670 P

4WD Motor Grader

JOHN DEERE

MAKE GRADE AND MOVE AHEAD IN A BIG WAY

For almost six decades, John Deere motor graders have been building a reputation for outstanding control and effortless grading precision. Thanks to the best ideas of customers like you, we've achieved a legacy of industry firsts. Productivity boosters enabled with the electrohydraulic (EH) option like exclusive automation features, cross slope, return to straight, and lever steering. Plus your choice between dual-joystick or fingertip controls. With a tall mainframe that smoothly shoulders large loads and clears obstacles, the 670 P-Tier's exceptional balance, optimized performance specs, and reliable capability can help you take grading performance to the next level and your operation in a reimagined new direction.

FEATURES

Power that checks and balances
Balanced engine horsepower, torque, and blade pull produce generous power and lugging ability, to deliver more power to the ground, easily pull through tough spots, or tackle steep hills. John Deere motor graders are designed with optimal weight distribution over each axle, for outstanding balance and grading performance.

Freedom of choice
Our P-Tier Graders let you choose how work gets done. EH option provides fatigue-minimizing, armrest-mounted controls. Opt for state-of-the-art dual-joystick or fingertip controls that mimic the conventional control pattern. The best of both worlds is available with a field kit that allows you to easily swap between the two. Our P-Tier models also offer conventional lever-operated controls. And based on customer feedback, all models still have a steering wheel.

Count on cross slope
Standard on machines optioned with EH controls, cross slope maintains slopes by automatically adjusting one side of the blade while the operator controls the other. Cross slope can also be operated in "manual mode" as a slope meter. Automated cross slope simplifies holding a consistent slope by reducing operation to a single lever. Both dual-joystick and fingertip controls come equipped with cross slope.

Working in tandem
Operators will appreciate the outstanding visibility to the tandems on models optioned with EH controls while working around obstacles such as water mains and hubs. Crab steering positions the tandems on firm ground, reduces side drift, and increases side-slope stability.

Uptime is everything
All daily service points including fuel refill are grouped on the left side of the machine for convenient ground-level access. On the right, periodic-service points including the engine oil, hydraulic, transmission, differential, and fuel filter bank are within easy reach. Cooling package minus stacked coolers plus hinged swing-out fan simplifies core cleanout. Standard variable-speed hydraulically driven fan runs only as fast or as often as needed, to conserve power and fuel while reducing noise.

Premium productivity
Featuring a fully sealed bearing and pinion that run smoother and quieter, the industry-leading design of the optional premium circle reduces operating costs while delivering 40-percent more torque and 15-percent more speed than a traditional circle. The premium circle eliminates having to compensate for wear in the circle and improves accuracy when using a grade-control system. And greasing intervals of only four zerks every 500 hours make the premium circle essentially maintenance free. Durable dual-input and proven single-input circles are also available.

Picture yourself here
All-around visibility is virtually unobstructed, with a clear view to the heel and toe as well as behind the moldboard. You can also see the area beneath the front axle, for increased awareness of oncoming obstacles. LCD hi-vis monitor provides intuitive, push-button access to vital machine data displayed via simple, easy-to-navigate icons and menus. High-resolution rearview camera with dedicated in-cab monitor comes standard.

Connected machines
John Deere construction equipment comes with in-base connectivity — free from subscriptions or annual renewals. Analyze critical machine data, track utilization, review diagnostic alerts, and more from **the John Deere Operations Center™.** The Operations Center also enables John Deere Connected Support™, which uses data from thousands of connected machines to proactively address issues before they arise. With your approval, your dealer can also remotely monitor machine health, diagnose problems, and even update machine software without a trip to the jobsite.*

*Availability varies by region and product. Options not available in every country.

INTUITIVE AUTOMATION SUITE
STREAMLINES MACHINE CONTROL

PUT INTELLIGENCE TO WORK

With **Automation Suite** including industry-exclusive Auto-Pass, Blade Flip, and Auto-Shift PLUS, it's push-button easy to set yourself apart from your competition. Our automation advantages are available from the factory when the motor grader is equipped with electrohydraulic (EH) controls, or they can be added to the machine in the future:

- Available with any control configuration, **Auto-Shift PLUS** allows operators to work without using the inching pedal.
- **Auto-Articulation** lets the operator increase the maneuverability of coordinated steering and articulation while using only the joystick-steering function to steer and operate other necessary functions without manually articulating the machine.
- **Machine-Damage Avoidance** eliminates the risk of blade damage to machine structures during any operation.
- **Auto-Pass** makes grading easy by automatically placing the blade on the ground and activating the grade-control system (when equipped) at the start of the pass, then automatically raising and resetting the blade at the end of it.
- Use **Blade Flip** to automatically mirror the circle to a preset angle.
- Easily prepare the machine for transport with **Machine Presets.** Stow the blade and ripper, turn on the lights including the hazards, and enable Auto-Shift with one push-button press.

