

OPERATOR'S GUIDE

12B

Trilateral Head with Mast

Manual Number 8349495

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corporation**

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WARNING: Rated capacity of the truck/attachment combination is a responsibility of the original truck manufacturer and may be less than shown on the attachment nameplate. Consult the truck nameplate.

WARNING: Do not operate this attachment unless you are a trained and authorized lift truck driver.

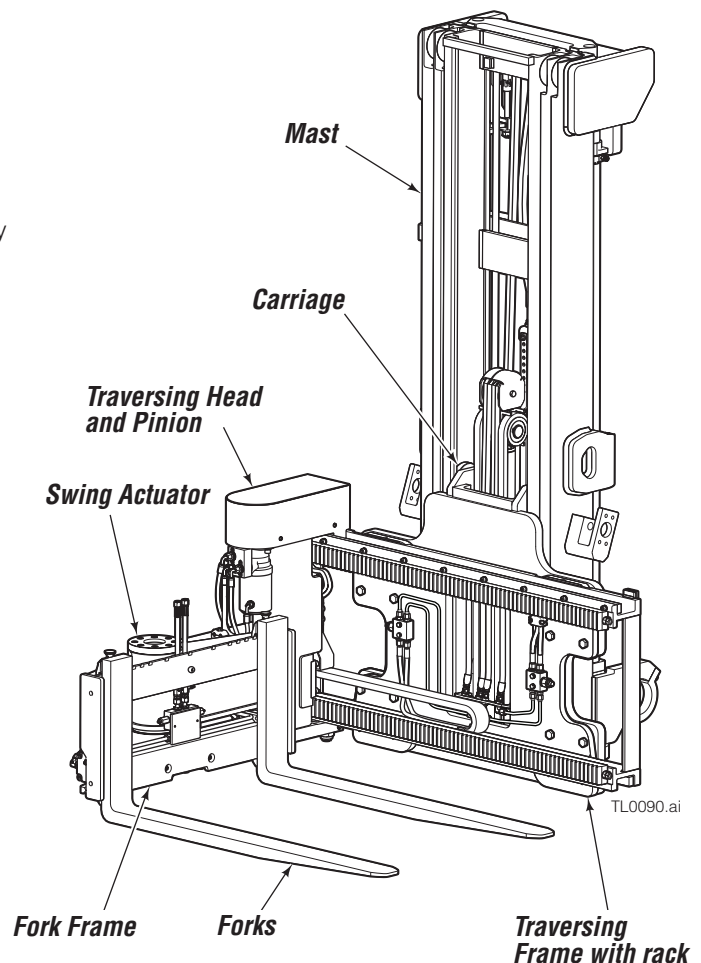
CAUTION: The **net** Cascade Trilateral Head with Mast combination capacity is determined by the truck manufacturer and will be noted on the lift truck data tag. The **net** load carrying capacity of the fork frame is the capacity of lift truck, mast and trilateral head combination to maintain truck stability. Typically, one **net** capacity rating will be given. This is the total combined **net** capacity of the mast and trilateral head combination.

INTRODUCTION

The Cascade Trilateral Head with Mast enables pallets to be loaded and moved in areas with limited access. The unit consists of a mast carrying a trilateral head. The trilateral head contains a traversing frame with a mechanism to move the fork frame toward a load. The mechanism also rotates the fork frame on the vertical axis.

About this Guide – This information is intended to simplify operator understanding about effective and safe use and operation for the Mast and Trilateral Head combination. Read this information thoroughly before operating this unit. Be sure you know and understand all operating procedures and safety precautions. If you have any questions or don't understand a procedure, ask your supervisor.

Emphasize Safety! Most accidents are caused by operator carelessness or misjudgment. You must watch for poorly maintained equipment and hazardous situations and correct them.



SAFETY RULES

Industrial Lift Trucks

No riders



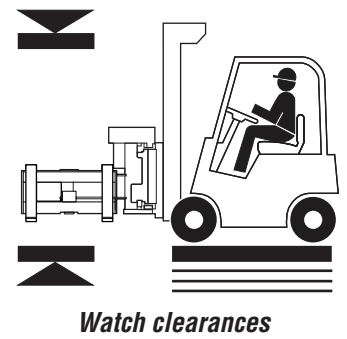
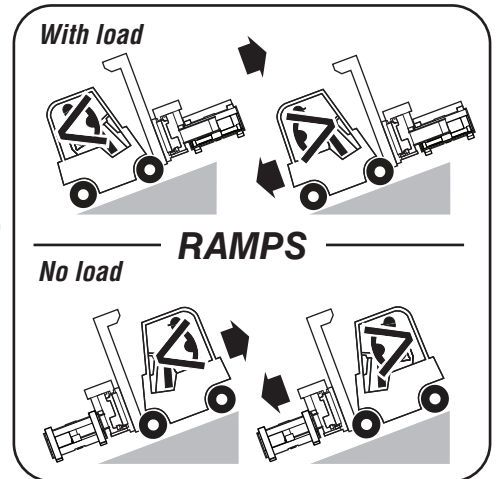
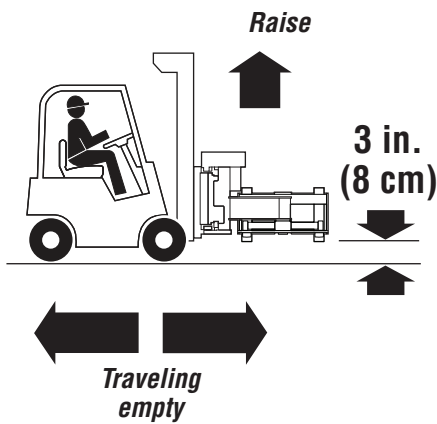
No reaching through mast



