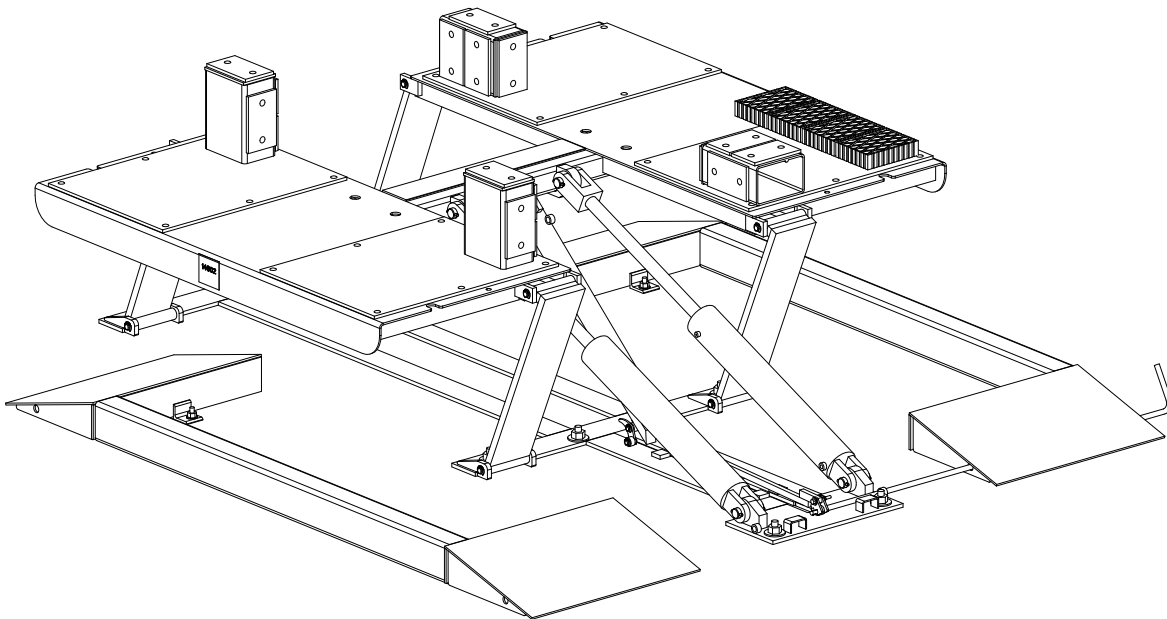




**VLXS7**  
**Low Rise Car Lift**  
Capacity 7000 lbs.  
(Maximum 1750 lbs. per pad)

**VLXS10**  
**Low Rise Car Lift**  
Capacity 10,000 lbs.  
(Maximum 2500 lbs. per pad)



**OPERATING CONDITIONS**

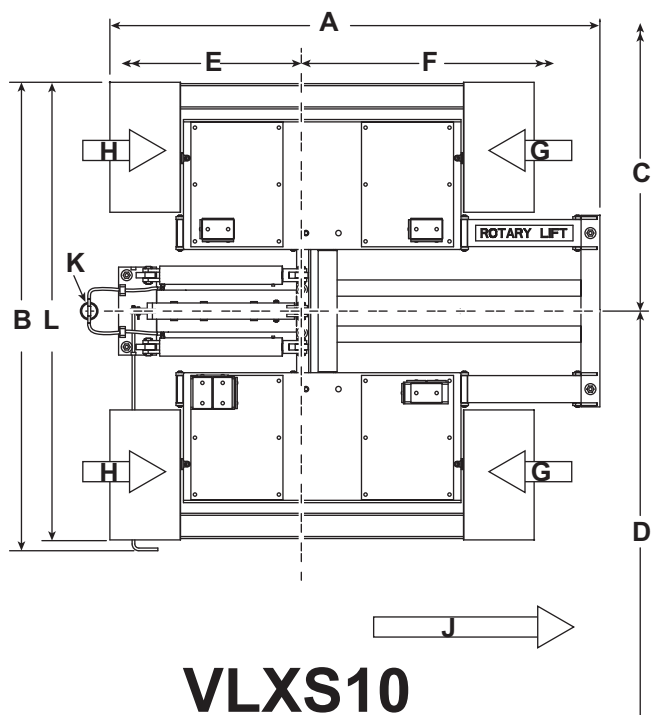
Lift is not intended for outdoor use  
and has an operating ambient temperature  
range of  
41°-104°F (5°-40°C)

**LP20389**

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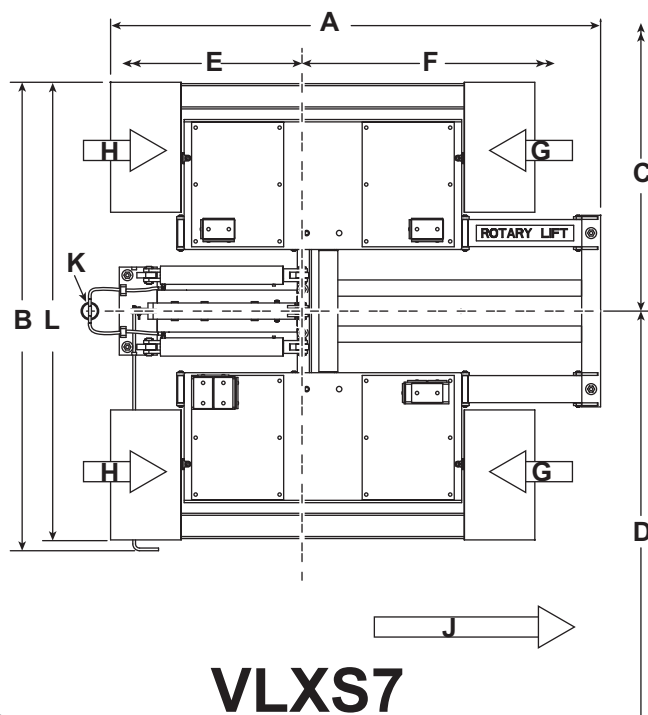
**IN20389**  
Rev. K 2/26/2014