670 P-TIER MOTOR GRADER SPECIFICATIONS

While general information, pictures, and descriptions are provided, some illustrations and text may include product options and accessories NOT AVAILABLE in all regions, and in some countries products and accessories may require modifications or additions to ensure compliance with the local regulations of those countries.

Engine	**670 P-TIER**		
Manufacturer and Model	John Deere PowerTech™ PSS 9.0L	John Deere PowerTech™ Plus 9.0L	John Deere PowerTech™ 9.0L
Non-Road Emission Standard	EPA Final Tier 4 (FT4)/EU Stage V	EPA Tier 3/EU Stage IIIA	EPA Tier 2/EU Stage II
Cylinders	6	6	6
Displacement	9.0 L (548 cu. in.)	9.0L (548 cu. in.)	9.0L (548 cu. in.)
Net Engine Power			
Gear 1	134 kW (180 hp)	134 kW (180 hp)	134 kW (180 hp)
Gear 2	142 kW (190 hp)	142 kW (190 hp)	142 kW (190 hp)
Gear 3	153 kW (205 hp)	149 kW (200 hp)	149 kW (200 hp)
Gear 4	157 kW (210 hp)	153 kW (205 hp)	153 kW (205 hp)
Gear 5	164 kW (220 hp)	157 kW (210 hp)	157 kW (210 hp)
Gear 6	168 kW (225 hp)	164 kW (220 hp)	164 kW (220 hp)
Gear 7	172 kW (230 hp)	168 kW (225 hp)	168 kW (225 hp)
Gear 8	175 kW (235 hp)	172 kW (230 hp)	172 kW (230 hp)
Net Peak Torque	1225 Nm (904 lb.-ft.)	1196 Nm (882 lb.-ft.)	1196 Nm (882 lb.-ft.)
Net Torque Rise	56%	56%	56%
Aspiration	Series turbocharged, charge-air cooled	Turbocharged, charge-air cooled	Turbocharged, charge-air cooled
Lubrication	Full-flow spin-on filter and integral cooler	Full-flow spin-on filter and integral cooler	Full-flow spin-on filter and integral cooler
Air Cleaner With Restriction Indicator	Dual element, dry	Dual element, dry	Dual element, dry
Cooling			
Engine Coolant, Extended Life, Rating	–37 deg. C (–34 deg. F)		
Powertrain			
Transmission	Direct-drive John Deere PowerShift Plus™, modulated shift-on-the-go, Event-Based Shifting (EBS), inching pedal; independent transmission reservoir with separate filtration and cooling system with 117-L/min. (31 gpm) gear pump		
Gears			
Forward	8		
Reverse	8		
Maximum Travel Speeds	*No tire slip at 2,180 rpm, 14.0-R24 tires*	**Maximum Travel Speeds *(continued)***	*No tire slip at 2,180 rpm, 14.0-R24 tires*
Gear 1	4.0 km/h (2.5 mph)	Gear 5	16.4 km/h (10.2 mph)
Gear 2	5.6 km/h (3.5 mph)	Gear 6	23.2 km/h (14.4 mph)
Gear 3	7.7 km/h (4.8 mph)	Gear 7	32.3 km/h (20.1 mph)
Gear 4	10.9 km/h (6.8 mph)	Gear 8	45.5 km/h (28.3 mph)
Front Axle	Heavy-duty welded fabrication		
Oscillation (total)	32 deg.		
Wheel Lean Angle (each direction)	20 deg.		
Differentials	Spiral bevel; hydraulically actuated, clutch type can be applied on-the-go; selectable manual or automatic differential lock		
Steering (all models include steering wheel)	All-hydraulic power-frame articulation for maneuverability and productivity; crab steering reduces side drift, positions tandems on firm ground, and increases side-slope stability; return-to-straight control included in Grade Pro option		
Turning Radius (front steer and articulation)	7.21 m (284 in.) (23 ft. 8 in.)		
Articulation (both right and left)	22 deg.		
Final Drives	Inboard-mounted planetary sealed in cooled, filtered oil		
Brakes	Foot-controlled, hydraulically operated, multiple wet-disc brakes sealed in pressurized, cooled, filtered oil; both independent systems effective on all 4 tandem wheels		
Primary and Secondary Brakes	Hydraulically actuated, inboard of tandem pivot, self-adjusting, sealed in cooled and filtered oil, multi-disc (ISO 3450)		
Parking Brake	Automatically spring applied, hydraulically released, oil cooled, self-adjusting (ISO 3450)		
Hydraulics			
Type	Closed-center, pressure-compensated load-sensing (PCLS), variable-displacement piston pump		
Maximum Pump Flow	212 L/min. (56 gpm)		
Maximum System Pressure	18 961 kPa (2,750 psi)		
Pump Displacement	90 cm^3 (5.5 cu. in.)		