No standing under load

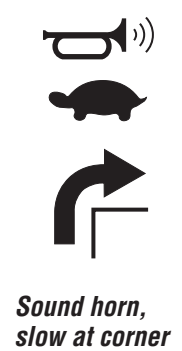
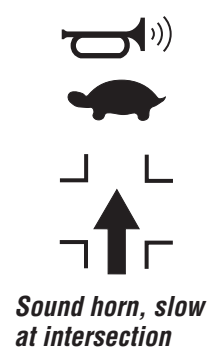
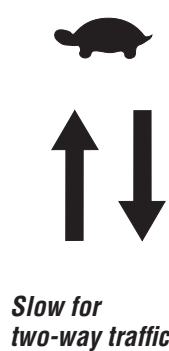


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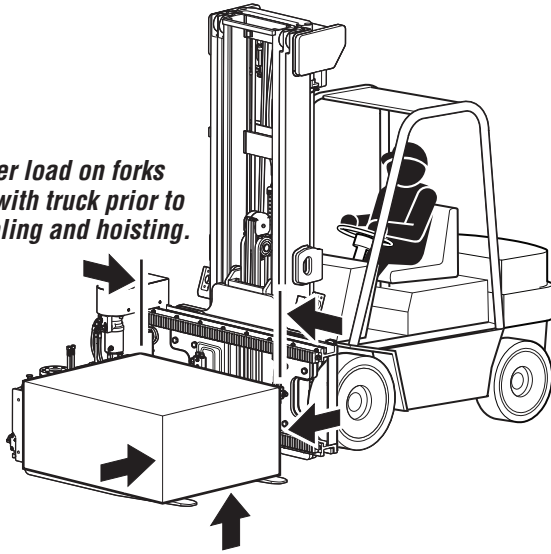
TRAFFIC



SAFETY RULES

Handling Loads

Center load on forks and with truck prior to traveling and hoisting.

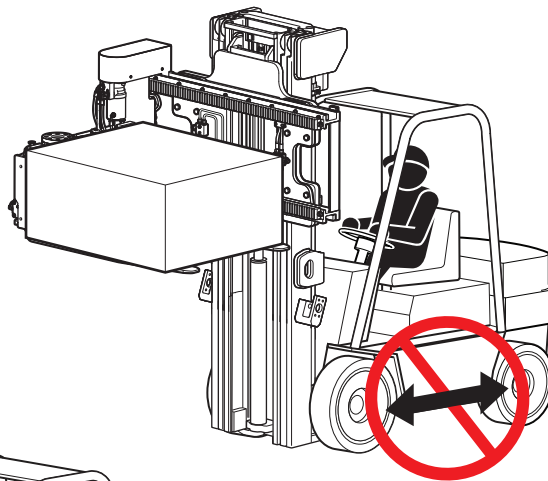
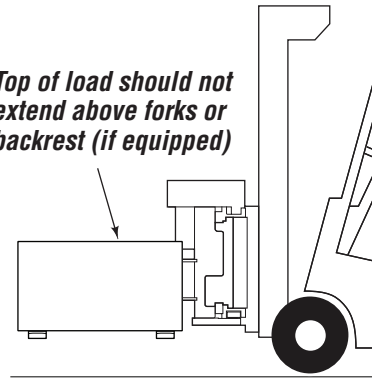


Raise load prior to traversing and/or pivoting.

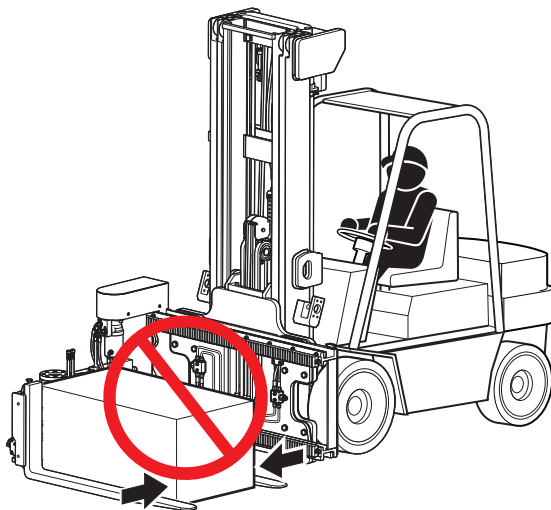


No mast tilting with raised load.

