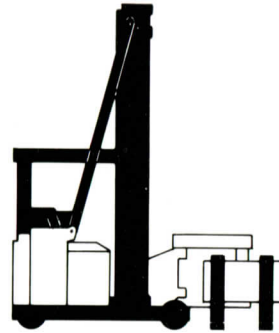

Operator's Instruction Manual



NT 12

CLARK



WARNING

**FOR YOUR SAFETY AND THE
SAFETY OF OTHERS**

BEFORE YOU OPERATE THIS TRUCK!

**READ ALL WARNINGS AND INSTRUCTIONS IN THE
OPERATOR'S MANUAL AND ON THE TRUCK.**

CHECK THE TRUCK FOR CORRECT OPERATION.

**DO NOT OPERATE THIS TRUCK UNLESS YOU ARE
TRAINED AND AUTHORIZED TO DO SO.**

FOREWORD

Federal and state laws require that operators be completely trained in the safe operation of lift trucks.

Before you start operating this lift truck, make sure that you understand all driving procedures. It is important to operate your lift truck safely and efficiently.

This manual will help you learn how to operate your lift truck. This manual describes the controls, special features and the functions of each control.

This manual is not a training manual, it is a guide to help authorized operators safely operate a lift truck. Illustrations in this manual show the operator correct procedures for checking, starting, operating and stopping the lift truck.

Clark lift trucks are built to take hard work, but not abuse. They are built to be dependable but as with any lift truck, they are only as efficient as the operator and the persons responsible for maintaining them.

Do not make any repairs to this truck unless you have been trained in lift truck repair procedures and authorized by your employer.

MANUALES DE INSTRUCCION PARA OPERADORES IMPRIMIDOS EN ESPANOL SON OBTENIDOS DE SU DISTRIBUIDOR CLARK.

BETRIEBSANWEISUNGEN IN DEUTSCHER SPRACHE KOENNEN SIE BEI IHREM CLARK-HAENDLER ERHALTEN.

MANUELS DE L'OPERATEUR EN LANGUE FRANCAISE PEUVENT ETRE COMMANDES CHEZ VOTRE DISTRIBUTEUR CLARK.

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DRIVE SAFELY

BEFORE YOU OPERATE THIS LIFT TRUCK, READ AND UNDERSTAND THE INSTRUCTIONS, SIGNS AND MESSAGES IN THIS MANUAL AND ON THE LIFT TRUCK.

INJURY OR DEATH TO YOU OR OTHER PERSONNEL WILL OCCUR IF YOU DO NOT FOLLOW THESE INSTRUCTIONS AND MESSAGES.

STAY ALERT!

SUMMARY OF SAFE OPERATING PROCEDURES

1. Do not operate this truck unless you have been trained and authorized to do so. Read all warnings and instructions in operator's manual and on this truck.

2. Do not operate this truck until you have checked its condition. Give special attention to Tires, Horn, Battery, Controller, Lift System including forks and attachments; chains, cable and limit switches, brakes, steering mechanism, and guards.

3. Operate truck only from designated operating position. Never place any part of your body into the mast structure, between the mast and the truck, or outside the truck. Do not carry passengers.

4. Do not handle unstable or loosely stacked loads. Use special care when handling long, high or wide loads to avoid losing the load, striking bystanders, or tipping the truck.

5. Do not overload truck. Check capacity plate for load weight information.

6. Turret trucks will tip over if not operated correctly. Start, stop, travel, steer and brake smoothly. Slow down for turns and on uneven or slippery surfaces that could cause truck to slide or overturn. Operate carefully when traveling without a load as the risk of overturn is greater.

7. Elevate forks or other lifting mechanism only to pick up or deposit a load. Watch out for obstructions, especially overhead.

8. Travel with load or lifting mechanism as low as possible. Always look in direction of travel. Keep a clear view and when load interferes with visibility, travel with load or lifting mechanism trailing (operate within guidance rail systems, if available).

9. Turret trucks are not designed to operate on ramps or inclines. Do not operate on ramps or inclines.

10. Observe applicable traffic regulations. Yield right-of-way to pedestrians. Slow down and sound horn at cross aisles and wherever vision is obstructed.

11. Before lifting, make sure load is centered and forks are completely under load.

12. Do not put any part of your body under the forks or load. Do not allow anyone to stand or walk under load or lifting mechanism.

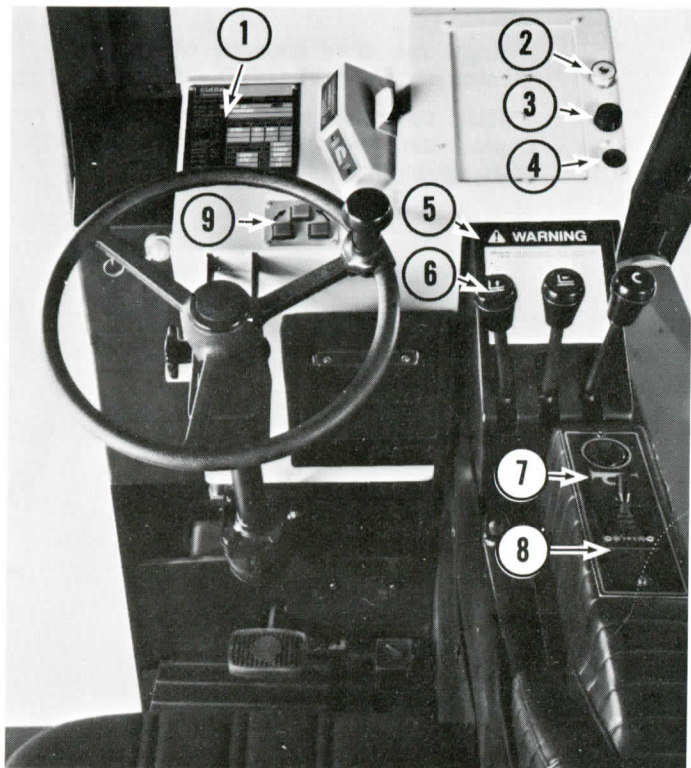
13. Do not carry personnel on the forks.

14. Before leaving the truck, make sure the lifting mechanism is lowered and the hand brake is set. Turn off power, remove key and put chocks against wheels if on an incline.

15. Forward direction of the turret truck is with operator end leading.

16. Travel with the forks lateral (sideways) to the machine and shifted fully left or right.

DATA PLATE AND DECALS



Make a report of decals that are damaged or missing and replace them immediately.

1. Data and Capacity Plate
2. Traction Go Indicator
3. Travel and Lift Indicator
4. Creep Speed Indicator
5. Operator's Warning Decal
6. Control Lever Symbols
7. Horn Decal
8. Directional Control Decal
9. Steering Indicator Plate

83M214

DATA PLATE AND DECALS

CLARK

INDUSTRIAL TRUCK DIVISION
BATTLE CREEK, MICHIGAN GEORGETOWN, KENTUCKY

MODEL NO.

SERIAL NO.

ATTACHMENTS

APPROX. WT.
ALL TRUCKS

APPROX. WT.
ELECTRICS ONLY

BATTERY WT.

BATTERY
CAPACITY

1

TYPE 3

2 4

CAPACITY WITH ATTACH LISTED ABOVE OR WITH FORKS - UPRIGHTS VERTICAL			
LBS	A	B	C
5			

LESS BATT - ELECTRICS 6

WITH MAX BATT WT

MAX 7	MIN
AH 8	NO
LBS	VOLTS 9

FOR OTHER CAPACITIES CONSULT MANUFACTURER
 AS RELEASED FROM FACTORY THIS TRUCK MEETS THE
 DESIGN SPECIFICATIONS ESTABLISHED IN AMERICAN
 NATIONAL STANDARD FOR POWERED INDUSTRIAL TRUCKS.
 PART II ANSI B 561-1969 AND 1975 PT NO 2315709

Know the rated capacity of your lift truck and DO NOT OVERLOAD IT.

Read the rated capacity on the data plate and understand areas 1 through 9 as shown in the illustration.

1. Truck Type
2. Truck model and Serial Number
3. Classification Type
4. Attachments
5. Capacity
6. Truck Weight
7. Battery Weight
8. Battery Amp Hours
9. Voltage

18616

DATA PLATE AND DECALS



WARNING

BREAKING THESE RULES WILL CAUSE SERIOUS OR FATAL INJURY TO YOURSELF AND OTHERS.

- Do not operate this lift truck unless you are trained and authorized. Read and understand operator's manual before starting lift truck. Clark dealers have replacement manuals.
- Do not operate damaged or faulty lift truck. Do not attempt repairs unless you are trained and authorized.
- Look where you drive. Watch out for people, obstructions (especially overhead), and drop-offs. If load blocks your view, drive backward, except up slopes.
- Lift trucks will tip over if not properly operated. Slow down before turning. Do not turn on slopes. Drive with forks or attachments fully lowered and tilted back. Check tires for correct pressure.
- Forks or attachments can fall rapidly if not properly controlled or maintained. Do not use this lift truck to raise people.
- Protect against falling objects. Overhead guard and load backrest extension must be in place.
- Do not load lift truck over capacity on nameplate. Move long, high, or wide loads carefully. Do not move unstable loads.
- Before getting off lift truck, lower forks or attachments all the way, put drive in neutral, turn off key, and set parking brake.

© Clark Equipment Co. 1982

Sit Down Rider

2377058

The operator's warning decal describes basic instructions for safe operation of a lift truck.

Read and understand these instructions plus the other messages in this manual and on the truck.

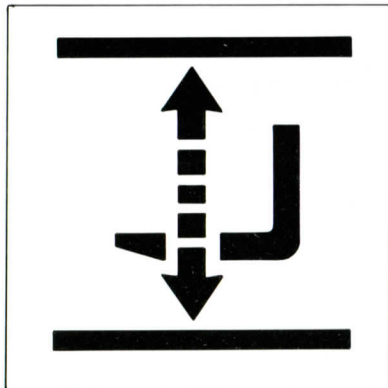
2377058

DATA PLATE AND DECALS

THIS OVERHEAD GUARD CONFORMS TO AMERICAN NATIONAL STANDARD B56.1. IT IS INTENDED TO PROTECT THE DRIVER FROM SMALL FALLING OBJECTS BUT NOT FROM FALLING CAPACITY LOADS. GUARDS OF THIS DESIGN HAVE ALSO PASSED A VERTICAL IMPACT TEST OF 8,000 FOOT POUNDS.

24817

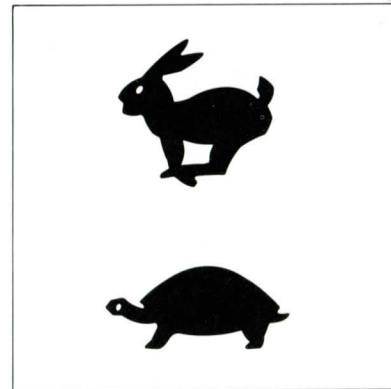
The overhead guard plate is located on the side of the operator's overhead guard.



