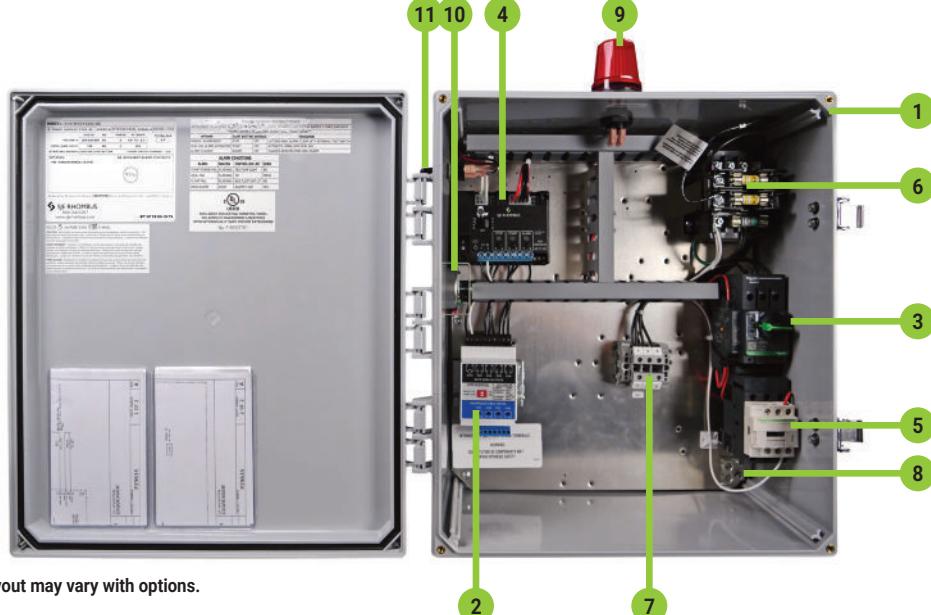


MODEL 314 CONTROL PANEL

Three Phase, Simplex Pump Control with Intrinsically Safe Circuits



Panel layout may vary with options.



The Model 314 control panel is designed for applications requiring intrinsically safe float circuits or other circuit extensions. This panel will control one 208/240/480 VAC three phase pump. Two control switches activate a magnetic motor contactor to turn the pump on and off. If an alarm condition occurs, an additional alarm switch activates the audio/visual alarm system. Common applications include pump chambers, lift stations, or other installations classified as hazardous locations requiring intrinsically safe circuits.

The Model 314 control panel features built in pump failure and float out of sequence detection. In addition, there are three user selectable field programmable options: alarm steady state or flashing; alarm auto reset or manual reset; and optional seal failure alarm beacon plus horn activation.

Simplex controller features include:

- Touch safe circuit board housing and low voltage 24 VDC float circuits
- Alarm (field programmable to flash)
- Alarm automatic reset (field programmable to manual alarm reset)
- Float out-of-sequence detection
- Pump contactor failure detection
- Controller protected by three auto resettable fuses (control, alarm, and pump 1)

Note: SJE Rhombus recommends separate pump and control/alarm power sources.

COMPONENTS

1. Enclosure measures 16 x 14 x 6 inches (40.64 x 35.56 x 15.24 cm); NEMA 4X (ultraviolet stabilized thermoplastic with removable flanges for outdoor or indoor use)
2. Intrinsically safe module limits the amount of energy to switches preventing ignition of flammable gases
3. Motor protective switch provides adjustable overload, branch circuit protection and pump disconnect
4. Simplex controller provides pump and alarm control; elevated in the enclosure for easy access and field wiring
 - a. HOA switch for manual control of the pump
 - b. Pump run green LED indicator
 - c. Control power ON/OFF switch
 - d. Power ON green LED indicator
 - e. Float push-to-test buttons
 - f. Float status red LED indicators
 - g. Auxiliary alarm contacts Form C
 - h. Option: adjustable seal failure circuit and red LED indicator (must select option 5E when ordering)
5. IEC motor contactor controls pump by switching electrical lines
6. Multi-tap transformer (208/240/480 VAC primary) provides 120 VAC control/alarm voltage or 600 VAC primary transformer
7. Input power terminal block
8. Ground lugs
9. Red LED beacon provides 360° visual check of alarm condition
10. Alarm horn provides audio warning of alarm condition (83 to 85 decibel rating)
11. Exterior alarm Test/Normal/Silence switch allows horn and light to be tested and horn to be silenced in an alarm condition; alarm automatically resets once alarm condition is cleared

Model 314 control panels cannot be returned. Please refer to the Product Return section.

