

John Deere 643L-II Wheeled Feller Buncher Operation & Test Technical Manual (TM14327X19)

643L-II Wheeled Feller Buncher Diagnostic

(PIN: 1DW643L__F690815—)



JOHN HARE



COLLECTION

OPERATION & TEST TECHNICAL MANUAL 643L-II Wheeled Feller Buncher

(PIN: 1DW643L__F690815—)

TM14327X19 30NOV19 (ENGLISH)

For complete service information also see:

PowerTech 6059 OEM Diesel Engines (Final Tier 4/Stage IV platform) Level 33 FCU ctm12001E
TeamMate IV 1400 Series Inboard Planetary Axles cm14021E
JDI InK™ 2G / 3G MTG Technical Manual 1515
643L-II Wheeled Feller Buncher TM14327X19
Hydraulic Cylinders 1515



Worldwide Construction and
Forestry Division

Covers: 643L-II, 1DW643L__, F690815 ()

Type: Service Manual

Language: English

Pages: 715

Format: PDF

Features: Bookmarked, searchable, printable

Compatibility: Windows/Mac/Tablet/Mobile

This service manual contains important information for the maintenance, troubleshooting and servicing of the **John Deere 643L-II Wheeled Feller Buncher Operation & Test Technical Manual (TM14327X19)**

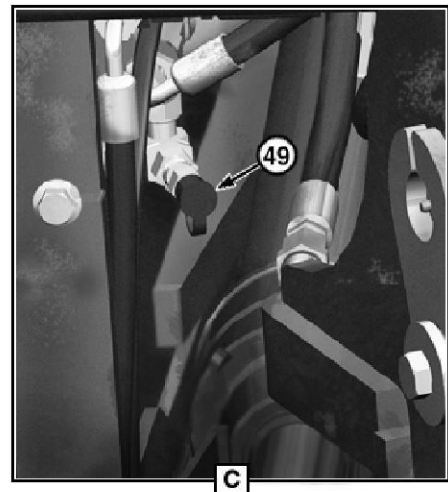
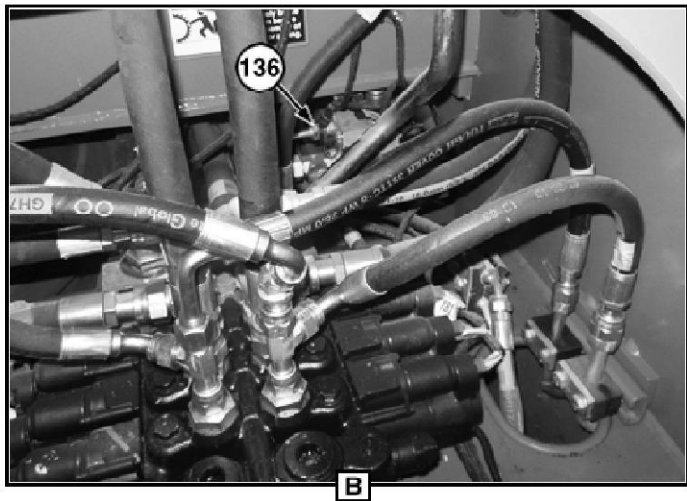
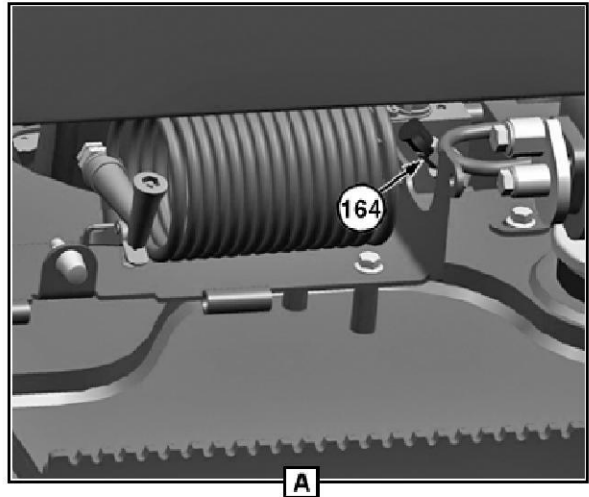
In this manual you will find detailed specifications, illustrations, schematics, diagrams and step-by-step procedures to properly service and diagnose the machine to the manufacturer's standards.

Contents:

- General Information
- Specifications
- Serial Number Location
- Engine Specifications
- Engine Diagnostics
- Engine Tests and Adjustments
- Engine Repair
- Power Train
- Transmission
- Axles
- Differential
- PTO
- Hydraulic System
- Electrical System
- Electrical Tests and Diagnostics
- Wiring Diagram / Schematic
- Ignition and Charging
- Steering
- Brakes
- Wheels
- Operator's Platform
- Body Panels
- Disassembly and Assembly
- Diagnostics, Tests and Adjustments
- Troubleshooting
- and much more...

Please note this manual is in **downloadable PDF format only**. If you have any questions about this product or would like to request sample pages, please contact us and reference the product name or SKU.