83M382

The fork height indicator decal appears on the operator's control panel.

When this lamp is illuminated it indicates that the forks are below a certain height that will allow the truck to lift and travel.

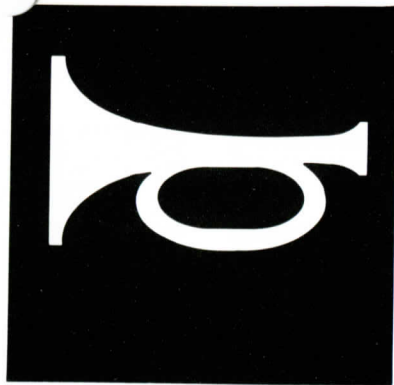


83M383

The travel speed decals appear on the operator's control panel.

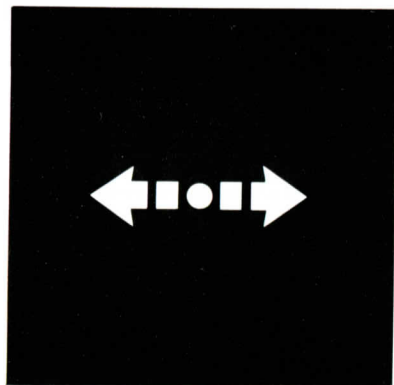
When these lamps are illuminated they indicate fast or slow travel speeds.

DATA PLATE AND DECALS



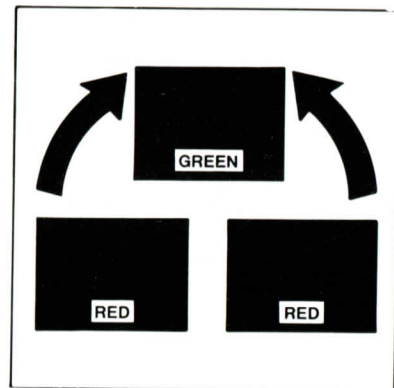
83M384

The horn decal is located on the operator's console and shows the location of the horn button.



83M385

The travel direction decal is located on the operator's console and shows the travel direction on the forward-reverse control lever.



83M381

The steer wheel decal is located in front of the hand wheel and indicates the position of the steer wheel.

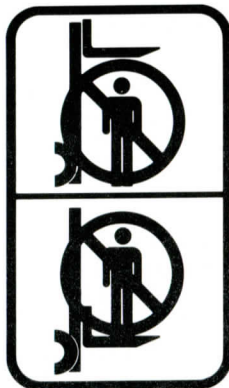
DATA PLATE AND DECALS



24809

“Keep hands off” decals are located on the upright.

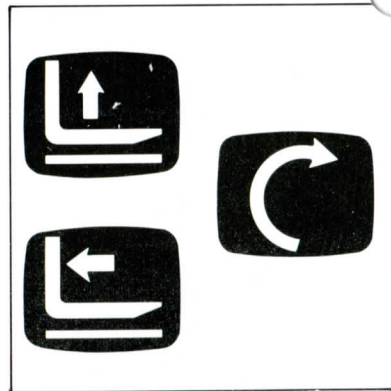
Do not reach into or climb on the upright. Personal injury will result if any part of your body is put between the moving parts of the upright.



24810

“Keep away from the forks” decals are located on the lift cylinders.

Do not ride on or stand under forks or attachments. Personal injury will result if personnel stand on or under raised forks.

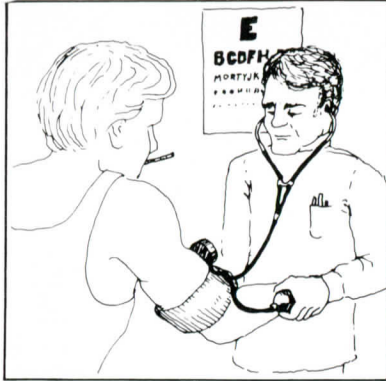


83M386

The control lever symbols are located on the control handles and control the fork head.

1. Raise-lower
2. Rotate
3. Extend-retract

SAFETY



24781

Only authorized personnel can operate Clark lift trucks.

Operators must be in good physical condition and have good driving skills.



24808

Do not operate a lift truck unless you are trained and qualified.

Remember to use safe driving rules.



24782

Wear a hard hat, safety glasses and safety shoes when operating a lift truck. Do not wear loose clothing.

SAFETY



24783

Never operate a lift truck with wet hands or shoes. Never hold any controls with grease on your hands. Your hands will slide off of the controls and cause an accident.

CLARK DRIVER'S DAILY CHECKLIST
Check Before Start Of Each Shift

CHECK ONE GAS LIFT OR DIESEL TRUCK ELECTRIC TRUCK

NAME: _____ DATE: _____

OPERATOR: _____ SUPERVISOR OR IN: _____

START OF DAY: _____ END OF DAY: _____

WHEEL METER READING: _____

If Boxes Accordingly OK Name(s) Abnormal of Paper

VISUAL CHECKS	OPERATIONAL CHECKS
<input type="checkbox"/> TIRE CONDITION	<input type="checkbox"/> HORN
<input type="checkbox"/> DEAD END TAIL LIGHTS	<input type="checkbox"/> STEERING
<input type="checkbox"/> WARNING LIGHTS	<input type="checkbox"/> SERVICE BRAKES
<input type="checkbox"/> WASH/WATER	<input type="checkbox"/> PARKING BRAKES
<input type="checkbox"/> LOWER GAUGES AND INSTRUMENTS	<input type="checkbox"/> HYDRAULIC CONTROLS
<input type="checkbox"/> LUBRICATION GAUGES AND LEAKS	<input type="checkbox"/> DEATH BRAKE
<input type="checkbox"/> ENGINE OIL LEVEL	<input type="checkbox"/> BATTERY - LOAD TEST
<input type="checkbox"/> RADIATOR WATER LEVEL	<small>NOTE: BATTERY WATER INDICATOR MUST BE FULLY CHARGED. THE 15 MINUTE WATER TEST IS A QUALITY CONTROL CHECK. FAILURE TO PERFORM THIS TEST PROPERLY MAY CAUSE DAMAGE TO YOUR TRUCK.</small>
<input type="checkbox"/> FUEL LEVEL	
<input type="checkbox"/> BATTERY - PLUG CONNECTION	
<input type="checkbox"/> WHEEL BEARING TIGHTENING	
<input type="checkbox"/> BATTERY - CHARGE INDICATOR	
<input type="checkbox"/> WHEEL SET ON WHEELS/BUCKLE	
<input type="checkbox"/> WHEEL SET ON WHEELS/BUCKLE	

REMARKS: SUPPLIER ALL ITEMS MISSING ATTENTION OR REPAIR

13124

Inspect your truck with the operator's daily checklist before you operate it. Make sure all safety systems work correctly. Do not operate a lift truck that has damage or is not safe. Make a report of decals that are missing or damaged and replace them immediately.

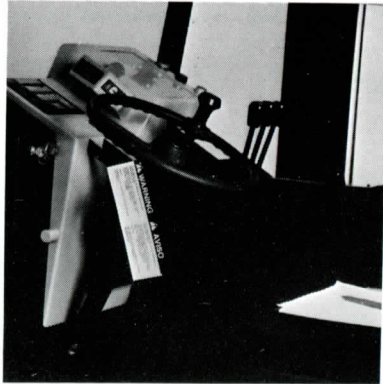


83M191

Learn how your truck is operated. Know its safety devices and how they work.

Before operating your truck, check steering, horn, brake application, forward-reverse switch, and all the fork controls for correct operation.

SAFETY



83M187

Attach a "WARNING" tag to the steering wheel if the truck is damaged, missing decals or unsafe to operate.

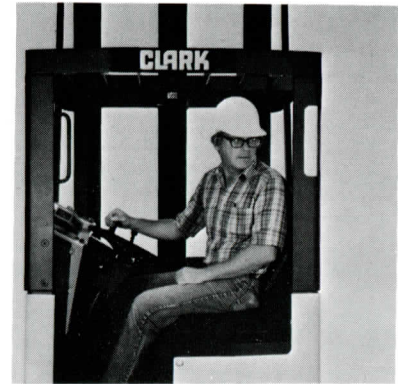
Report this information to your supervisor.

Do not operate the machine until repairs have been correctly done.



24798

Report all accidents to your supervisor.

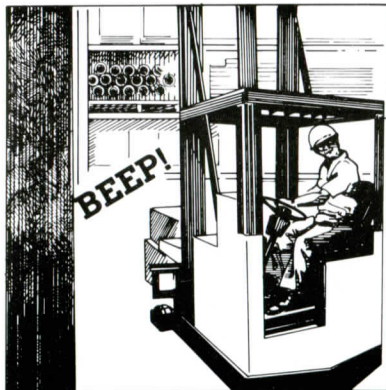


83M188

Look all around truck before moving it in any direction. Remember to start and stop slowly and smoothly.

Always look for pedestrians, other trucks or obstructions in your path of travel.

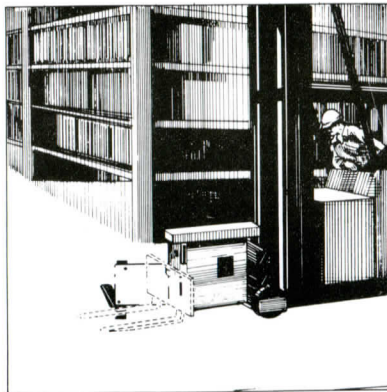
SAFETY



83M356

When operating your truck, remember to press the horn at all corners, exits, entrances and when nearing pedestrians.

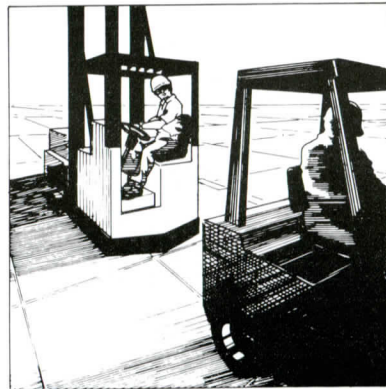
When depositing a load, seek assistance if your vision is not clear.



83M357

Always be aware of the position of the fork tips.

Make sure there is enough space and no obstructions before you rotate or extend the forks to the side.



83M358

Keep a safe distance from the truck ahead of you at all times. Make sure there is enough distance to permit you to stop smoothly and safely.

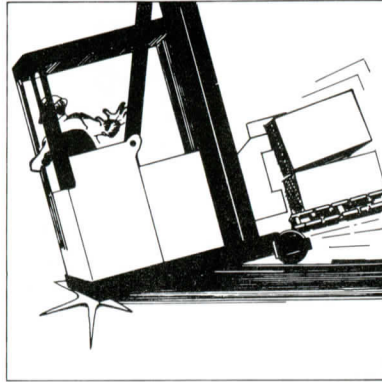
SAFETY



83M359

Do not travel, turn or change direction suddenly. Decrease speed for turns, ramps, aisles, wet floors or when vision is not clear.