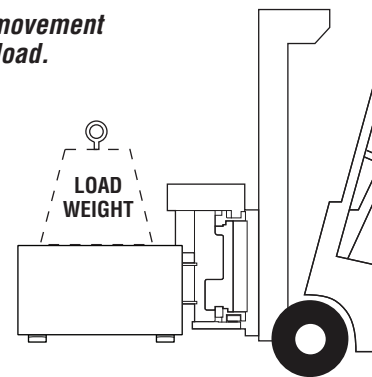
Top of load should not extend above forks or backrest (if equipped)



Limit truck movement with raised load.



CAUTION: Do not put side loads on forks.

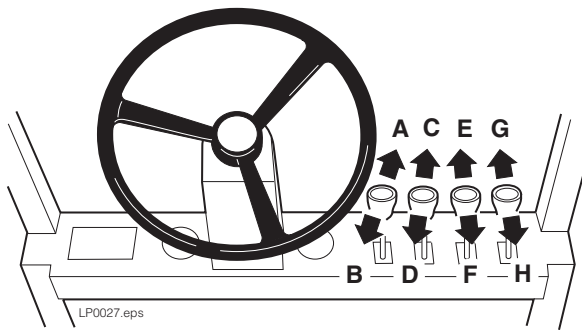


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Load weight must not exceed combined truck/attachment capacity (see truck nameplate).

Total fork capacity (LH + RH fork) must be greater than load weight. Check capacity stamp on forks.

