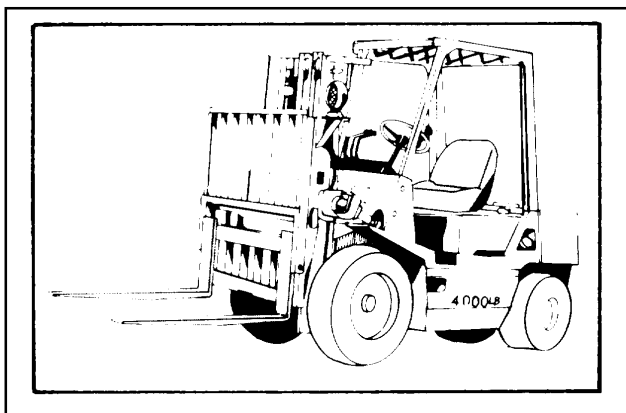


**TECHNICAL MANUAL
OPERATOR'S, ORGANIZATIONAL,
DIRECT SUPPORT AND GENERAL SUPPORT
MAINTENANCE MANUAL
INCLUDING
(REPAIR PARTS AND SPECIAL TOOLS LIST)**



**TRUCK, LIFT, FORK, GASOLINE
ENGINE DRIVEN, PNEUMATIC
RUBBER TIRE, 4000 POUND CAPACITY,
144 INCH LIFT, TCM MODEL
FG30N7(T) MHE 259
NSN 3930-01-146-3990**

GENERAL DATA SECTION

OPERATING SECTION

**MAINTENANCE SECTION
(PREVENTIVE)**

**MAINTENANCE SECTION
(CORRECTIVE)**

**APPENDIX A - LIST OF
APPLICABLE PUBLICATIONS**

**APPENDIX B - SUPPLEMEN
TAL OPERATING MAINT-
ENANCE AND REPAIR
PARTS INSTRUCTIONS
W/MAINTENANCE ALLOCA-
TION CHART**

**APPENDIX C - REPAIR
PARTS AND SPECIAL
TOOLS LIST**

HEADQUARTERS, DEPARTMENT OF THE ARMY

MARCH 1985



**OPERATOR'S, ORGANIZATIONAL, DIRECT SUPPORT
AND GENERAL SUPPORT MAINTENANCE MANUAL
INCLUDING (REPAIR PARTS AND SPECIAL TOOLS LIST)
FOR
TRUCK, LIFT, FORK, GASOLINE
ENGINE DRIVEN, PNEUMATIC RUBBER
TIRE, 4000 LB. CAPACITY, 144
INCH LIFT, TCM MODEL FG30N7(T)
MHE259 NSN 3930-01-146-3990**

REPORTING OF ERRORS

You can help improve this manual. If you find any mistakes or if you know of a way to improve the procedures, please let us know. Mail your letter, DA Form 2028 (Recommended Changes to Publications and Blank Forms) or DA Form 2028-2 located in the back of this manual direct to: Commander, US Army Tank-Automotive Command, ATTN: AMSTA-MB, Warren, MI 48090. A reply will be furnished direct to you.

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Index I-1 National Stock Number and Part Number Index

This technical manual is an authentication of the manufacturers commercial literature and does not conform with the format and content specified in AR 310-3, Military Publications. This technical manual does, however, contain available information that is essential to the operation and maintenance of the equipment.

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NOTE

This: manual is published for the purpose of identifying an authorized commercial manual for the use of personnel to whom this Forklift Truck is issued.

TCM America
Bridgeport, NJ 08014

Procured under Contract No. DAAEO7-82-C-6720

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GENERAL DATA SECTION

INTRODUCTION

This manual contains operation, service and repair instructions with a parts breakdown for the TCM Model FG30N7(T). These trucks are manufactured by TCM, Shiga Prefecture, Japan, and were procured under Contract DAAE07-82-C-6720. These trucks are built to MIL-T-52932A (11 July 80).

PURPOSE OF EQUIPMENT

These internal combustion, fork lift trucks are designed for the handling, transporting and warehousing of materials over hard surfaces. In this capacity, as a self-contained, sit down, rider-type, mechanized piece of material handling equipment, they are completely equipped to lift and carry their rated capacity and lift it (when stopped) to the full rated height of the upright.