Remember, operate your truck safely and avoid accidents.



83M360

Do not make a fast start or stop. Sudden stopping is dangerous and may cause your load to shift or fall off.



83M361

Never travel with the forks extended beyond the confines of the truck.

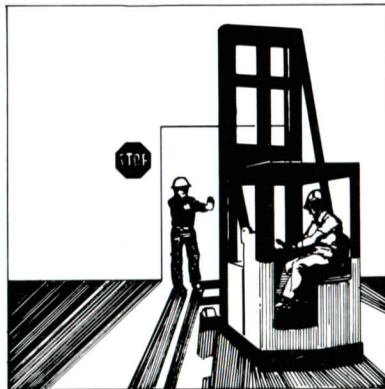
SAFETY



13087

Always obey all posted traffic rules and warning signs.

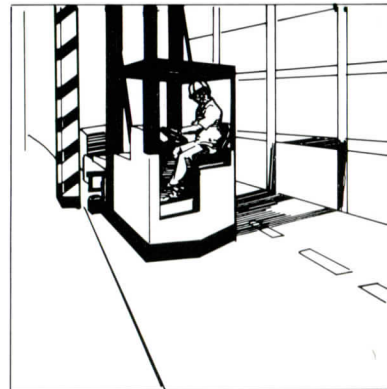
An operator shall give the right-of-way to ambulances, fire trucks or other emergency vehicles.



83M362

Do not operate your truck in unauthorized areas. Follow all safety rules and read all warning signs.

Know your operating area and always be aware of other traffic in your area.



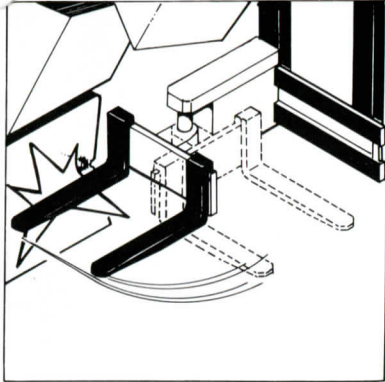
83M363

Operate truck only in truck routes or side guide rail systems and keep operating aisles clean.

One-way aisles are recommended. If this does not fit your operation, keep to the right of the center line.

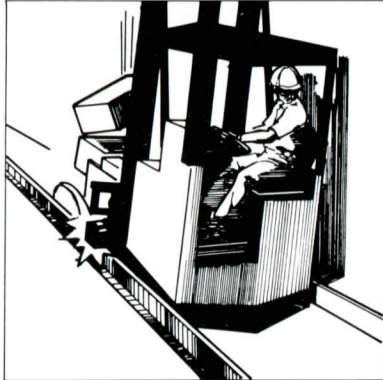
If there is a wide load on the forks, allow enough clearance when passing other trucks, stationary objects, and people at work.

SAFETY



83M364

Be careful of drive end swing when turning and fork swing when pivoting.

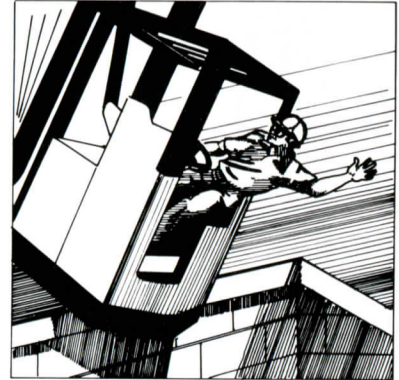


83M365

Be careful when entering side guide rails. Make sure you enter straight and avoid hitting the rails.

When the truck has fully entered the rails take your hands off the hand wheel.

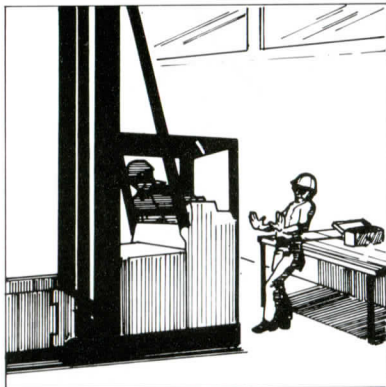
Do not hold the hand wheel or attempt to steer it while you are inside guide rails.



83M366

Be careful when operating your truck near the edge of a loading dock or ramp. The truck can fall over the edge and cause injury or death. Keep a safe distance from the edge and use caution when the floor is slippery.

SAFETY



83M367

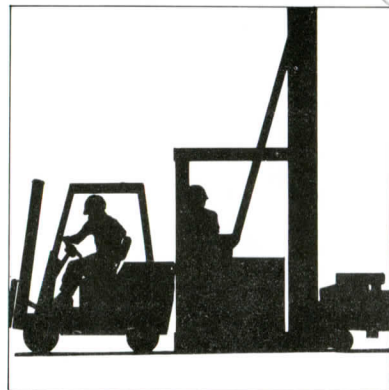
An operator shall not drive a truck up to anyone who is standing in front of a bench or other fixed object.

Follow these rules or you can cause injury to personnel and damage equipment.



83M368

Turret trucks are not designed to operate on ramps or inclines. Do not operate your turret truck on ramps or inclines.



83M369

Do not use your truck to push or tow another truck. Do not let another push or tow your truck. If a truck will not move, call a service technician.

SAFETY

CLARK ①

INDUSTRIAL TRUCK DIVISION
BATTLE CREEK, MICHIGAN GEORGETOWN, KENTUCKY

MODEL NO. [] ② TYPE ③

SERIAL NO. []

ATTACHMENTS [] ④

CAPACITY WITH ATTACH LISTED ABOVE OR WITH FORKS UPRIGHTS VERTICAL			
LBS	A	B	C
⑤			

LESS BATT. - ELECTRICS [] ⑥

WITH MAX BATT. WT

MAX ⑦	MIN
A.H. ⑧	NO.
LBS	VOLTS ⑨

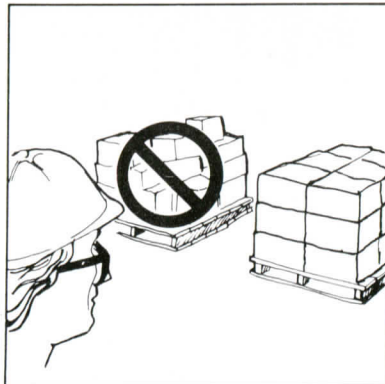
APPROX. WT. ALL TRUCKS
APPROX. WT. ELECTRICS ONLY
BATTERY WT.
BATTERY CAPACITY

FOR OTHER CAPACITIES CONSULT MANUFACTURER
AS RELEASED FROM FACTORY THIS TRUCK MEETS THE
DESIGN SPECIFICATIONS ESTABLISHED IN AMERICAN
NATIONAL STANDARD FOR POWERED INDUSTRIAL TRUCKS
PART II ANSI B 56.1-1969 AND 1975 PT. NO. 2315709

18616

Know the rated capacity of your turret truck and never try to lift more than a capacity load.

Never carry loads that are not intended to be handled by turret trucks.



24830

Thoroughly inspect load to be moved for overload and/or poor balance. If the load is not safe, DON'T MOVE IT.

Unstable loads are a danger to you and to other personnel. Make sure that your load is well stacked and evenly positioned across both forks. Never lift a load with only one fork.



83M174

Always press on the foot brake and activate the hand parking brake before operating the fork control levers.

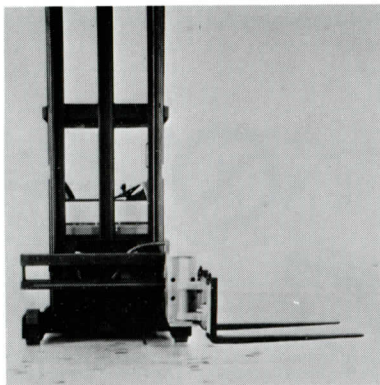
SAFETY



83M175

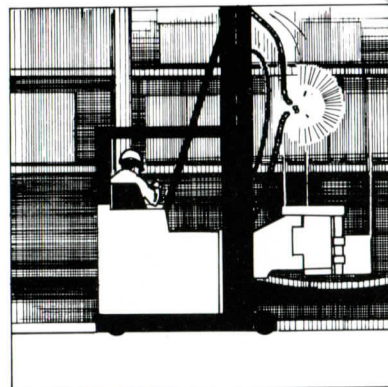
Always make sure there is enough overhead clearance, then lift smoothly.

Make sure forks are separated as far apart as possible inside the pallets.



83M201

Never use the reach mechanism or the extended forks to push or drag loads into position. Use as a lifting function only.



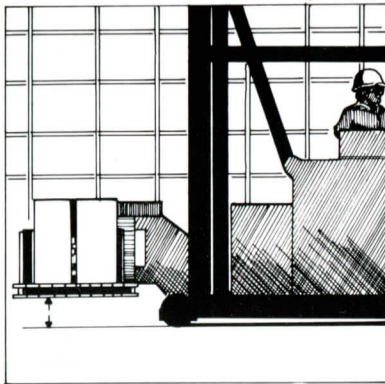
83M370

Do not continue to lower the forks after the weight of the load is no longer supported by the forks.

Damage to the racks and truck components will occur if the chains become loose.

Do not remove the forks from the pallet while still supporting the load.

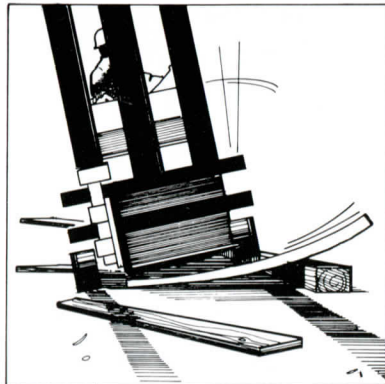
SAFETY



83M371

Always travel with your load near the floor and forks retracted.

Maximum travel speed cannot be reached unless the forks are near the floor.



83M372

Do not drive over loose objects.

Before driving over a dockboard or bridgeplate make sure that it is secure and that your load will not exceed its capacity.

Damage or personal injury can result if these rules are not followed.

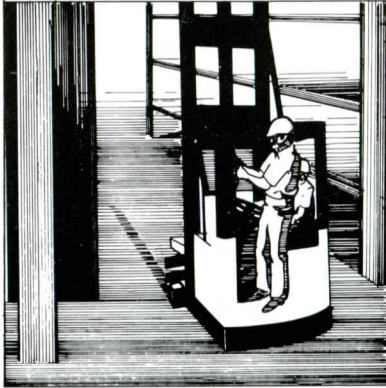


83M190

Do not operate a turret truck unless you are in the operator's compartment. Keep your hands and feet on the controls and do not extend them past the operator's area.

Never put hands, fingers or any part of your body into the upright at any time.

SAFETY



83M373

Never carry any passengers. They can fall off or cause you to have an accident.

Always be in full control of your lift truck and do not drive carelessly.



83M374

Do not permit anyone to stand or walk under elevated forks.



13102

Know and observe floor load limits and overhead clearances in all operating areas.

