

# OPERATOR'S MANUAL

# 650540-X

## INCLUDING: OPERATION, INSTALLATION & MAINTENANCE

ALSO INCLUDE MANUALS: 67075 CART (PN 97999-603), 6712X-X PUMP (PN 97999-602), SAFETY INFORMATION (PN 100400-76) & S-632 GENERAL INFORMATION SHEET (97999-624)

4 1/4" AIR MOTOR

43.6:1 RATIO

4" STROKE

## PUMP SYSTEM

**650540-1**  
CARBON STEEL

**650541-1**  
STAINLESS STEEL

## 650541-X

RELEASED: 3-6-95  
REVISED: 9-14-10  
(REV. E)



**READ THIS MANUAL CAREFULLY BEFORE INSTALLING,  
OPERATING OR SERVICING THIS EQUIPMENT.**

It is the responsibility of the employer to place this information in the hands of the operator. Keep for future reference.

### SERVICE KITS

- Use only genuine ARO replacement parts to assure compatible pressure rating and longest service life.
- 61268 for repair of Air Motor Section.
- 63729X-XXX for repair of Lower Pump 6710X-X.

### GENERAL DESCRIPTION

**⚠ WARNING** DO NOT EXCEED MAXIMUM OPERATING PRESSURE OF 6,549 P.S.I. (451.7 BAR) AT 150 P.S.I. (10.4 BAR) AIR INLET PRESSURE.

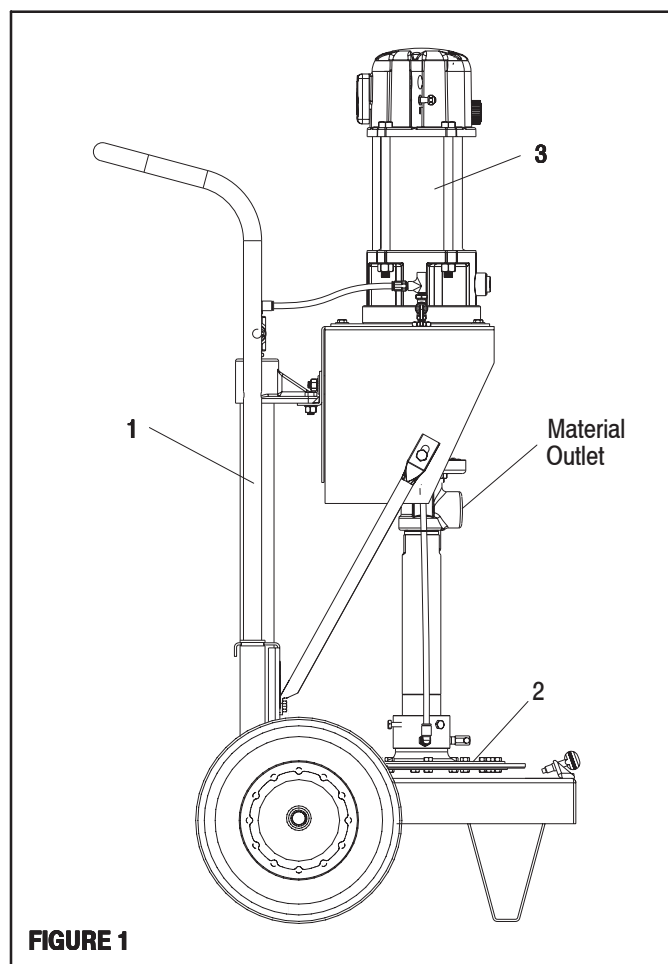
**⚠ WARNING** REFER TO GENERAL INFORMATION SHEET FOR ADDITIONAL SAFETY PRECAUTIONS AND IMPORTANT INFORMATION.

By delivering a smooth, continuous bead of the proper size, an ARO system helps the operator maintain both his production rate and produce quality standards. Maintained quality standards assures that the material benefits are realized. To further maximize operator production time, the ARO System has a built-in lift feature for quick and easy drum changeover.

ARO Systems are totally enclosed, sealing the material in the system from air and moisture, preventing premature cure-out of the material. This allows for either continuous or intermittent use of the system and reduces the need for daily system clean-up.

Built-in lift capability allows for quick drum changeover and easy lifting of pump assembly from container.

The 43.6:1 ratio is an expression of the relationship between the effective air motor area and the effective lower pump area. When 150 PSI (10 bar) of air pressure is supplied to the air motor, the lower pump area will develop a maximum of 6,549 PSI (451.7 bar) of fluid pressure (at no flow) as the fluid control is opened, the flow rate will increase as the air motor cycle rate increases to keep up with the demand



**FIGURE 1**

### MAJOR COMPONENTS LIST

Item	Description	Qty	Part No.	Item	Description	Qty	Part No.
1	Cart / Lift	1	67075	3	Basic Pump Assembly (650540-1)	1	67120-P43
2	Follower Plate (650540-1)	1	651840-1		Basic Pump Assembly (650541-1)	1	67121-P43
	Follower Plate (650541-1)	1	651841-1				

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# ARO

**IR** Ingersoll Rand  
Industrial Technologies

## INSTALLATION

The 65054X-X Chop-Check Dispensing System comes completely assembled. Remove unit from crate and place on a level surface. Install material hose and dispensing device as required.

