, a high-tech enterprise engaged in the R&D, production and sales of industrial automation products, has always focused on the fields of electric drive and industrial control since its establishment. It has been listed as the "Jiangsu Provincial Enterprise Technology Center", "Jiangsu Private Technology Enterprise", "Jiangsu Provincial Specialized and New Giant Enterprise", "Jiangsu Provincial Engineering Technology Research Center", "Suzhou Gazelle Enterprise" and "Competitive Brand in Motion Control Field". After years of independent R&D and innovation, VEICHI has developed a series of independent intellectual property rights. By the end of June 30, 2021, a total of 108 patents have been granted, including 21 invention patents. VEICHI has R&D and production bases in Suzhou and Shenzhen, and has established a wholly-owned subsidiary in India. At present, the company's business covers many countries and regions, providing global customers with competitive, safe and reliable products and services.

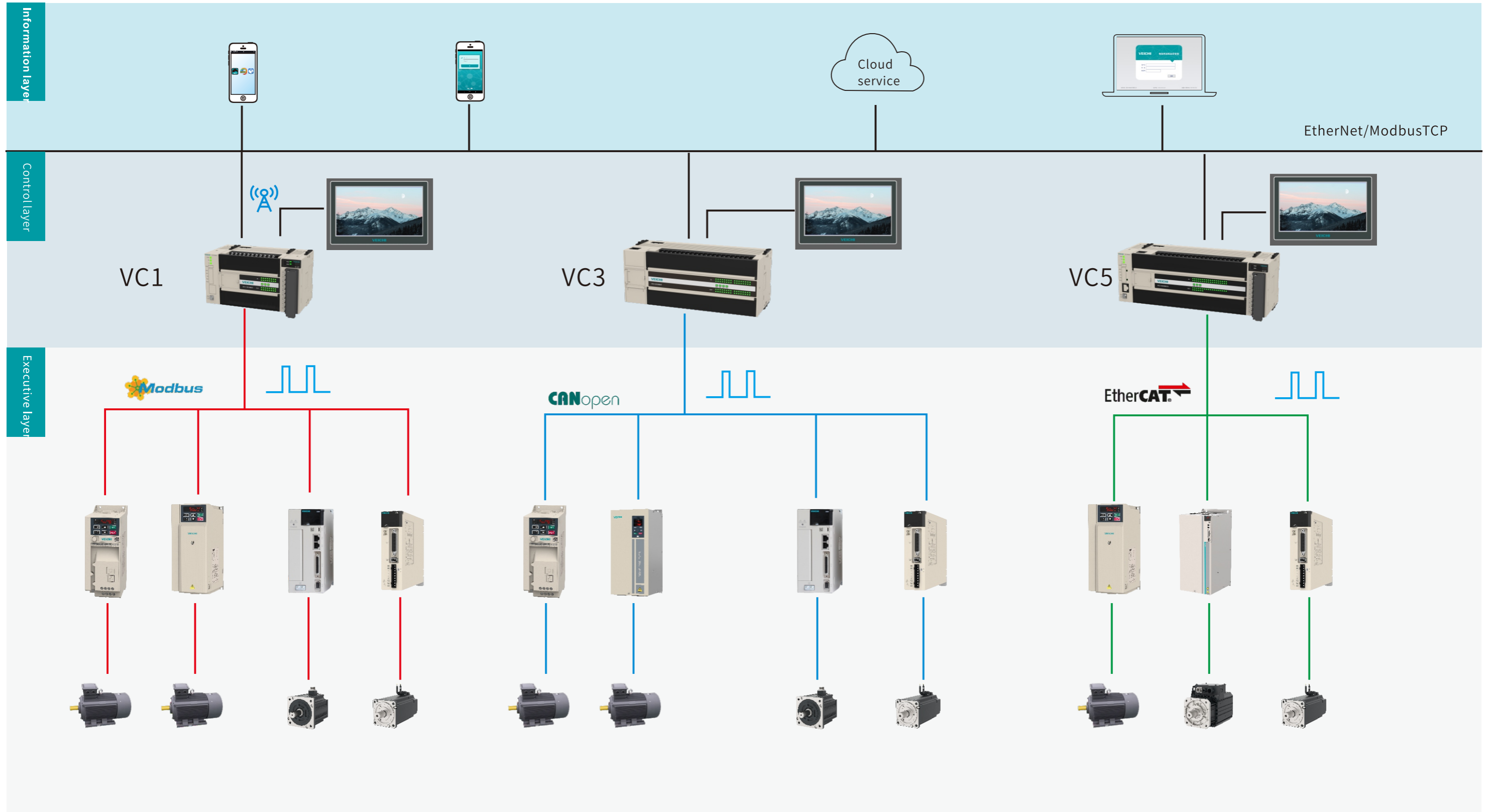
We supply a wide range of products, including inverters from 0.4kW to 1,200kW, servo systems from 50W to 200kW, motion controllers, PLCs and HMIs, to diverse customers in lifting and mining equipment, rail transportation, machine tools, compressors, plastics, solar water pumping, building materials, robots or manipulators, printing and packaging, textile and chemical fiber, metallurgy, municipal, petroleum, chemical and other industries.

