

444D, 544D, AND 644D LOADERS TECHNICAL MANUAL TM-1341 (Oct-87)

SECTION AND GROUP CONTENTS

SECTION I—GENERAL INFORMATION

- Group I—Introduction and Safety Information
- Group II—General Specifications
- Group III—Torque Values
- Group IV—Fuels and Lubrication
- Group V—Inspection Procedures

SECTION 01—WHEELS

- Group 0110—Powered Wheels and Fastenings

SECTION 02—AXLES AND SUSPENSION SYSTEMS

- Group 0200—Removal and Installation
- Group 0210—Differential or Bevel Drive
Differential and Differential Lock
- Group 0225—Input Drive Shafts and U-Joints
- Group 0250—Axle Shafts, Bearings and
Reduction Gears
- Group 0260—Hydraulic System
Unloading Valve and Differential
Lock Valve

SECTION 03—TRANSMISSION (IN- CLUDES TORQUE CONVERTER)

- Group 0300—Removal and Installation
- Group 0315—Controls Linkage
- Group 0325—Input Drive Shafts and U-Joints
- Group 0350—Gears, Shafts, Bearings and
Power Shift Clutch
Transmission and Torque Converter

SECTION 03—TRANSMISSION (IN- CLUDES TORQUE CONVERTER— CONTINUED)

- Group 0360—Hydraulic System
Oil Pump, Control Valve, Oil Cooler,
Oil Cooler Thermal Bypass Valve,
Clutch Cut-Off Solenoid Valve

SECTION 04—ENGINE

- 5.4 L (329 Cu In.)—444D, 544D
- 5.9 L (359 Cu In.)—444D, 544D
- 6.8 L (414 Cu In.)—444D, 544D
- 7.6 L (466 Cu In.)—644D

*NOTE: For repair on 5.9 L (359 cu. in.) engines, see
CTM-4; 7.6 L (466 Cu. In.) engines, see CTM-1.*

- Group 0400—Removal and Installation
Oil Pan
Fuel Injection Pump
Fuel Injection Lines and Nozzles
Turbocharger
Water Pump
Thermostats
Fuel Transfer Pump
Starting Motor

SECTION AND GROUP CONTENTS—Continued

SECTION 05—ENGINE AUXILIARY SYSTEMS

- Group 0505—Cold Weather Starting Aids
- Group 0510—Cooling Systems
- Group 0515—Speed Controls And Fuel Shut-Off Linkage
- Group 0520—Intake System
- Group 0530—External Exhaust System
- Group 0560—External Fuel Supply Systems

SECTION 06—TORQUE CONVERTER

- See Group 0350 For Torque Converter Repair

SECTION 07—DAMPENER DRIVE

- Group 0752—Elements

SECTION 09—STEERING SYSTEM

- Group 0930—Secondary Steering
- Group 0960—Hydraulic System
 - Steering Valve, Steering Column
 - Priority Valve, Steering Cylinder,
 - Crossover Relief Valve, Cushion Valve

SECTION 10—SERVICE BRAKES

- Group 1011—Active Elements
- Group 1015—Controls Linkage
- Group 1060—Hydraulic System
 - Brake Valve, Brake Accumulator,
 - Brake Pump, Brake System Filter,
 - Unloading Valve and Differential Lock Valve

SECTION 11—PARK BRAKE

- Group 1111—Active Elements
 - Brake Assembly
- Group 1115—Controls Linkage

SECTION 16—ELECTRICAL SYSTEMS

- Group 1671—Batteries, Support and Cables
- Group 1672—Alternator, Regulator and Charging System Wiring
- Group 1673—Lighting System
- Group 1674—Wiring Harness and Switches
- Group 1675—System Controls
 - Transmission Clutch Cut-Off,
 - Differential Lock, Boom
 - Height Kickout and Return-To-Dig Components
- Group 1676—Instruments and Indicators

SECTION 17—FRAME, CHASSIS, OR SUPPORTING STRUCTURE

- Group 1740—Frame Installation
- Group 1746—Frame Bottom Guards
- Group 1749—Chassis Weights
 - Side and Rear Weights

SECTION 18—OPERATOR'S STATION

- Group 1800—Removal and Installation
- Group 1810—Operator Enclosure
- Group 1821—Seat and Seat Belt
- Group 1830—Heating and Air Conditioning

SECTION 19—SHEET METAL AND STYLING

- Group 1921—Grille and Grille Housing

SECTION 20—SAFETY, CONVENIENCE AND MISCELLANEOUS

- Group 2004—Horn and Warning Devices

SECTION 31—LOADER

- Group 3102—Buckets
- Group 3115—Controls Linkage
- Group 3140—Frames
- Group 3160—Hydraulic System
 - Loader Control Valve, Hydraulic Pump, Boom, Bucket, Multi-Purpose Bucket, and Lumber Fork Cylinders,
 - Hydraulic Filter, Reservoir, Suction Screen, Pump Relief Valve

SECTION 99—DEALER FABRICATED TOOLS

T64:1341 J8 021187

INTRODUCTION

This manual is part of a total service support program.