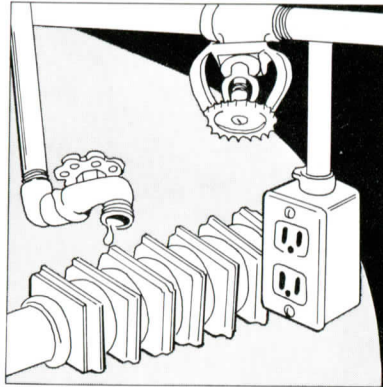
Never enter an elevator or any other area until you are sure the floor is strong enough to hold your truck and the load.

SLOW

13103

Slow down for turns, ramps, bumps, cross aisles, congested areas, wet or slippery floors and at all times when vision is restricted.

SAFETY



13104

Use caution when placing loads, or traveling, near water pipes, electrical wire, steam pipes, heaters or any other fragile or dangerous equipment or material.



WARNING

BREAKING THESE RULES WILL CAUSE SERIOUS OR FATAL INJURY TO YOURSELF AND OTHERS.

- Do not operate this lift truck unless you are trained and authorized. Read and understand operator's manual before starting lift truck. Clark dealers have replacement manuals.
- Do not operate damaged or faulty lift truck. Do not attempt repairs unless you are trained and authorized.
- Look where you drive. Watch out for people, obstructions (especially overhead), and drop-offs. If load blocks your view, drive backward, except up slopes.
- Lift trucks will tip over if not properly operated. Slow down before turning. Do not turn on slopes. Drive with forks or attachments fully lowered and tilted back. Check tires for correct pressure.
- Forks or attachments can fall rapidly if not properly controlled or maintained. Do not use this lift truck to raise people.
- Protect against falling objects. Overhead guard and load backrest extension must be in place.
- Do not load lift truck over capacity on nameplate. Move long, high, or wide loads carefully. Do not move unstable loads.
- Before getting off lift truck, lower forks or attachments all the way, put drive in neutral, turn off key, and set parking brake.

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St. Louis, MO, U.S.A.

237298

24658

Prominently placed on every Clark truck is a list of basic rules for safe operation. These rules are for your protection. Be familiar with them.

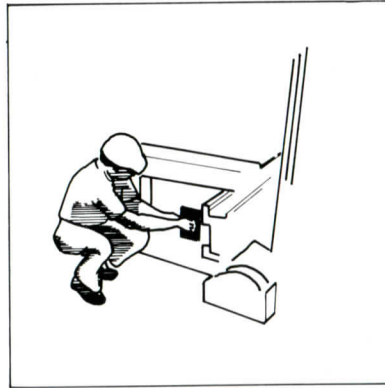
SAFETY



83M192

A scheduled planned maintenance and lubrication program should be followed.

All adjustments and repairs should be performed by thoroughly trained and authorized personnel only.



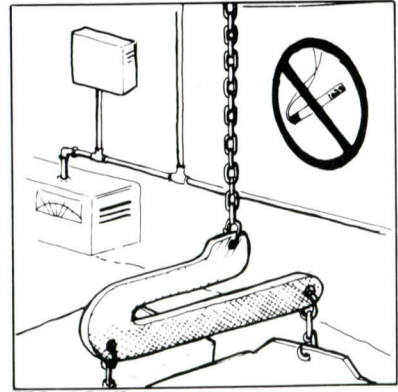
83M387

Never replace parts other than with parts that are recommended by the manufacturer.

Never alter existing parts without the manufacturer's permission.

Never make any structural alterations which may change capacity or stability.

Unauthorized replacement parts may make the truck unsafe to operate.

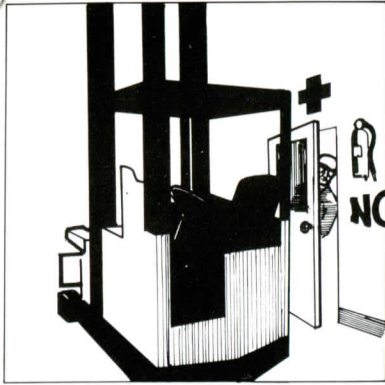


24799

Batteries should be serviced or charged only in charging areas and only by personnel trained in safe battery maintenance.

Never smoke or use open flames in areas where batteries are being charged or in areas where fuel or other flammable fluids or materials are kept or used.

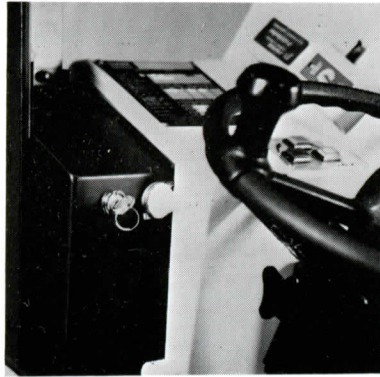
SAFETY



83M377

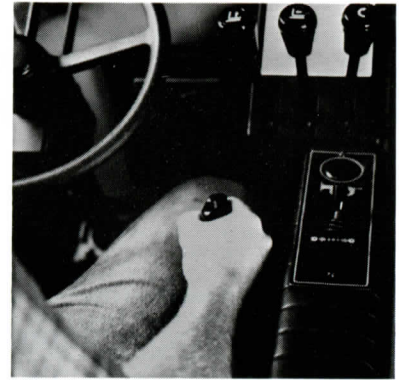
Park trucks in authorized areas only. Lower forks to floor.

Make sure truck does not block fire aisles, fire equipment or stairways.



83M203

When leaving truck make certain that circuit switch has been turned to "OFF" and key has been removed. Remember to block wheels if truck is left on an incline.

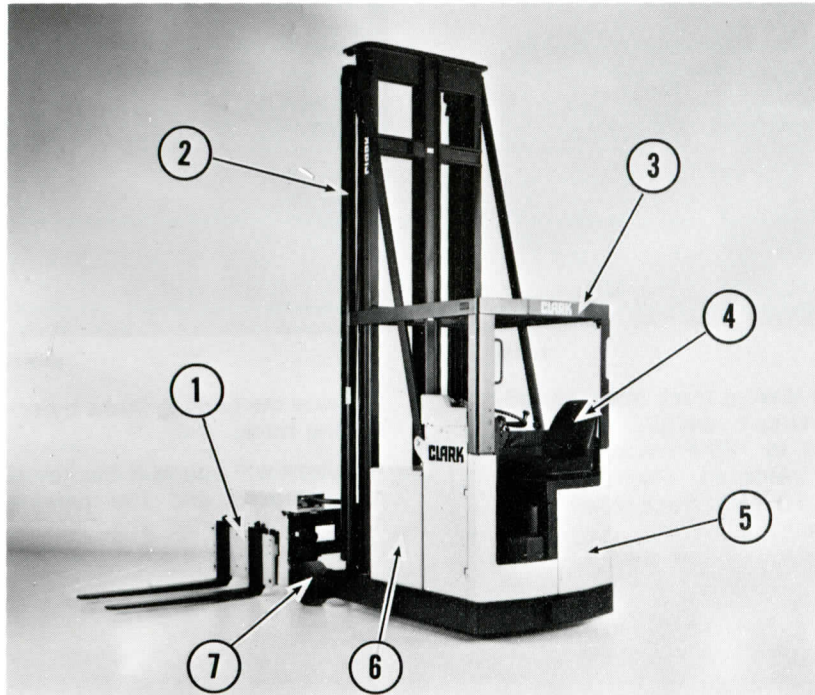


83M174

Activate the parking brake before leaving truck.

An alarm will sound if the key is not removed and the parking brake not activated when leaving the seat of your truck.

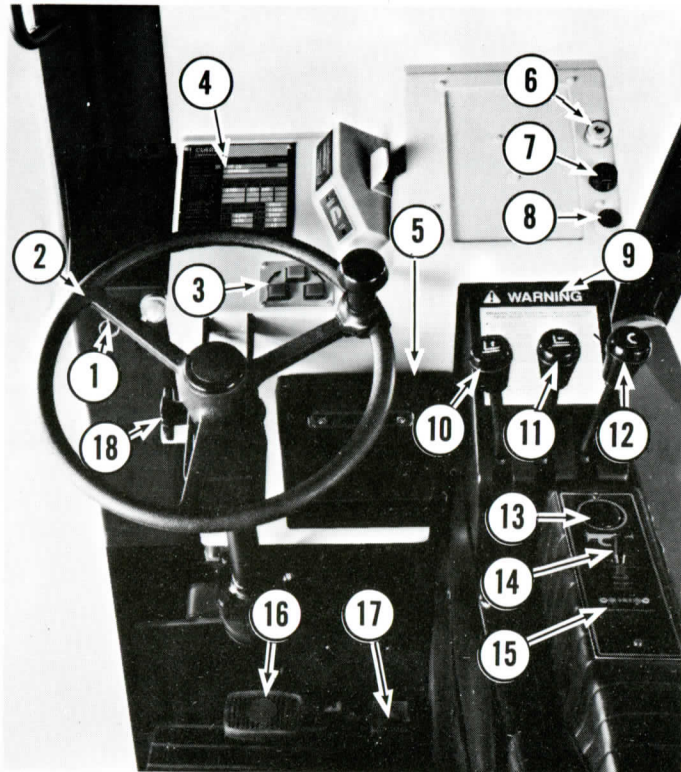
KNOW YOUR TRUCK



1. Hydraulic Fork Head
2. Upright
3. Overhead Guard
4. Operator's Compartment
5. Drive Unit Compartment
6. Battery Compartment (2)
7. Load Wheels

83M216

OPERATOR'S COMPARTMENT AND CONTROLS



1. Key and Indicator Lamp
2. Steering Wheel
3. Steering Position Indicator
4. Data & Capacity Plate
5. Operator's Manual Holder
6. Fast Travel Indicator Lamp
7. Fork Height Indicator Lamp
8. "CREEP" Travel Speed Button
9. Operator's Warning Decal
10. Lift-Lower Control Lever
11. Extend-Retract Control Lever
12. Rotate Control Lever
13. Horn Button
14. Directional Forward-Reverse Lever
15. Hand Parking Brake
16. Foot Brake
17. Accelerator Pedal
18. Steering Wheel Height Adjustment Knob

