

SERVICE REPAIR

MANUAL

Hyster A216 (J40XM2, J50XM2, J60XM2, J65XM2)
Forklift

HYSTER

PERIODIC MAINTENANCE

E1.50-1.75XM, E2.00XMS
(E25-40XMS, E25-40XMS₂) [D114];
E2.00-3.20XM (E45-65XM, E45-65XM₂) [F108];
J2.00-3.20XM (J40-60XM, J40-60XM₂) [A216]



HM210601

HYSTER

SAFETY PRECAUTIONS

MAINTENANCE AND REPAIR

- When lifting parts or assemblies, make sure all slings, chains, or cables are correctly fastened, and that the load being lifted is balanced. Make sure the crane, cables, and chains have the capacity to support the weight of the load.
- Do not lift heavy parts by hand, use a lifting mechanism.
- Wear safety glasses.
- **DISCONNECT THE BATTERY CONNECTOR** before doing any maintenance or repair on electric lift trucks. Disconnect the battery ground cable on internal combustion lift trucks.
- Always use correct blocks to prevent the unit from rolling or falling. See **HOW TO PUT THE LIFT TRUCK ON BLOCKS** in the **Operating Manual** or the **Periodic Maintenance** section.
- Keep the unit clean and the working area clean and orderly.
- Use the correct tools for the job.
- Keep the tools clean and in good condition.
- Always use **HYSTER APPROVED** parts when making repairs. Replacement parts must meet or exceed the specifications of the original equipment manufacturer.
- Make sure all nuts, bolts, snap rings, and other fastening devices are removed before using force to remove parts.
- Always fasten a **DO NOT OPERATE** tag to the controls of the unit when making repairs, or if the unit needs repairs.
- Be sure to follow the **WARNING** and **CAUTION** notes in the instructions.
- Gasoline, Liquid Petroleum Gas (LPG), Compressed Natural Gas (CNG), and Diesel fuel are flammable. Be sure to follow the necessary safety precautions when handling these fuels and when working on these fuel systems.
- Batteries generate flammable gas when they are being charged. Keep fire and sparks away from the area. Make sure the area is well ventilated.

NOTE: The following symbols and words indicate safety information in this manual:



WARNING

Indicates a condition that can cause immediate death or injury!



CAUTION

Indicates a condition that can cause property damage!

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manual**

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**Have any questions please write to me:
admin@servicemanualperfect.com**

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This section is for the following models:

E1.50-1.75XM, E2.00XMS (E25-40XMS, E25-40XMS₂) [D114];
E2.00-3.20XM (E45-65XM, E45-65XM₂) [F108];
J2.00-3.20XM (J40-60XM, J40-60XM₂) [A216]

**"THE
QUALITY
KEEPERS"**

**HYSTER
APPROVED
PARTS**

General



WARNING

Do not make repairs or adjustments unless you have both authorization and training. Repairs and adjustments that are not correct can make a dangerous operating condition.

Do not operate a lift truck that needs repairs. Report the need for repairs immediately. If repair is necessary, put a DO NOT OPERATE tag in the operator's area. Remove the key from the key switch. Disconnect the battery connector.



CAUTION

Disposal of lubricants and fluids must meet local environmental regulations.

Disposal of batteries must meet local environmental regulations.

On lift trucks before XM₂, when turning the key switch to the **ON** position, the Brush Wear Indicator and Motor Temperature Indicator will illuminate. On XM₂ lift trucks, there is no brush wear indicator, but the LCD screen will show a status code indicating that the brushes need replacing as described in the **Operating Manual**. Contact your dealer if any LED Indicators do not illuminate during the check part of initial lift truck operation.

This section contains a Maintenance Schedule and the instructions for maintenance and inspection.

The Maintenance Schedule has time intervals for inspection, lubrication, and maintenance. The time intervals are based on a normal operation. A normal operation is considered to be one 8-hour shift per day in a relatively clean environment on an improved surface. Multiple shifts, dirty operating conditions, etc., will require a reduction in the recommended time periods in the Maintenance Schedule.

Your dealer for Hyster lift trucks has the equipment and trained service personnel to do a complete program of inspection, lubrication, and maintenance. A regular program of inspection, lubrication, and maintenance will help your lift truck provide more efficient performance and operate for a longer period of time.

Some users have service personnel and equipment to do the inspection, lubrication, and maintenance

shown in the Maintenance Schedule. Service Manuals are available from your dealer for Hyster lift trucks to help users who do their own maintenance.

SERIAL NUMBER DATA

The serial number code for the lift truck is on the Nameplate. The code is also stamped on top of the rear bulkhead of the frame. It is on the bulkhead inside the right rear leg of the overhead guard.

HOW TO MOVE DISABLED LIFT TRUCK

How to Tow Lift Truck



WARNING

Use extra caution when towing a lift truck if any of the following conditions exist:

- **Brakes do not operate correctly.**
- **Steering does not operate correctly.**
- **Tires are damaged.**
- **Traction conditions are bad.**
- **The lift truck must be moved on a steep grade.**

If the steering pump motor does not operate, steering control of the lift truck can be slow and difficult. Do NOT tow the lift truck if there is no power. Poor traction can cause the disabled lift truck or towing vehicle to slide. Steep grades will require additional brake force to stop the lift truck.

