ELECTRICAL CONTROL DEVICES

Most compressor systems will require various temperature switches, pressure switches, or other devices to properly control or safeguard the compressor.

TEMPERATURE SWITCHES

Temperature switches are highly recommended as high discharge temperature is a leading cause of premature component failure and is often an early warning sign of impending problems.

Temperature switches should be installed with a thermowell as close to the compressor discharge as possible. They should be set to actuate at a temperature just above the normal maximum operating temperature of the compressor.

LOW OIL PRESSURE SWITCHES

Loss of crankcase oil pressure is a rare occurrence, but can result in costly damage. A low oil pressure switch set at about 15 psig (1 bar-g) may be installed to stop the compressor in the event of a lubrication failure. A 10 second delay timer should be used to lock the low oil pressure switch out during compressor startup.

PRESSURE SWITCHES

Pressure switches may be installed in the suction or discharge gas stream as protective devices or for compressor control. They may be used to stop or start the compressor, or control the suction valve unloaders. Their use will vary with each application.

LEVEL SWITCHES

All liquid traps have provisions for the fitting one or two liquid level switches. These switches may be used to stop the compressor or actuate a drain system. When selecting a switch make sure both the materials of construction and the specific gravity rating of the float is suitable for the expected liquid.

GAUGES

Gauges are available to provide a visual indication of temperature, pressure or liquid level. They are very useful for trouble shooting a system and can provide more information than the simple ON / OFF status of a switch.

OTHER ELECTRICAL DEVICES

- Unloader Control Solenoid Valves
- Vibration Switches
- Coolant Flow Control Valves
- Automatic Shutoff Valves
- Differential Pressure Switches