83M392

BEFORE OPERATION

CLARK **DRIVER'S DAILY CHECKLIST**
Check Before Start Of Each Shift

CHECK ONE GAS OR DIESEL TRUCK ELECTRIC TRUCK DATE _____

OPERATOR _____ SUPERVISOR SIGN _____

START OF DAY _____ END OF DAY _____ USE FOR DAY _____

✓ All as Accrordingly OK Needs Attention or Repair

VISUAL CHECKS		OPERATIONAL CHECKS	
TIRES CONDITION	<input type="checkbox"/>	WORN	<input type="checkbox"/>
HEAD AND TAIL LIGHTS	<input type="checkbox"/>	STEERING	<input type="checkbox"/>
WARNING LIGHTS	<input type="checkbox"/>	SERVICE BRAKES	<input type="checkbox"/>
HOOD AND FAN	<input type="checkbox"/>	WARNING SIGNALS	<input type="checkbox"/>
HYDRAULIC SYSTEMS AND INSTRUMENTS	<input type="checkbox"/>	OPERATIONAL CONTROLS	<input type="checkbox"/>
OPERATOR SEATBELT AND LIFELINE	<input type="checkbox"/>	SEAT BELT	<input type="checkbox"/>
ENGINE OIL LEVEL	<input type="checkbox"/>	BATTERY CHARG TEST	<input type="checkbox"/>
HYDRAULIC WATER LEVEL	<input type="checkbox"/>	WATER MOTOR BATTERY INDICATOR BELL SIGNALS	<input type="checkbox"/>
FUEL LEVEL	<input type="checkbox"/>	WATER MOTOR BATTERY INDICATOR BELL SIGNALS	<input type="checkbox"/>
BATTERY PLUG CONNECTION	<input type="checkbox"/>	WATER MOTOR BATTERY INDICATOR BELL SIGNALS	<input type="checkbox"/>
WATER MOTOR BATTERY INDICATOR BELL SIGNALS	<input type="checkbox"/>	WATER MOTOR BATTERY INDICATOR BELL SIGNALS	<input type="checkbox"/>
WATER MOTOR BATTERY INDICATOR BELL SIGNALS	<input type="checkbox"/>	WATER MOTOR BATTERY INDICATOR BELL SIGNALS	<input type="checkbox"/>

REMARKS: CHECK FOR ALL TIGHTNESS OPERATOR OF WORN

13124

Each operator must complete the daily checklist. Do all of the checks and give list to authorized personnel. See your Clark dealer for copies of the checklist sheets. If the checklist indicates that repairs are needed, do not operate the truck.



83M180

Remove the two bolts from the drive unit compartment door and open both doors.



83M178

Tilt the seat forward and support it with the pivot rod.

BEFORE OPERATION



83M192

Inspect the truck and look for damage and leakage. Write all damage and leakage on the daily checklist, and do not operate the truck until it is repaired.



83M186

Check the drive wheel for flat spots or pieces missing.

Inspect the steering pump chain for looseness or lack of lubrication.



83M180

Put the seat down. Close the drive unit compartment doors and tighten the two compartment door bolts.

Write any leakage or damage on your daily checklist.

BEFORE OPERATION



83M196

Inspect the load wheels for flat spots or pieces missing. Also check and remove all debris imbedded in the tire.



83M193

Lift the battery connector cover and rotate it against the operator's front panel.

Inspect the battery connectors and check the condition of the battery cables.



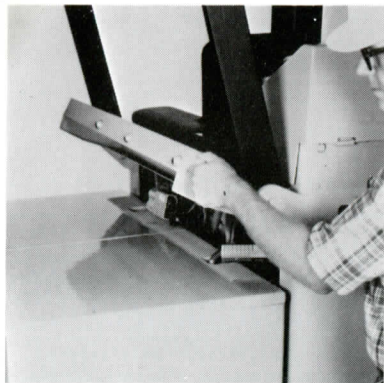
83M194

Lift both battery covers. (When two batteries are used.) Make an inspection of the battery, battery terminals and check the condition of the battery cables.

Make a report of all worn or cracked cables.

Close both battery covers.

BEFORE OPERATION



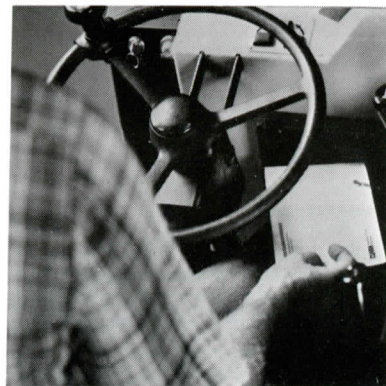
83M193

Close the battery connector cover.



83M197

Check condition of the overhead guard. If it has damage, report it to your supervisor.



83M185

Make sure the operator's manual is in the holder.

BEFORE OPERATION



83M203

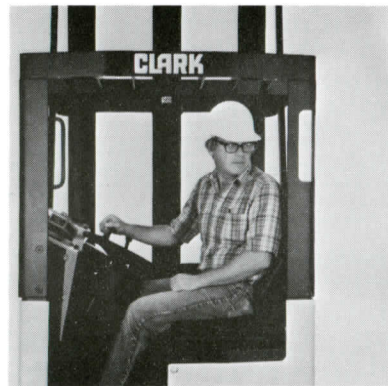
Connect the batterie(s) to the truck (if disconnected) and turn the key switch to the extreme right. When the amber indicator lamp is illuminated, release the key.

If the amber indicator lamp does not glow, write it on the daily checklist.



83M200

Press the horn button to check horn function. If the horn does not function, report the failure and have it repaired before the truck is put into operation.



83M188

Before operating the truck, look in all directions to make sure your path of travel is clear.

BEFORE OPERATION



83M189

Check the hand parking brake to make sure it is operating correctly.

Activate the hand brake by pulling the handle toward you.



83M183

Put the directional control lever in either forward or reverse travel direction.



83M184

With the parking brake activated and the directional control lever in either forward or reverse position, press down on the accelerator pedal.

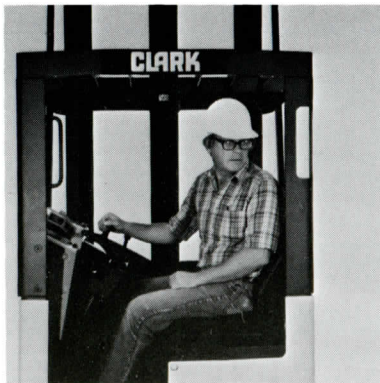
The truck should NOT move. If the truck moves, report it to your supervisor.

BEFORE OPERATION



83M174

Press down on the button on top of the parking brake handle and push the handle forward to release the brake.



83M188

Check the accelerator and the steering controls. Look all around the truck to make sure your path of travel is clear. Make sure there is enough turning space.

Put the forward-reverse directional lever in the desired position.



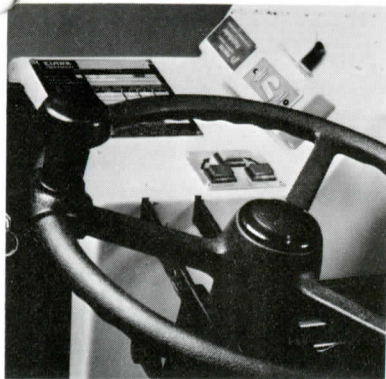
83M184

Take your foot off of the brake pedal and press down on the accelerator pedal.

The truck should start moving slowly.

If the truck does not move, report it to your supervisor.

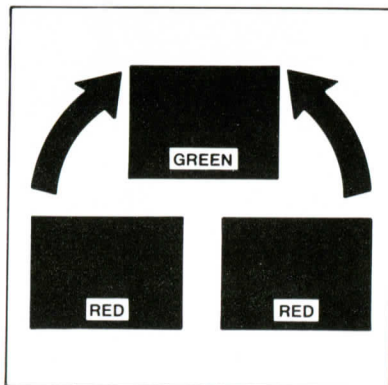
BEFORE OPERATION



83M206

Check the steering by turning the steering hand wheel fully left and then right.

The steering wheel should turn smoothly without binding or any loss of steering control.

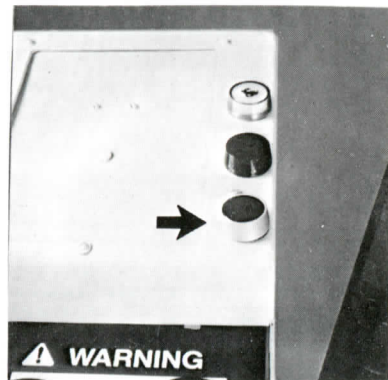


83M381

Check the steering directional indicator while turning the truck.

The green indicator lamp should illuminate when the drive/steer wheel is in a straight ahead position.

The two red indicator lamps should illuminate when making a turn to the right or left. If the lamps do not operate correctly, write the problem on the daily checklist.



83M390

Check the slow or "CREEP" travel speed. Move forks fully left or right. Press on the accelerator pedal and push the blue "TUR-TLE" lamp button.

The truck should travel at a very slow "CREEP" speed.

BEFORE OPERATION



83M181

Press on the brake pedal and stop truck travel.

Brake action should be smooth and stop the truck in a normal distance. Write any unusual braking operation on the driver's daily checklist.

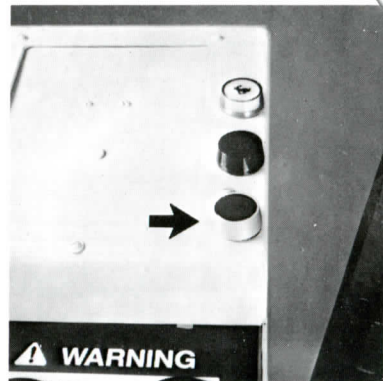


83M175

Before forks are raised, make sure there is enough overhead clearance.

Pull backwards on the lift control lever. When the green indicator light stops illuminating, activate the parking brake and continue to raise the forks to maximum height.

Look at the upright and carriage and check for correct operation as it raises. Write any operating problems on the daily checklist.



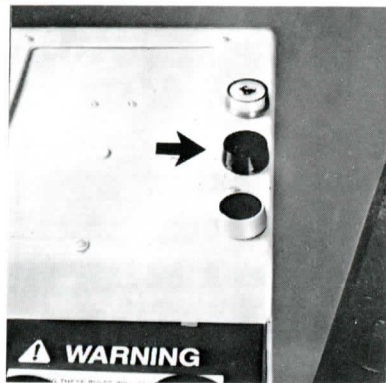
83M390

When the forks are above 200 inches [5080 mm], normal travel speed ceases.

Creep speed is available for positioning forks or loads.

1. Creep speed button must be illuminated.
2. Release the parking brake.
3. Push the blue creep button and the accelerator pedal at the same time and move to desired position.
4. Activate the parking brake and continue to raise forks to desired height.

BEFORE OPERATION



83M389

Lower the forks until the green indicator lamp illuminates. Normal travel and lift should now be possible.

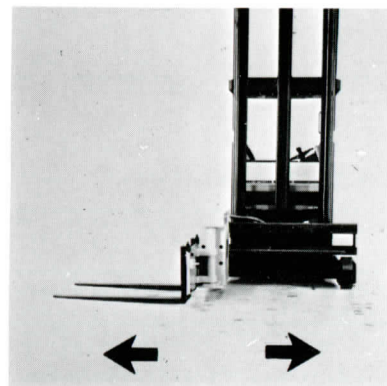


83M198

Activate the hand parking brake. Pull back on the reach lever to extend the forks to the right.

Push the lever forward to extend the forks to the left.

Write any operating problems on the checklist.