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**VLXS10**

### CLEARANCE AROUND VLXS10 LIFT



**VLXS7**

### CLEARANCE AROUND VLXS7 LIFT

Fig. 1

- A. Overall Length .....7'-7" (2311mm)
- B. Overall Width.....6'-11-3/4" (2127mm)
- C. Minimum To Center Of Next Lift ..... 11'-0" (3353mm)
- D. Minimum To Nearest Obstruction.....5'-0" (1981mm)
- E. Minimum For 24' (7315mm) Bay
  - Standard Approach (G)..... 10'-9" (3277mm)
  - Optional Approach (H) ..... 13'-3" (4039mm)
- F. Minimum For 24' (7315mm) Bay
  - Standard Approach (G)..... 13'-3" (4039mm)
  - Optional Approach (H) ..... 10'-9" (3277mm)
- G. Approach
- H. Approach (Optional)
- J. At Full Rise Lift Moves 15" In This Direction
- K. 2" Conduit to Power Unit (Optional).
- L. Width of Platform/Base .....6'-6-1/2" (1994mm)

- A. Overall Length .....7'-7" (2311mm)
- B. Overall Width.....6'-11-3/4" (2127mm)
- C. Minimum To Center Of Next Lift ..... 11'-0" (3353mm)
- D. Minimum To Nearest Obstruction.....5'-0" (1981mm)
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- G. Approach
- H. Approach (Optional)
- J. At Full Rise Lift Moves 15" In This Direction
- K. 2" Conduit to Power Unit (Optional).
- L. Width of Platform/Base .....6'-6-1/2" (1994mm)

#### NOTE:

Lift can be installed with cylinder end pointing towards front or rear of bay. **Be alert to differences in lift clearance requirements according to installation option chosen and customer preference.**

1. **Lift Location:** Always check architect's building plans when applicable. The lift should be located on a relatively level floor in a space which will allow adequate working space around the vehicle, Fig. 1.

**Note:** Lift can be installed with cylinder end pointing towards front (typical) or rear of bay. **Be alert to differences in lift clearance requirements according to installation option chosen and customer preference.**

**DO NOT** install on asphalt or other similar unstable surfaces.

**Note:** At full rise, the lift moves the vehicle 15" (381mm), Fig. 2.

2. Remove shipping bands and wood skids from lift.

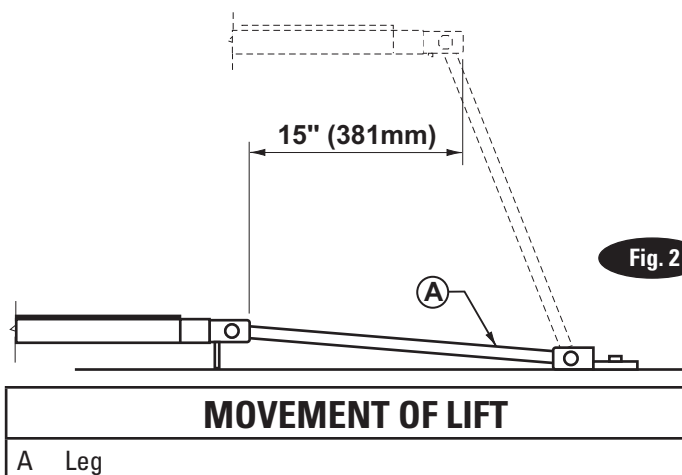


Fig. 2

### MOVEMENT OF LIFT

A Leg

### 3. Anchoring:

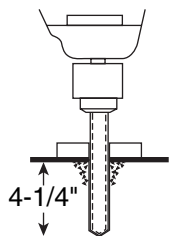
- A. The anchor bolts must be installed at least 4-3/4" (121mm) from any edge or seam in the concrete
- B. Concrete shall have a compression strength of at least 3,000 PSI (20N/mm<sup>2</sup>) and a minimum thickness of 4-1/4" (108mm) in order to achieve a minimum anchor embedment of 3-1/4" (83mm). When using the standard supplied 3/4" x 5-1/2" lg. anchors, if the top of the anchor exceeds 2-1/4" above the floor grade, you DO NOT have enough embedment.
- C. Drill (8) 3/4" dia. holes in concrete floor using holes in base plate as a guide, see Fig. 3 & 4.

Note: DO NOT install anchors in holes marked "B" until AFTER lift is raised, see Fig. 4.

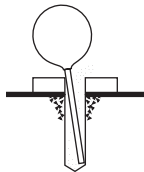
**CAUTION** DO NOT install on asphalt or other similar unstable surfaces.

- D. Tighten the anchor bolts to 110 ft-lbs (150 N-m). Do not use an impact wrench on anchor bolts.  
If after tightening the anchor supplied with the lift extends more than 2-1/4" (57mm) above the floor the anchor does not have enough embedment.

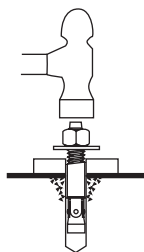
## ANCHORING LIFT



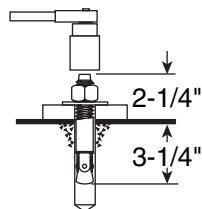
Drill hole using 3/4" carbide tipped masonry drill bit per ANSI standard B94.12.1977.



