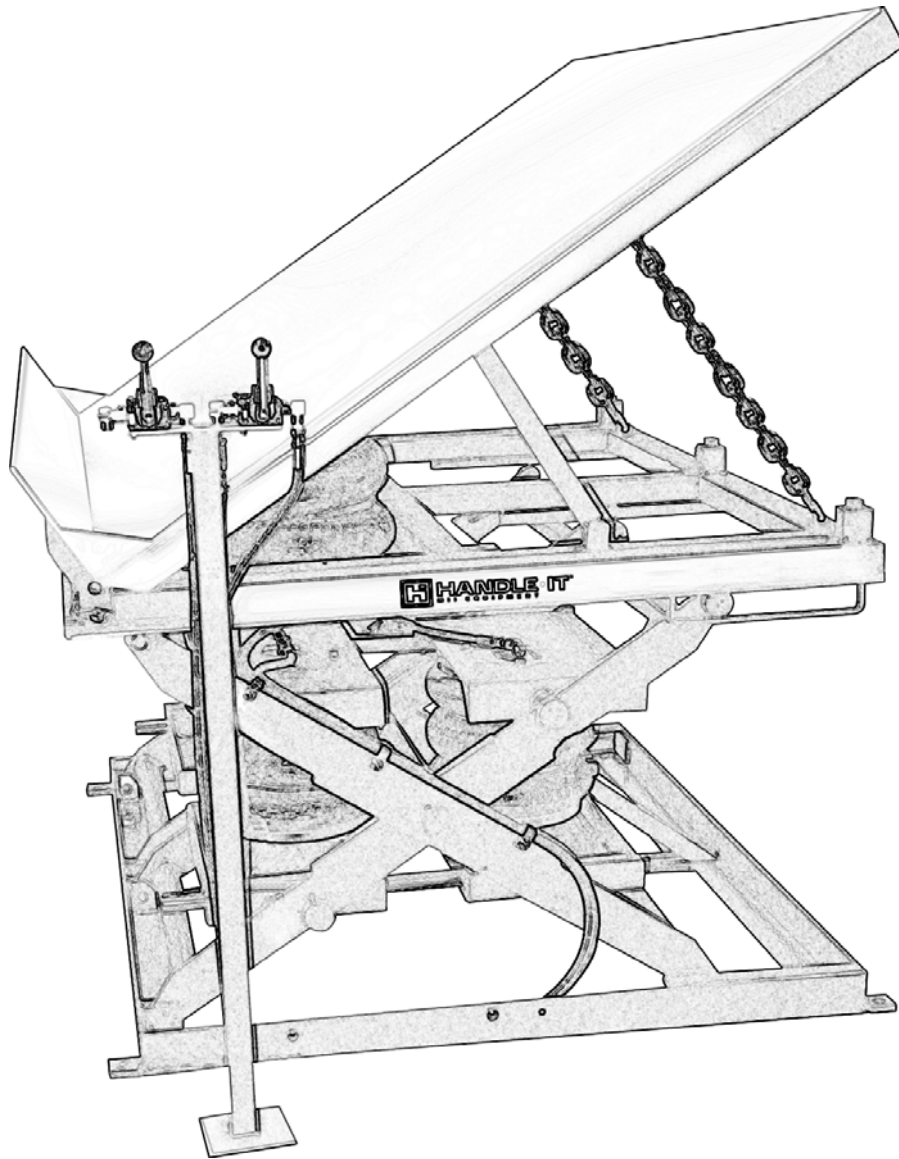




**HANDLE-IT™**  
M I E Q U I P M E N T

## Pneumatic Lift & Tilt Table Manual



PO Box 26335 · Milwaukee, WI 53226 · Toll Free 1-800-236-1080 · Fax 414-453-9975



**HANDLE-IT™**  
M I I E Q U I P M E N T

## Operation And Service Manual For Pneumatic Lift & Tilt Tables.

Introduction .....	2
Safety .....	2
Installation .....	3
Inspection .....	3
Installing.....	3
Pneumatic Section .....	3
Testing The Lift With No Load.....	4
Operation .....	4
Method Of Operation.....	4
Operating Procedures .....	5
Maintenance .....	5
Maintenance Bar .....	5
Routine Inspection And Maintenance .....	6
Troubleshooting Maintenance.....	6

## Introduction

This manual attempts to provide all of the information necessary for the safe and proper installation, operation and maintenance of Handle-It Airbag Lift & Tilt Tables.

