Liberty Pumps SXH24=3

Liberty Pumps SXH24=3 Simplex Pump Control with Alarm User Manual

Model: SXH24=3

INTRODUCTION

This instruction manual provides comprehensive guidance for the installation, operation, and maintenance of the Liberty Pumps Model SXH24=3 Simplex Pump Control with Alarm. Please read this manual thoroughly before installation and operation to ensure safe and efficient use of the product. Retain this manual for future reference.

SAFETY INFORMATION

Always observe safety precautions to reduce the risk of injury or damage. Disconnect power before performing any maintenance or service. Ensure all electrical connections comply with local codes and regulations. This unit must be installed by a qualified electrician.

PRODUCT OVERVIEW

The Liberty Pumps Model SXH24=3 is a simplex pump control panel designed to manage the operation of a single pump in various applications, typically for wastewater or effluent systems. It includes an integrated alarm system to alert users of high-level conditions or other operational issues. The control panel utilizes float switches to monitor liquid levels and activate the pump accordingly.

Image Description: A product image showing two Liberty Pumps control panels. The panel on the left is a standard control panel, while the panel on the right features an additional red alarm beacon on top. Both panels have multiple float switches extending from their bottom, indicating their function in liquid level management. These units are designed for controlling simplex pump operations and include alarm capabilities.

SETUP AND INSTALLATION

1. **Mounting the Control Panel:** Select a suitable location for mounting the control panel, ensuring it is easily accessible and protected from environmental elements. Use appropriate fasteners to secure the panel to a sturdy surface.

2. **Electrical Connections:**
   - Ensure all power is disconnected at the main breaker before making any electrical connections.
   - Connect the incoming power supply to the designated terminals within the control panel, following the wiring diagram provided inside the panel door.
   - Connect the pump motor wiring to the appropriate terminals.
   - Connect the float switch wires to their respective terminals (e.g., pump ON, pump OFF, high alarm).
   - Ensure proper grounding of the control panel and pump.

3. **Float Switch Installation:** Install the float switches at the desired liquid levels within the basin or tank. The "pump ON" float should be positioned above the "pump OFF" float. The "high alarm" float should be positioned above the "pump ON" float. Ensure floats have free movement and do not interfere with each other or other components.

4. **Initial Power-Up:** After all connections are secure and verified, restore power to the control panel. Observe the indicator lights and listen for any unusual sounds.

OPERATING INSTRUCTIONS

The SXH24=3 control panel operates automatically based on the liquid levels detected by the float switches.

- **Automatic Operation:** When the liquid level rises and activates the "pump ON" float, the control panel will energize the pump. The pump will continue to run until the liquid level drops and deactivates the "pump OFF" float.

- **High Alarm Condition:** If the liquid level continues to rise and activates the "high alarm" float, the integrated alarm will activate, typically sounding an audible alert and illuminating a visual indicator. This signifies a potential issue such as a pump failure or excessive inflow.

- **Alarm Silence/Reset:** The control panel usually includes a button or switch to silence the audible alarm. The alarm will typically reset automatically once the high-level condition is resolved.

- **Manual Override (if applicable):** Some models may include a manual override switch for testing or emergency operation. Refer to the specific wiring diagram for your unit to determine if this feature is present and how to use it safely.

MAINTENANCE

Regular maintenance ensures the longevity and reliable operation of your control panel.

- **Monthly Inspection:**
  - Visually inspect the control panel for any signs of damage, corrosion, or loose connections.
  - Check the condition of all float switches and their cables. Ensure they move freely and are not fouled by debris.
  - Test the alarm system by manually raising the high-level float (if safe to do so) or using the test button (if available).

- **Annual Inspection:**
  - Have a qualified electrician inspect all electrical components, connections, and wiring for wear or degradation.
  - Clean any dust or debris from inside the control panel enclosure.

- **Cleaning:** Use a soft, dry cloth to clean the exterior of the control panel. Do not use abrasive cleaners or solvents.

TROUBLESHOOTING

Problem	Possible Cause	Solution
Pump does not turn on.	• No power to control panel. • "Pump ON" float switch stuck or faulty. • Pump motor issue. • Blown fuse or tripped breaker.	• Check power supply and circuit breaker. • Inspect and free/replace float switch. • Consult pump manual or qualified technician. • Replace fuse or reset breaker.
Pump runs continuously.	• "Pump OFF" float switch stuck or faulty. • Continuous inflow.	• Inspect and free/replace float switch. • Investigate and resolve source of continuous inflow.
High alarm activates.	• Pump failure. • "High Alarm" float switch faulty. • Excessive inflow.	• Check pump operation and power. • Inspect and replace float switch. • Identify and mitigate source of inflow.