VEICHI has established 13 service outlets in China, and developed 122 channel dealers, covering 31 provinces and Hong Kong, Macao and Taiwan regions across the country, forming a wide-ranging and efficient distribution and service network to provide customers with high-quality products and efficient Service.

VEICHI will continue to adhere to the business philosophy of "Guided by market demand, Driven by technological innovation", to expand and strengthen the core businesses of inverters, servo systems and motion controllers, and intelligent Internet of Things, and always insist on providing customers with best products and services. VEICHI will spare no effort to make contributions to promote the development of electric drive and industrial control.



Veichi industrial automation control system solutions



VC series main module & IO expansion module naming rules

VC1 - 1614 MAT 1

① ② ③ ④ ⑤ ⑥ ⑦ ⑧

<p>① VC: Programmable Logic Controller</p>	<p>⑤ Unit type M: PLC main module E: PLC expansion module</p>
<p>② Serial Number 1S: Single module type 1: Economic type 2: General purpose type 3: High-performance type 3M: Motion control type 5: Bus control type</p>	<p>⑥ Power input method D: DC24V power input A: AC220V power input N: No power input</p>
<p>③ 16: Number of input points</p>	<p>⑦ Output method R: Relay output T: Transistor output M: Relay and transistor mixed output N: No output</p>
<p>④ 14: Number of output points</p>	<p>⑧ Non-standard product code Special functions added or reduced on the standard products Examples: VC1-1614MAR1: "1" means integrated analog value VC1-1614MAR2: "2" means detachable terminals</p>

VC1 Series PLC

The VC1 series PLC is a general-purpose PLC with small structure, powerful functions and extremely high cost performance. It can be widely used in machine manufacturing industries such as CNC machine, textiles, packaging, plastic steel, air conditioners, elevators, printing and so on.