OPERATION

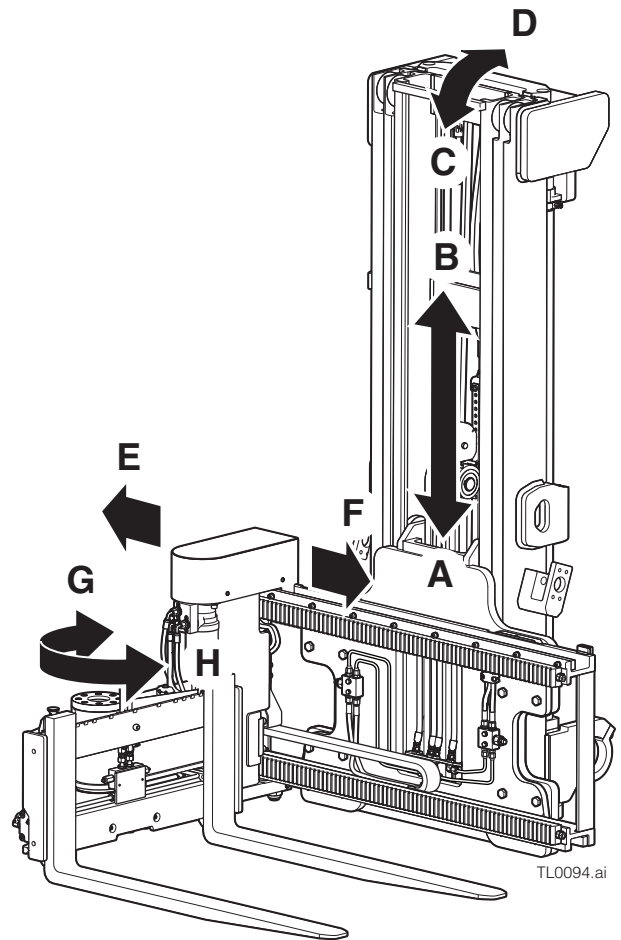


Main Valve Functions

- A** Hoist Down
- B** Hoist Up
- C** Tilt Forward
- D** Tilt Back

Auxiliary Valve Functions

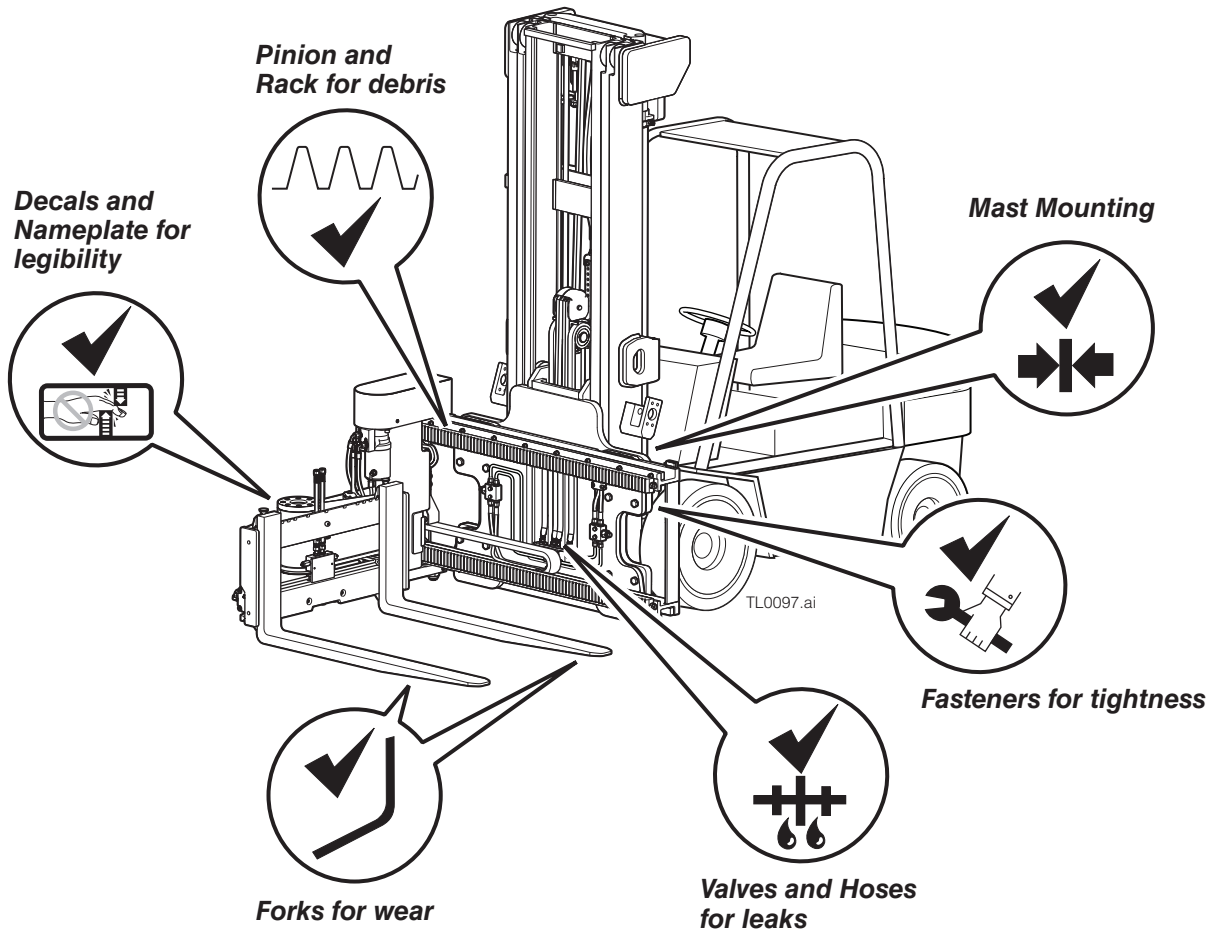
- E** Traverse Right
- F** Traverse Left
- G** Pivot Right (Rotate CW)
- H** Pivot Left (Rotate CCW)



WARNING: Truck control handle and attachment function activation shown here conforms to ANSI B56.1 (ISO 3691) recommended practices. Failure to follow these practices may lead to serious bodily injury or property damage. End user, dealer and OEMs should review any deviation from the practices for safe operation.

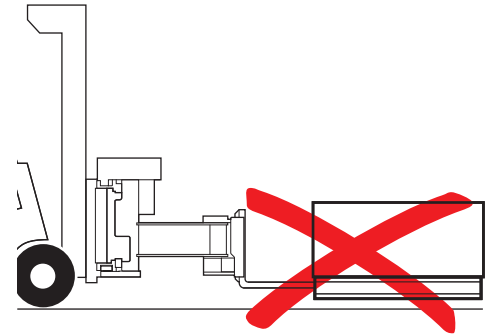
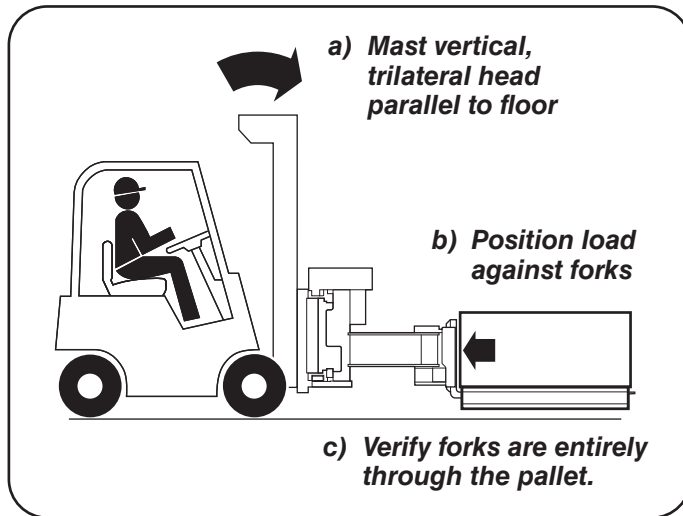
DAILY INSPECTION

Check items shown each day. Report problems to a supervisor. Refer to the attachment's service manual for troubleshooting and repair procedures.