Note: Other options available. Options selected may increase enclosure size and change component layout.

Note: Schematic/Wiring Diagram and Pump Specification Label are located inside the panel.



314	1	W	PUMP FULL LOAD AMPS	LEVEL CONTROL APPLICATION	6A10E
CONTROL PANEL	314	Three Phase Simplex Intrinsically Safe			OPTIONS (LISTED BELOW)
ALARM PACKAGE	1	Alarm Package (includes test/normal/silence switch, fuse, red light, & horn)			
ENCLOSURE RATING	W	Weatherproof, NEMA 4X (engineered thermoplastic)			
		208/240/480V	600V		
	001	1.0 - 1.6 FLA	005	1.0 - 1.6 FLA	
	101	1.6 - 2.5 FLA	105	1.6 - 2.5 FLA	
	201	2.5 - 4.0 FLA	205	2.5 - 4.0 FLA	
	301	4.0 - 6.3 FLA	305	4.0 - 6.3 FLA	
	401	6.0 - 10.0 FLA	405	6.0 - 10.0 FLA	
	511	9.0 - 14.0 FLA	515	9.0 - 14.0 FLA	
	611	13.0 - 18.0 FLA	615	13.0 - 18.0 FLA	
	621	17.0 - 23.0 FLA	625	17.0 - 23.0 FLA	
	701	20.0 - 25.0 FLA	705	20.0 - 25.0 FLA	
	H	Floats - Pump Down (select Option 17 below)			
LEVEL CONTROL APPLICATION	L	Floats - Pump Up (select Option 17 below)			
	E	EZconnex® Float Switch System			
	X	No Floats			

PRICING WORKSHEET

Model 314 Base Price _____
 Alarm Package _____
 Enclosure Rating _____
 Pump Full Load Amps _____
 Level Control Application _____
 Total Options _____
 TOTAL LIST PRICE _____

OPTIONS	DESCRIPTION
5A	Thermal Cutout/Heat Sensor Auto Reset (for pumps with thermal switch leads)
5E	Seal Failure Circuit & Red Indicator (2 wire)
✓ 6A	Auxiliary Alarm Contact, Form C (included as standard)
6G	Auxiliary Contact, Dry, Seal Fail, Normally Open (must select Option 5E)
8A	Elapsed Time Meter
8C	Event (Cycle) Counter
✓ 10E	Lockable Latch - NEMA 4X (included as standard, must select Enclosure Rating W above)
10G	Lightning Arrestor
10K	Anti-condensation Heater

For additional control panel options, please contact Technical Support at techsupport@sjeinc.com.

OPTIONS	DESCRIPTION
14B	Main Disconnect (rotary style, mounted through door, non-fused, padlockable in the OFF position, door interlock in the ON-position)
	0-20 FLA
	20-25 FLA
16C	30' Cord in Lieu of 20' Cord (per float)
16D	40' Cord in Lieu of 20' Cord (per float)
17G	SJE MilliAmpMaster™ / Pipe Clamp (3 Floats) - Mechanical
17H	SJE MilliAmpMaster™ / Externally Weighted (3 Floats) - Mechanical
19T	TOA (Test/Off/Automatic) Switch and Pump Run Light Through Door Mounted
19U	HOA (Hand/Off/Automatic) Switch and Pump Run Light Through Door Mounted
19X	Door Mounted Pump Run Indicator
33D	EZconnex® 3-Port, 25', with 10' Floats (3) / Pipe Clamp
35D	EZconnex® 4-Port, 25', with 10' Floats (4) / Pipe Clamp