Never carry a disabled lift truck unless the lift truck MUST be moved and cannot be towed. The lift truck used to carry the disabled lift truck MUST have a rated capacity equal to or greater than the weight of the disabled lift truck. The capacity must be for a load center equal to half the width of the disabled lift truck. See the Nameplate of the disabled lift truck for the approximate total weight. The forks must extend the full width of the disabled lift truck. Put the weight center of the disabled lift truck on the load center of the forks. Do not damage the underside of the lift truck.

1. The towed lift truck must have an operator.

2. Raise the carriage and forks approximately 300 mm (12 in.) from the surface. Install a chain to prevent the carriage and mast channels from moving.
3. Tow with another lift truck of *equal* or *greater* capacity than the disabled lift truck. Install a load of approximately half-capacity on the forks of the lift truck that is being used to tow the disabled lift truck. The half-capacity load will increase the traction of the lift truck. Keep the load as low as possible.
4. Use a towing link made of steel that fastens to the tow pins in the counterweights of both lift trucks.
5. Release the parking brake.
6. Tow the lift truck slowly.

HOW TO PUT LIFT TRUCK ON BLOCKS

How to Raise Drive Tires



WARNING

The lift truck must be put on blocks for some types of maintenance and repair. The removal of the following assemblies will cause large changes in the center of gravity: mast, drive axle, battery, or counterweight. When the lift truck is put on blocks, put additional blocks in the following positions to maintain stability:

- a. Before removing the mast and drive axle, put blocks under the counterweight so the lift truck cannot fall backward.
- b. Before removing the counterweight, put blocks under the mast assembly so the lift truck cannot fall forward.

The surface must be solid, even, and level when the lift truck is put on blocks. Make sure that

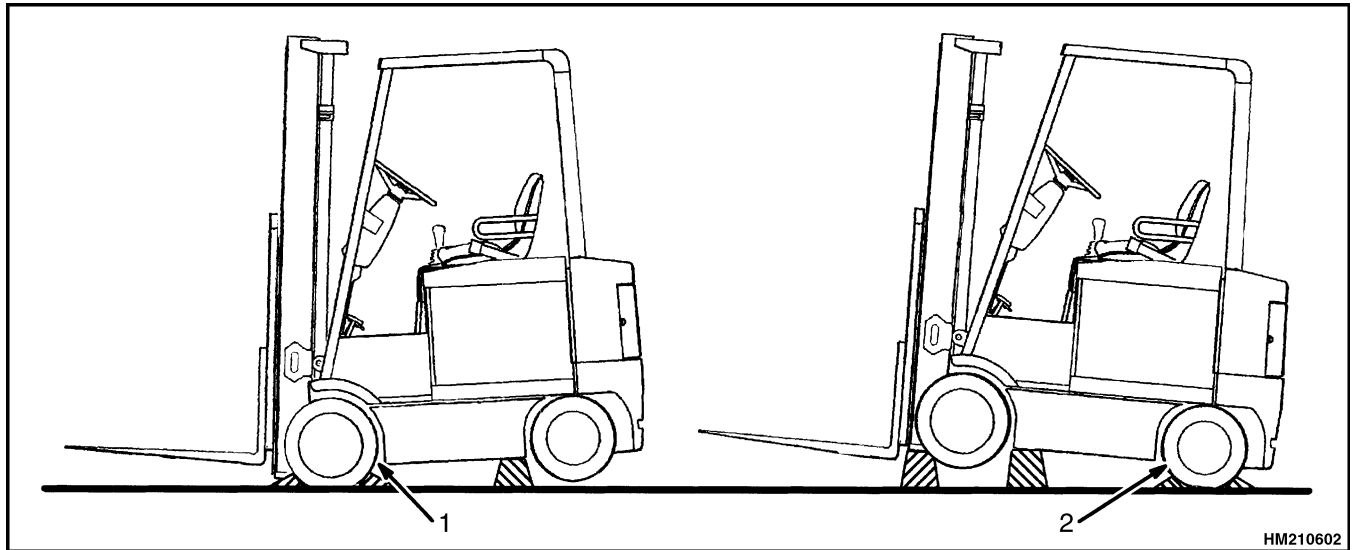
any blocks used to support the lift truck are solid, one-piece units.

NOTE: Some lift trucks have lifting eyes. These lift points can be used to raise the lift truck so that blocks can be installed.

1. Put blocks on each side (front and back) of the steering tires to prevent movement of the lift truck. See Figure 1.
2. Put the mast in a vertical position. Put a block under each outer mast channel.
3. Tilt the mast fully forward until the drive tires are raised from the surface.
4. Put additional blocks under the frame behind the drive tires.
5. If the hydraulic system will not operate, use a hydraulic jack under the side of the frame near the front. Make sure that the jack has a capacity equal to at least half the weight of the lift truck. See the Nameplate.

How to Raise Steering Tires

1. Apply the parking brake. Put blocks on both sides (front and back) of the drive tires to prevent movement of the lift truck. See Figure 1.
2. Use a hydraulic jack to raise the steering tires. Make sure that the jack has a capacity of at least 2/3 of the total weight of the lift truck as shown on the Nameplate.
3. Put the jack under the steering axle or frame to raise the lift truck. Put blocks under the frame to support the lift truck.



1. DRIVE TIRES

2. STEERING TIRES

Figure 1. Put Lift Trucks on Blocks

Maintenance Schedule

The Maintenance Schedule has two time periods. If the lift truck is operated less than eight hours each day, do maintenance at the 1-DAY, 6-WEEKS, 3-MONTHS, 6-MONTHS, and 1-YEAR periods. If the lift truck is operated more than eight hours each day, do maintenance at the periods shown in hours (8, 250, 500, 1000, 2000). The approximate locations

of the items indicated in the Maintenance Schedule are shown in Figure 2, Figure 3, and Figure 4.