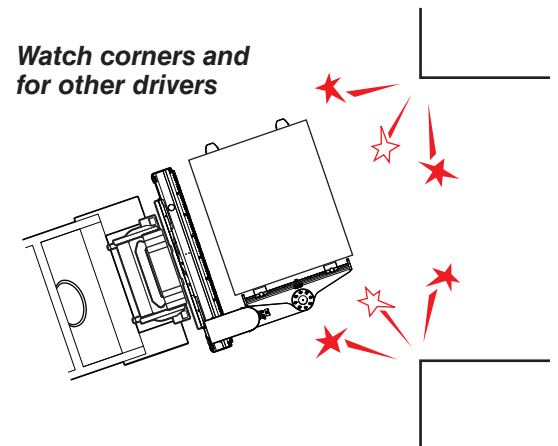
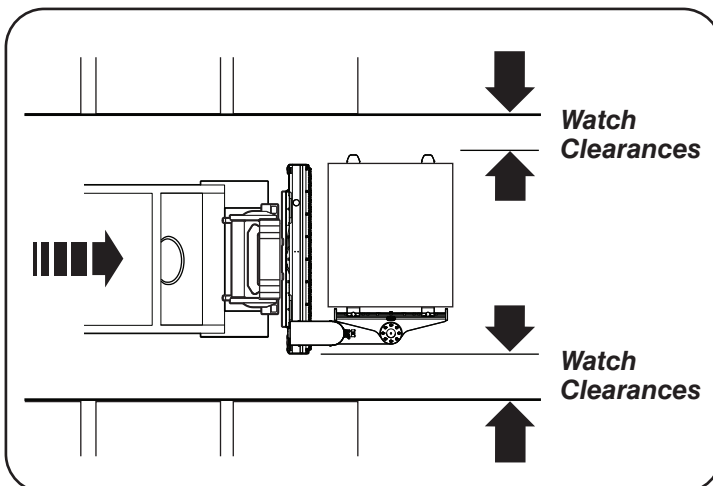
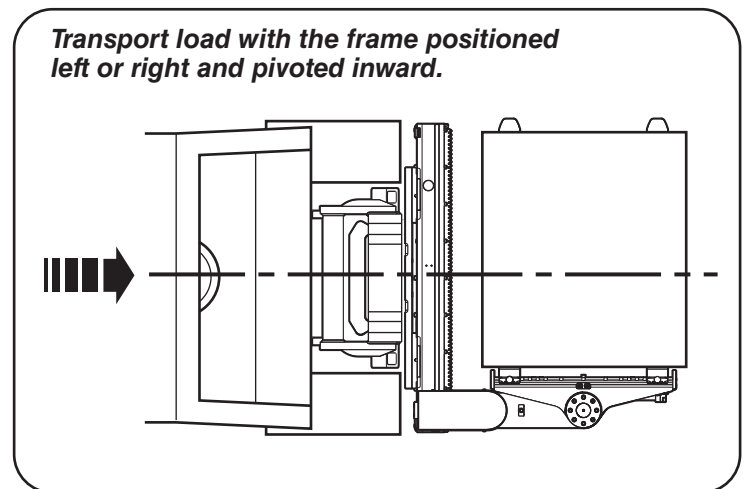
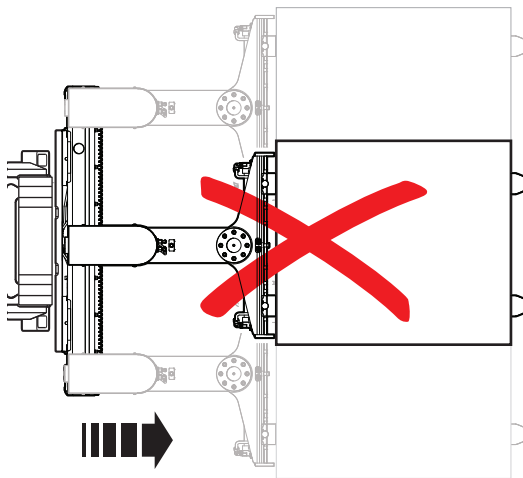
LOAD HANDLING BASICS