DESCRIPTION

These trucks are internal combustion, engine powered, front wheel drive, rear wheel steering, sit down rider fork lift trucks. The engine supplies the power for traveling, steering, and lifting. The "drive train" consists of the engine, the torque converter and power shift transmission, and the final drive axle. The steering is powered by the hydraulic pump through a flow divider and controlled by the steering box to the power steering cylinder. The lifting mechanism is powered by the hydraulic pump and controlled by the control valve to the cylinders. There is a hydraulic fluid reservoir, integral with the frame of the truck, filters, hoist and tilt cylinders and side shift cylinder with necessary hoses and fittings.

INSTALLATION

Since these trucks are packed and shipped in accordance with manufacturer's standard commercial practices they require only the installation of the forks, the battery cables to be hooked up properly, and all fluid levels to be checked before they are put into operation.

NOTE

The following equipment has been preserved and packaged, and is not ready for operation until the necessary depreservation and "Before Operating Services" have been performed, according to form DA2258, as supplied with the equipment. The following is a list of applicable serial numbers: 44430227 to 44430248 inclusive.

DEFINITIONS

Side Shift Carriage

An assembly attached to the lift bracket by means of wear strips and bushings and brackets so that it can be shifted laterally, by a hydraulic cylinder, four (4) inches left and right of center. The forks are mounted on the side shift carriage.

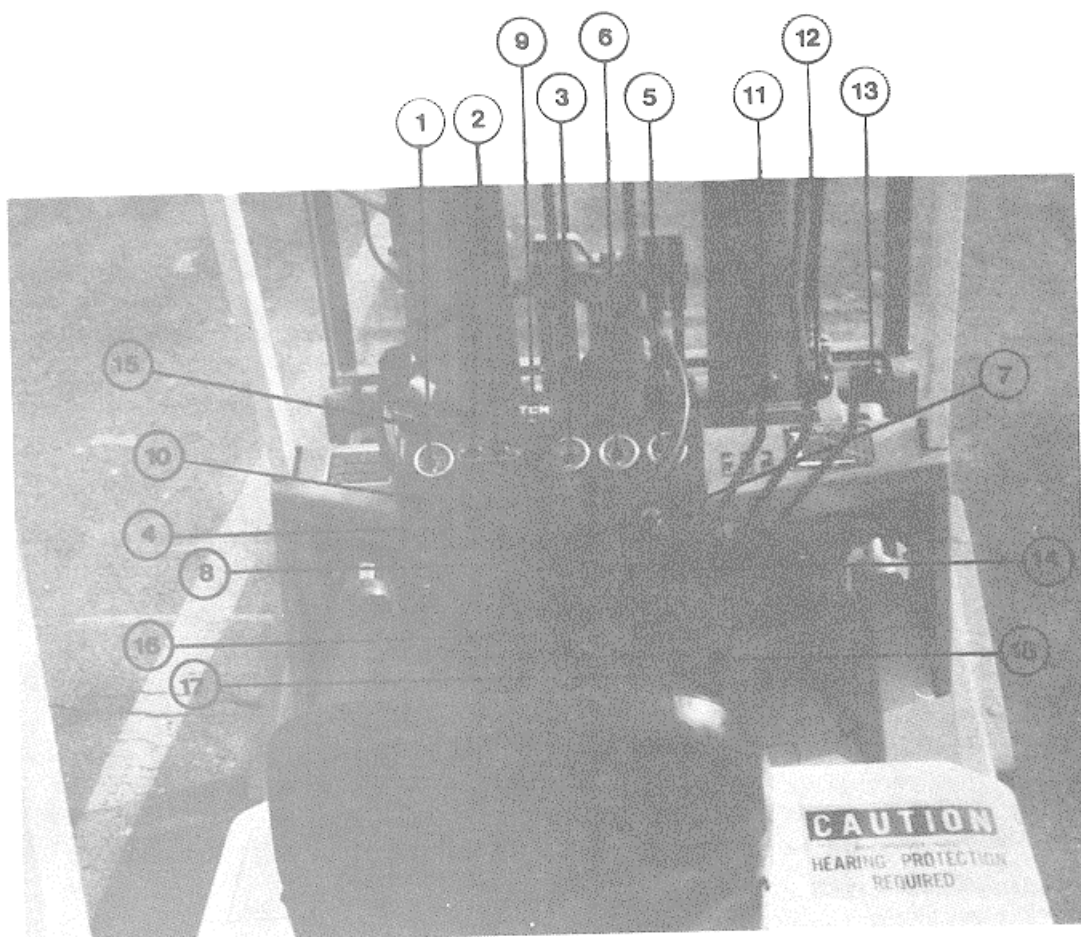
Upright

The upright is made up of three (3) channel sets each welded together (by means of cross members) as a unit and then assembled one inside the other to form a telescopic assembly that is opened by hoist cylinders by means of chains over pulleys. The final set of chains is hooked to the lift bracket or carriage.