Clean Hole.



Run nut down just below impact section of bolt. Drive anchor into hole until nut & washer contact base.



Tighten nut with Torque Wrench to 110 ft-lbs (150 N-m)

Fig. 3

SEISMIC - Varies by location consult with your structural engineer and manufacturer's representative.

**IMPORTANT** If an anchor will not reach the appropriate torque level or does not have enough embedment or adequate spacing cannot be achieved, replace the concrete under the lift with an 7' wide x 9' deep x 6" thick pad (2m x 2.7m x 152mm) of 3,000 psi (20N/mm<sup>2</sup>) concrete keyed under the existing floor. Let the concrete cure before reinstalling the lift.

**IMPORTANT** The frame must not be twisted, bent or otherwise misaligned by unlevel floors or improper anchoring. Misalignment will cause damage to the lift. Maximum out-of-level at anchors is: 1/4" (6mm) side to side; 1/2" (13mm) front to rear. If floor is crowned more than 1/4" (6mm) between front to rear anchors, shim at anchors. Top structure to be parallel to bases within 1/4" (6mm). Use shim kit FJ2426, or use grout to level the floor.

## ANCHOR LOCATIONS

- |   |  |
|---|--|
| A | Holes not used   |
| B | Drill (2) holes for 3/4" anchors through top, install after raising. |
| C | Drill (6) holes and install 3/4" anchors.                            |

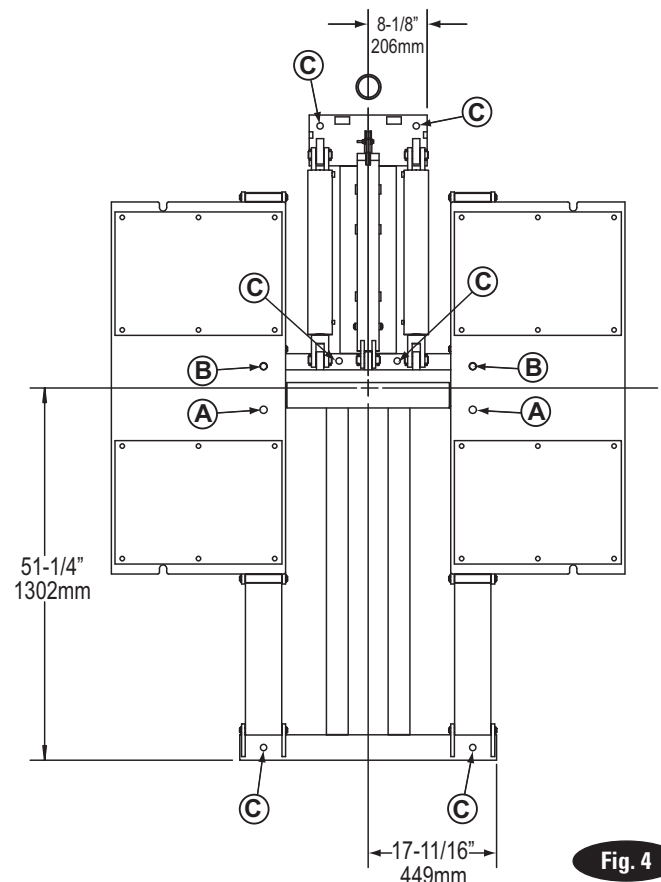


Fig. 4

**\*The supplied concrete fasteners meet the criteria of the American National Standard "Automotive Lifts - Safety Requirements for Construction, Testing, and Validation" ANSI/ALI ALCTV-2011, and the lift owner is responsible for all charges related to any additional anchoring requirements as specified by local codes. Contact customer service for further information at: 800.445.5438**

4. Install Power Unit And Mounting Post:

- A. Refer to architect’s plan for placement of power unit mounting post. Using the stand as a template mark location of (4) floor anchor holes. Note, the post uses a 1/2” diameter anchor which is different from the lift. Using a 1/2” carbide drill bit, drill and install anchors for the post.
- B. Attach four 5/16” x 1-1/4” bolts to the highest two and lowest two holes in the mounting bracket with 5/16” plain nuts. Attach the power unit, to these bolts and secure with 5/16” nylon insert nuts.
- C. Add fluid. Remove the fill-cap from the tank and fill with Dexron III ATF or hydraulic oil that meets ISO 32, until fluid reaches the MIN \_\_\_\_\_ mark on the power unit. Replace the fill-cap.

5. Electrical:

- A. The power unit comes completely wired and ready to plug into a 115 volt, single phase, 60 Hz. Circuit. A six foot, 3-wire power cord with grounding plug is provided. See Motor Operating Data Table, Fig. 5, 5a.

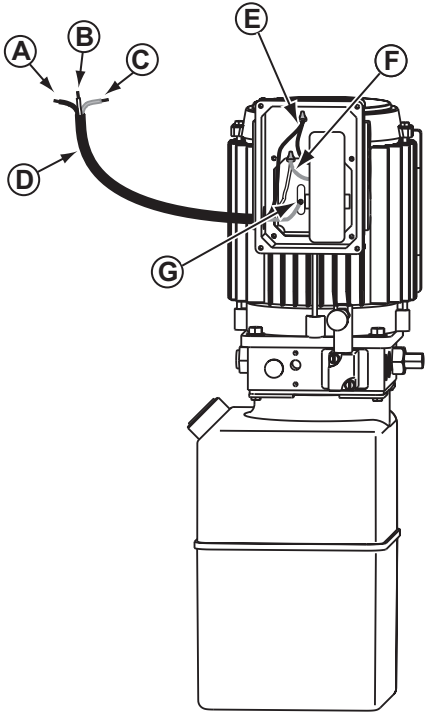
**IMPORTANT** Use separate circuit with time delay fuse or circuit breaker for each power unit. For single phase 115V use 25 amp. fuse. Wiring and power unit locations must comply with local electrical codes.