Support programming up to 16k steps



Support Ethernet through left expansion module



3 channels of 100kHz pulse output



Support USB communication for easy debugging



2 channels (50kHz) and 6 channels (10kHz) high-speed counting



Rich expansion modules



1 way 232, 1 way 485

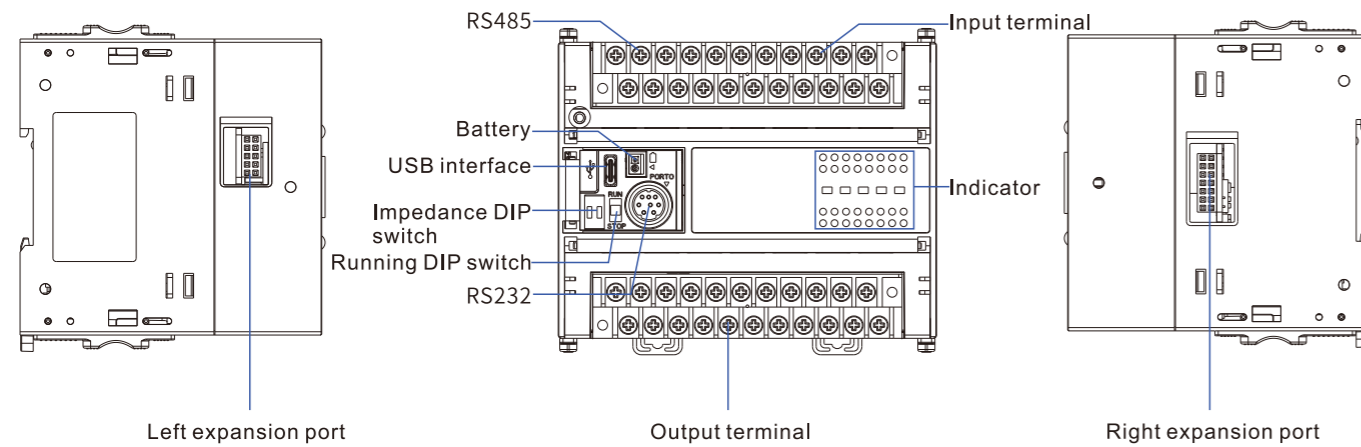


Convenient firmware upgrade



1 way 485 could be expanded through the left expansion module

VC1 series PLC port introduction



VC1 series product specifications

Index		Specifications
Normal	Basic command execution time	0.2 μs
	Real-time clock	±45 s/month(normal temperature)
Memory	Program capacity	64k steps
	Program permanent preservation after power down	Support
	Power-down preservation soft components	FLASH permanent preservation, max 2000 word components
IO	Maximum IO point	128
	Maximum number of expansion modules	15
	Maximum number of special expansion modules	8
Positioning control	Maximum pulse output (transistor)	3 channels 100kHz
	Single-phase counting channel	2 channels with the max input frequency of 50kHz, 6 channels with the max input frequency of 10kHz
	Dual-phase counting channel	1 channel with the max input frequency of 25kHz; 2 channels with the max input frequency of 5kHz
Communication	Serial communication port	One way 232, one way 485
	Ethernet	None
	USB communication	USB 2.0

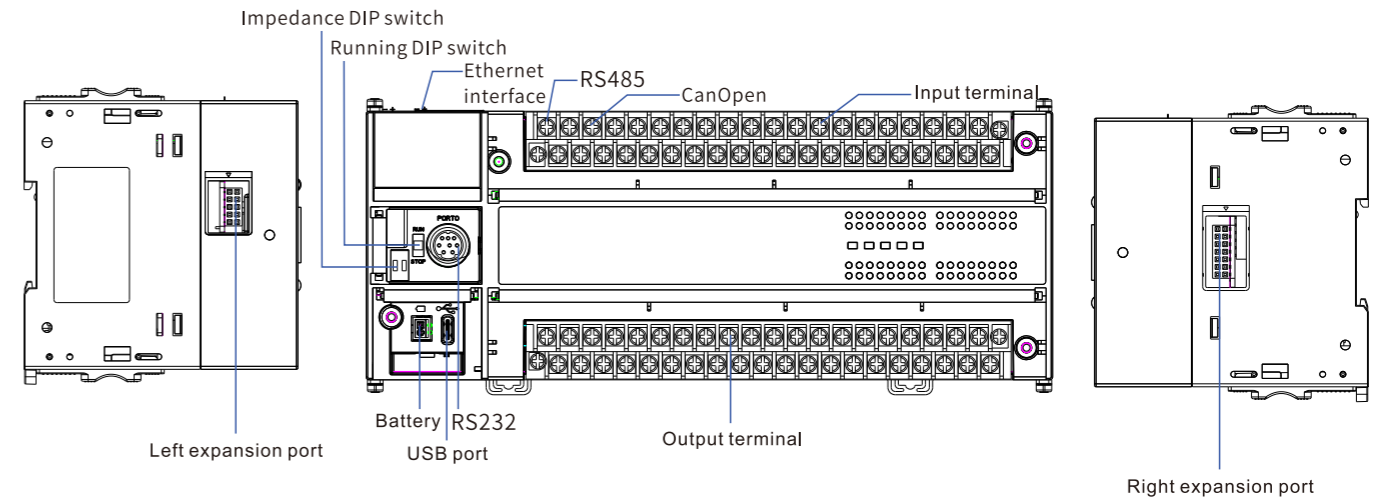
Model	Description	Certification
VC1-0806MAR	Small PLC-VC1 series-8 points input & 6 points relay output-VC1 general main module	CE
VC1-0806MAT	Small PLC-VC1 series-8 points input & 6 points transistor output-VC1 general main module	CE
VC1-1208MAR	Small PLC-VC1 series-12 points input & 8 points relay output-VC1 general main module	CE
VC1-1208MAT	Small PLC-VC1 series-12 points input & 8 points transistor output-VC1 general main module	CE
VC1-1410MAR	Small PLC-VC1 series-14 points input & 10 points relay output-VC1 general main module	CE
VC1-1410MAT	Small PLC-VC1 series-14 points input & 10 points transistor output-VC1 general main module	CE
VC1-1614MAR	Small PLC-VC1 series-16 points input & 14 points relay output-VC1 general main module	CE
VC1-1614MAT	Small PLC-VC1 series-16 points input & 14 points transistor output-VC1 general main module	CE
VC1-2820MAR	Small PLC-VC1 series-28 points input & 20 points relay output-VC1 general main module	CE
VC1-2820MAT	Small PLC-VC1 series-28 points input & 20 points transistor output-VC1 general main module	CE
VC1-3624MAR	Small PLC-VC1 series-36 points input & 24 points relay output-VC1 general main module	CE
VC1-3624MAT	Small PLC-VC1 series-36 points input & 24 points transistor output-VC1 general main module	CE
VC1-0806MAR2	Small PLC-VC1 series-8 points input & 6 points relay output-VC1 general main module/detachable terminal	CE
VC1-0806MAT2	Small PLC-VC1 series-8 points input & 6 points transistor output-VC1 general main module/detachable terminal	CE
VC1-1208MAR2	Small PLC-VC1 series-12 points input & 8 points relay output-VC1 general main module/detachable terminal	CE
VC1-1208MAT2	Small PLC-VC1 series-12 points input & 8 points transistor output-VC1 general main module/detachable terminal	CE
VC1-1410MAR2	Small PLC-VC1 series-14 points input & 10 points relay output-VC1 general main module I detachable terminal	CE
VC1-1410MAT2	Small PLC-VC1 series-14 points input & 10 points transistor output-VC1 general main module I detachable terminal	CE
VC1-1614MAR2	Small PLC-VC1 series-16 points input & 14 points relay output-VC1 general main module I detachable terminal	CE
VC1-1614MAT2	Small PLC-VC1 series-16 points input & 14 points transistor output-VC1 general main module I detachable terminal	CE
VC1-2820MAR2	Small PLC-VC1 series-28 points input & 20 points relay output-VC1 general main module I detachable terminal	CE
VC1-2820MAT2	Small PLC-VC1 series-28 points input & 20 points transistor output-VC1 general main module I detachable terminal	CE
VC1-3624MAR2	Small PLC-VC1 series-36 points input & 24 points relay output-VC1 general main module I detachable terminal	CE
VC1-3624MAT2	Small PLC-VC1 series-36 points input & 24 points transistor output-VC1 general main module I detachable terminal	CE