PRIOR TO TRANSPORT



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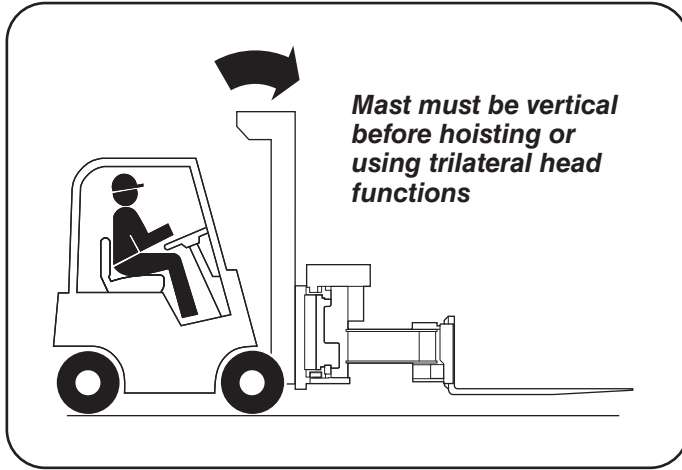
TRAVELING



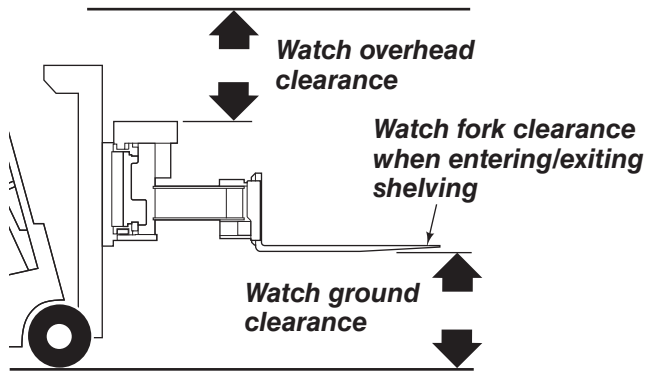
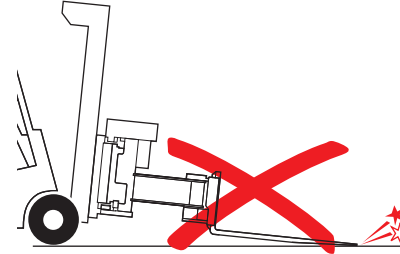
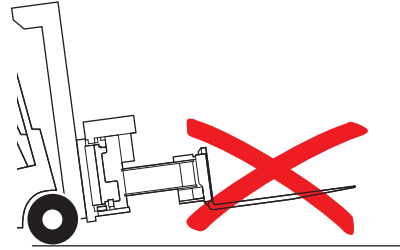
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LOAD HANDLING BASICS