- B. Optional 208V-230V operated: Have a certified electrician run 230V single phase 60Hz power supply to 2 HP motor, Fig. 5. Size wire for 20 amp circuit. See Motor Operating Data table.

Single Phase Rotary Power Unit

Motor Operating Data - Single Phase	
Line Voltage	Running Motor Voltage Range
208-230 Volts 60 HZ	197-253 Volts

Motor Operating Data - Single Phase	
Line Voltage	Running Motor Voltage Range
115 Volts 60 HZ	103-127 Volts



Power Unit Wiring Detail	
A	Black Wire
B	White Wire
C	Green Wire
D	208-230V 60HZ Single Phase
E	Attach Black Wire to Black Wire.
F	Attach White Wire to Red Wire
G	Attach Ground Wire here.

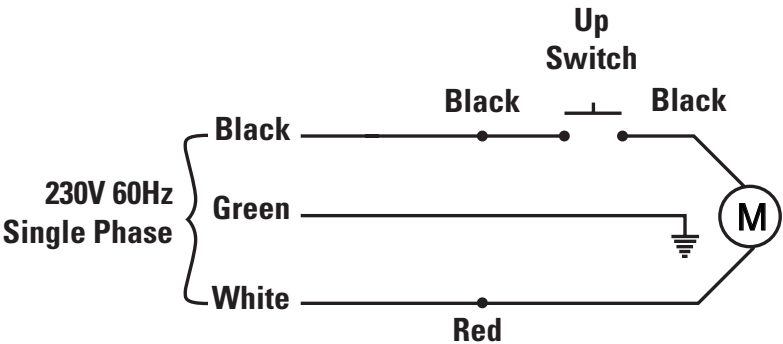
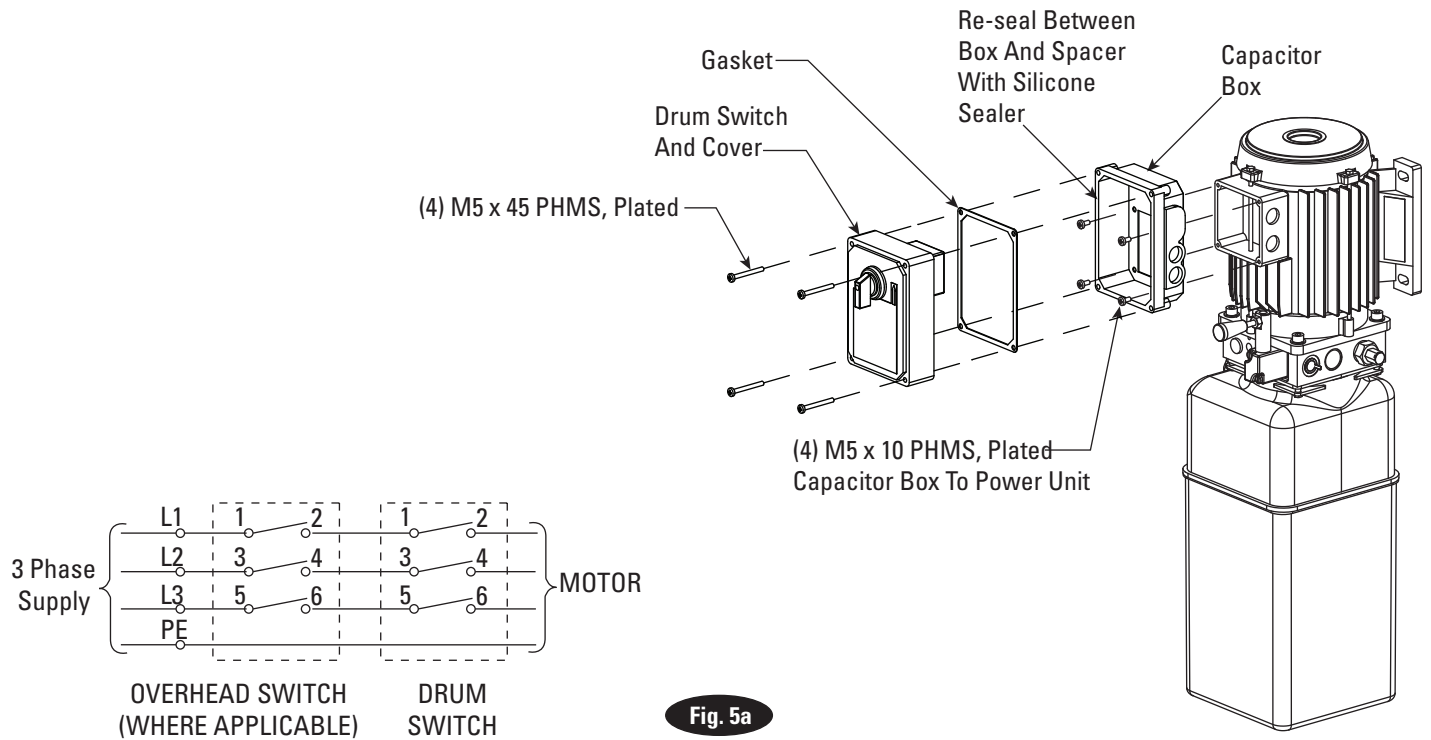
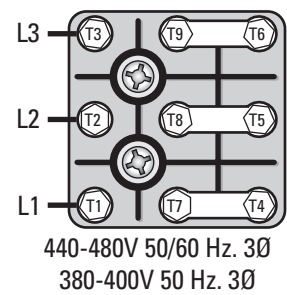
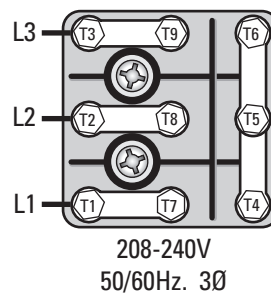