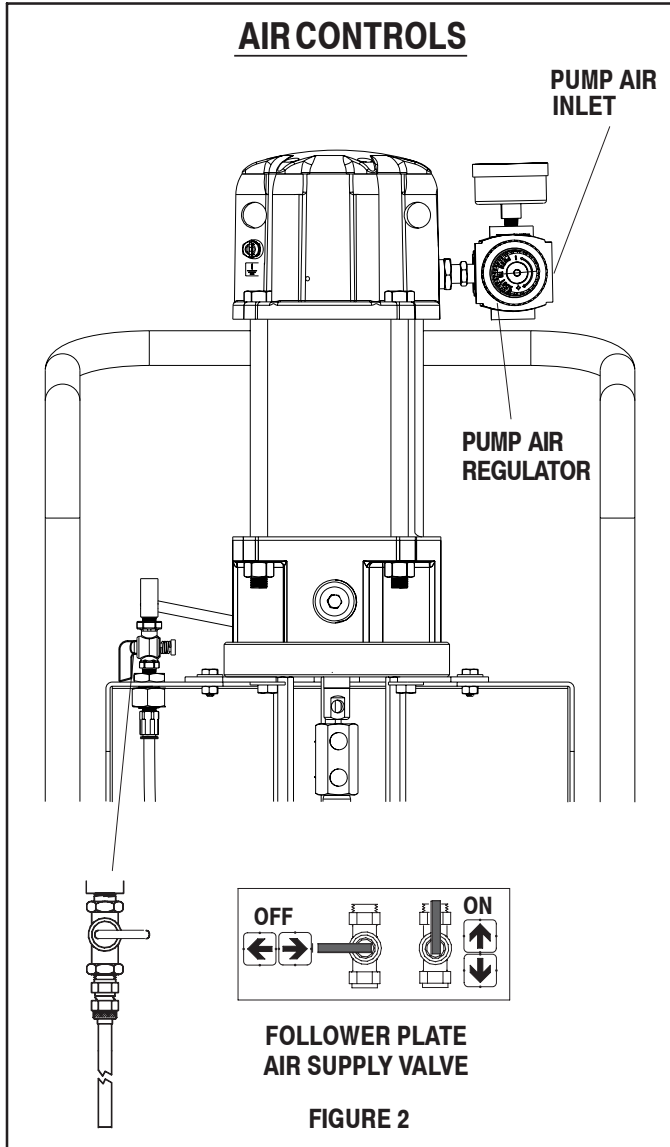
When the following instructions are observed, heavy paste materials

can be pumped directly from their original 5 gallon drum without air inclusion, or excessive waste. The follower plate creates an air tight seal as well as clean-wiping action in its progressive downward movement into the drum.

## OPERATING INSTRUCTIONS

### OPERATING INSTRUCTIONS / INITIAL SETUP PROCEDURE

**⚠ WARNING** STAND CLEAR. When raising or lowering the lift.



#### TO RAISE LIFT, (THE FIRST TIME):

1. Take note of the pump / drum clearance above. Be certain the lift is clear of any objects above the unit.
2. Adjust (Turn Needle Valve Knob Counter-Clockwise) air pressure to lift. Connect the air supply (160 PSI MAX) to the air inlet.
3. Raise the lift high enough to clear the height of the drum. Stop the lift upward travel by adjusting (Turn Needle Valve Clockwise until tight.) Needle Valve.

#### REFER TO PAGE 3:

1. Once lift assembly and pump are in the "UP" position, place and center an opened 5 gallon drum of material on the lift base. Use the stops on the base to center 5 gallon drum. Tighten thumb screw to secure drum.

2. Lubricate lower follower wiper plate seal with any type grease. (silicone, vaseline, gear, etc.) This ensures a smooth fit into the pail as well as prevents curing type compounds from bonding to seal.
3. Check vent plug on follower plate to be sure it easily threads in and out. It is recommended to lubricate the threads of the plug to help prevent possible set up of compound at this point. **See 65184X-X Operator's Manual.**

#### TO LOWER LIFT:

**⚠ WARNING** PINCH HAZARD. Follower can descend quickly causing injury. Keep hands clear when aligning with container.

**NOTE:** Be certain the Follower Plate vent plug has been removed so that the air trapped between the follower and the material is allowed to escape from this vent. Captured air between the follower plate and drum will escape.

**NOTE:** The lift may hesitate momentarily before starting downward, the air pressure inside the post air chamber must decrease before it will begin to descend.

1. Disconnect air line from the lift air inlet. Adjust (Turn Needle Valve Knob Counter-Clockwise) Needle Valve to Lower the pump end into drum.
2. Replace the vent plug once the material begins to ooze from the vent opening.
3. Adjust (Turn pump air regulator knob Counter-Clockwise to prevent over pressurization of pump.) Knob on pump air regulator.
4. Connect air line to pump air regulator and adjust (Turn pump air regulator Clockwise) air until pump begins to cycle.
5. Trigger gun to prime pump with material.