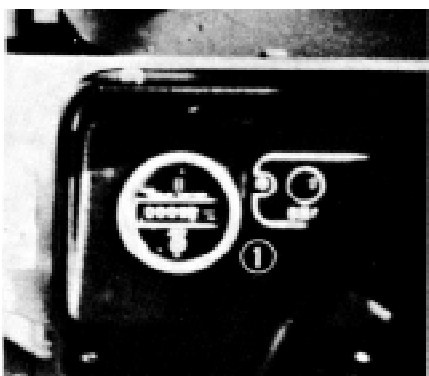
Lift Bracket (or Carriage)

This assembly's bearings ride inside of the third set of channels. It is lifted by chains which run over the top of sheaves on the cross-head of the free-lift cylinder. The forks are mounted to the lift bracket's side shifting finger bars and can be slid across their face to adjust the spacing.

OPERATING SECTION

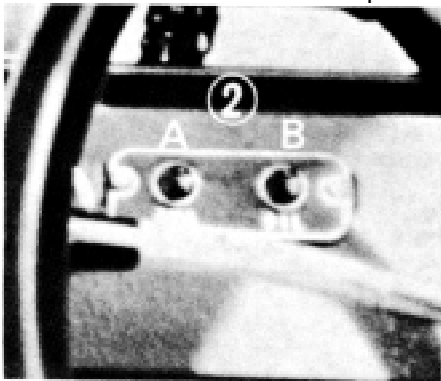


- 1 Hour Meter
- 2 Warning Lamps
- 3 Ammeter
- 4 Choke Button
- 5 Fuel Gauge
- 6 Temperature Gauge
- 7 Ignition Switch
- 8 Light Switch
- 9 Horn Button
10. Steering Handwheel
11. Lift Lever
12. Tilt Lever
13. Side Shift Lever
14. Parking Brake Lever
15. Forward-Reverse Lever
16. Inching Pedal
17. Brake Pedal
18. Accelerator Pedal



HOUR METER [1]

This meter measures working time of engine. Use meter to schedule lubrication and maintenance periods.



WARNING LAMPS [21]

These warning lamps indicate whether or not their corresponding devices are working properly. Each lamp lights up when an abnormal condition takes place in the corresponding device.

CAUTION

If the light continues to stay lit or lights up during operation, the charging rate is low and should be checked immediately.

CHG (A)

This lamp indicates the battery condition of charge. The lamp comes on when the ignition switch is set at "ON"*, but it goes out as the engine starts and accelerator pedal is pressed.

CAUTION

If this light continues to stay lit or lights up during operation, the pressure is insufficient and should be checked immediately.

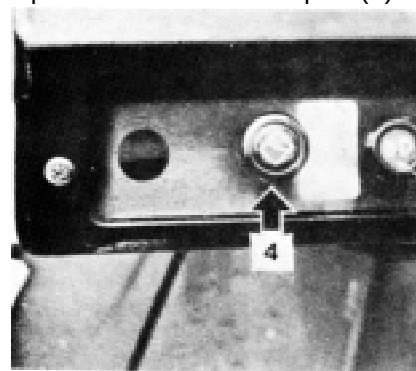
OIL (B)

This lamp indicates the pressure condition of engine lube oil. Although it lights up when the engine switch is set at "ON", once the engine starts up and the accelerator pedal is depressed, this lamp goes out.



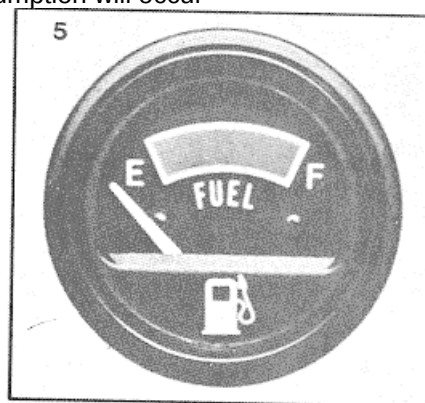
AMMETER [3] -

This indicates the battery state of charge. During engine running, the pointer should indicate plus (+) side.



CHOKE BUTTON [4]

When starting a cold engine, first pull out this choke button and turn the key switch. After the engine is started up, do not fail to return the choke button into the original position, otherwise, engine trouble or increased fuel consumption will occur.



FUEL GAUGE [5]

When ignition switch is set to the position "ON"*, the gauge informs operator how much fuel remains in the fuel tank. "E" mark stands for "Empty", "F" "Full".