The Maintenance Schedule, Table 1, has the maximum service intervals for average conditions. Inspect and lubricate more frequently if the lift truck operates in dirty or difficult conditions.

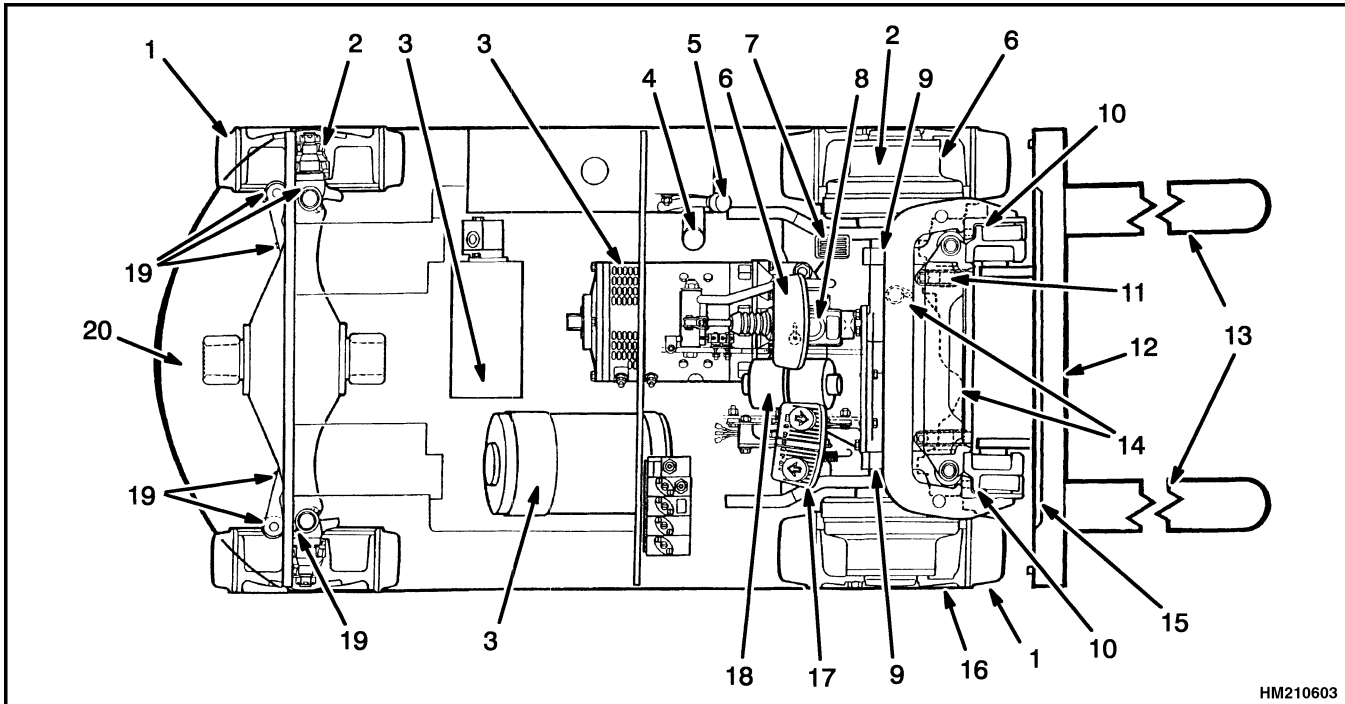


Figure 2. E1.50-1.75XM, E2.00XMS (E25-40XM, E25-40XMS₂) Maintenance Points

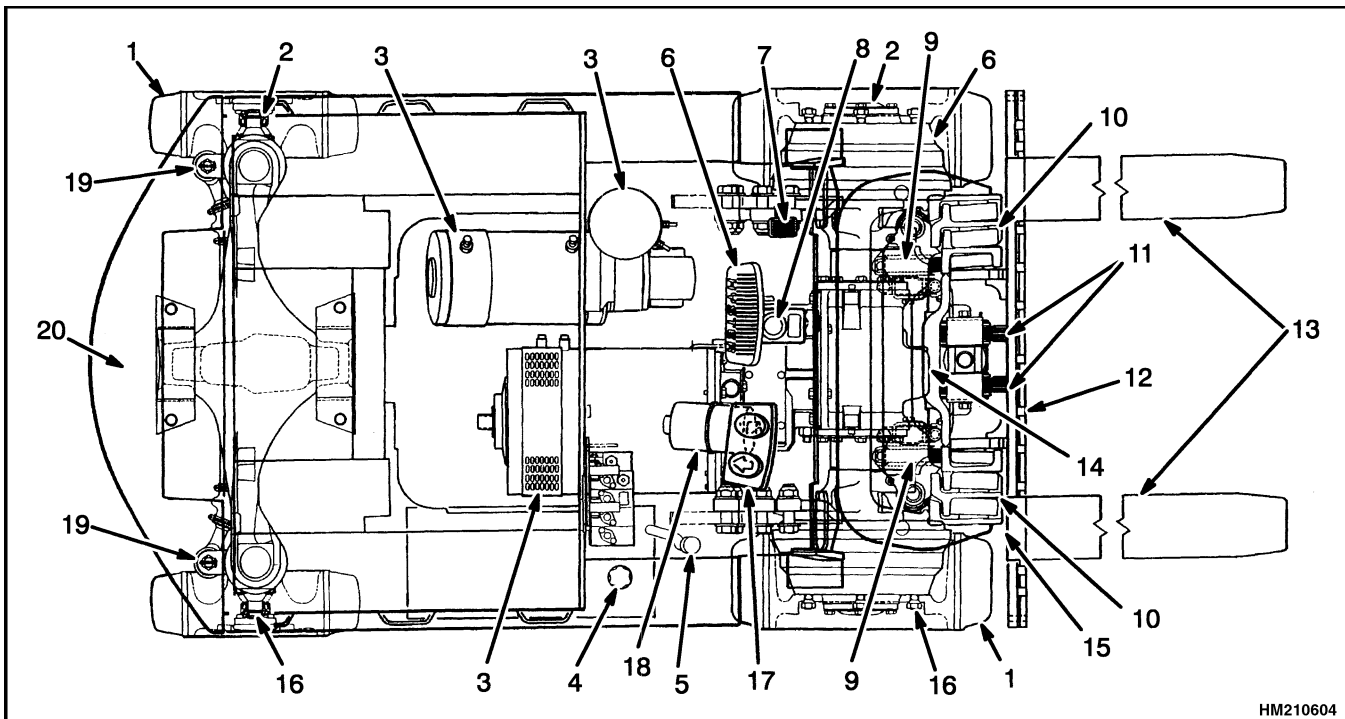
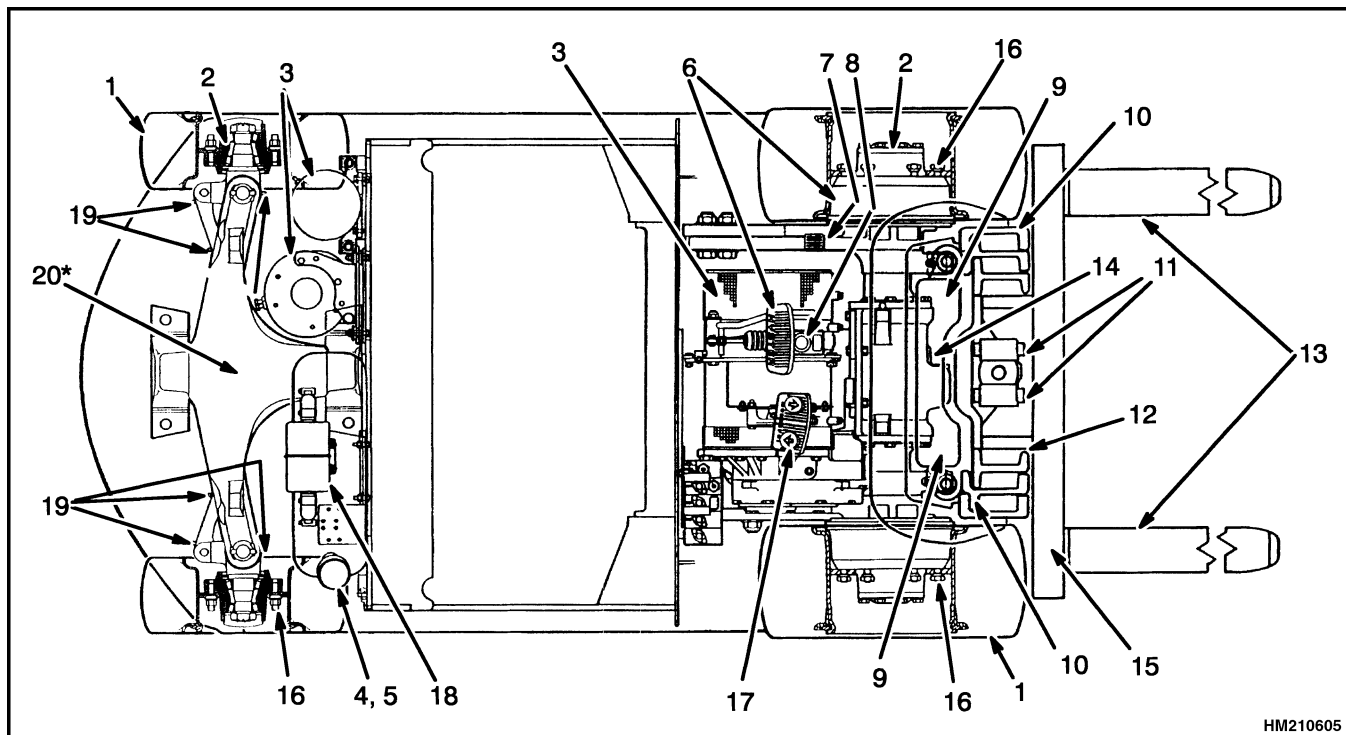


Figure 3. E2.00-3.20XM (E45-65XM, E45-65XM₂) Maintenance Points



NOTE: *TOP OF COUNTERWEIGHT.

Figure 4. J2.00-3.20XM (J40-60XM, J40-60XM₂) Maintenance Points

Table 1. Maintenance Schedule

Item No.	Item	8 hr/ 1 day	250 hr/ 6 wks	500 hr/ 3 mo	1000 hr/ 6 mo	2000 hr/ 1 yr	Procedure or Quantity	Specification
	Oil Leaks	X					Check for leaks	
1	Tires	X					Check condition	
13	Forks	X		X			Check condition	
12	Mast and Carriage	X					Check operation	
	Safety Labels	X					Replace as necessary	See Parts Manual

X=Check C=Change L=Lubricate CIL=Check Indicator Light during operation

NOTE 1: Equalization charge is required approximately each month.

