Zunate FBANG-four holes (Zunatehosam4wu2z)

Zunate FBANG-four holes G1/4 Automatic Pressure Switch

Model: FBANG-four holes (Zunatehosam4wu2z)
Brand: Zunate

1. Introduction

This instruction manual provides essential information for the safe and efficient installation, operation, and maintenance of your Zunate FBANG-four holes G1/4 Automatic Pressure Switch. This device is designed to automatically control the operation of an air compressor by sensing the system pressure and activating or deactivating the compressor motor accordingly. Proper understanding and adherence to these instructions will ensure optimal performance and extend the lifespan of the product.

Figure 1.1: Front view of the Zunate FBANG-four holes G1/4 Automatic Pressure Switch. This image shows the main body of the pressure switch, including the ON/OFF lever with a red tip and the 'PRESSURE CONTROL' label on the side.

2. Product Overview and Features

The Zunate FBANG-four holes G1/4 Automatic Pressure Switch is a robust and reliable component for air compressor systems. It is engineered to provide precise pressure control, contributing to energy efficiency and prolonged compressor life. Its design facilitates straightforward installation and user-friendly operation.

Key Features:

- **Automatic Pressure Control:** Designed to automatically manage air compressor operation, helping to conserve electrical energy.
- **Durable Construction:** Manufactured with high-quality materials for a long mechanical service life, rated for 500 million cycles.
- **Standard Interface:** Features a G1/4 threaded female NPT fitting for broad compatibility.

- **Wide Operating Pressure Range:** Stable operation within 75-120 psi (5.5-8 kg/cm²). Pre-set to turn on the compressor at 75 psi and turn off at 120 psi.
- **Four-Port Manifold:** The four-port manifold allows for flexible installation in various directions and enables the addition of accessories such as a relief valve, pressure gauge, or multiple air outlets.
- **Integrated ON/OFF Lever:** Equipped with a metal ON/OFF lever for manual control and a discharger located on the side of the switch.
- **Direct Replacement:** Serves as a direct and efficient replacement for older or damaged pressure switches.

Figure 2.1: Top view of the pressure switch, highlighting the four G1/4 threaded ports for connection to the air compressor system. A dimension of 12mm/0.47in is indicated, likely referring to the port diameter.

3. Specifications

Refer to the table below for detailed technical specifications of the Zunate FBANG-four holes G1/4 Automatic Pressure Switch.

Specification	Value

Specification	Value
Model	FBANG-four holes (Zunatehosam4wu2z)
Type	Mechanical Pressure Switch
Rated Voltage	220 V
Rated Current	10 A
Mechanical Life	500 million cycles
Working Pressure Range	75 ~ 120 psi (5.5 ~ 8 kg/cm²)
Interface	G1/4 (Female NPT)
Product Dimensions (L x W x H)	10 x 9 x 5 cm
Power Source	Corded Electric
Recommended Use	Regulation and control of air compressors

4. Safety Information

Read and understand all safety warnings and instructions before installing or operating this product. Failure to follow these instructions may result in electric shock, fire, serious injury, or property damage.

- **Electrical Safety:** Ensure the power supply matches the rated voltage (220V) and current (10A) of the pressure switch. Disconnect power before making any electrical connections or performing maintenance. All electrical wiring should be performed by a qualified electrician and comply with local electrical codes.
- **Pressure Safety:** This device operates under high pressure. Always depressurize the air system before installing, removing, or servicing the pressure switch. Use appropriate personal protective equipment (PPE) such as safety glasses.
- **Installation:** Do not modify the pressure switch. Use only original or approved replacement parts. Ensure all connections are secure and leak-free.
- **Environment:** Do not expose the pressure switch to excessive moisture, dust, or corrosive environments. Operate within specified temperature ranges.

5. Setup and Installation

The Zunate FBANG-four holes pressure switch is designed for easy integration into air compressor systems. Follow these steps for proper installation:

1. **Power Disconnection:** Ensure the air compressor is completely disconnected from its power source to prevent accidental startup.
2. **Depressurize System:** Fully drain the air tank and ensure there is no residual pressure in the system.
3. **Mounting:** Securely mount the pressure switch to a stable surface or directly onto the air compressor manifold. The four-port design allows for flexible orientation.
4. **Air Connections:** Connect the main air line from the compressor tank to one of the G1/4 ports on the

pressure switch. Use appropriate thread sealant (e.g., PTFE tape) on all threaded connections to ensure an airtight seal.