670 P-TIER MOTOR GRADER SPECIFICATIONS

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Blade Function	**670 P-TIER**	
All-hydraulic, industry-standard lever placement of blade-function controls; includes float position; 7 discrete saddle positions		
Blade Range		
Lift Above Ground	490 mm (19.3 in.)	
Blade Side Shift (right or left)	683 mm (26.9 in.)	
Pitch at Ground Line		
Forward	42 deg.	
Back	5 deg.	
Shoulder Reach Outside Wheels (frame straight, right or left)	2083 mm (82.0 in.) (6 ft. 10 in.)	
Bank Cut Angle (right or left)	90 deg.	
Blade Pull		
At Maximum Operating Weight	15 501 kg (34,173 lb.)	
Electrical		
Solid-state load center and sealed-switch module	*EPA FT4/EU Stage V*	*EPA Tier 3/EU Stage IIIA and EPA Tier 2/EU Stage II*
Voltage	24 volt	24 volt
Number of Batteries	2	2
Battery Capacity	1,400 CCA	1,010 CCA
Reserve Capacity	440 min.	190 min.
Amp-Hour Rating	224 amp-hour	110 amp-hour
Alternator Rating		
Base	130 amp	100 amp
Optional	200 amp	130 amp
Lights	LED driving lights; 2 high- and 2 low-beam LED headlights; front and rear LED turn signals and marker lights; LED brake and hazard warning lights	
Mainframe		
Type	Welded box construction	
Width (minimum)	307 mm (12.1 in.)	
Height (minimum)	307 mm (12.1 in.)	
Thickness		
Side	16 mm (0.63 in.)	
Top and Bottom Plate	23 mm (0.89 in.)	
Modulus		
Minimum Vertical Section	1445 cm^3 (88 cu. in.)	
Average Vertical Section at Saddle	2245 cm^3 (137 cu. in.)	
Draft Frame (drawbar)		
Welded box construction machined for flatness with double ball-and-socket pivot connection		
Circle		
Welded construction, heat-treated, machined for flatness		
	Standard Circle	*Premium Circle*
Circle Diameter	1524 mm (60 in.)	1524 mm (60 in.)
Rotation	360 deg.	360 deg.
Surface	Quick-change bronze or nylon wear inserts	Sealed and lubricated roller element slewing bearing
Pinion/Ring-Gear Connection	Adjustable backlash and open for serviceability	No adjustment; fully sealed and lubricated
Drive	Hydraulic motor and worm gear with positive lock	Hydraulic motor and worm gear with positive lock
Slip Clutch	Option	Standard
Circle Side Shift (right and left)	787 mm (31 in.)	787 mm (31 in.)
Moldboard		
High-strength, pre-stressed for higher strength; wear-resistant, high-carbon steel and reversible end bits; blade side-shift wear system includes quick-change replaceable wear inserts and quick-adjust jackscrew system		
Base Length	3.66 m (144 in.) (12 ft. 0 in.)	
Height (measured along arc, including cutting edge)	610 mm (24 in.)	
Thickness	22 mm (0.88 in.)	