The Lift & Tilt Table has a nameplate, which provides the load capacity ratings, serial number, drawing number and date of manufacturing. Please refer to these numbers when ordering parts or requesting further information.

## Safety

Handle-It Pneumatic Lift & Tilt Tables are very powerful, capable of doing large amounts of work. They are pneumatically actuated and are capable of causing serious injury or damage if adequate precautions are not taken. Do not install or operate this Lift & Tilt Table without carefully reading this manual.

- *Do not* perform any repair or maintenance work with the Lift in an open position unless the Lift or Tilt is properly safety locked with a maintenance bar.
- All personnel must stand clear of the machine when platform is in motion.
- *Do not* work under table without securing Lift.
- *Do not* put hands or feet under platform.
- *Do not* stand, sit or climb on the Lift & Tilt Table.
- *Do not* use on soft, uneven or unstable surfaces.
- *Do not* exceed load capacity.
- *Do not* place load on moving Lift.

Handle-It Pneumatic Lift & Tilt Tables can be equipped with safety skirts, protecting personnel from possible injuries. To get an access to all pneumatic components and scissor legs the skirts can be strapped up.

## Installation

### Inspection

Upon receipt of the Pneumatic Lift & Tilt Table inspect the equipment completely to determine if there is any shipment damage. *Do not use* the Lift & Tilt Table if there appears to be any damage. With the Lift & Tilt Table in down position check the following:

1. Signs of damage especially to the Airstroke Actuators™ and pneumatic components.
2. Check connections and nuts/bolts for tightness
3. Check the base frame for flatness.
4. Inspect for any bent or damaged metal parts.

## Installing

- 1) Make sure that the floor in the installation area is flat, stable and free from dirt and surface defects.
- 2) Place the Lift & Tilt Table in exact operating position.

### **Warning**

**When moving the Pneumatic Lift & Tilt Table, it should be picked up by the base frame only. The use of a strap sling is suggested. If the Lift has Lifting eyebolts, attach a chain spreader and raise the Lift from a centre position. Be sure the eyebolts are secured in place with locking nuts prior to using.**

- 1) Make sure that the complete base of the Lift is in contact with the floor. In order to provide complete contact with the floor, the base maybe shimmed or grouted.
- 2) Handle-It Lift recommends lagging the Lift down with hold down brackets provided.

## Pneumatic Section

Pneumatic Lift & Tilt Tables are designed for normal factory environments. Consult the factory for unusual applications.

### **Warning**

**Qualified authorized service personnel should perform all pneumatic connections.**

The Table requires a minimum of 80 PSI, 15 CFM and clean dry air to function correctly.

## Testing the Lift & Tilt with no load

- 1) Before testing the Lift & Tilt Table, clear the area of any loose material. Be sure the Lift & Tilt Table has no obstruction above it or on any side. Using the controls provided, briefly operate the Lift and the Tilt (5-10 Sec).
- 2) If the Lift and the Tilt Table begins to rise respectively and functions properly, continue to the full upright position.

### **Warning**

**If the Lift & Tilt Table does not rise immediately or there is any operational problem, stop it immediately. Before continuing, refer to the troubleshooting section and correct the problem.**

- 3) After raising the Lift & Tilt Table completely, lower the Lift & Tilt Table. It should move slowly and smoothly. If the Lift & Tilt Table operates properly, raise and lower the Lift & Tilt Table and stop at different levels to get a good perspective on the Lift & Tilt Table's operations and movements.

# Operation

## Method of operation

Handle-It Pneumatic Lift & Tilt Tables are provided with two control valves, which control the flow of air to the Airstroke Actuators™. As the actuator is pressurized, the Lift is forced apart causing the tabletop to Lift and Tilt.