NOTE 2: Multipurpose grease with 2 to 4% Molybdenum Disulfide.

NOTE 3: Lubricate lower spindle bearings at 250 hours and upper bearings during assembly.

NOTE 4: Replace the contacts in the hydraulic pump contactor every 1000 hours of operation. Replace the other contacts in the contactors when the thickness is 30% of a new contact. See the Service Manual for detailed information.

NOTE: Never use steam to clean electrical parts.

Table 1. Maintenance Schedule (Continued)

Item No.	Item	8 hr/ 1 day	250 hr/ 6 wks	500 hr/ 3 mo	1000 hr/ 6 mo	2000 hr/ 1 yr	Procedure or Quantity	Specification
17	Direction and Speed Control	X					Check operation	
							Lubricate as necessary	Multipurpose Grease See NOTE 2
	Steering	X					Check operation	
	Gauges, Horn, Lights, Reverse Alarm, and Fuses	X					Check operation	
	Seat Belt and Seat Rails	X					Check condition	
		CIL						
4	Hydraulic Oil (FULL mark) E1.50-1.75XM, E2.00XMS (E25-40XM, E25-40XMS ₂)	X				C	19 liter (20 qt)	-180 to 38°C (0 to 100°F) SAE 10W API SC/CC
4	Hydraulic Oil (FULL mark) E2.00-3.20XM (E45-65XM, E45-65XM ₂)	X				C	23 liter (24 qt)	-180 to 38°C (0 to 100°F) SAE 10W API SC/CC
4	Hydraulic Oil (FULL mark) J2.00-3.20XM (J40-60XM, J40-60XM ₂)	X				C	27 liter (29 qt)	-180 to 38°C (0 to 100°F) SAE 10W API SC/CC
7	Parking Brake	X		L			Check operation	
		CIL					Lubricate linkage	Silicone Spray Hyster P/N 328388

X=Check C=Change L=Lubricate CIL=Check Indicator Light during operation

NOTE 1: Equalization charge is required approximately each month.

NOTE 2: Multipurpose grease with 2 to 4% Molybdenum Disulfide.

NOTE 3: Lubricate lower spindle bearings at 250 hours and upper bearings during assembly.

NOTE 4: Replace the contacts in the hydraulic pump contactor every 1000 hours of operation. Replace the other contacts in the contactors when the thickness is 30% of a new contact. See the Service Manual for detailed information.

NOTE: Never use steam to clean electrical parts.

Table 1. Maintenance Schedule (Continued)

Item No.	Item	8 hr/ 1 day	250 hr/ 6 wks	500 hr/ 3 mo	1000 hr/ 6 mo	2000 hr/ 1 yr	Procedure or Quantity	Specification
11	Lift Chains	X		X	L	L	Check condition and lubrication	30W Motor oil or Hyster Chain and Cable Lubricant (P/N 171350)
				X		L	Check adjustment and length	
15	Fork Pins and Guides				L		As necessary	Motor oil
18	Hydraulic Filter					C	1	See Parts Manual
3	Motor Brushes	CIL		X			Check condition	See Parts Manual
6	Service Brakes	X				X	Check operation	See Parts Manual
		CIL					Check condition	
8	Brake Fluid	CIL		X			0.24 liter (0.5 pt)	SAE J-1703
	Seat Brake and Parking Brake Adjustment			X			Adjust as necessary	Must hold a load on a 15% grade
16	Wheel Nut Torque E1.50-1.75XM, E2.00XMS (E25-40XM, E25-40XMS ₂) Drive Wheels (Wheel Bolts)			X			Check torque	332 N•m (245 lbf ft)
16	Wheel Nut Torque E1.50-1.75XM, E2.00XMS (E25-40XMS, E25-40XMS ₂) Steer Wheels (Whl. Nuts Pneu.)			X			Check torque	156 N•m (115 lbf ft)

X=Check C=Change L=Lubricate CIL=Check Indicator Light during operation

NOTE 1: Equalization charge is required approximately each month.

NOTE 2: Multipurpose grease with 2 to 4% Molybdenum Disulfide.

NOTE 3: Lubricate lower spindle bearings at 250 hours and upper bearings during assembly.

NOTE 4: Replace the contacts in the hydraulic pump contactor every 1000 hours of operation. Replace the other contacts in the contactors when the thickness is 30% of a new contact. See the Service Manual for detailed information.

NOTE: Never use steam to clean electrical parts.

Table 1. Maintenance Schedule (Continued)

Item No.	Item	8 hr/ 1 day	250 hr/ 6 wks	500 hr/ 3 mo	1000 hr/ 6 mo	2000 hr/ 1 yr	Procedure or Quantity	Specification
16	Wheel Nut Torque E1.50-1.75XM, E2.00XMS (E25-40XM, E25-40XMS ₂) Steer Wheel Castle Nuts (Cushion)			X			Check grease and tighten to correct torque	Multipurpose Grease See NOTE 2 68 N•m (50 lbf ft) Initial 3 N•m (2 lbf ft) Final
16	Wheel Nut Torque E2.00-3.20XM (E45-65XM, E45-65XM ₂) Steer Wheel Castle Nuts (Cushion)			X			Check grease and tighten to correct torque	Multipurpose Grease See NOTE 2 68 N•m (50 lbf ft) Initial 3 N•m (2 lbf ft) Final
16	Wheel Nut Torque E2.00-3.20XM(E45- 65XM, E45-65XM ₂) And J2.00-3.20XM (J40-60XM, J40-60XM ₂) Drive Wheel (Wheel Nuts)			X			Check torque	237 to 305 N•m (175 to 225 lbf ft)
16	Wheel Nut Torque J2.00-3.20XM (J40-60XM, J40-60XM ₂) Steer Wheels			X			Check torque	237 to 305 N•m (175 to 225 lbf ft)
19	Steering Axle Rod Ends (Steering Cyl.)					L	Check operation 2 Fittings	Lubricate as required Multipurpose grease See NOTE 2

X=Check C=Change L=Lubricate CIL=Check Indicator Light during operation

NOTE 1: Equalization charge is required approximately each month.