Fig. 5

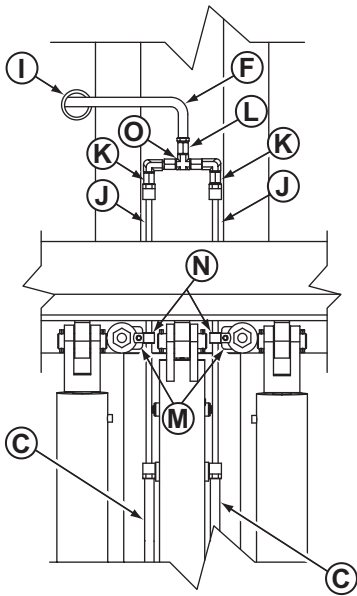


### Three Phase Power Unit

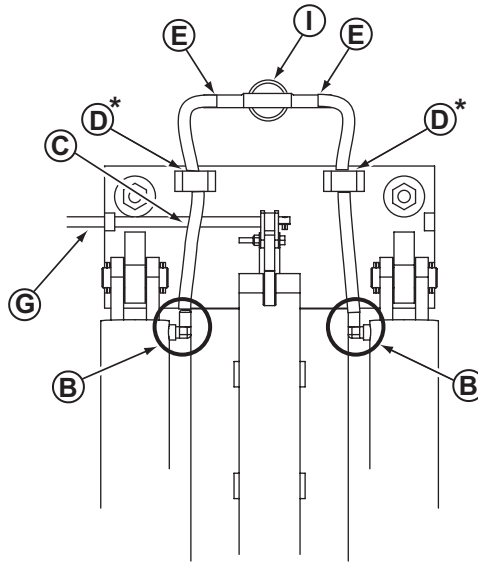
MOTOR OPERATING DATA TABLE - THREE PHASE	
LINE VOLTAGE	RUNNING MOTOR VOLTAGE RANGE
208-240V 50/60Hz.	197-253V
400V 50Hz.	360-440V
440-480V 50/60Hz.	396V-528V



### Rear Approach Hose Routing (With Conduit)



### Front Approach Hose Routing (With Conduit)



### Front Approach Hose Routing (With Hose Guard)

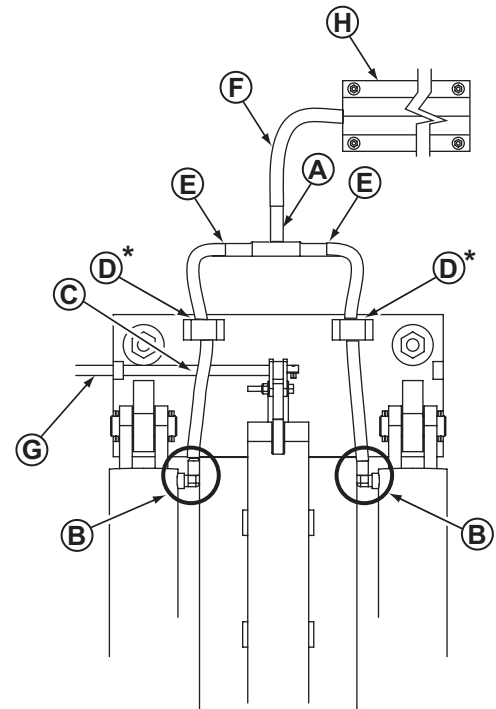


Fig. 6

## 6. Running Hoses And Bleeding The Hydraulic System:

- A. **⚠ WARNING** When attaching hydraulic fittings with pipe threads to the cylinders use Teflon tape. DO NOT start the Teflon tape closer than 1/8" (3mm) from the end of the fitting. Failure to comply may cause damage to the hydraulic system.
- B. **⚠ WARNING** When tightening connections with flared (JIC) fittings, always follow the following tightening instructions. Failure to follow these instructions may result in cracked fittings and / or leaks. Use the proper size wrench. The nut portion of the fitting is the only part that should turn during tightening. The flare seat MUST NOT turn. Screw the fittings together hand tight. Using a 11/16" wrench to rotate the nut portion of the fitting 2-1/2 hex flats. Back the fitting off one full turn. Again, tighten the fitting hand tight, then rotate the nut portion of the fitting 2-1/2 hex flats.
- C. Connect the long hydraulic hose to the branch on the JIC tee fitting, Fig 6 (F).
- D. Connect a male pipe thread to male JIC elbow to the port near the base end of each cylinder. The fittings should face toward the front of the lift (towards conduit or hose guard) and up 5 to 10 degrees, the cylinders will rotate upward as the lift rises, Fig. 6 (B). For rear approach hose installation face rearward down 5 to 10 degrees.
- E. Connect the short hydraulic hoses to the elbows on the cylinders, Fig. 6 (B). These connections should be hand-tight only. Feed the free ends of the hoses thru the hose guides, Fig. 6 (C & D) . (Ignore for rear approach hose installation.)