The Tilt Angle is limited by two 3/8" chains of equal length. The Air Actuator Manufacturer recommends 30 Degrees of maximum Tilt angle. The Tilt angle can be decreased by shortening the chain.

As air is released from the bag, the Airstroke Actuators collapse and the top is lowered. A factory pre-set flow control ensures a smooth descent at controlled speed.

An optional motion stabiliser will reduce bounce.



## Warning

***Do not*** maintain the control valve in the open position if the Lift & Tilt Table does not move or has reached its upper limit. This may cause damage to the pneumatic system.

## Operating Procedures

In order to operate the Lift & Tilt Table, follow these operating procedures.

- 1) Read and understand all the instructions before operating.
- 2) Load the Lift & Tilt Table correctly. Refer to attached nameplate for load capacity

information.

- a) Do not load the Lift & Tilt Table while it is moving.
  - b) Do not exceed the maximum rated load.
  - c) Place load in the center of table.
  - d) If the load is unstable or may become unstable, fasten it into position.
- 3) Operate the Lift.
- a) To raise the Lift or Tilt, activate the hand control valve to the "up" position. Hold the valve open until the Lift or Tilt reaches its desired extension. The valve is spring loaded and will return to center (closed) when the lever is released.
  - b) To lower the Lift or Tilt, activate the hand control valve to the down position. Hold the valve open until the Lift or Tilt descends to the desired height or the Lift & Tilt reaches its fully lowered position.
- 4) Wait till the Lift & Tilt Table has come to a complete stop before unloading.
- 5) Stand clear of the Lift & Tilt Table when operating it in order to avoid injury.

## **Warning**

***Do not stand, sit or climb onto the Lift & Tilt Table.***

***If the Lift & Tilt Table fails to move or exhibits strange movement or sound, stop immediately.***

***Do not operate the Lift & Tilt Table until it has been checked and repaired.***

***Do not load or unload a moving Lift.***

## **Maintenance**

Generally the Handle-It Lift & Tilt Table will require little maintenance. However routine maintenance and inspection will minimise costly repairs or hazardous conditions.

## **Warning**

***Never go under, or service a Lift & Tilt Table with a load on the table or the platform in up position. If the pneumatic system requires repairs, shut off and lock out the air supply. Purge the system of any pressure before beginning any repairs.***

## **Maintenance bar**

Handle-It Lift Pneumatic Lift & Tilt Tables are designed to be maintained and serviced in a raised position. Maintenance bars are provided for safely locking the Lift and the Tilt in raised position

### Installation

- 1) Completely remove any load from the Lift platform.
- 2) Raise the Lift to its full height.
- 3) Engage a maintenance bar.
- 4) Lower the Lift until the top rests on the maintenance bar.
- 5) Check that the maintenance bar is securely in place.
- 6) Release all air pressure from the Lift. The maintenance bar is now supporting the Lift.

## Removal

- 1) Raise the Lift to its full height.
- 2) Flip out the maintenance bar.
- 3) Lower the Lift.

## Routine Inspection And Maintenance

All routine inspection maintenance should be performed on a weekly basis.

1) With the Lift unloaded and in its fully raised position, check the pneumatics system for leaks.

- a) Check all fittings, lines and components for escaping air.
- b) In addition to listening for an audible hissing, perform a soap bubble test.
- c) If a leak exist, repair immediately.

2) Check Airstroke Actuators™ for any signs of wear, chafing, nicks, splits, etc. Replace if necessary.

3) Tighten all visible nuts and bolts.

4) Bushings on all Lifts are permanently lubricated and do not require servicing.

5) Check chain mounting lugs for weld cracking or other signs of fatigue.

5) **IMPORTANT!** Check if pivot pins are secure. Great damage and possible injury can occur if these pins come loose.

## Troubleshooting Maintenance

### Pneumatic Table moving slowly or not at all

1) Check for obstructions.

2) Check for incoming air supply.

3) Check circuit for air leaks - loose connection, damaged hose, etc. Listen for air escaping.

4) Is Lift overloaded? Check capacity.

5) Check control valve for sticking or jamming - repair or replace.