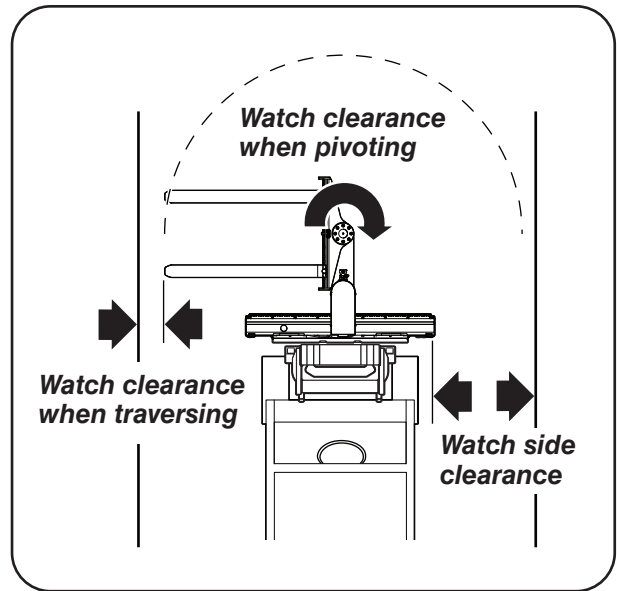
PRIOR TO HOISTING, PIVOTING, TRAVERSING



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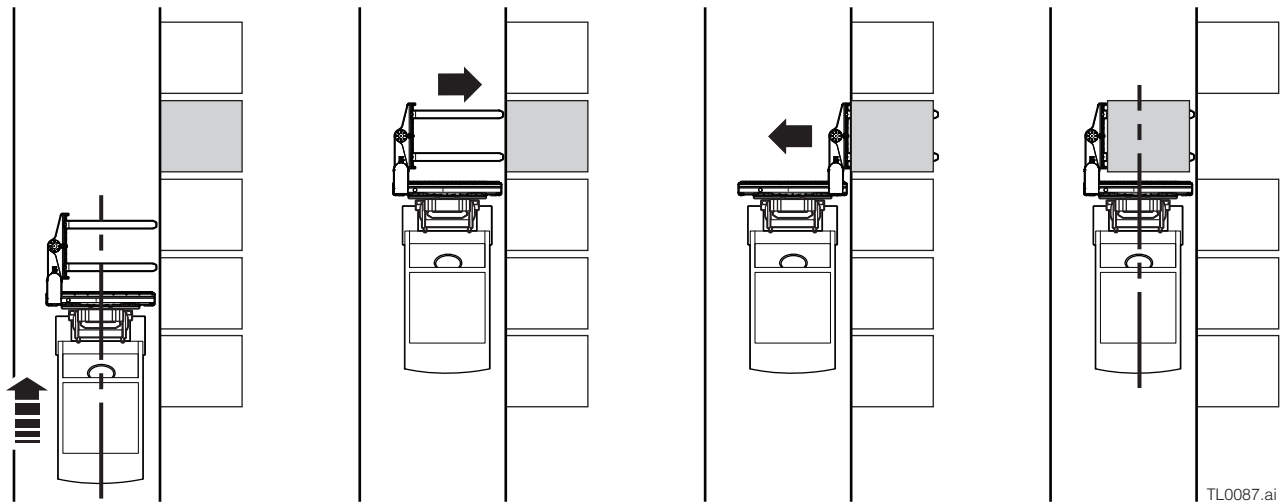


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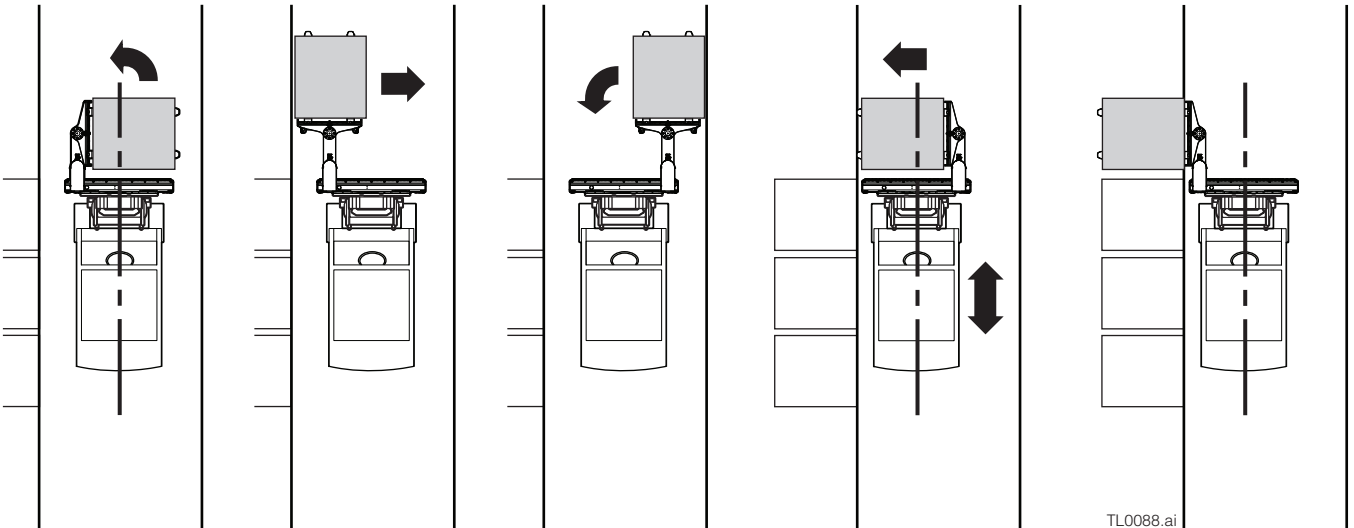
PICKUP, UNLOADING

PICKING A LOAD FROM A SHELF



- 1 Drive forward to load.**
- 2 Align forks with load. Traverse toward load.**
- 3 Position load against forks. Pick up load. Traverse back.**
- 4 Verify Trilateral Head/Frame/Load combination is centered with truck.**

UNLOADING ON THE OPPOSITE SHELF



- 1 Pivot the Actuator to position the Frame parallel to the Traversing Frame.**
- 2 Traverse load in the opposite direction.**
- 3 Pivot the Actuator to position the Frame perpendicular with the Traversing Frame.**
- 4 Position the truck and align the forks with deposit location. Traverse toward deposit location.**
- 5 Deposit load. Lower forks and traverse away from load.**

SAFE OPERATION AND MAINTENANCE

OSHA Regulations – Industrial Trucks and Attachments



WARNING: The safe operation and maintenance of industrial trucks is regulated by Occupational Safety and Health (OSHA) regulations 1910.178 and American National Standards Institute (ANSI)

Safety Standard for Powered Industrial Trucks, ANSI B56.1. When operating and maintaining industrial trucks equipped with attachments you should pay particular attention to the following sections of these regulations. You should be familiar with all sections of these regulations. **Ask your employer for the complete regulations.**

(a) General Requirement

- (4) Modifications and additions which affect capacity and safe operation shall not be performed by the customer or user without manufacturers prior written approval. Capacity, operation and maintenance instruction plates, tags or decals shall be changed accordingly.
- (5) If the truck is equipped with front-end attachments other than factory installed attachments, the user shall request that the truck be marked to identify the attachments and show the appropriate weight of the truck and attachment combination at maximum elevation with load laterally centered.
- (6) The user shall see that all nameplates and markings are in place and maintained in a legible condition.