VC3 Series PLC

The VC3 series PLC is a high performance PLC with small structure, powerful functions, and high cost performance, which could be used for multi-channel pulse control applications. It can be widely used in machine manufacturing industries such as CNC machine, textiles, packaging, plastic steel, air conditioners, elevators, printing and so on.



VC3 series PLC port introduction

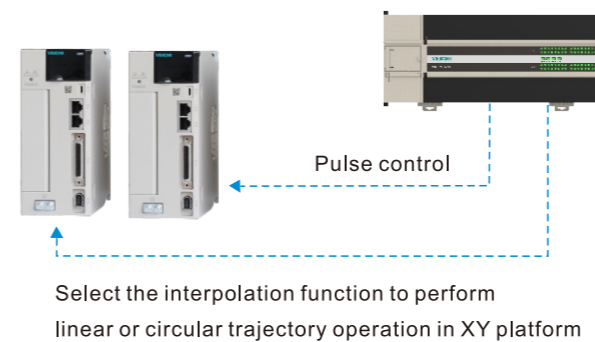
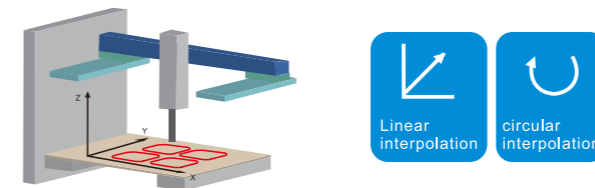


VC3 Series PLC Advantages

VC3M is upgraded on the basis of VC3 platform. With more powerful motion control functions, it could control the multi-axis synchronous motion, and be used for various fields

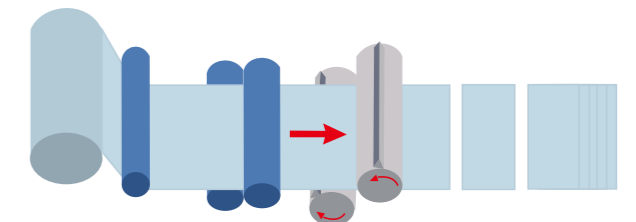
Linear interpolation, circular interpolation

Support 2-axis linear and circular interpolation, corresponding to 2-axis XY platform control, to achieve accurate positioning of the slide.