- F. Connect short hoses to the runs on the JIC tee fitting, Fig. 6 (E). For rear approach hose installation to stainless tubing also position tubing clamp adapters over concrete anchors and place clamp over tubing as shown. Connect 90 degree JIC elbow to swivel tee and then long hose to male adapter.

A	JIC tee fitting
B	JIC elbows
C	Short hydraulic hose to be routed over latch release handle as shown, or by hydraulic cylinder as shown.
D	Feed the free ends of the short hydraulic hoses thru the hose guides as shown.
E	Short hoses to be connected to the runs on the JIC tee fitting.
F	Long hydraulic hose to be either routed through 2" conduit or through the hose guard as shown. This is according to the installation option chosen by customer.
G	Latch release handle
H	Hose guard ( <b>Note: Hose guards are not to be used if conduit is in concrete, DO NOT anchor at this time.</b> )
I	2" conduit to power unit
J	Stainless Tubing Assembly
K	90° JIC Elbow
L	Male Adapter
M	Clamp Adapter
N	Tubing Clamp
O	Swivel Tee

**\*For recessed installations, hose guides (D\*) are not used. Cylinders are rotated 180° from positions shown in Fig. 6.**

- G. With the lift at it's lowest position loosen the connections between the hoses and fittings attached to the cylinders. Do not loosen the connections between the fittings and the cylinders themselves.
- H. Run the power unit until fluid appears at the cylinder ports. Tighten the hose connections.
- I. Add fluid to the system as previously described.

## 7. Recessed Installation Fig. 9

- A. Position spacer plates between pit wall and lift structure. Anchor spacers using procedure for wheel dish in Step 10B.

## 8. Positioning The Ramps:

- A. The ramps should be positioned as shown in Fig. 7, with a minimum of 1/2" (3mm), Dimension (A), clearance between the ramp and the front edge of the pad opposite the cylinders and 5/8" (16mm), Dimension (B), clearance between the outside surfaces of the pad and the inside surface of the ramps. DO NOT DRILL ANCHOR HOLES AT THIS TIME!
- B. Raise and lower the lift through one cycle and ensure there is adequate clearance between the ramps and the pad.

RAMP CLEARANCE TABLE	
A	1/2" (13mm) minimum clearance.
B	5/8" (16mm) minimum clearance.
C	Anchor hole locations for wheel dish.

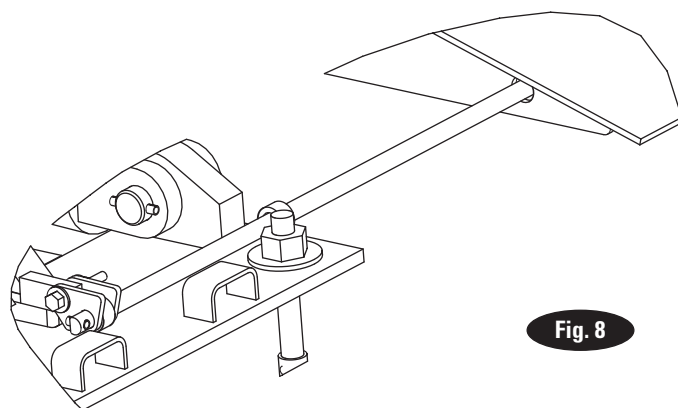
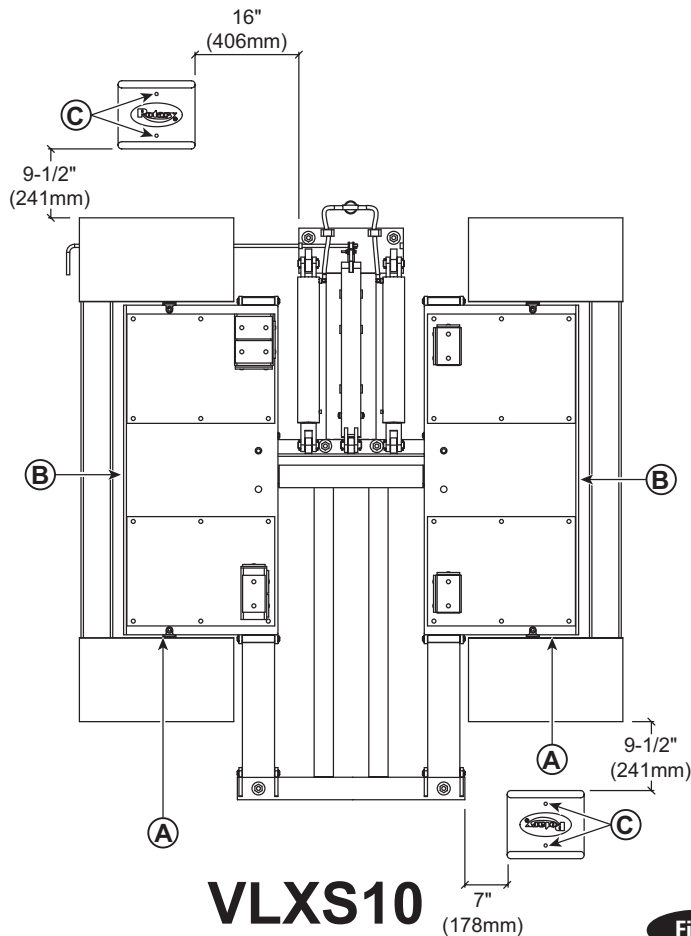
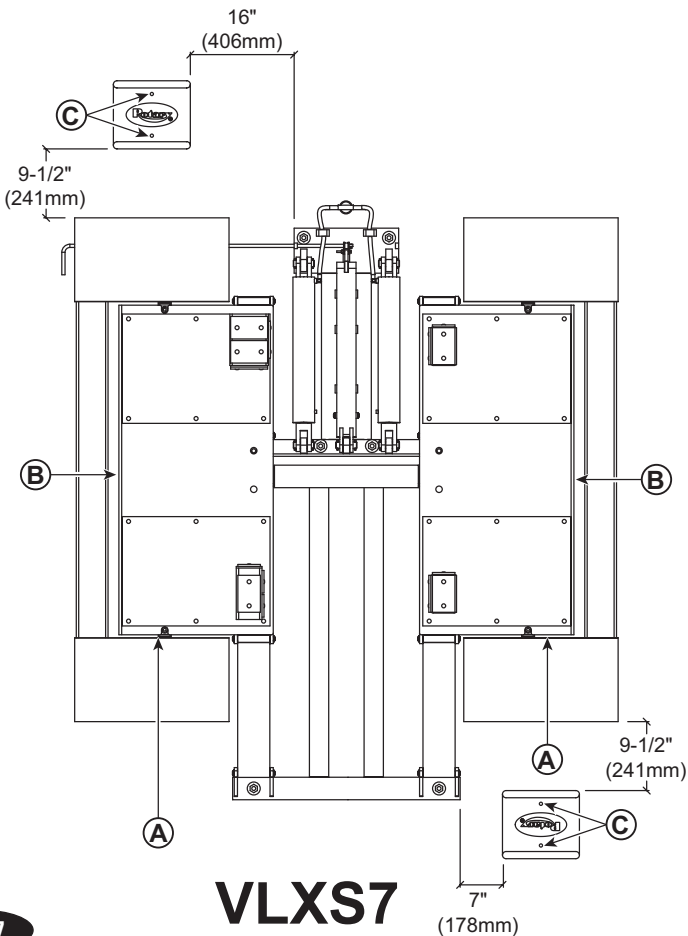