FOS Manuals—reference

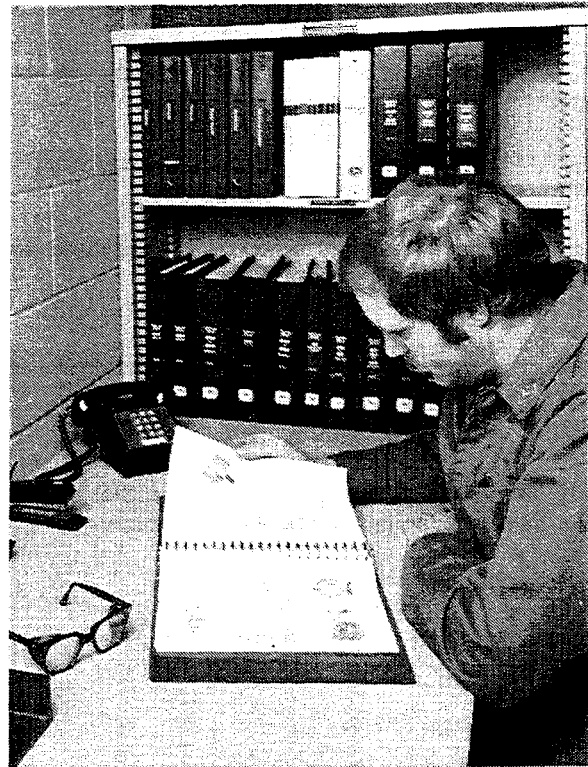
Technical Manuals—machine service

Component Manuals—component service

Fundamentals of Service (FOS) Manuals cover basic theory of operation, fundamentals of troubleshooting, general maintenance, and basic types of failures and their causes. FOS Manuals are for training new personnel and for reference by experienced technicians.

Technical Manuals are concise service guides for specific machines. Technical manuals are on-the-job guides containing only the vital information needed by an experienced service technician.

Component Technical Manuals are concise service guides for specific components. Component technical manuals are written as stand alone manuals covering multiple machine applications.



AB6;RW5559 053;INTR02 030785

FEATURES OF THIS TECHNICAL MANUAL

John Deere ILLUSTRATION format emphasizing illustrations and concise instructions in easy-to-use modules.

Emphasis on diagnosis, analysis, and testing so you can understand the problem and correct it.

Diagnostic information presented with the most logical and easiest to isolate problems first to help you identify the majority of routine failures quickly.

Step-by-step instructions for teardown and assembly.

Summary listing at the beginning of each group of all applicable specifications, wear tolerances, torque values, essential tools, and materials needed to do the job.

An emphasis throughout on safety—so you do the job right without getting hurt.

This technical manual was planned and written for you—an experienced service technician. Keep it in a permanent binder in the shop where it is handy. Refer to it when you need to know correct service procedures or specifications.



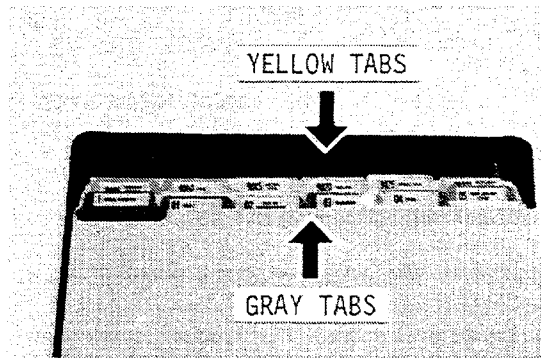
AB6;RW5560 053;INTR03 071085

USING TABS

To fully utilize this technical manual, you must understand how it is organized.

Only two tab colors are used—gray and yellow. Each color represents a different type of information.

Spend a minute reading this now and save many minutes of searching later.



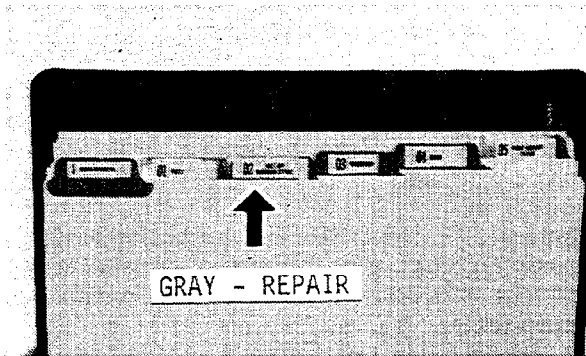
GRAY TAB SECTIONS

The gray tab sections are repair sections that tell how to repair the components of the various systems.

Repair of a component includes:

- Removal from machine (when necessary)
- Disassembly
- Inspection
- Replacement of parts
- Assembly
- Adjustment
- Installation on machine (when necessary)

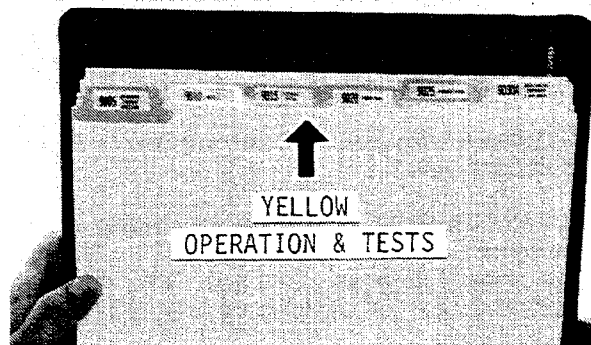
The numbers used for the repair (gray tab) sections are part of an overall service publication numbering system. The numbers identify the same sections in the parts catalog, flat rate manual, service information bulletins, and service training courses.



YELLOW TAB SECTIONS

Each yellow tab section contains information on:

| Groups | |
|--------|-------------------------------|
| 05 | Theory of Operation |
| 10 | System Operational Checks |
| 15 | System Diagnostic Information |
| 20 | Adjustments |
| 25 | Tests |





Suggest:

If the above button click is invalid.

Please download this document

first, and then click the above link

to download the complete manual.

Thank you so much for reading