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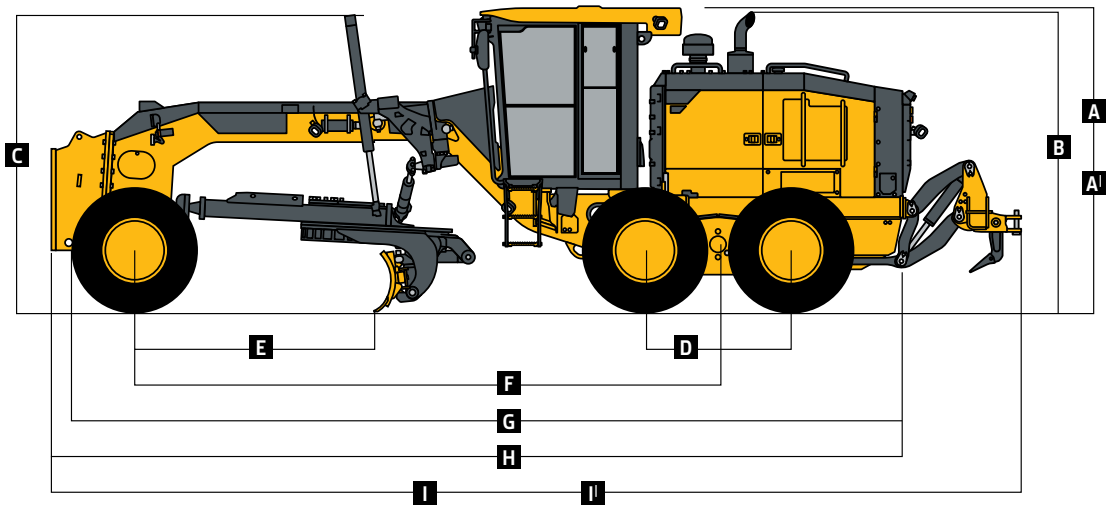
Cutting Edge	**670 P-TIER**	
Dura-Max™ through-hardened steel edge		
Thickness	16 mm (0.62 in.)	
Width	152 mm (6 in.)	
Scarifiers		
	Front	*Mid-mount*
Type	V-type toolbar with 2 pitch positions and hydraulic float	Radial linkage, with NeverGrease™ pin joints; V-type manual 3-pitch positions and hydraulic float
Width of Cut	1.20 m (48 in.) (4 ft. 0 in.)	1.19 m (46.7 in.) (3 ft. 11 in.)
Number of Shanks/Teeth	5 (maximum capacity 9)	11
Lift Above Ground	589 mm (23.2 in.)	335 mm (13.2 in.)
Maximum Depth	335 mm (13.2 in.)	325 mm (12.8 in.)
Shank		
Spacing	146 mm (5.75 in.)	117 mm (4.6 in.)
Size	25 x 76 mm (1 x 3 in.)	25 x 76 mm (1 x 3 in.)
Front Lift Group (Balderson-style)		
Parallel linkage, mechanical pins, and hydraulic float		
Lift		
Above Ground (top of tube)	1864 mm (73.4 in.)	
Range	988 mm (38.9 in.)	
Rear Ripper/Scarifier		
Parallel linkage, with NeverGrease pin joints, hydraulic float, and integrated hitch		
	Ripper	*Scarifier*
Width of Cut	2.21 m (87.2 in.) (7 ft. 3 in.)	2.18 m (86 in.) (7 ft. 2 in.)
Number of Shanks/Teeth	3 (maximum capacity 5)	None standard (maximum capacity 9)
Lift Above Ground	602 mm (23.7 in.)	810 mm (31.9 in.)
Maximum Depth	426 mm (16.8 in.)	323 mm (12.7 in.)
Force		
Penetration	9526 kg (21,000 lb.)	—
Pry-Out	12 580 kg (27,734 lb.)	—
Shank Size	61.5 x 133 mm (2.42 x 5.25 in.)	25 x 76 mm (1 x 3 in.)
Operator Station		
Low-profile cab with ROPS (ISO 3471-2008) and FOPS (ISO 3449-2005)		
Tires/Wheels		
	14R24 on 254-mm (10 in.) Rim	*17.5R25 on 356-mm (14 in.) Rim*
Wheel Tread on Ground	2.08 m (82.0 in.)	2.16 m (85.0 in.)
Overall Width	2.49 m (98.0 in.)	2.64 m (104.0 in.)
Ground Clearance (front axle)	587 mm (23.1 in.)	587 mm (23.1 in.)
Serviceability		
Refill Capacities	*EPA Final Tier 4 (FT4)/EU Stage V*	*EPA Tier 3/EU Stage IIIA and EPA Tier 2/EU Stage II*
Fuel Tank	416.5 L (110 gal.)	416.5 L (110 gal.)
Diesel Exhaust Fluid (DEF) Tank	22.5 L (6 gal.)	—
Cooling System	55.0 L (14.5 gal.)	48.5 L (12.8 gal.)
Engine Oil With Filter	28.4 L (7.5 gal.)	28.0 L (7.4 gal.)
Transmission Fluid	28.4 L (7.5 gal.)	28.4 L (7.5 gal.)
Differential Housing	38.0 L (10 gal.)	38.0 L (10 gal.)
Tandem Housings (each)	74.0 L (19.5 gal.)	74.0 L (19.5 gal.)
Circle Gearbox	5.7 L (1.5 gal.)	5.7 L (1.5 gal.)
Hydraulic Reservoir	60.5 L (16 gal.)	53.0 L (14 gal.)
Operating Weights		
With Full Fuel Tank, 3.66-m x 610-mm x 22-mm (12 ft. x 24 in. x 0.88 in.) Moldboard With 152-mm x 16-mm (6 in. x ⅝ in.) Cutting Edges, 14-24 Bias L2 Tires, and 79-kg (175 lb.) Operator	*EPA FT4/EU Stage V*	*EPA Tier 3/EU Stage IIIA and EPA Tier 2/EU Stage II*
Front	4193 kg (9,245 lb.)	4203 kg (9,265 lb.)
Rear	11 807 kg (26,030 lb.)	11 327 kg (24,972 lb.)
Total	16 000 kg (35,275 lb.)	15 530 kg (34,237 lb.)
Typical Operating Weight With Front Push Block, Rear Ripper/Scarifier, and Other Equipment		
Front	5522 kg (12,175 lb.)	5488 kg (12,100 lb.)
Rear	13 708 kg (30,220 lb.)	13 063 kg (28,800 lb.)
Total	19 230 kg (42,395 lb.)	18 552 kg (40,900 lb.)
Maximum Operating Weight	24 948 kg (55,000 lb.)	24 948 kg (55,000 lb.)