NOTE 2: Multipurpose grease with 2 to 4% Molybdenum Disulfide.

NOTE 3: Lubricate lower spindle bearings at 250 hours and upper bearings during assembly.

NOTE 4: Replace the contacts in the hydraulic pump contactor every 1000 hours of operation. Replace the other contacts in the contactors when the thickness is 30% of a new contact. See the Service Manual for detailed information.

NOTE: Never use steam to clean electrical parts.

Table 1. Maintenance Schedule (Continued)

Item No.	Item	8 hr/ 1 day	250 hr/ 6 wks	500 hr/ 3 mo	1000 hr/ 6 mo	2000 hr/ 1 yr	Procedure or Quantity	Specification
19	Steering Axle King Pins					L	Check operation 2 Fittings See NOTE 3	Lubricate as required Multipurpose grease See NOTE 2
19	Steering Axle Tie Rods E1.50-1.75XM, E2.00XMS (E25-40XMS, E25- 40XMS ₂)		L				Check operation 6 Fittings	Lubricate as required Multipurpose grease See NOTE 2
19	Steering Axle Tie Rods J2.00-3.20XM (J40-60XM, J40- 60XM ₂)			L			Check operation 6 Fittings	Lubricate as required Multipurpose grease See NOTE 2
	Mast						Check condition	See NOTE 2
9	Pivots			L			2 Fittings	Multipurpose grease
	Mast						Check Condition	See NOTE 2
10	Sliding Surfaces			L			As required	Multipurpose grease
	Mast						Check Condition	See NOTE 2
12	Sideshift Carriage			L			4 Fittings	Multipurpose grease
	Mast						Check Condition	

X=Check C=Change L=Lubricate CIL=Check Indicator Light during operation

NOTE 1: Equalization charge is required approximately each month.

NOTE 2: Multipurpose grease with 2 to 4% Molybdenum Disulfide.

NOTE 3: Lubricate lower spindle bearings at 250 hours and upper bearings during assembly.

NOTE 4: Replace the contacts in the hydraulic pump contactor every 1000 hours of operation. Replace the other contacts in the contactors when the thickness is 30% of a new contact. See the Service Manual for detailed information.

NOTE: Never use steam to clean electrical parts.

Table 1. Maintenance Schedule (Continued)

Item No.	Item	8 hr/ 1 day	250 hr/ 6 wks	500 hr/ 3 mo	1000 hr/ 6 mo	2000 hr/ 1 yr	Procedure or Quantity	Specification
12	Integral Sideshift Carriage				X	C	Check wear	2.5 mm (3/32 in.) or less
	(Upper/Lower Bearings)						4 Bearings	
20	Contactors			X		C	Check condition	See Parts Manual See NOTE 4
	Hinges, Levers, Linkage, Pedals Seat Rails			L		L	As required	Multipurpose grease (See NOTE 2) or Silicone Spray Hyster P/N 328388
14	Differential/Speed Reducer E1.50-1.75XM, E2.00XMS (E25-40XM, E25-40XMS ₂)			X		C	2.9 liter (3.1 qt)	Ultr Gear Lube SAE 80W or Gear Oil SAE 80W-90 (Chevron) or equivalent
14	Differential/Speed Reducer E2.00-3.20XM (E45-65XM, E45-65XM ₂)			X		C	4.2 liter (4.4 qt)	Ultr Gear Lube SAE 80W or Gear Oil SAE 80W-90 (Chevron) or equivalent
14	Differential/Speed Reducer J2.00-3.20XM (J40-60XM, J40-60XM ₂)			X		C	3.7 liter (3.9 qt)	Ultr Gear Lube SAE 80W or Gear Oil SAE 80W-90 (Chevron) or equivalent
5	Hydraulic Tank Breather			X		C	Clean or replace	See Parts Manual
2	Wheel Bearings					L	As necessary	Multipurpose grease See NOTE 2

X=Check C=Change L=Lubricate CIL=Check Indicator Light during operation

NOTE 1: Equalization charge is required approximately each month.

NOTE 2: Multipurpose grease with 2 to 4% Molybdenum Disulfide.

NOTE 3: Lubricate lower spindle bearings at 250 hours and upper bearings during assembly.

NOTE 4: Replace the contacts in the hydraulic pump contactor every 1000 hours of operation. Replace the other contacts in the contactors when the thickness is 30% of a new contact. See the Service Manual for detailed information.

NOTE: Never use steam to clean electrical parts.