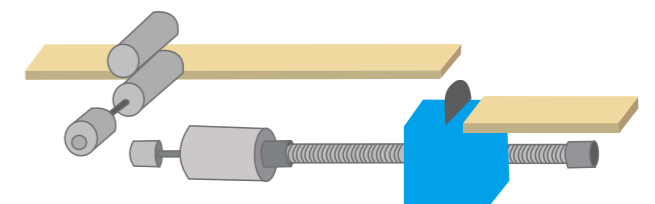










Electronic gear, electronic cam

Flying shear function: Track the progress of the material, set the cutting length, automatically plan the operation track, to achieve the material fixed length cutting .



Chasing shear function: Set the starting point and length of the synchronization zone, confirm the allowable travel range of the chasing shear axis and the starting point & end point of the round-trip movement, and plan the cam trajectory curve to achieve synchronized cutting.



-  Support programming up to 64k steps
-  8-way 200kHz pulse input and output
-  Support CanOpen
-  One way 232, one way 485, and one way 485 can be left expanded
-  Support Ethernet Modbus TCP master-slave protocol
-  Support USB communication for easy debugging
-  Support right expansion IO and special modules
-  Support firmware upgrade

VC3 series product specifications

Index		Specifications
Normal	Basic command execution time	0.065μs
	Real-time clock	±45 s/month(normal temperature)
Memory	Program capacity	64k steps
	Program permanent preservation after power down	Support
	Power-down preservation soft components	All soft components except R
IO	Maximum IO point	512
	Maximum number of expansion modules	15
	Maximum number of special expansion modules	8
	Digital filter function	Each channel of X0-X7 can set digital filter individually. The input filter constant range: 0-60000μs
Positioning control	Maximum pulse output (transistor)	8 channels 200kHz
	Single-phase counting channel	8 channels with the max input frequency of 200kHz
	Dual-phase counting channel	4 channels with the max input frequency of 200kHz
Communication	Serial communication port	One way 232, one way 485
	Ethernet	One-way Ethernet Modbus TCP master-slave
	CanOpen	One Way CanOpen Communication
	USB communication	USB 2.0

Model	Description	Certification
VC3-1616MAR	Small PLC-VC3 series-16 points input & 16 points relay output-VC3 general main module	CE
VC3-1616MAT	Small PLC-VC3 series-16 points input & 16 points transistor output-8 pulse output-VC3 general main module	CE
VC3-1616MAT-4	Small PLC-VC3 series-16 points input & 16 points transistor output-4 pulse output-VC3 general main module	CE
VC3-1616MAT-6	Small PLC-VC3 series-16 points input & 16 points transistor output-6 pulse output-VC3 general main module	CE
VC3-3232MAR	Small PLC-VC3 series-32 points input & 32 points relay output-VC3 general main module	CE
VC3-3232MAT	Small PLC-VC3 series-32 points input & 32 points transistor output-8 pulse output-VC3 general main module	CE
VC3-3232MAT-4	Small PLC-VC3 series-32 points input & 32 points transistor output-4 pulse output-VC3 general main module	CE
VC3-3232MAT-6	Small PLC-VC3 series-32 points input & 32 points transistor output-6 pulse output-VC3 general main module	CE
VC3M-1616MAT	Motion PLC-VC3 series-16 points input & 16 points transistor output-VC3 general main module	CE
VC3M-3232MAT	Motion PLC-VC3 series-32 points input & 32 points transistor output-VC3 general main module	CE

Expansion modules and optional accessories



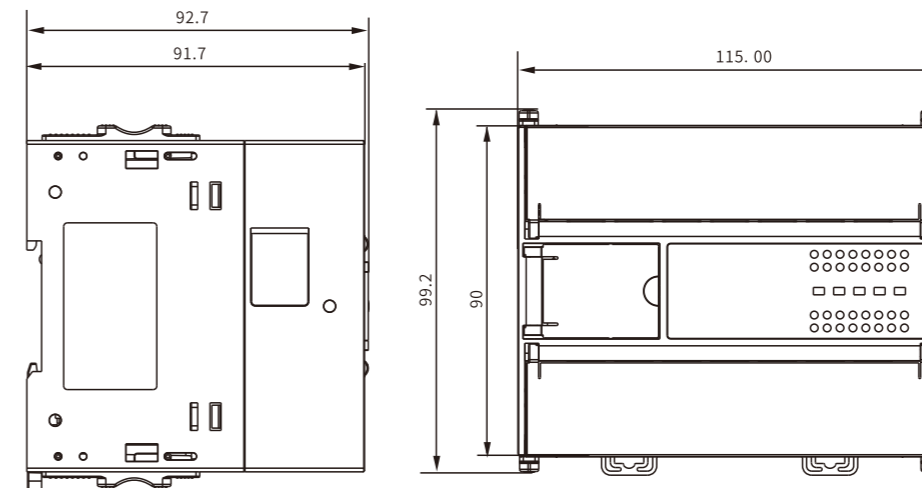
IO expansion module	Description	Certification
VC-0808ENR	8 points DC24V input, 8 points relay output	CE
VC-0808ENT	8 points DC24V input, 8 points transistor output	CE
VC-1600ENN	16 points DC24V input	CE
VC-0016ENR	16 points relay output	CE
VC-0016ENT	16-point transistor output	CE