Option Weights	670 P-TIER
Moldboards With Through-Hardened Dura-Max Cutting Edge	
3.66 m x 610 mm x 22 mm (12 ft. x 24 in. x ⅞ in.) With 152-mm x 16-mm (6 in. x ⅝ in.) Cutting Edge and 16-mm (⅝ in.) Hardware	0 kg (0 lb.)
3.66 m x 610 mm x 22 mm (12 ft. x 24 in. x ⅞ in.) With 203-mm x 19-mm (8 in. x ¾ in.) Cutting Edge and 16-mm (⅝ in.) Hardware	45 kg (99 lb.)
3.96 m x 686 mm x 25 mm (13 ft. x 27 in. x 1 in.) With 203-mm x 19-mm (8 in. x ¾ in.) Cutting Edge and 16-mm (⅝ in.) Hardware	180 kg (396 lb.)
4.27 m x 610 mm x 22 mm (14 ft. x 24 in. x ⅞ in.) With 152-mm x 16-mm (6 in. x ⅝ in.) Cutting Edge and 16-mm (⅝ in.) Hardware	105 kg (231 lb.)
4.27 m x 610 mm x 22 mm (14 ft. x 24 in. x ⅞ in.) With 203-mm x 19-mm (8 in. x ¾ in.) Cutting Edge and 16-mm (⅝ in.) Hardware	157.4 kg (347 lb.)
4.27 m x 686 mm x 25 mm (14 ft. x 27 in. x 1 in.) With 203-mm x 19-mm (8 in. x ¾ in.) Cutting Edge and 16-mm (⅝ in.) Hardware	251 kg (554 lb.)
4.27 m x 686 mm x 25 mm (14 ft. x 27 in. x 1 in.) With 203-mm x 19-mm (8 in. x ¾ in.) Cutting Edge and 19-mm (¾ in.) Hardware	261 kg (575 lb.)
Extensions, 610 mm (2 ft.) (right or left)	
For Use With 610-mm (24 in.) Moldboards	116 kg (255 lb.)
For Use With 686-mm (27 in.) Moldboards	120 kg (265 lb.)
Overlay End Bits, Reversible (one pair)	
For 152-mm (6 in.) Cutting Edge	19.5 kg (43 lb.)
For 203-mm (8 in.) Cutting Edge	23 kg (51 lb.)
Heavy-Duty Dual-Input Circle-Drive Gearbox	14 kg (31 lb.)
Circle-Drive Slip Clutch	9 kg (20 lb.)
Circle	
Standard	0 kg (0 lb.)
Premium	289 kg (638 lb.)
Moldboard Impact-Absorption System	43 kg (95 lb.)
Ripper/Scarifier, Rear Mounted With Hitch and Ripper Shanks (3)	1139 kg (2,510 lb.)
Scarifier Shanks With Teeth (9 for rear ripper/scarifier)	68 kg (150 lb.)
Ripper Shanks and Teeth (2)	63 kg (139 lb.)
Rear Counterweight With Integral Rear Hitch	727 kg (1,603 lb.)
Rear Hitch	54.4 kg (120 lb.)
Push Block, Front	1338 kg (2,950 lb.)
Machine Dimensions	
A Height to Top of Cab	3.18 m (10 ft. 5 in.)
A[I] Height to Top of Full-Height Cab	3.40 m (11 ft. 2 in.)
B Height to Top of Exhaust	3.10 m (10 ft. 2 in.)
C Height to Top of Blade-Lift Cylinders	3.05 m (10 ft. 0 in.)
D Tandem Axle Spacing	1.54 m (5 ft. 1 in.)
E Blade Base	2.57 m (8 ft. 5 in.)

