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SECTION INDEX

This manual covers the instructions for operation, lubrication, adjustments and maintenance for normal daily care. These instructions are divided into ten sections to simplify your reference to the information most important to you. Refer to Table of Contents on next page for a complete list of the subjects covered within each section.

This manual has been prepared to help you operate and maintain your machine with utmost efficiency and safety. Read this manual thoroughly and learn your machine before you attempt to operate it.

SECTION 1 — INTRODUCTION

This section discusses generally the use of this manual, serial numbers and how to ship or store this machine.

SECTION 2 — BEFORE STARTING THE NEW MACHINE

This section outlines the special procedures necessary to insure proper "break-in" and care of a new machine.

SECTION 3 — INSTRUMENTS AND CONTROLS

The text and illustrations on instruments and controls in this section are designed to tell you "where it is," "what it does," and "how to use it." Read this section carefully.

SECTION 4 — PREPARING FOR EACH DAY'S WORK

This illustrates the few simple preparations before each day's work to assure a work day free of "down-time."

SECTION 5 — OPERATING THE BASIC MACHINE

This section outlines and illustrates the step-by-step procedures for starting, operating, and stopping the basic machine.

SECTION 6 — OPERATING THE TRACTOR EQUIPMENT

This section describes the methods for operating and adjusting the various equipment available with this machine.

SECTION 7 — OPERATING TECHNIQUES

A few operating suggestions and techniques are discussed with simple ideas to help ease the work and lengthen the useful life of your machine.

SECTION 8 — SCHEDULED MAINTENANCE

A complete scheduled maintenance procedure is outlined here — one that assures less down-time and expense, and more profit and work from your machine. Read and use this section.

SECTION 9 — MAINTENANCE

Much of the maintenance and adjustment procedures outlined in Section 8 need clear explanation. This section is devoted to explaining the "how to do" in an easy style to help you "do it yourself" and get it right.

SECTION 10 — SPECIFICATIONS AND CAPACITIES

This section covers the capacities, general dimensions and weights, speeds and torques.

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Before shutting down, operate the engine at half speed (no load) for three to five minutes. This will aid in cooling the engine and turbocharger.

NOTE: For instructions on operating the tractor equipment, refer to Section 6.

STARTING THE ENGINE

Step numbers correspond with the numbers shown on Figs. 2 and 3.

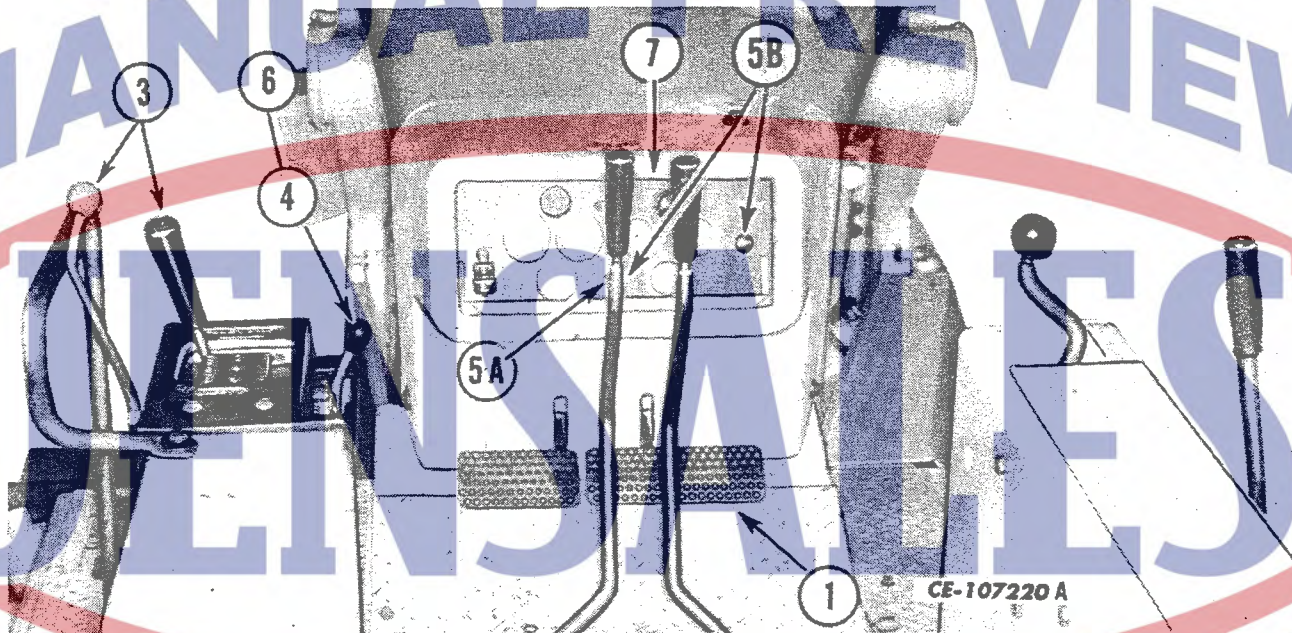


Fig. 2. Starting the Engine



Fig. 3. Electrical System Master Switch

IMPORTANT: The turbocharger must be primed when the engine has been idle for 30 days or more. Refer to "TURBOCHARGER" in Section 9.