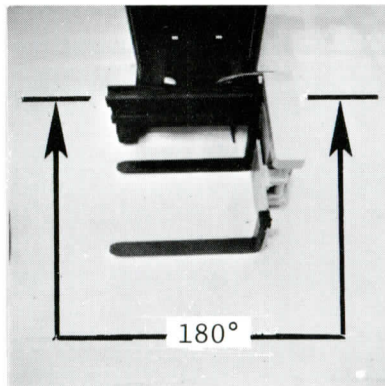


83M205

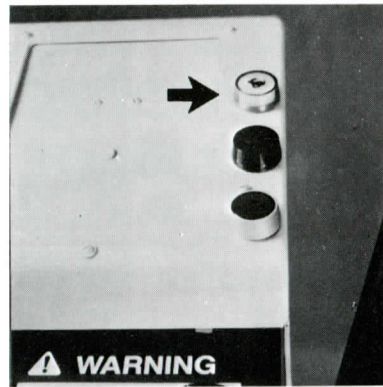
BEFORE OPERATION



83M176



83M381



83M388

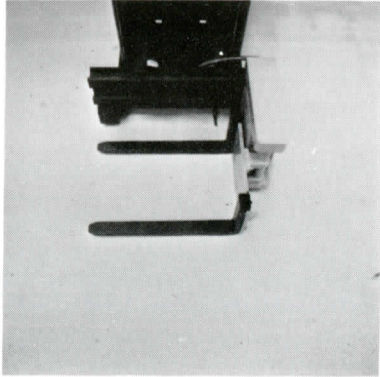
Make sure the hand parking brake is still activated. Check the rotation of the forks. Pull back on the rotate lever to rotate the forks counterclockwise.

Make sure forks rotate 180° in either direction.

Write any operating problems on the checklist.

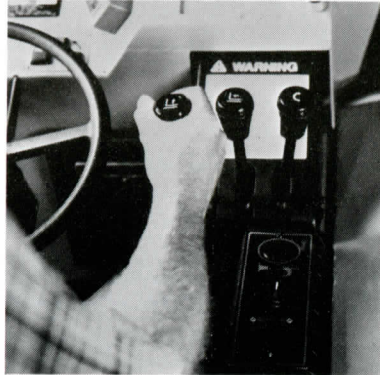
When the forks are extended or being rotated, the amber indicator lamp should not be illuminated. You should not be able to travel when the amber lamp is not illuminated.

BEFORE OPERATION



83M209

When the forks are fully rotated (180°) and the forks are not extended (center position) the amber lamp should illuminate and normal travel is available.



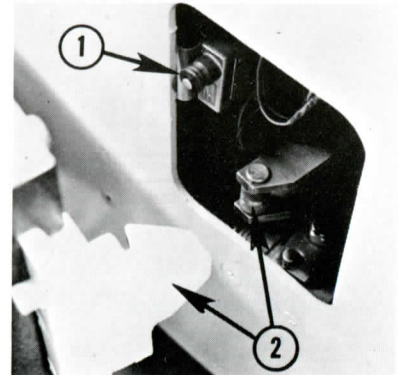
83M175

Make sure no personnel are standing under the forks.

Push forward on the lift control lever and lower the forks.

The forks should lower smoothly.

Write any operating problems on the checklist.



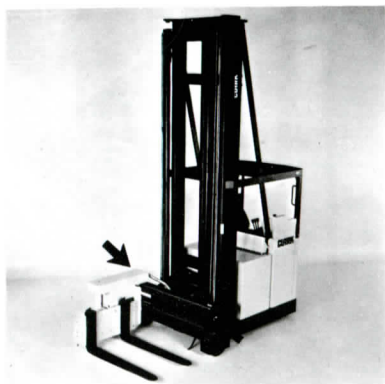
83M212

With the forks on the floor, inspect the rotation interlock switch (1) and the rotation lock (2) for correct operation.

If the lock and the interlock switch are not operating correctly, the amber indicator lamp will not illuminate.

Write any operating problems on the daily checklist.

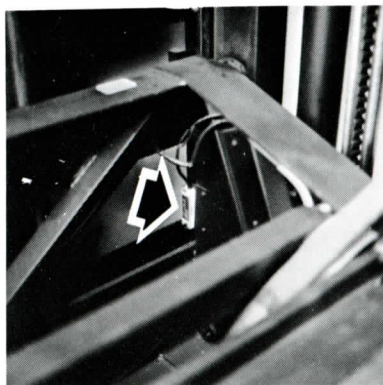
BEFORE OPERATION



83M394

Inspect the fork extension interlock switches, one on each side of the carriage slide, for correct operation.

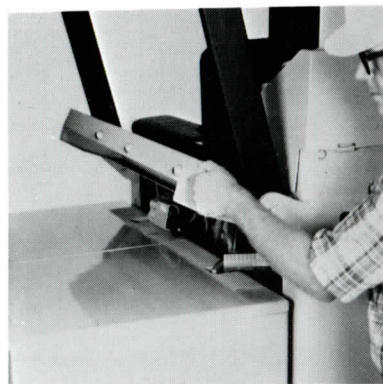
If the magnetic interlock switches are not operating correctly, the amber indicator lamp will not illuminate.



83M207

Inspect the lift/lower interlock switches located on the upright beam.

If the switches do not operate, the green and blue indicator lamps will not illuminate correctly at specific heights. Travel and lift functions will not operate correctly.

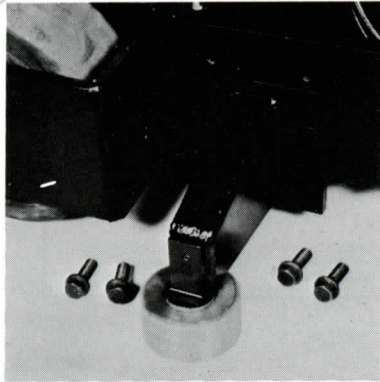


83M193

Lift the battery connector protection cover and inspect the parking brake interlock switch for proper operation.

If the parking brake interlock switch is not operating correctly, lifting operations above specific heights will not be possible.

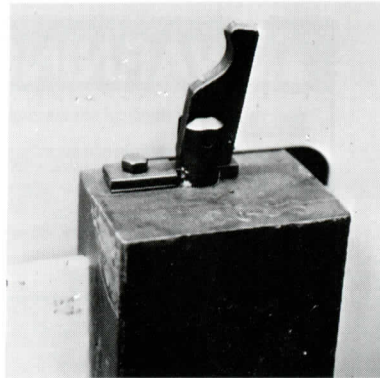
BEFORE OPERATION



83M218

Inspect the side guide rollers for loose mounting bolts or damaged roller.

Report any damage to your supervisor.



83M210

Inspect the fork lock lever for proper locking operation.

Lift to unlock, lower to lock.

CLARK **DRIVER'S DAILY CHECKLIST**
Check Before Start Of Each Shift

CHECK ONE GAS, LPG OR DIESEL TRUCK ELECTRIC TRUCK

DATE: _____

TRUCK # _____ OPERATOR: _____ SUPERVISOR'S O.K. _____

YOUR METER READING: _____ START OF DAY: _____ END OF DAY: _____ TIME PERIOD: _____

Breaks Accordingly OK Needs Attention or Repair

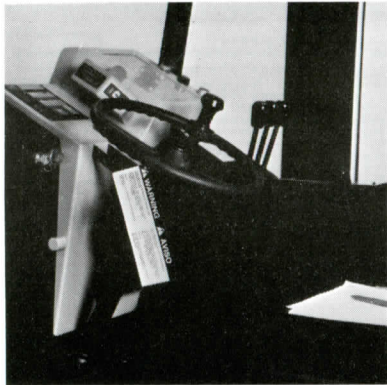
VISUAL CHECKS		OPERATIONAL CHECKS	
<input type="checkbox"/>	TIRE CONDITION	<input type="checkbox"/>	HORN
<input type="checkbox"/>	HEAD AND TAIL LIGHTS	<input type="checkbox"/>	STEERING
<input type="checkbox"/>	WORKING LIGHTS	<input type="checkbox"/>	OPERATOR SEATBELT
<input type="checkbox"/>	HORN BATTERY	<input type="checkbox"/>	PARKING BRAKES
<input type="checkbox"/>	OTHER GAUGES AND INSTRUMENTS	<input type="checkbox"/>	HYDRAULIC CONTROLS
<input type="checkbox"/>	OVERALL DAMAGE AND LEAKS	<input type="checkbox"/>	REAR BRAKE
<input type="checkbox"/>	ENGINE OIL LEVEL	<input type="checkbox"/>	BATTERY CHARGE TEST
<input type="checkbox"/>	HYDRAULIC OIL LEVEL	<input type="checkbox"/>	NOTE: MUST BE CAREFUL INDICATOR WHEELS HOLDING ALL FOUR WHEELS BACK TO PREVENT DAMAGE TO WHEELS BY OVERSTRESSING WHEELS.
<input type="checkbox"/>	FUEL LEVEL	<input type="checkbox"/>	
<input type="checkbox"/>	BATTERY PLUG CONNECTION	<input type="checkbox"/>	
<input type="checkbox"/>	NOTE: BE BOLD TO BE TESTED PLUS CONNECTION	<input type="checkbox"/>	
<input type="checkbox"/>	BATTERY CHARGE INDICATOR	<input type="checkbox"/>	
<input type="checkbox"/>	NOTE: MUST BE BOLD TO BE TESTED PLUS CONNECTION	<input type="checkbox"/>	

WARNING: BE CAREFUL ALL FOUR WHEELS ATTENTION ON BEHIND



13124

Review the operator's daily checklist to make sure that it has been completed. Give the checklist to the person responsible for lift truck maintenance.

BEFORE OPERATION



83M187

 WARNING	 AVISO
THIS TRUCK IS IN NEED OF REPAIR (SEE REVERSE SIDE).	ESTA MÁQUINA NECESITA REPARARSE. (VER OTRO LADO)
OPERATION OF THIS VEHICLE MAY CAUSE INJURY TO YOU OR THE MACHINE. FOR FURTHER INFORMATION CALL _____	LA OPERACIÓN DE ESTE VEHÍCULO LE PUEDE OCASIONAR DAÑOS PERSONALES A UD. O PODRÍA DAÑAR LA MÁQUINA. PARA MAYOR INFORMACIÓN LLAMAR A _____
PHONE _____	NO. TELEFONO _____
DATE _____	FECHA _____
REMOVE THIS SIGN ONLY AFTER REPAIRS ARE MADE.	QUITAR ESTE AVISO SOLAMENTE DESPUÉS DE QUE SE HAYA TERMINADO LA REPARACIÓN.
	<small>19 886 0587 MAR 82</small>

24805

If your daily checklist review shows that the truck has damage or is not safe to operate, attach a “WARNING” tag to the hand wheel.

Information on the warning tag should describe the problem.

Notify your supervisor or maintenance personnel.