Left expansion module	Description	Certification
VC-RS485	RS485 left extension module	CE
VC-ENet	Ethernet Left Expansion Module	CE

Special module	Description	Certification
VC-4AD	4 analog input module	CE
VC-4DA	4 analog output module	CE
VC-4TC	4 thermocouple temperature module	CE
VC-4PT	4 thermal resistance temperature	CE

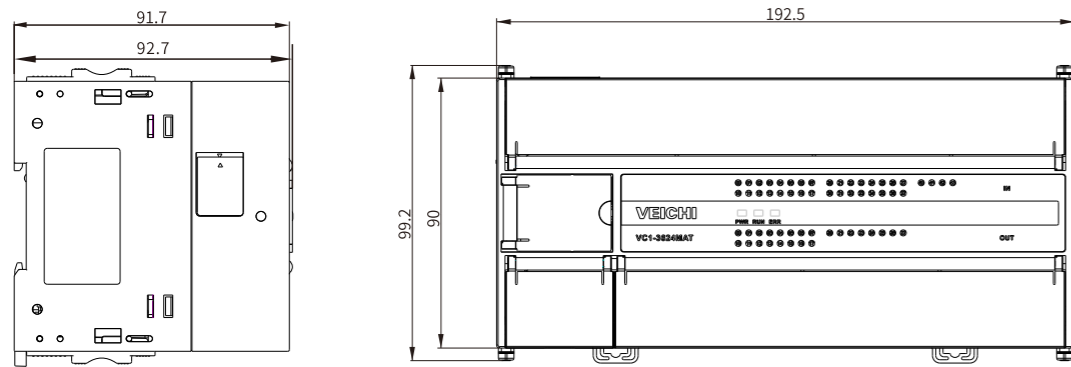
Optional accessories	Description	Cable length
VC-SL1	DB9 to DIN8 touch screen PLC serial port cable	3m
VC-SL2	USBA head to DIN8 serial communication line	3m
VC-SL3	USB communication cable	3m

The installation size of main module and the left & right expansion modules



VC1 main module size

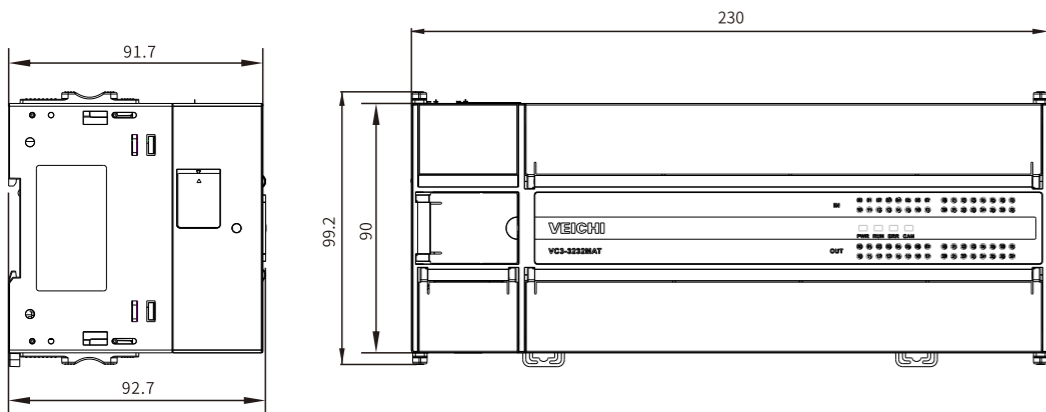
Applicable models
VC1-0806MAR
VC1-0806MAT
VC1-1208MAR
VC1-1208MAT
VC1-1410MAR
VC1-1410MAT
VC1-1614MAR
VC1-1614MAT
VC1-0806MAR2
VC1-0806MAT2
VC1-1208MAR2
VC1-1208MAT2
VC1-1410MAR2
VC1-1410MAT2
VC1-1614MAR2
VC1-1614MAT2



