

# FORD 3000 ALL PURPOSE TRACTOR

## ENGINE SPECIFICATIONS

**ENGINE, gasoline**—Type, in-line vertical, overhead valve. Number of cylinders, 3. Rated speed, 2,100 rpm. Bore, 4.2 in. Stroke, 3.8 in. Displacement, 158 cu. in. Compression ratio, 7.75:1.

**ENGINE, diesel**—Type, in-line vertical, direct injection, with cold starting aid. Number of cylinders, 3. Rated speed, rpm, 2,000. Bore, in., 4.2. Stroke, in., 4.2. Displacement, cu in., 175. Compression ratio, 16.5:1.

**CYLINDER BLOCK**—Heavy-duty cast iron with deep skirts and heavy ribs. **Crankshaft**—Four main, hardened bearing journals. Journal length, in., 1.46. Diameter, in., 3.37.

**Connecting rods**—Massive, forged I-beam. Piston bushing, bronze on steel backing. **Bearings**—Sleeve-type, over-plated copper-lead or aluminum alloy main bearings. **Pistons**—Aluminum alloy, with hardened top ring insert; holds top ring with firm precision to resist wear and extend ring life.

**Piston rings**—One oil ring and two compression rings per piston (gasoline engine); three compression rings (diesel). All rings except lower compression ring are chrome-plated.

**Piston pin**—Floating type. Length, 3.5 in. Outside diameter, 1.5 in. **Piston travel**—Gasoline: 1,330 fpm @ 2,100 engine rpm. Diesel: 1,400 fpm @ 2,000 engine rpm. **Valves**—Positive rotators on exhaust valves. Hardened valve seat inserts. **Camshaft**—High-lift, flat follower type. **Cylinders**—Sleeveless design, increases rigidity of block, transfers heat quickly and uniformly to liquid coolant. **Engine lubrication**—Pressurized system. Main bearings, connecting rod bearings, and camshaft bearings pressure lubricated. Rocker arms, pressure lubricated (intermittent). Piston pin bearings, cylinder walls, and tappets splash lubricated. Timing drive, squirt lubricated. Push rods, lubricated by drip from rocker arms. Fixed screen intake. 300-hr 2-qt oil filter, with replacement element. **Carburetor**—Single venturi, up-draft type. Accelerating well and power valve. Fuel inlet screen. **Fuel filter**—Disc element and sediment bowl. **Injection pump** (diesel)—Distributor type with mechanical governor. Injector timing, 19 deg. **Air cleaner**—Dry type (gasoline). Diameter, 6.5 in. Rated air flow, 100 cfm. Oil-bath (diesel). Rated air flow, 125 cfm. Capacity, 1.9 pt. **Cooling system**—Fan, pump-circulated pressurized coolant, thermostat-controlled, with bypass. Full length water jackets. Tube-and-fin radiator, with pressure cap. 26 gpm pump. Thermostat, open temperature, 168 deg. F.; full open, 192 deg. F. **Electrical starting and ignition**—Key starter switch and transmission safety lock. Starting motor with positive engagement drive assembly. Centrifugal and vacuum spark advance. Voltage and current regulator. Battery, 12-volt, 80-amp-hr (gasoline); 128-amp-hr (diesel). Ventilated-type generator, capacity 22 amp. **Injection nozzles** (diesel)—4-orifice type, accessible without removing valve cover.

## CHASSIS

**TRANSMISSION OPTIONS**—**4-speed**: Constant mesh. Four speeds forward, 1 reverse. Forward gears, helical. Reverse gears, helical-spur. **8-speed (dual-range)**: Provides lowest 4 forward speeds in low range, highest 4 forward speeds in high range, and 2 reverse speeds. Gears, front position, combined helical-spur; rear position and reverse, spur. **10-speed (Select-O-Speed)**: Full-range, power-shift transmission, lets operator power-shift into any one of 10 forward speeds, on-the-go. Three planetary gear sets in constant mesh. Power flow directed through gear sets by means of hydraulically-actuated clutch packs. Two reverse speeds.