OPERATION



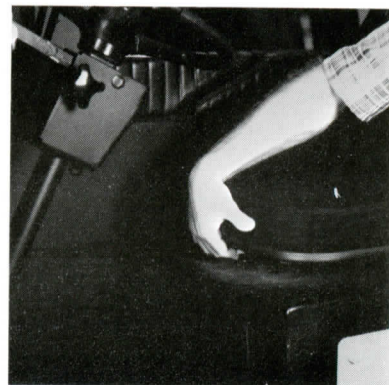
83M193

Remove blocks from the load wheels and connect the battery connectors if disconnected.



83M199

Enter the operator's compartment and adjust the steering wheel height to a comfortable position.



83M182

Adjust the driver's seat forward or reverse to a comfortable position.

The adjust lever is located under the front of the seat.

OPERATION

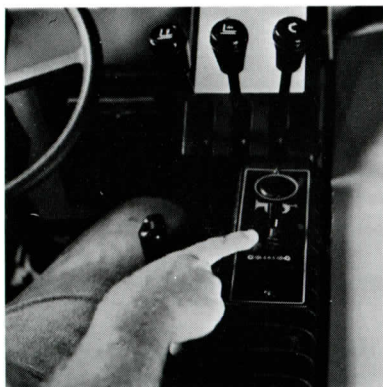


83M190

Put the key into the switch and turn clockwise, release the key.

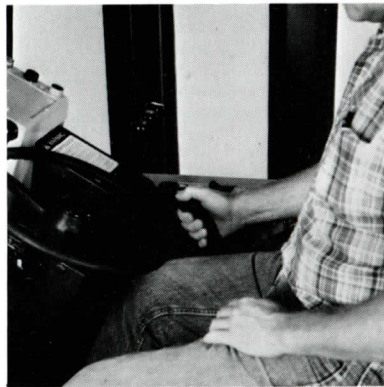
The key will automatically return to the neutral (on) position.

The amber indicator lamp will illuminate when power is supplied to the system.



83M183

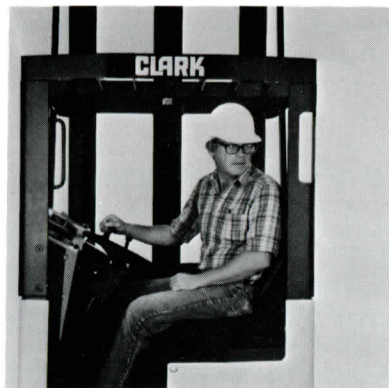
Put the directional control lever in the direction you want to travel.



83M189

Release the hand parking brake by pressing down on the handle button and moving the handle forward.

OPERATION



83M188

Check all around to make sure that the desired path of travel is clear of obstructions and personnel.

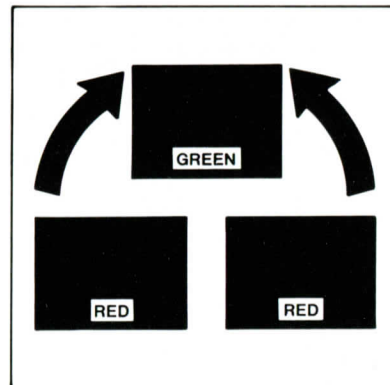
IMPORTANT

Forward direction of the turret truck is with operator end leading. Travel with the forks lateral (sideways) to the machine and shifted fully left or right so they do not extend past the confines of the truck.



83M206

Turn steer hand wheel in the desired direction of travel.



83M381

Look at the steering direction indicator lights to check position of steer wheel.

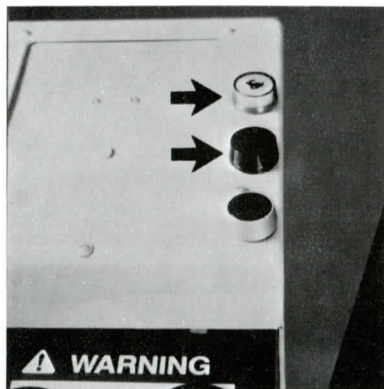
OPERATION



83M175

Pull back on the lift control lever and raise the forks about 2 inches (50 mm) above the floor.

Always be aware of the fork tips position when traveling.



83M391

Look at the amber (1) and green (2) indicator lamps on the control panel.

The amber lamp should be illuminated indicating truck is ready for travel.

The green lamp should also be illuminated indicating that the forks are within an acceptable traveling height.



83M184

Put your right foot on the accelerator pedal and press down smoothly until the truck is moving at the desired speed.

OPERATION



83M200

Press the horn button when operating close to personnel and when approaching aisle cross-ways.



83M181

To stop the truck, lift your foot from the accelerator pedal and apply the brake pedal.



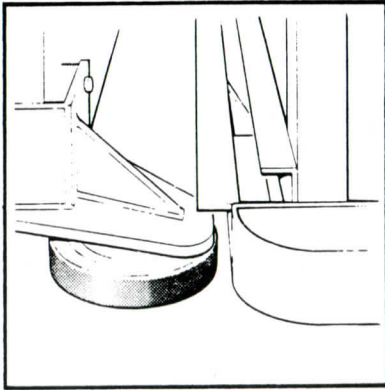
83M176

To rotate the forks clockwise, pull back on the rotate lever.

Push forward to rotate the forks counterclockwise.

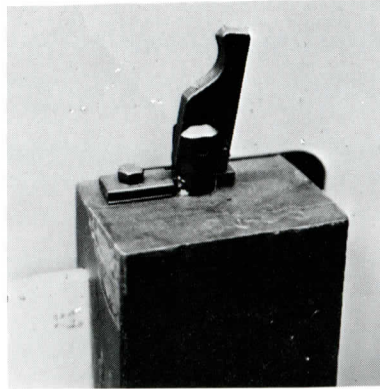
Make sure the forks lock in the full 180° position.

OPERATION



83M380

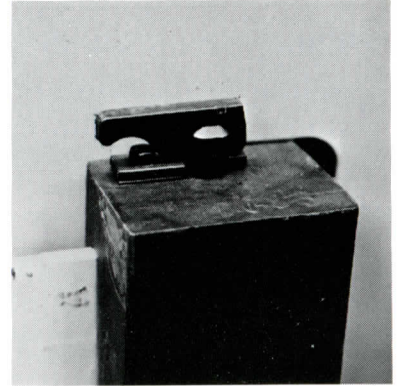
If your truck is equipped with side guide rollers, make sure care is taken when aligning guide rollers into the aisle guide rail.



83M210

Lift the fork lock lever and slide the forks to get the correct width for the load.

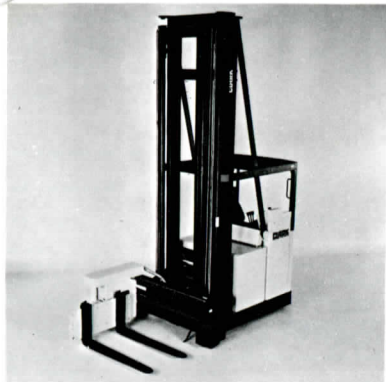
Move forks in a safe manner and keep your fingers away from pinch points.



83M211

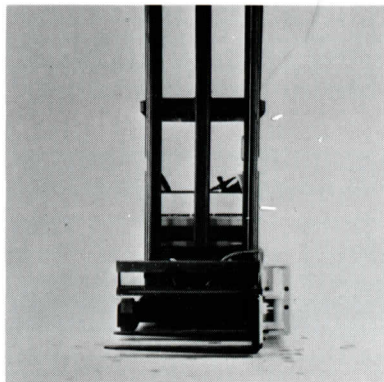
Remember to lower the lever to lock the forks after they are in the correct position.

OPERATION



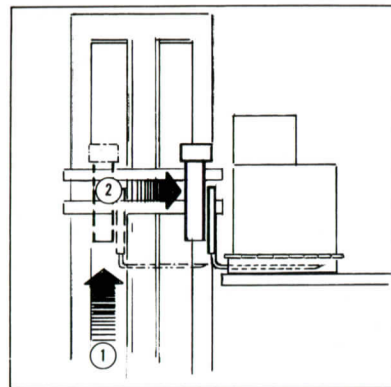
83M213

Rotate the forks to the correct aisle side and then move to center position before entering aisle.



83M204

Forks must be moved fully left or right and in a lateral (crossways) position before traveling.



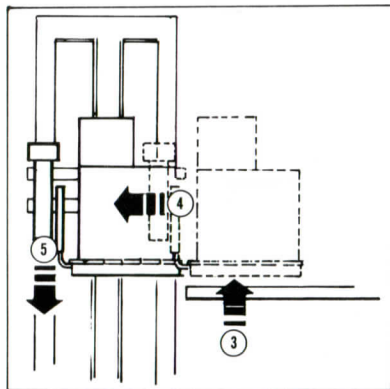
83M375

(1) Raise the forks to the desired pallet height.

Extend the forks into the pallet.

(2) The forks must be fully under the load and spread as wide as possible to provide stability and balance.

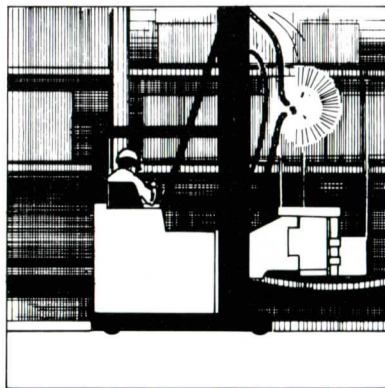
OPERATION



83M376

(3) Lift the load from the rack. When the load has cleared the rack, (4) retract it to the center position and (5) lower it to the floor.

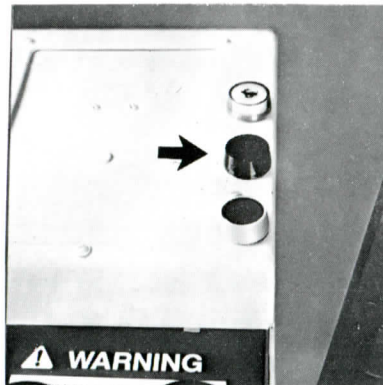
Lower the load smoothly and make sure there are no personnel or objects under the forks or near the truck.



83M370

Do not continue to lower the forks after the pallet has contacted the rack structure.

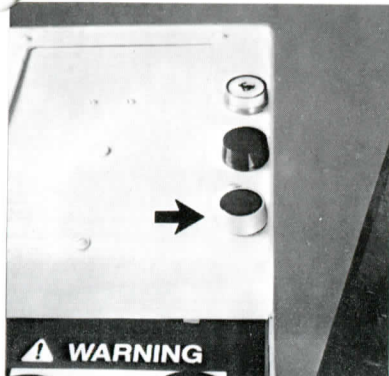
Loose chains can result, causing damage to rack structure and truck components.



83M389

At specific heights during lifting operations, the green indicator lamp on the control console will go out. This means you will have to activate the hand parking brake to continue lifting.