Hydraulic Test Port Locations



TX1262280A UN: Hydraulic Test Port Locations

LEGEND:

49-Accumulator Test Port

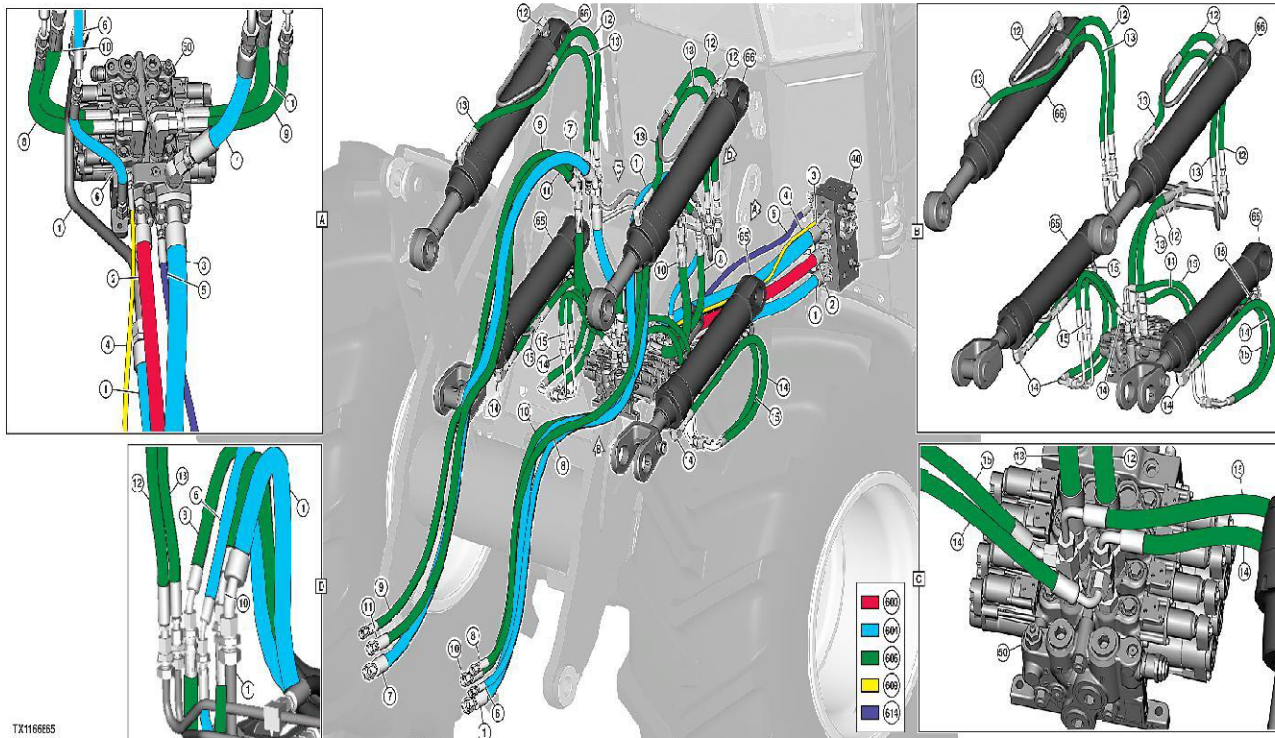
136-Park Brake Test Port

164-Differential Lock Pressure Test Port

Test ports (49, 136, and 164) are used to connect JT02156A Digital Pressure and Temperature Analyzer Kit. Ports are the same for the saw and shear machine. For more information on test port locations, [see Hydraulic System Schematic—Saw](#) or [see Hydraulic System Schematic—Shear](#). (Group 9025-10.)

JM46292,00001D3-1E-20180815

Main Control Valve and Boom Circuit Line Identification



TX1166265

TX1166365-UN: Main Control Valve and Boom Circuit Line Identification

LEGEND:

- 1-Return Line (hydraulic pump manifold port SAW MOTOR to saw motor port B)
- 2-High-Pressure Line (hydraulic pump manifold port P MAIN VALVE to main control valve [4-spool] port P)
- 3-Return Line (main control valve [4-spool] port T to hydraulic pump manifold port T1)
- 4-Pilot Line (hydraulic pump manifold port PILOT MAIN to main control valve [4-spool])
- 5-Load Sense Line (hydraulic pump manifold port LS MAIN VALVE to main control valve [4-spool] port LS)
- 6-Case Drain Line (saw motor port T2 to main control valve [4-spool] port SUMP)
- 7-Return Line (saw motor port A to main control valve [4-spool])
- 8-Accumulator Arm Close Line (main control valve [4-spool] port A to accumulator cylinder head end)
- 9-Accumulator Arm Open Line (main control valve [4-spool] port B to accumulator cylinder rod end)
- 10-Clamp Open Line (main control valve [4-spool] port A to clamp cylinder rod end)
- 11-Clamp Close Line (main control valve [4-spool] port B to clamp cylinder head end)
- 12-Tilt Out Line (main control valve [4-spool] port A to tilt cylinders head end)
- 13-Tilt In Line (main control valve [4-spool] port B to tilt cylinders rod end)
- 14-Boom Lower Line (main control valve [4-spool] port A to boom cylinders rod end)
- 15-Boom Lift Line (main control valve [4-spool] port B to boom cylinders head end)
- 40-Hydraulic Pump Manifold
- 50-Main Control Valve (4-spool)
- 65-Boom Cylinder (2 used)
- 66-Tilt Cylinder (2 used)
- 600-High-Pressure Oil
- 604-Return Oil
- 606-Trapped Oil
- 609-Pilot Oil
- 614-Load Sense Oil



Thank you very much
for your reading.
Please click here
to get more information.