### PTO OPTIONS

	Trans- mission PTO	Live PTO	Inde- pendent PTO	Ground Drive PTO
4-speed	X			
8-speed	X	X		
10-speed			X	X

*Design, materials, and/or specifications are subject to change without notice and without liability therefor.*

**FINAL DRIVE**—Matched pinion gear and spiral bevel ring gear; 6.16:1 reduction ratio with manual transmissions; 6.67:1 with 10-speed (Select-O-Speed) transmission. Pinion gear, straddle-mounted, carried on 3 roller, 2 tapered, 1 straight bearing. 4-pinion differential, supported on tapered roller bearings. Semi-floating rear axle, with steel forged axle shafts.

**CLUTCH**—Heavy-duty, dry disc. Diameter 11 in. Total facing area, two sides, 118.5 sq in. Foot operated.

**FRONT AXLE**—Swept-back, adjustable with three forged steel overlapping sections. Center section pivoted within heavy cast support. Tubular pivot pin, diameter, in., 1.75.

**STEERING**—Manual. Recirculating ball nut type, with 18-in. diameter steering wheel. Steering gear ratio, 15.43:1. Steering wheel turns, stop to stop, 2.6.

**BRAKES**—Mechanical. Internal expanding shoe, self-energized. Brakes can be operated either individually or latched together and operated simultaneously. Diameter, in., 14. Total lining area, 98.46 sq in. Cast iron drum.

**HYDRAULIC SYSTEM and Category I 3-point hitch**—“Live” hydraulics with position and draft control. Double-acting draft control reacts to both compression and tension in the top link for maximum traction with light or heavy equipment in all soils. Flow control valve lets operator adjust speed of draft control reaction, matching equipment weight and soil conditions, 3-point hitch, hydraulic lifting force, 1,700 lbs at point 24 inches rear of lower link balls. Also available: 3-way selector valve which can be installed in the tractor hydraulic system, to permit operation of single-acting remote cylinder by means of the 3-point hitch lift control lever. 1-spool or 2-spool remote control valves available to control single-acting or double-acting remote hydraulic cylinders. These open-center valves provide feathering action from closed position to fully open; may be set for “float”; and automatically return to neutral when cylinders reach fully raised or lowered position. Engine-driven, piston-type pump, capacity 4.8 gpm @ 2,000 engine rpm @ 2,500 psi.

**STANDARD EQUIPMENT**—Tachometer hour-meter. Fuel gauge. Swinging drawbar. Fenders. Tool box. Oil pressure warning light. Generator warning light. Water temperature gauge. Vertical exhaust. Deluxe seat. Lights, including two headlights, taillight, instrument panel lights. Flashing safety light. 5.50—16, 4-ply, F2 front tires. 12.4—28-in., 4-ply, R1 rear tires.

**OPTIONAL EQUIPMENT (Factory Installed)**

**Power-assist steering**—Cylinder on drag link, both sides, separate from control valve. Engine-mounted, gear-driven 4.3 gpm gear pump.

**Differential lock**—When engaged, power is directed evenly to both wheels, allowing wheel on firm ground to find traction in difficult spots, and move tractor. Disengages automatically.

**Power adjusted rear wheels**—52-80 in. without reversing rims on wheel discs.

**Horizontal exhaust.**

**Diesel cold start**—standard with 10-speed transmission.

### OPTIONAL TIRE EQUIPMENT

**Front**—6.00—16, 4-ply, F2.

**Rear**—16.9—24, 6-ply, R3.

14.9—24, 4-ply, R1.

13.6—28, 4-ply, R1.

### ACCESSORIES (Dealer Installed)

Auxiliary services control valve. Linkage drawbar. Air pre-cleaner and long stack. PTO guard. Linkage stabilizers. Remote control valve. 1 or 2-spool. Double-acting remote hydraulic cylinders. Quick-release hydraulic coupling (D.A.). Implement work light and switch. Conversion kit—Category I to Category II 3-point hitch. Implement warning light. Front wheel weights. Rear wheel weights. PTO belt pulley. Canvas cab. Diesel cold start aids. Slow moving vehicle emblem. Over/Under Auxiliary Transmission providing 12 forward, 3 reverse speeds with 4-speed transmission. Front bumper and weight. Tractor radio. Grease gun, holster. Spark plug tire pump. Hydraulic selector valve.

## YOUR FORD TRACTOR AND EQUIPMENT DEALER

FORD TRACTOR