If troubleshooting steps do not resolve the issue, contact a qualified service technician or Liberty Pumps customer support.

SPECIFICATIONS

- **Model:** SXH24=3
- **Brand:** Liberty Pumps
- **Type:** Simplex Pump Control with Alarm
- **Item Weight:** 13 pounds
- **Manufacturer Part Number:** SXH24=3
- **ASIN:** B009PRS8DA
- **First Available:** October 12, 2012
- *Note: Specific electrical ratings (voltage, amperage) will be detailed on the product label or internal wiring diagram. Always refer to the unit's specific labeling for precise electrical specifications.*
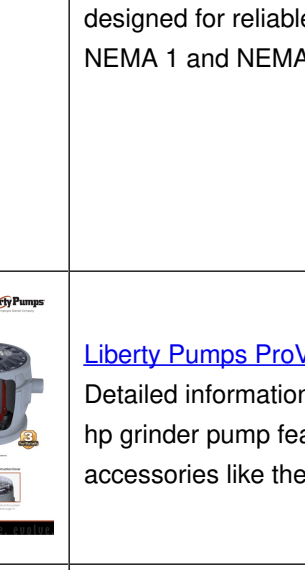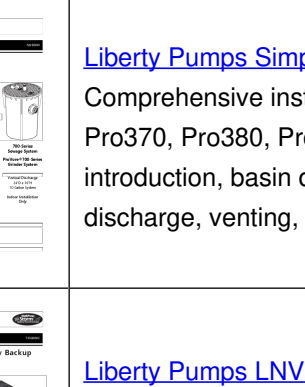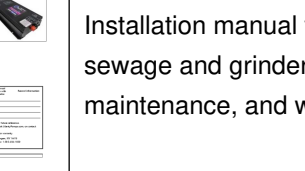
WARRANTY INFORMATION

Liberty Pumps products are typically covered by a limited warranty against defects in material and workmanship. For specific warranty terms, duration, and claim procedures, please refer to the warranty documentation included with your product or visit the official Liberty Pumps website. Keep your purchase receipt as proof of purchase.
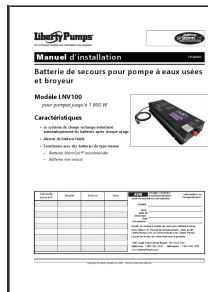
SUPPORT AND CONTACT

For technical assistance, replacement parts, or further inquiries, please contact Liberty Pumps customer support.

- **Manufacturer:** Liberty Pumps
- **Website:** www.libertypumps.com (Please visit the official website for up-to-date contact information and support resources.)

Related Documents - SXH24=3

Liberty Pumps Control Panel Installation, Operation, and Troubleshooting Manual
Comprehensive guide for Liberty Pumps Simplex control panels (Single Phase and Three Phase). Covers installation, operation, troubleshooting, and warranty information for models SXL21=3, SXL24=3, SXH21=3, SXH24=3, SX34=3-131, SX34=3-141, SX34=3-171, SX34=3-191, SX34=3-511, SX54=3-121.

SX-SERIES Simplex Pump Controls - Liberty Pumps
Detailed specifications and features for Liberty Pumps' SX-SERIES Simplex Pump Controls, designed for reliable single-pump control in residential and commercial applications. Includes NEMA 1 and NEMA 4X enclosure options, model specifications, and switch details.

Liberty Pumps ProVore® 380 Simplex Grinder System: Features, Specifications, and Accessories
Detailed information on the Liberty Pumps ProVore® 380 Simplex Grinder System, including its 1 hp grinder pump features, technical specifications, dimensional data, performance curve, optional accessories like the access riser, and alarm systems for residential sewage applications.

Liberty Pumps Simplex Sewage/Grinder Systems Installation Manual
Comprehensive installation manual for Liberty Pumps Simplex Sewage/Grinder Systems, including Pro370, Pro380, ProVore 380, and 700-Series models. Covers safety precautions, system introduction, basin dimensions, cover descriptions, installation procedures, electrical connections, discharge, venting, float switch control, and warranty information.

Liberty Pumps LNV100 Battery Backup Installation Manual for Sewage and Grinder Pumps
Installation manual for the Liberty Pumps LNV100 Battery Backup system, providing power for sewage and grinder pumps during outages. Covers features, safety, operation, installation, testing, maintenance, and warranty.

Guide d'installation détaillé pour la batterie de secours Liberty Pumps LNV100, conçue pour les pompes à eaux usées et broyeurs. Inclut des instructions de sécurité, de connexion, de test et de dépannage.