Vc1 multi-terminal main module size

Applicable models

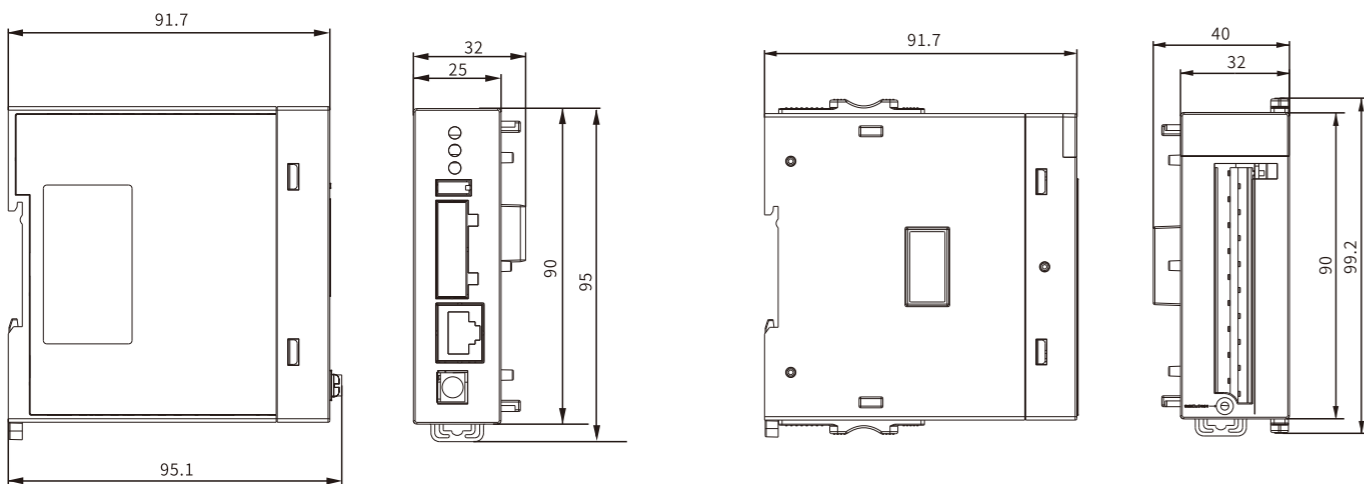
- VC1-2820MAR
- VC1-2820MAT
- VC1-3624MAR
- VC1-3624MAT
- VC1-2820MAR2
- VC1-2820MAT2
- VC1-3624MAR2
- VC1-3624MAT2



VC3 main module size

Applicable models

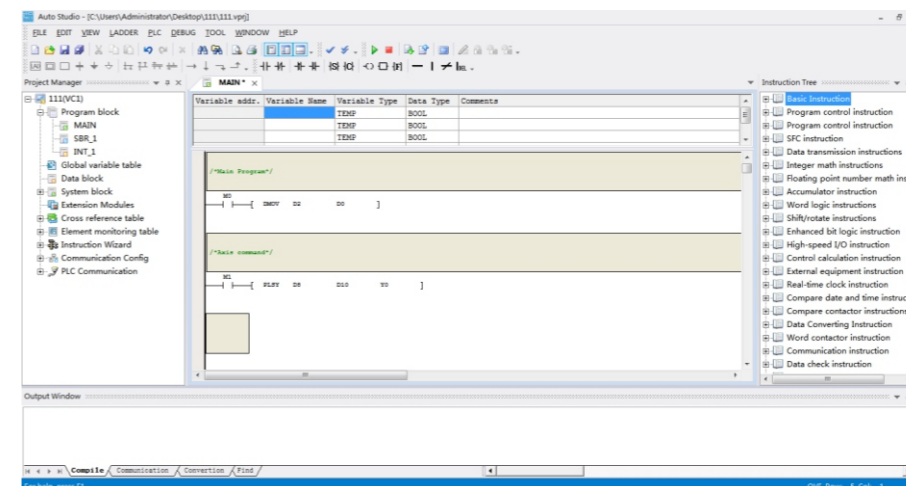
- VC3-3232MAR
- VC3-3232MAT
- VC3-3232MAT-4
- VC3-3232MAT-6
- VC3M-3232MAT