Table 1. Maintenance Schedule (Continued)

Item No.	Item	8 hr/ 1 day	250 hr/ 6 wks	500 hr/ 3 mo	1000 hr/ 6 mo	2000 hr/ 1 yr	Procedure or Quantity	Specification
	Seat Plate And Seat Brake Pivots			L				Use Silicon Spray Hyster P/N 328388
	Brake Linkage and Shaft			L				Multipurpose grease See NOTE 2
	Hoist and Tilt Controls	X					Lubricate as necessary	Use Silicon Spray Hyster P/N 328388
	Steering Column Tilt Mechanism	X					Lubricate as necessary	Use Silicon Spray Hyster P/N 328388
X=Check C=Change L=Lubricate CIL=Check Indicator Light during operation								
NOTE 1: Equalization charge is required approximately each month.								
NOTE 2: Multipurpose grease with 2 to 4% Molybdenum Disulfide.								
NOTE 3: Lubricate lower spindle bearings at 250 hours and upper bearings during assembly.								
NOTE 4: Replace the contacts in the hydraulic pump contactor every 1000 hours of operation. Replace the other contacts in the contactors when the thickness is 30% of a new contact. See the Service Manual for detailed information.								
NOTE: Never use steam to clean electrical parts.								

Maintenance Procedures Every 8 Hours or Daily

HOW TO MAKE CHECKS WITH KEY OFF

Tires and Wheels



WARNING

Air pressure in pneumatic tires can cause tire and wheel parts to explode. The explosion of wheel parts can cause serious injury or death.

Remove all of the air from the tires before the tires are removed from the lift truck.

If the air pressure is less than 80% of the correct air pressure, the tire must be removed before air is added. Put the tire in a safety cage when adding air pressure to the tire. Follow the procedures described in Add Air to Tires section in your manual.

When air is added to the tires, use a remote air chuck. The person adding air must stand to the side of the safety cage and not in front of it.

Inspect the tires for wire, rocks, glass, pieces of metal, holes, cuts, and other damage. See Figure 5. Remove any object that will cause damage. Check for loose or missing hardware. Remove any wire strapping or other material that is wrapped around the axle.

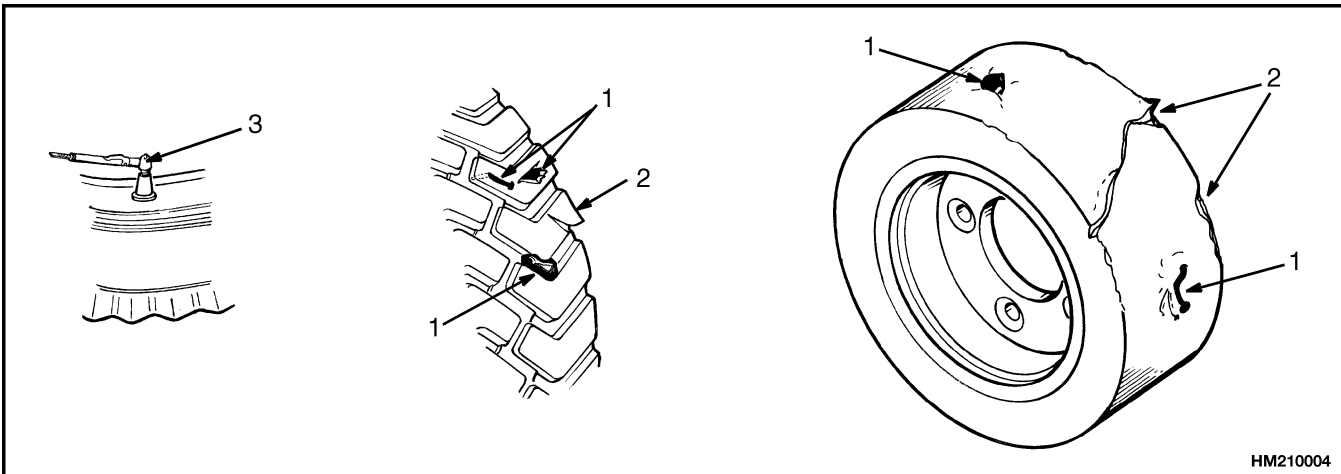
Make sure the wheel bolts or nuts are tight. Tighten the wheel bolts or nuts in a cross pattern to the correct torque value shown in the Maintenance Schedule table.

If the lift truck has pneumatic tires, keep the tires at the correct air pressure. See the Nameplate. Check the air pressure with a gauge when the tires are cold. If it is necessary to add air to a tire that is warm, check one of the other tires on the same axle and add air to the tire that has low pressure so the air pressures are equal. The air pressure of the warm tires must always be equal to or greater than the specification for air pressure for cold tires. Check pneumatic wheels for bent or damaged rims. Check for loose or missing parts.

CAUTION

Check all wheel bolts or nuts after 2 to 5 hours of operation: when new lift trucks begin operation and on all lift trucks when the wheels have been removed and installed. Tighten the bolts or nuts in a cross pattern to the correct torque value shown in the Maintenance Schedule. When the bolts or nuts stay tight for eight hours, the interval for checking the torque can be extended to 500 hours.

Tighten the castle nuts of the steer wheel spindles of these units to 68 N•m (50 lbf ft) while rotating the wheel in each direction at EACH installation. Loosen the nuts 1/4 turn. Pull and push at top of wheel to check for movement (end play). If there is movement, tighten the castle nuts to 3 N•m (2 lbf ft). Install the cotter pins at the nearest alignment positions. Install the hub cap. Additional torque checks are not required.



1. CHECK FOR DAMAGE (REMOVE NAILS, GLASS, AND OTHER OBJECTS FROM TREAD)
2. MAKE SMOOTH EDGES
3. CHECK TIRE PRESSURE (PNEUMATIC TIRES)

Figure 5. Tires Check

Forks

The identification of a fork is determined by how it is connected to the carriage. These lift trucks have hook forks.