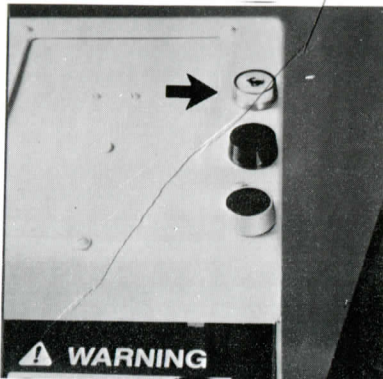
OPERATION



83M390

Above specific heights normal travel speeds will not function. The blue indicator button will illuminate and slow (creep) speed must be used to move the truck.

Press the button and push down on the accelerator pedal to "creep" the truck into the desired position.



83M388

After the load is lowered to a safe traveling height the amber indicator lamp will illuminate and normal travel speed can be obtained.

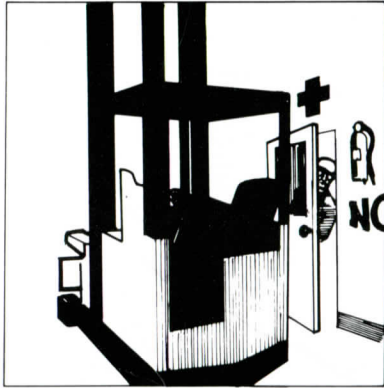
Remember, as the forks lower, truck travel speed will increase.



83M192

Be constantly alert for unusual or erratic operation. Report any malfunction immediately so that adjustments or repairs can be performed by trained and authorized personnel.

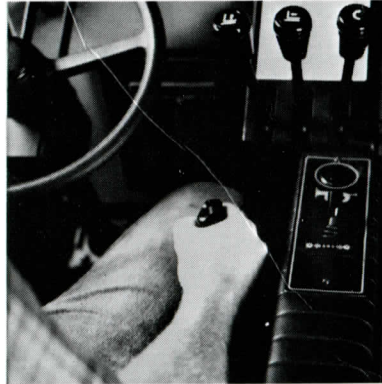
PARKING



83M377

Park trucks in authorized areas only. Lower forks to floor.

Make sure truck does not block fire aisles, fire equipment, stairways or walkways.



83M174

Activate the parking brake by pulling the handle toward you.

Block the load wheels when parking on a grade or incline.



83M190

Turn the switch key counter-clockwise to the "OFF" position and remove the key.

Remember an alarm will sound if you do not set the parking brake and remove the key.

BATTERY RETAINMENT/CARE



83M194

IMPORTANT

USE ONLY BATTERIES THAT MEET THE FOLLOWING SPECIFICATIONS.

Voltage: Two (2) 24
Amp hour capacities: 420 to 693
Minimum battery size: Two (2) at 23-1/8"W x 31.5"H x 24-1/4"L



WARNING

BATTERY SERVICE

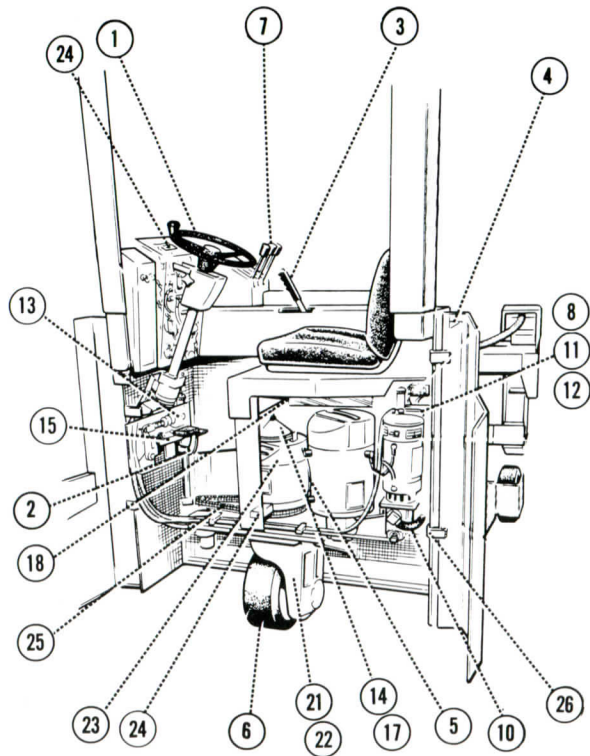
DO NOT SERVICE BATTERY UNLESS YOU ARE TRAINED AND AUTHORIZED. BATTERY ACID CAN CAUSE SEVERE BURNS AND INJURY.

FOR OTHER INDUSTRIAL BATTERY SIZES, PROVIDE BLOCKING TO RESTRAIN THE BATTERY FROM MOVING NOT MORE THAN 12,7 MM/.50 IN. IN A HORIZONTAL DIRECTION.

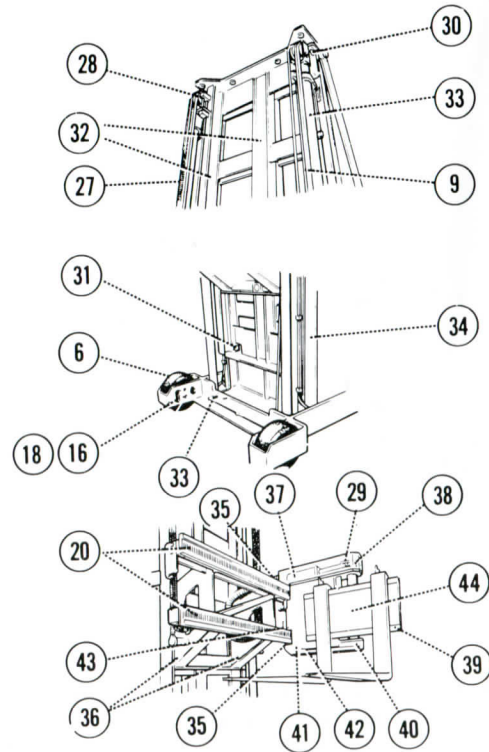
MAKE SURE THAT BATTERY COVERS ARE CLOSED AND CONNECTOR PROTECTION COVER IS LOWERED BEFORE OPERATING TRUCK.

DO NOT SERVICE BATTERIES UNLESS YOU ARE TRAINED AND AUTHORIZED.

MAINTENANCE AND LUBRICATION



83M378



83M379

MAINTENANCE AND LUBRICATION

Lubrication and Maintenance Chart

(See Illustrations for Part Locations)

* = (See Maintenance Manual)

A = Daily
B = Weekly
C = Monthly
D = Semi-Annually
E = Annually

1. Check that all controls are in good working condition.
Report any damage on the daily checklist.
- * 2. Check the foot brake adjustment.
- * 3. Check the parking brake adjustment — parking brake microswitch.
4. Check the battery, cables & terminals. Make sure they are clean and not damaged. Make sure battery is charged.
5. Check the condition of the drive unit motor cables.
6. Check the condition of the wheels. Remove stones.
Tightness of wheel nuts load and drive.
7. Check for hydraulic leaks. Tighten as necessary.
Clark hydraulic microswitches for cleanness.
- * 8. Check the oil level in the hydraulic tank. If low add (SAE 10-30W oil).
- * 9. Check hydraulic hoses and cables on mast.
Adjust for tension.
10. Check the condition of the hydraulic suction pipes from the tank to the pumps.
- * 11. Change the large micronic filter in the hydraulic tank and clean the nylon filters at the bottom of the tank.
12. Drain and refill the hydraulic and power steering reservoirs (SAE 10-30W oil).

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MAINTENANCE AND LUBRICATION

Lubrication and Maintenance Chart (Continued)

- *13. Check the level of the brake fluid in the master cylinder.
If low add (SAE J1703, DOT3 fluid).
- *14. Check the disc brake for wear. Grease the pins/springs
and top of adjusting screw (NLGI #1 grease).
- *15. Grease the accelerator and foot brake pedal pivot
shaft (NLGI #1 grease).
- *16. Check the condition of the brake shoes and the load
wheel bearings for wear. Pack bearings (NLGI #1)
- *17. Remove pivot pin on brake lever, clean the pin "Z" and
bushing. Grease (NLGI #1).
- *18. Check the seals in the master cylinder, load wheel
cylinder and disc brake cylinder.
- *19. Drain the hydraulic brake system, flush out and refill
(SAE J1703, DOT3 fluid).
- 20. Grease the "L" head (open gear lubricant).
- 21. Check the drive unit gear box oil level. Top off
with (Clark 1801708).
- 22. Drain the drive unit gear box and refill (Clark 1801708).
- *23. Remove and inspect the traction motor bearings.
Repack (NLGI #1)
- *24. Adjust steering indicator lights.
- *25. Check steering chain. Adjust if necessary and
oil the steering chain (heavyweight oil).
- 26. Oil the chassis door hinges and door locking bolts
(lightweight oil).
- 27. Check and grease the lift chain (SAE 40 oil).
- 28. Grease the lift chain pulleys (NLGI #1).

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MAINTENANCE AND LUBRICATION

Lubrication and Maintenance Chart (Continued)

- 29. Check and grease the rotate chain.
- 30. Grease the outer mast rollers.
- 31. Check and grease mast and carriage rollers.
- 32. Grease the mast channels.
- 33. Check cylinders for leaks.
- 34. Check the mast, chassis and all welded assemblies for damage or metal fatigue.
- *35. Check and grease the turret head eccentric rollers top and bottom (NLGI #1).
- 36. Grease the carriage rollers (NLGI # 1).
- 37. Grease the upper gear shaft bearings (NLGI #1).
- 38. Grease the upper rotate shaft bearings (NLGI #1).
- 39. Grease the fork carriage sliding faces (NLGI #1).
- 40. Grease the lower rotate shaft bearings (NLGI #1).
- 41. Grease the lower gear shaft bearing (NLGI #1).
- 42. Grease the gear train.
- 43. Grease the main roller.
- 44. Grease the latch gear. Apply a thin coat to mating surface.

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MAINTENANCE AND LUBRICATION SERVICE GUIDE

SYMPTOM	POSSIBLE CAUSE	REMARKS
Sluggish performance, erratic switching, slow lift	Battery discharged or defective Loose connection (power wiring) Motor brushes are worn Brake is dragging	Charge and inspect battery Tighten connections Replace the brushes See brake adjustments in Maintenance Section Check for clearance
Fuses open	Short circuit Overload Defective fuse	Inspect circuits Study duty cycle, reduce load Replace fuse
Hydraulic system leaks oil	Defective hose Loose fittings	Replace the hose Tighten
Reservoir overflows	Overfilled Air entering system	Drain to proper oil level Return tube in reservoir defective Inspect and replace
No operation	Battery disconnected or discharged Control fuses blown Power fuse blown Open circuit or PMT trips	Connect and/or charge the battery Replace fuses Replace fuse Refer to schematic
Transmission leaks oil	Worn seal Loose joints	Replace Tighten and reseal
Not enough brake	Improper adjustment Low or leaking fluid	See Maintenance Manual Repair

For Handy Reference

RECORD THE FOLLOWING INFORMATION PERTAINING TO YOUR TRUCK

Model No.

Serial No.


Attachments

Truck Weight W/Battery

Truck Rated Capacity

Gross Truck Weight (W/Battery and Rated Load)

Customer Truck Identification No.



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