Fig. 8

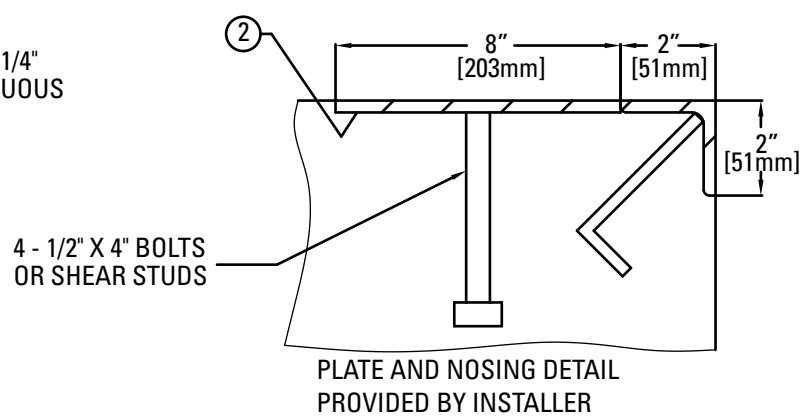
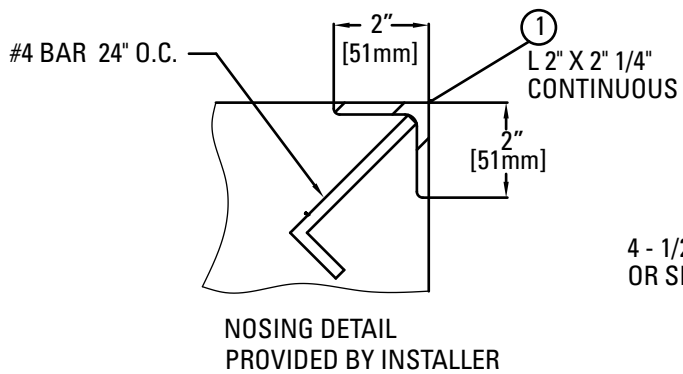
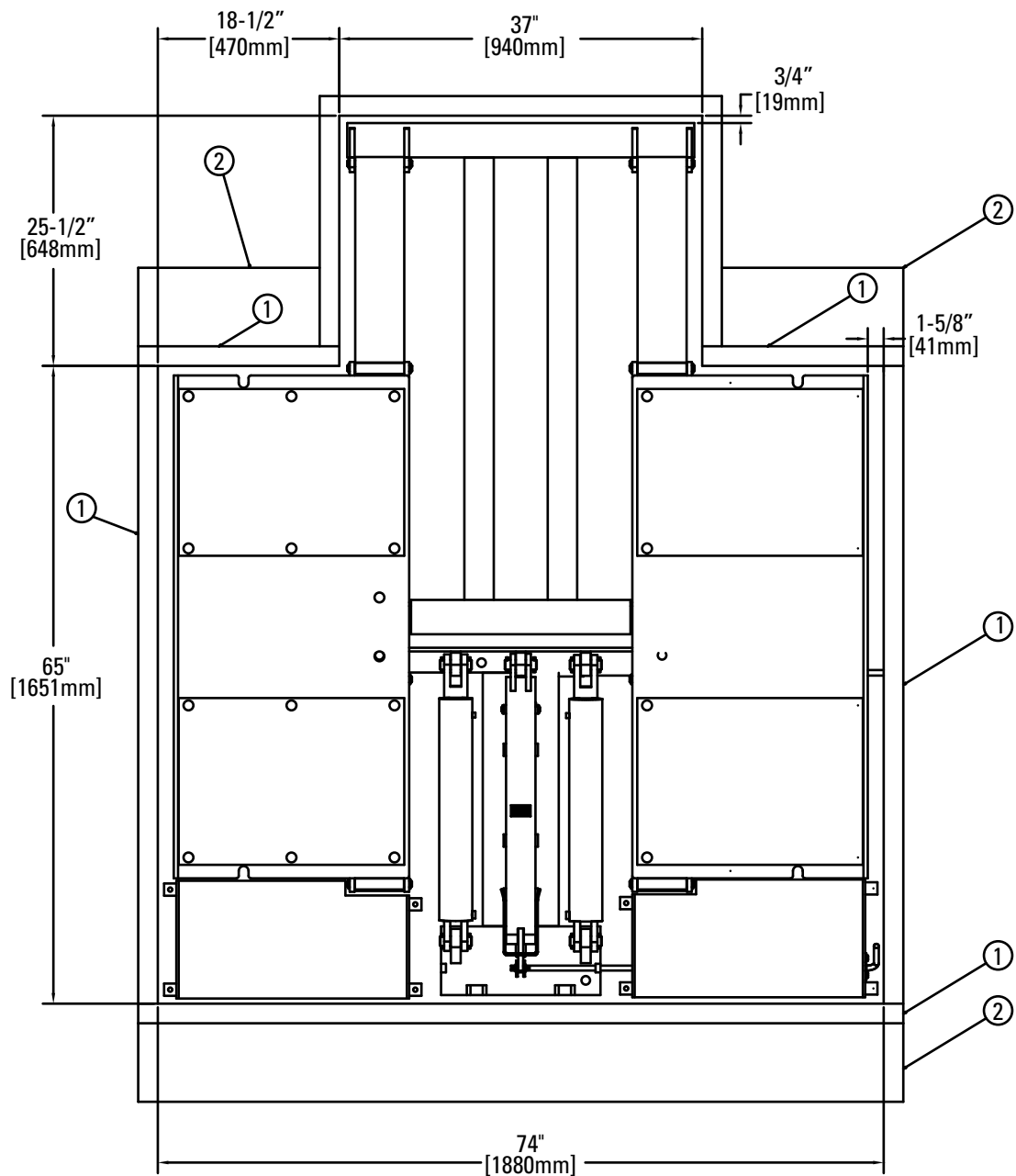