5. **Accessory Connections (Optional):** Utilize the remaining G1/4 ports for additional components such as a pressure gauge, safety relief valve, or auxiliary air outlets as needed.
6. **Electrical Wiring:** Connect the electrical wiring from the compressor motor to the appropriate terminals on the pressure switch. Refer to the wiring diagram provided with your air compressor or consult a qualified electrician. Ensure correct polarity and secure all connections.
7. **Leak Check:** Once all connections are made, slowly re-pressurize the system and check for any air leaks using soapy water. Tighten connections as necessary.

Figure 5.1: Angled view illustrating the G1/4 threaded ports and the manual ON/OFF lever. This perspective helps in understanding the connection points for air lines and accessories.

6. Operating Instructions

The Zunate FBANG-four holes pressure switch operates automatically once properly installed and powered. It is pre-set to maintain pressure within a specific range.

1. **Initial Power-Up:** After installation and safety checks, connect the air compressor to its power source.
2. **Engage Switch:** Move the manual ON/OFF lever to the 'ON' position. The compressor should start running

if the tank pressure is below the cut-in pressure (75 psi).

3. **Automatic Operation:** The compressor will run until the tank pressure reaches the cut-off pressure (120 psi), at which point the pressure switch will automatically turn off the compressor motor.
4. **Pressure Drop:** As air is used and the tank pressure drops to the cut-in pressure (75 psi), the pressure switch will automatically restart the compressor to replenish the air supply.
5. **Manual Shut-off:** To manually turn off the compressor, move the ON/OFF lever to the 'OFF' position. This will stop the compressor regardless of the tank pressure.

Figure 6.1: Side view of the pressure switch, clearly showing the 'PRESSURE CONTROL' label, indicating its primary function within the air compressor system.

7. Maintenance

Regular maintenance ensures the longevity and reliable operation of your pressure switch. Always disconnect power and depressurize the system before performing any maintenance.

- **Inspection:** Periodically inspect the pressure switch for any signs of wear, damage, or corrosion. Check for loose electrical connections or air leaks.

- **Cleaning:** Keep the exterior of the pressure switch clean and free from dust, dirt, and debris. Do not use harsh chemicals or solvents.
- **Functionality Check:** Regularly verify that the pressure switch is cycling the compressor correctly within its specified pressure range (75-120 psi).
- **Replacement:** If the pressure switch shows signs of malfunction, inconsistent operation, or significant wear, replace it with an original Zunate FBANG-four holes G1/4 Automatic Pressure Switch or an equivalent approved part.

Figure 7.1: Top-down view of the pressure switch, clearly showing the label indicating the operating pressure range of 5.5-8 kgf/cm² (approximately 75-120 psi).

8. Troubleshooting

If you encounter issues with your Zunate FBANG-four holes pressure switch, refer to the following troubleshooting guide:

Problem	Possible Cause	Solution
Compressor does not start	No power supply ON/OFF lever in 'OFF' position Faulty wiring Pressure already above cut-in	Check power connection Move lever to 'ON' Inspect and secure wiring (consult electrician) Check pressure gauge; if high, use air to lower pressure
Compressor does not stop	Pressure switch malfunction Air leak in system Pressure gauge faulty	Replace pressure switch Check all connections for leaks Verify pressure gauge accuracy
Inconsistent pressure cycling	Internal wear or debris Minor air leak Incorrect pressure settings (if adjustable)	Replace pressure switch Check for small leaks Ensure settings are within specified range (this model is pre-set)
Air leaks around switch	Loose connections Damaged threads or seals	Tighten connections; reapply thread sealant Inspect and replace if damaged

If the problem persists after attempting these solutions, contact qualified service personnel.

9. Warranty and Support

Zunate products are manufactured to high-quality standards. For information regarding warranty coverage, terms, and conditions, please refer to the documentation provided at the time of purchase or visit the official Zunate website.

For technical assistance, troubleshooting beyond this manual, or to inquire about replacement parts, please contact Zunate customer support through the retailer where the product was purchased or via the contact information available on the official Zunate website.

When contacting support, please have your product model number (FBANG-four holes / Zunatehosam4wu2z) and purchase details readily available.