Adjust

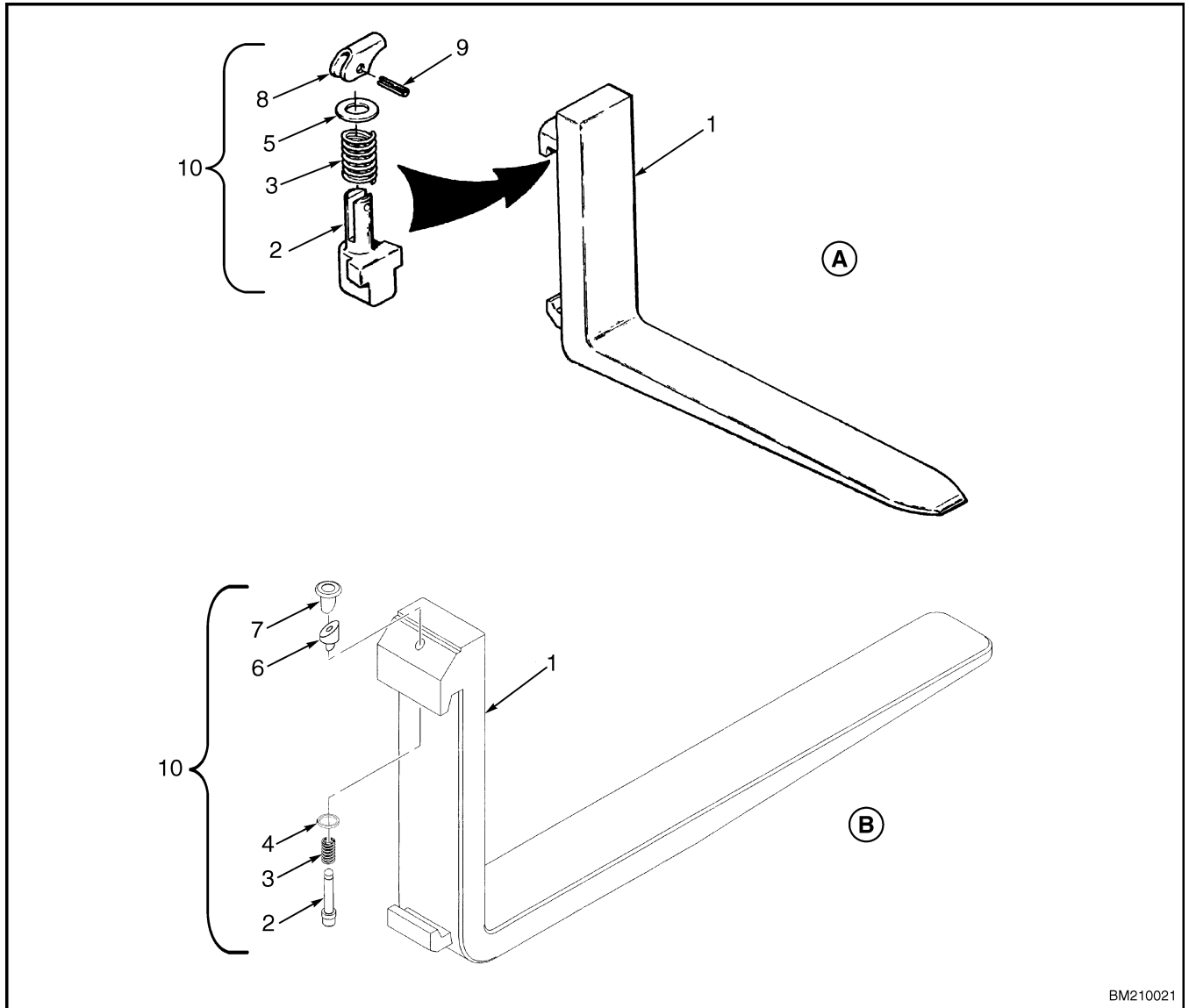
Hook forks are connected to the carriage by one of two types of hooks and lock pins. See Figure 6. These lock pins are installed through the top fork hooks and fit into slots in the top carriage bar. Adjust the forks as far apart as possible for maximum support of the load. Raise the lock pin in each fork to slide the fork on the carriage bar. Make sure the lock pin is engaged in the carriage bar to lock the fork in position after making adjustments.

Remove

WARNING

Do not try to lift a fork without a lifting device. The forks can weigh up to 181.4 kg (400 lb) each.

Slide a hook fork to the fork removal notch on the carriage. See Figure 6 and Figure 8. Lower the fork onto blocks so the bottom hook of the fork moves through the fork removal notch. See Figure 7. Lower the carriage farther so the top hook of the fork is disengaged from the top carriage bar. Move the carriage away from the fork, or use a lifting device to move the fork away from the carriage.



BM210021

A. OLD STYLE LOCK PIN ASSEMBLY

1. FORK
2. LOCK PIN
3. SPRING
4. WASHER
5. WASHER

B. NEW STYLE LOCK PIN ASSEMBLY

6. WEDGE
7. KNOB
8. LEVER
9. COTTER PIN
10. LOCK PIN ASSEMBLY

Figure 6. Fork Lock Pin Assembly**Install****WARNING**

**Do not try to lift a fork without a lifting device.
The forks can weigh up to 181.4 kg (400 lb) each.**

Move the fork and carriage so the top hook on the fork can engage the top carriage bar. Raise the carriage to

move the lower hook through the fork removal notch. Slide the fork on the carriage so both upper and lower hooks engage the carriage. Engage the lock pin with a notch in the top carriage bar.