IMPORTANT: This engine cannot be started by towing, pushing or coasting the tractor.

1. Apply and lock the brake pedal.
2. Turn the electrical system master switch to "ON" position.
3. Place the transmission shift lever in neutral and pull the safety lock lever back to the "ON" position (Fig. 5 or 6).
4. Move the engine speed control lever back to 1/2 speed position at temperatures above +10°C (+50°F). Move the engine speed control lever all the way back to full speed position for temperatures below +10°C (+50°F).

(Continued on next page)

SCHEDULED MAINTENANCE

BASIC TRACTOR SERVICE POINTS

- Continued

BRAKE PEDAL AND DECELERATOR LINKAGE (Fig. 6)

(Two fittings.) If brake pedal or decelerator is binding remove the dash housing to gain access to fittings. Apply lubricator to fittings until clean lubricant appears. Reinstall the dash.

CONTROL LINKAGE (Fig. 6)

(Four fittings.) Apply the lubricator to each fitting until clean lubricant appears.

STEERING BRAKE SHAFT

(One on each side.) Apply the lubricator to each fitting until clean lubricant appears.



Fig. 6



Fig. 7

1. Filler and Level Plug
2. Drain Plug
3. Inside Housing Drain Plug

SPECIFICATIONS AND CAPACITIES

SPECIFICATIONS - Continued

ELECTRICAL SYSTEM - Continued

Alternator:

Neihoff 50 amp

TORQUE CONVERTER

Make Rockford
Type Single stage w/fixed stators

TRACK

Gauge (center to center of tracks) 1.98 m (78 in)
Ground Contact Length 2.76 m (108.5 in)
Track Shoe Width:
Standard 508 mm (20 in)
Maximum 660 mm (26 in)

TRACTOR SPEEDS

Forward Speeds Standard:

First 0-3.64 km/h (0-2.26 mph)
Second 0-6.55 km/h (0-4.07 mph)
Third 0-10.27 km/h (0-6.38 mph)

Reverse Speeds Standard:

First 0-4.31 km/h (0-2.68 mph)
Second 0-7.71 km/h (0-4.79 mph)
Third 0-12.04 km/h (0-7.48 mph)

Forward Speeds (equipped with two speed steering):

First Low Range 0-2.82 km/h (0-1.75 mph)
First High Range 0-3.65 km/h (0-2.27 mph)
Second Low Range 0-5.09 km/h (0-3.16 mph)
Second High Range 0-6.55 km/h (0-4.07 mph)
Third Low Range 0-8.05 km/h (0-5 mph)
Third High Range 0-10.27 km/h (0-6.38 mph)

Reverse Speeds (equipped with two speed steering):

First Low Range 0-3.33 km/h (0-2.07 mph)
First High Range 0-4.31 km/h (0-2.68 mph)
Second Low Range 0-6.0 km/h (0-3.73 mph)
Second High Range 0-7.71 km/h (0-4.79 mph)
Third Low Range 0-9.45 km/h (0-5.87 mph)
Third High Range 0-12.04 km/h (0-7.48 mph)

SPECIAL TORQUES

All torques are given with bolts, screws and nuts lubricated with engine oil unless otherwise indicated.

Crankcase Oil Pan Drain Plug 41-47 N·m (30-35 lbf ft)
Cranking Motor Mounting Bolts 142-163 N·m (105-120 lbf ft)
Cylinder Head Cover Bolts 34 N·m (25 lbf ft)
Engine Valve Clearance Adjusting Screw Nut:
Rocker Lever 47 N·m (35 lbf ft)
Valve Bridge 34 N·m (25 lbf ft)
Hydraulic Reservoir Filter and Level Plug 41 N·m max. (30 lbf ft max.)
Hydraulic Reservoir Filter Assembly Nut 14-27 N·m (10-20 lbf ft)
Hydraulic Reservoir Filter Assembly and Shroud Nut 176-190 N·m (130-140 lbf ft)
Hydraulic Lift and Tilt Cylinder Bolts 108-122 N·m (80-90 lbf ft)
Hydraulic Track Adjuster Ball Check 61-75 N·m (45-55 lbf ft)
Hydraulic Track Adjuster Bleeder Plug 61-75 N·m (45-55 lbf ft)