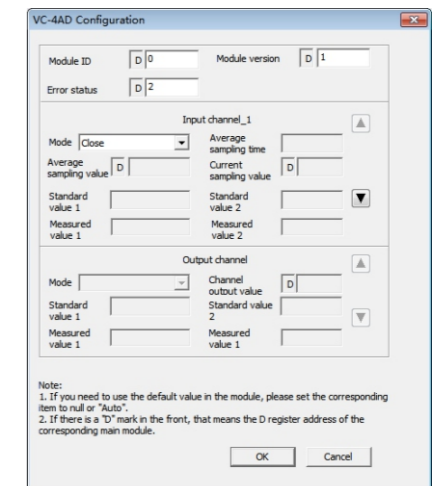
Left expansion module size drawing

Dimension drawing of right expansion module

Programming software

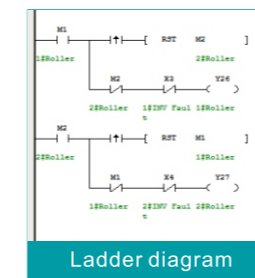


AutoStudio programming main interface



Special module configuration

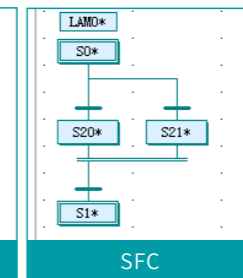
Support multiple programming languages and their mutual conversion



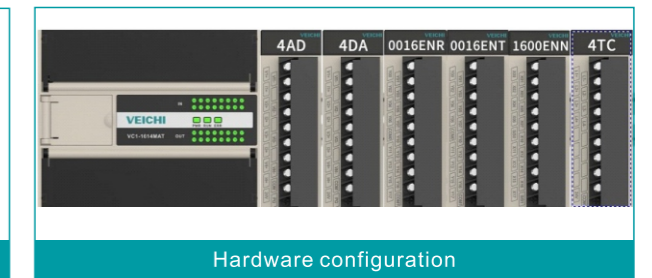
Ladder diagram



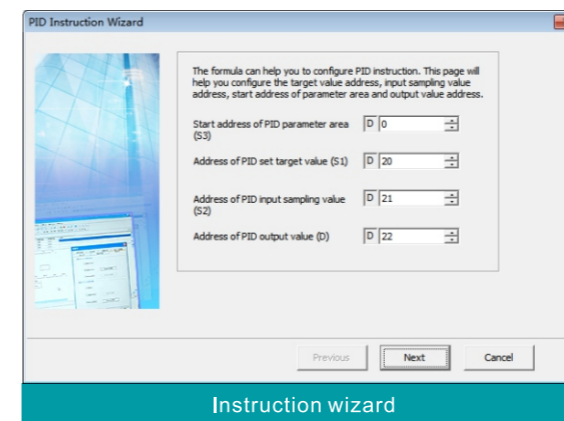
Instruction list



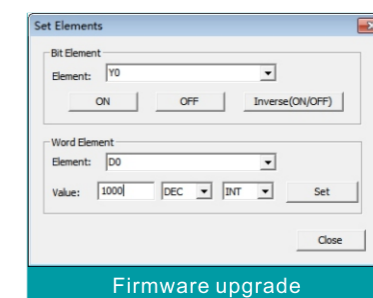
SFC



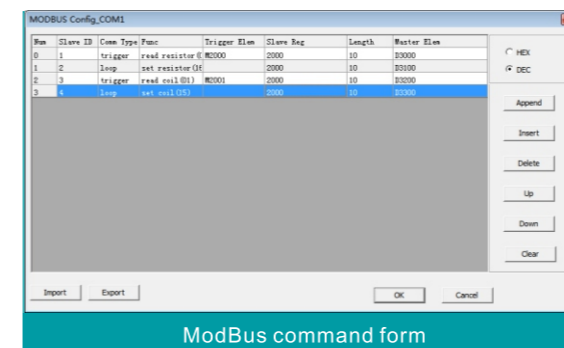
Hardware configuration



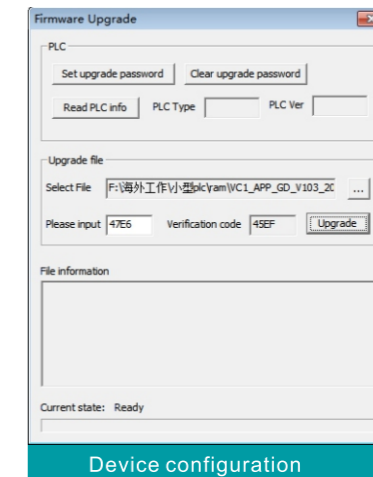
Instruction wizard



Firmware upgrade



ModBUS command form



Device configuration