(e) Safety Guards

- (2) If the type of load presents a hazard, the user shall equip fork trucks with a vertical load backrest extension in accordance with (a)(2) following.

(a)(2) All new powered industrial trucks acquired and used by an employer after February 15, 1972 shall meet the design and construction requirements for powered industrial trucks established in the "American National Standard for Powered Industrial Trucks, Part II, ANSI B56.1", except for vehicles intended primarily for earth moving or over-the-road hauling.

(l) Operator Training

Only trained and authorized operators shall be permitted to operate a powered industrial truck. Methods shall be devised to train operators in the safe operation of powered industrial trucks.

(m) Truck Operations

- (1) Trucks shall not be driven up to anyone standing in front of a bench or other fixed object.
- (2) No person shall be allowed to stand or pass under the elevated portion of any truck, whether loaded or empty.
- (3) Unauthorized personnel shall not be permitted to ride on powered industrial trucks. A safe place to ride shall be provided where riding of trucks is authorized.
- (4) The employer shall prohibit arms or legs from being placed between the uprights of the mast or outside the running lines of the truck.
- (5i) When a powered industrial truck is left unattended, load engaging means shall be fully lowered, controls shall be neutralized, power shall be shut off and brakes set. Wheels shall be blocked if the truck is parked on an incline.
- (5ii) A powered industrial truck is unattended when the operator is 25 feet or more away from the vehicle which remains in his view, or whenever the operator leaves the vehicle and it is not in his view.
- (5iii) When the operator of an industrial truck is dismounted and within 25 feet of the truck still in his view, the load engaging means shall be fully lowered, controls neutralized and the brakes set to prevent movement.

- (6) A safe distance shall be maintained from the edge of ramps or platforms while on any elevated dock or platform or freight car. Trucks shall not be used for opening or closing freight doors.
- (10) A load backrest extension shall be used whenever necessary to minimize the possibility of the load or part of it from falling rearward.

(n) Traveling

- (4) The driver shall be required to slow down and sound the horn at cross isles and other locations where vision is obstructed. If the load being carried obstructs forward view, the driver shall be required to travel with the load trailing.
- (7i) When ascending or descending grades in excess of 10 percent, loaded trucks shall be driven with the load upgrade.
- (7iii) On all grades the load and load engaging means shall be tilted back if applicable, and raised only as far as necessary to clear the road surface.

(o) Loading

- (1) Only stable or safely arranged loads shall be handled. Caution shall be exercised when handling off-center loads which cannot be centered.
- (2) Only loads within the rated capacity of the truck shall be handled.
- (3) The long or high (including multiple-tiered) loads which may affect capacity shall be adjusted.
- (4) Trucks equipped with attachments shall be operated as partially loaded trucks when not handling a load.
- (5) A load engaging means shall be placed under the load as far as possible; the mast shall be carefully tilted backward to stabilize the load.
- (6) Extreme care shall be used when tilting the load forward or backward, particularly when high tiering. Tilting forward with load engaging means elevated shall be prohibited except to pick up a load. An elevated load shall not be tilted forward except when the load is in a deposit position over a rack or stack. When stacking or tiering, only enough backward tilt to stabilize the load shall be used.

(p) Operation of the Truck

- (1) If at any time a powered industrial truck is found to be in need of repair, defective, or in any way unsafe, the truck shall be taken out of service until it has been restored to safe operating condition.

(q) Maintenance of Industrial Trucks

- (1) Any power-operated industrial truck not in safe operating condition shall be removed from service. All repairs shall be made by authorized personnel.
- (5) All parts of any such industrial truck requiring replacement shall be replaced only by parts equivalent as to safety with those used in the original design.
- (6) Industrial trucks shall not be altered so that the relative positions of the various parts are different from what they were when originally received from the manufacturer, nor shall they be altered either by the addition of extra parts not provided by the manufacturer or by the elimination of any parts. Additional counter-weighting of fork trucks shall not be done unless approved by the truck manufacturer.
- (7) Industrial trucks shall be examined before being placed in service and shall not be placed in service if the examination shows any condition adversely affecting the safety of the vehicle. Such examinations shall be made at least daily. When industrial trucks are used on a round-the-clock basis, they shall be examined after each shift. Defects when found shall be immediately reported and corrected.

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Do you have questions you need answered right now?

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