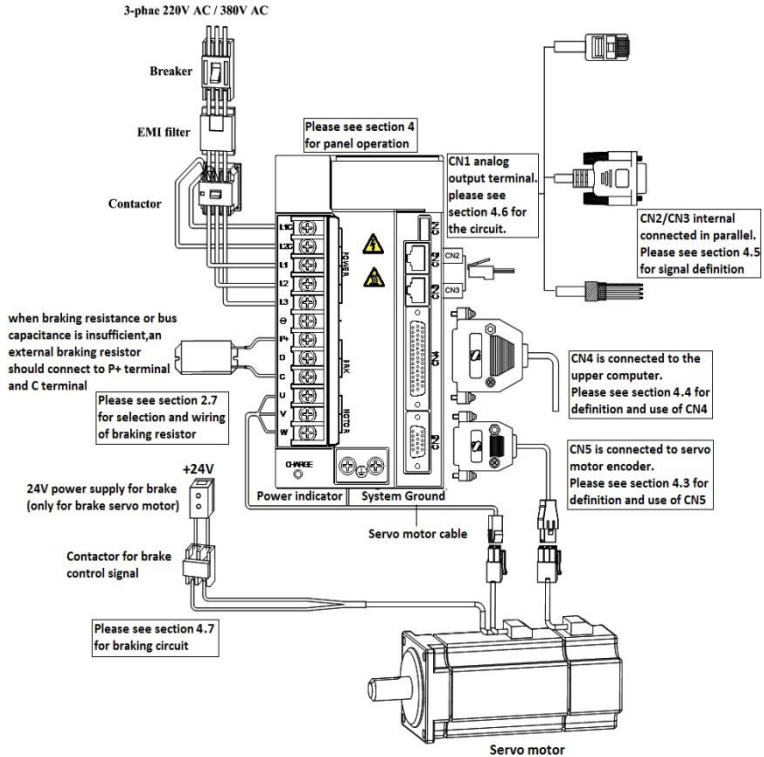


## 4. Wiring

### 4.1 Peripheral Connection



#### Remark:

- 1) The servo drive is connected to the industry power supply directly, and there is no power isolation like transformer. To prevent electric shock of servo system, please put a fuse or molded case circuit breaker in the input power supply.
- 2) Do not install electromagnetic contactor between the drive and the motor, which can damage the drive.

## 10. Specification

### 10.1 Technical specification

Model SD100-	2R8 -2A	5R5 -2A	7R6 -2A	010 -2A	5R4 -3A	8R4 -3A	012 -3A			
Applicable Encoder	2500ppr									
Model SD100-	2R8 -2B	5R5 -2B	7R6 -2B	010 2B	5R4 -3B	8R4 -3B	012 -3B	018 -3B	021 -3B	030 -3B
Applicable Encoder	17bit									
Frame	SIZE A			SIZE B				SIZE C		
Rated Output Power	0.4	0.75	1.0	1.5	1.5 5	2	3	4.5	5.6	7.5
Rated Output Current	2.8	5.5	7.6	10	5.4	8.4	12	18.0	21.0	30.0
Power	Main Power	1-phase AC220V±5% 50/60Hz 3-phase AC220V±5% 50/60Hz			3-phase AC220V±5% 50/60Hz	3-phase AC380V±5% 50/60Hz				
	Control Power	1-phase AC220V±5%				1-phase AC380V±5%				
Working Conditions	Temperature	Working temperature: 0~40°C. Storage temperature: -20~85°C								
	Humidity	Working/storage ≤90%RH (no condensation)								
	Altitude	≤1000m								
	Vibration	≤4.9m/s <sup>2</sup> , 10~60Hz (Not allowed to work at the resonance point)								
Cooling Mode	Fan cooling									
Control Mode	SVPWM, Vector control									
Six Control Modes	Speed control mode, position control mode, torque control mode, speed/position control mode, torque/speed control mode, position/torque control mode									
Front Panel	Press key: 5 LED light: 5 bit									
Regenerative Braking	Built in brake unit and resistance, connectable external braking resistor									
Feedback Mode	Support 2500ppr, 17 bit									
Digital Input and Output	Input	Servo startup, fault reset, position pulse deviation counter clear, direction selection of speed instruction, position / speed switching, internal instruction trigger, control mode switching, pulse prohibition, forward drive prohibition,								

		reverse drive prohibition, positive jog, negative jog	
	Output	Servo ready, brake output, motor rotation output, zero speed signal, speed approach, speed arrival, location approach, location arrival, torque limit, speed limit, warning output, fault output	
Protection Function	Software	Over-voltage, under-voltage, over-speed, over-heating, over-load, encoder fault, etc.	
	Hardware	Location error is too large, EEPROM fault, etc.	
Alarm Data Tracking Function		4 sets of historical records and related data	
Communication Function		Modbus RTU, CANopen	
Encoder Signal Output	Signal Type	A, B differential output, Z signal open collector output, settable width of the Z signal	
	Encoder line number	Programmable arbitrary frequency dividing	
Position Control Mode	Maximum Input Pulse Frequency	Differential input mode: 500Kpps Open collector input mode: 200Kpps	
	PULSE Instruction Mode	Pulse + symbol, AB orthogonal pulse, CW/CCW	
	Instruction Control Mode	External pulse instruction Internal register instruction	
	Instruction Smooth Mode	Low-pass smoothing filter	
	Electronic Gear Ratio	Electronic gear ratio: N/M (1/50<N/M<200) N: 1~65535, M: 1~65535	
	Position Accuracy	±1 pulse (2500ppr) ±3 pulse (17 bit)	
	Speed Control Mode	Analog Instruction Input	Voltage Range
Input impedance			10KΩ
Instruction		External analog instruction	

	Control Mode	Internal register instruction		
	Instruction Smooth Mode	Low pass and S curve smoothing filter		
	Torque Limit	Parameter setting or analog input		
	Speed Ratio	1:3000 (2500ppr) 1:5000 (17bit)	Minimum speed / rated speed When continuously and smoothly running with rated load	
	Bandwidth	≥250Hz (2500ppr) ≥500Hz (17bit)		
	Speed Fluctuation Rate	Load Fluctuation (0~100%)	Max 0.01%	For 17bit encoder, when the speed instruction is rated speed, the Speed Fluctuation Rate = (speed of no load – speed of rated load) / rated speed
		Power Supply Voltage Fluctuation(±10%)	Max 0.01%	
Ambient Temperature (0~50°C)		Max 0.01%		
Torque Control Mode	Analog Instruction Input	Voltage Range	-10V~10V	
		Input Impedance	10KΩ	
		Time Constant	200us	
	Instruction Control Mode	External analog instruction Internal register instruction		
	Instruction Smoothing Mode	Low pass smoothing filter		
	Torque Limit	By setting internal register or analog given		
	Accuracy	±5% (current accuracy)		