#### TO RAISE LIFT, (NORMAL OPERATION):

1. Disconnect air line from pump air regulator and connect to lift air inlet. Adjust the Follower Plate Air Valve pressure up to approximately 8 psig. **DO NO OVERPRESSURIZE THE DRUM** to avoid damage. **NOTE:** Air from this valve will only pass when the unit is being raised.
2. Adjust (Turn Needle Valve Knob Counter-Clockwise) air pressure on lift.
3. Raise the lift high enough to clear the height of the drum. Stop the lift upward travel adjusting needle valve knob Counter-Clockwise.

#### TO CHANGE DRUM:

**NOTE:** The Needle Valve Knob should be turned Clockwise to hold lift in the "UP" Position.

1. Unscrew thumb screw and remove old 5 gallon drum.
2. Place and center. a new drum into position. Remove cover. Tighten thumb screw.

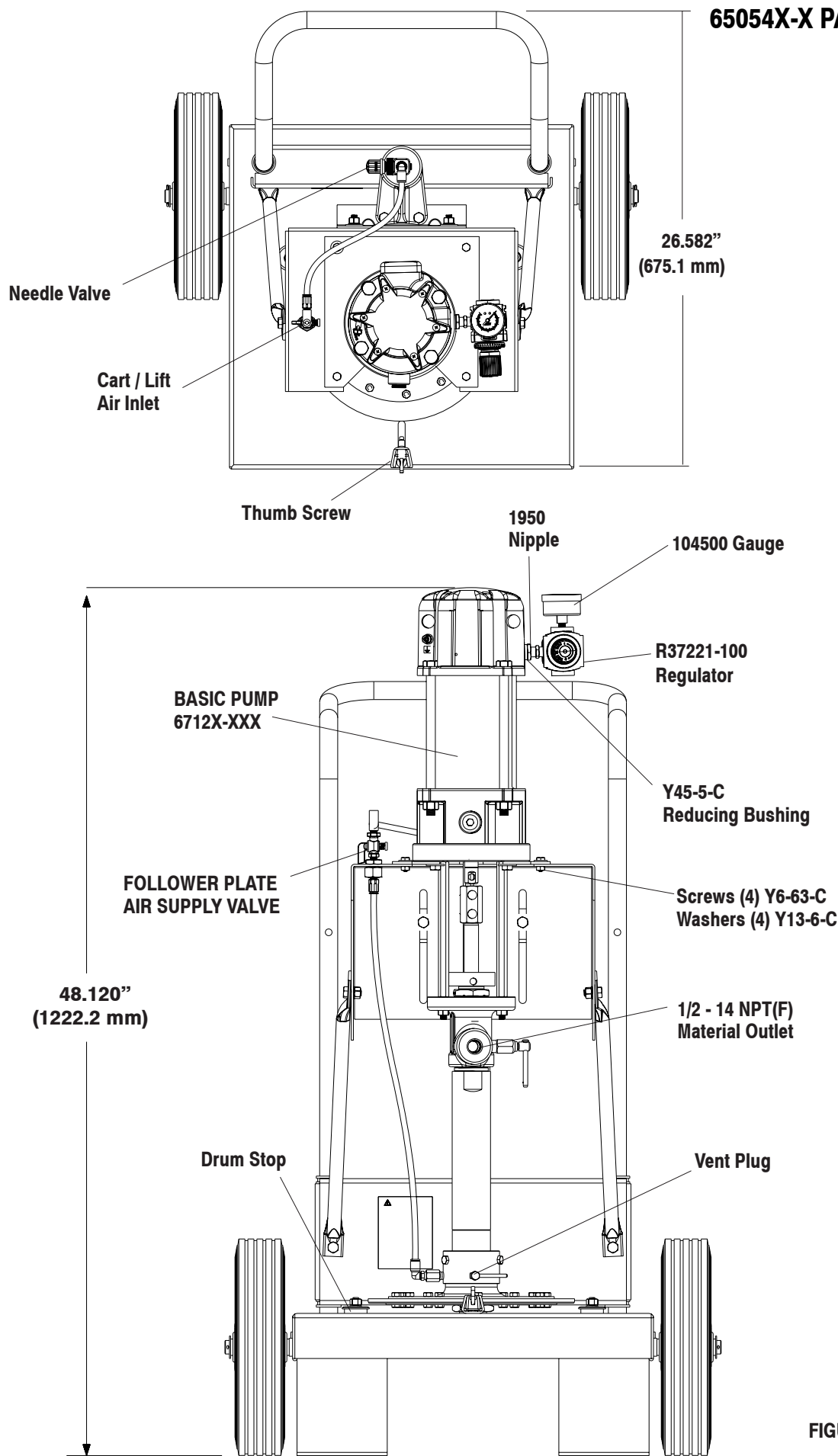


FIGURE 3