VLXS10



VLXS7

Fig. 7



PIT DIMENSIONS ARE INSIDE DIMENSIONS  
PIT DEPTH IS 3-1/2" AND SLOPE TO  
ANY DRAINS INSTALLED SHOULD BE 1/16" PER FOOT

Fig. 9



### **9. Installing The Lock Release Handle:**

- A. Insert the latch release handle through the access hole in the ramp nearest the power unit.
- B. Insert the keyed end of the handle through the keyway in the latch release weldment as shown in Fig. 8.
- C. Install the roll pin into the end of the handle as shown in Fig. 8.

### **10. Anchoring The Ramps And Spotting Dish:**

#### **A. Ramps:**

Note the ramps use a 1/2" diameter anchor which is different from the lift. Using a 1/2" carbide drill bit, drill holes and install (4) anchors to the ramps.

#### **B. Wheel Dish:**

- 1. Locate front wheel dish as shown in Fig. 7 (C).
- 2. Drill two 3/8" holes x 2-1/2" deep in concrete floor using holes in wheel spotting dish as guide.
- 3. Hammer both drive anchors through wheel spotting dish into concrete floor.

### **11. Installing Hose Guard:**

**Note: Hose guards ARE NOT to be used if conduit is in concrete.**

- A. Position hose guard over hose. Note: Hose guard is to be used to prevent damage of hose when driven over and to prevent tripping.
- B. Drill (4) 1/4" anchor holes and install anchors.

### **12. Final Adjustments:**

#### **A. Install and tighten the remaining two anchors as described in Fig. 4.**

- B. If any problems are encountered, do not proceed with subsequent steps. Instead, resolve the problem before proceeding by referencing the Troubleshooting portion of the Owner's Manual section of this manual.
- C. Raise the lift empty to the top of its travel and lower it the floor three (3) times to remove the remaining air from the hydraulic system and to verify that the power unit won't stall at relief pressure.
- D. Position a vehicle on the lift, raise to full height and lower onto the safety latches. Lower the vehicle to the floor.
- E. After cycling the lift ten times with a vehicle on it, recheck the tightness of the lift anchors to 90 ft-lbs (122 N-m).

NOTES:

NOTES:

**Installer:** Please return this booklet to literature package and give to lift owner/operator.

**Trained Operators and Regular Maintenance Ensures  
Satisfactory Performance of Your Rotary Lift.**

**Contact Your Nearest Authorized Rotary Parts Distributor for Genuine Rotary Replacement Parts. See  
Literature Package for Parts Breakdown.**

**Rotary World Headquarters**

2700 Lanier Drive  
Madison, IN 47250, USA  
[www.rotarylif.com](http://www.rotarylif.com)

**North America Contact Information**

Tech. Support:  
p 800.445.5438  
f 800.578.5438  
e [userlink@rotarylif.com](mailto:userlink@rotarylif.com)  
Sales:  
p 800.640.5438  
f 800.578.5438  
e [userlink@rotarylif.com](mailto:userlink@rotarylif.com)

**World Wide Contact Information**

World Headquarters/USA: 1.812.273.1622  
Canada: 1.905.812.9920  
European Headquarters/Germany: +49.771.9233.0  
United Kingdom: +44.178.747.7711  
Australasia: +60.3.7660.0285  
Latin America / Caribbean: +54.3488.431.608  
Middle East / Northern Africa: +49.771.9233.0

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