

# CHV110 SERIES ENERGY SAVING CABINET

Energy crisis has been recognized as a crucial issue worldwide in recent years. More and more enterprise has realized that some action has to be taken to save energy cost and improve efficiency. CHV110 series energy saving cabinet is a unique product which is designed specially for injection molding machine, air compressor and central air conditioning.



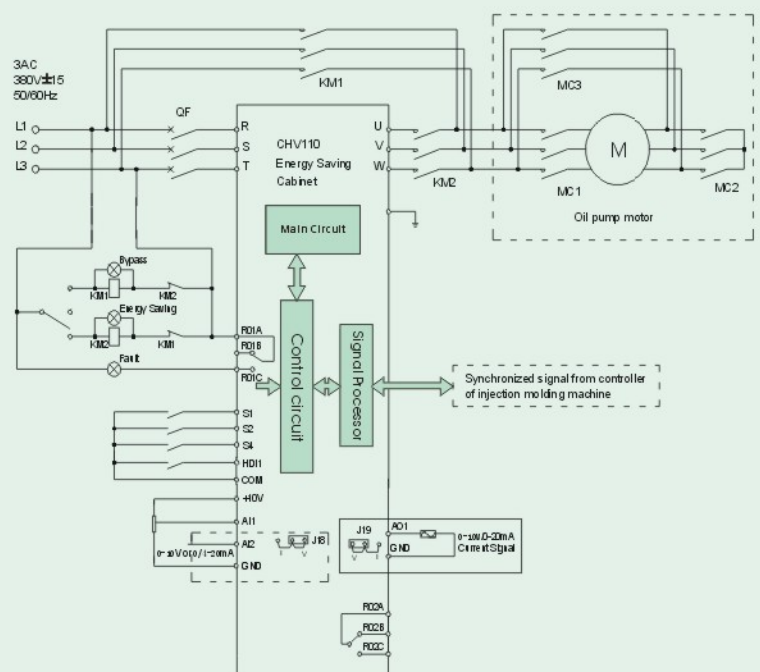
## Principle of energy saving

- Adjust output power automatically: CHV110 series can adjust the speed of oil pump according to two feedback signal (pressure and flow) from injection molding machine to make oil pump achieve minimum power consumption throughout variable load range as well as to ensure output power of hydraulic system matches with power needed by the load.
- Compensate power factor: The power factor of normal fixed speed pump is around 0.6~0.8. When CHV110 series apply on the pump, power factor will be nearly equal to 1 which means reactive power will be reduced so that cable loss and heating of equipment will be eliminated accordingly.
- Soft start of motor: Advanced variable frequency control has been adopted for CHV110 series to accelerate motor according to linear or ramp up curve. Soft start function can eliminate shock current at startup stage, prevent instantaneous voltage drop from the mains, and extend lifetime of equipment.
- No high pressure throttled energy loss: Based on the process requirement of injection molding, synchronous signal from control system of injection molding machine will be used to regulate pressure proportional valve and flow proportional valve to eliminate reflux through the relief valve to the minimum.

## Product feature

- Power range: 7.5~75KW
- Control mode: Vector control with PG, Sensorless vector control, V/F control
- Dual CPU platform: Ensure high accuracy control and prompt dynamic response
- Frequency setting method: Pressure and flow signal comparison output
- Integrated bypass system: Save commission time
- High overload capability: 200% rated current for 2 second
- High torque at low speed: Quick startup, no delay to production cycle time
- Built-in DC reactor: Improve power factor
- Trip-free function: Ensure continuous production
- High anti-interference capability: Install magnetic ring for input and output power cable
- Built-in PID controller: Achieve close loop pressure, flow and temperature control
- Compact size, dust-proof
- Two installation method: wall-mounted or stand on the ground
- Excellent energy saving effect: Up to 60%

## Wiring diagram



## Selection guide

Model No.	Rated Power (KW)	Rated Output Current (A)	Size (H*W*D) (mm)
<b>3AC 380V/400V/415V - 15%~15%</b>			
CHV110-7R5G-4	7.5	17	685*300*250
CHV110-011G-4	11	25	
CHV110-015G-4	15	32	
CHV110-018G-4	18.5	37	846*350*270
CHV110-022G-4	22	45	
CHV110-030G-4	30	60	
CHV110-037G-4	37	75	935*390*285
CHV110-045G-4	45	90	
CHV110-055G-4	55	110	
CHV110-075G-4	75	150	985*431*360
<b>3AC 220V - 15%~15%</b>			
CHV110-7R5G-2	7.5	30	685*300*250
CHV110-011G-2	11	42	846*350*270
CHV110-015G-2	15	55	
CHV110-018G-2	18.5	70	935*390*285
CHV110-022G-2	22	80	
CHV110-030G-2	30	110	985*431*360
CHV110-037G-2	37	130	
CHV110-045G-2	45	160	1490*850*390
CHV110-055G-2	55	190	
CHV110-075G-2	75	260	

## Precaution

Please power off the motor before change from mains to energy saving and vice versa.

Signal cable for injection molding card should be separated from power cable, parallel wiring is prohibited.

Please select shield cable as signal cable to prevent interference. The shield of signal cable should be connected to the ground (PE of energy saving cabinet).