Option Weights *(continued)*	670 P-TIER
Scarifier	
Front Mounted With Teeth (5)	831 kg (1,833 lb.)
Mid-Mount With Teeth (11)	1481 kg (3,265 lb.)
Front Lift Group (Balderson-style)	763 kg (1,682 lb.)
Tires	
14.00-24, 12 PR G2	0 kg (0 lb.)
17.5-25, 12 PR G2/L2	114 kg (252 lb.)
14.00-R24, Radial, G2/L2 General Purpose	220 kg (486 lb.)
14.00-R24, Radial, G2/L2 Snow	261 kg (576 lb.)
17.5-R25, Radial, L2 General Purpose	272 kg (600 lb.)
17.5-R25, Radial, G2/L2 Snow	316 kg (696 lb.)
17.5-R25, Radial, G3/L3 General Purpose	362 kg (798 lb.)
1-Piece Rims	
229 mm x 610 mm (9 in. x 24 in.)	0 kg (0 lb.)
330 mm x 635 mm (13 in. x 25 in.)	65 kg (144 lb.)
Multi-Piece Rims	
254 mm x 610 mm (10 in. x 24 in.)	180 kg (396 lb.)
356 mm x 635 mm (14 in. x 25 in.)	267 kg (588 lb.)
Fenders	
Front	99 kg (218 lb.)
Rear	141 kg (310 lb.)
Low Cab With Opening Front and Side Windows	14.5 kg (32 lb.)
Tall Cab	
With Fixed Front and Side Windows	58.5 kg (129 lb.)
With Opening Front and Side Windows	73 kg (161 lb.)
Premium Air-Suspension, Heated Seat With Adjustable Arm- and Headrests	13 kg (28 lb.)
Coolant Heater	4 kg (9 lb.)
Quick Service	11 kg (24 lb.)
Sound-Absorption Package (machines equipped with Tier 3/Stage IIIA and Tier 2/Stage II engines only)	14 kg (31 lb.)
Secondary Steering	26 kg (58 lb.)
Beacon Bracket	8 kg (18 lb.)
Fire Extinguisher	14.5 kg (32 lb.)
Lighting Packages	
10 Halogen Lights	4.5 kg (10 lb.)
18 Halogen Lights	8 kg (18 lb.)
18 LED Lights	7 kg (16 lb.)
Auxiliary Hydraulic Control Valve Section and Controls	7 kg (15 lb.)
Hydraulics for Front-Mounted Equipment	9 kg (19 lb.)
Machine Dimensions *(continued)*	
F Wheelbase	6.16 m (20 ft. 3 in.)
G Overall Length	8.89 m (29 ft. 2 in.)
H Overall Length With Scarifier	9.69 m (31 ft. 9 in.)
I Overall Length With Push Block and Ripper	9.99 m (32 ft. 9 in.)
I[I] Overall Length With Scarifier and Ripper	10.59 m (34 ft. 9 in.)
For Overall Width see Tires/Wheels on page 8.	



Additional equipment

Key: ● Standard ▲ Optional or special — See your John Deere dealer for further information.

670 P-TIER	Operator's Station
●	Low-profile ROPS/FOPS cab with HVAC (ROPS ISO 3471 / FOPS SAE 3449 Level II)
▲	Low-profile ROPS/FOPS cab utilizing laminated glass with fixed lower front and side opening windows
▲	Opening side windows (standard with Grade Pro)
●	Keyless start with multiple security modes
●	Fabric air-suspension seat with armrests and headrest
▲	Premium heated, leather/fabric, high-wide-back, air-suspension seat with armrests (standard with Grade Pro)
●	Sealed-switch module with function indicators
●	Electric rear-window defroster
●	Upper front windshield washers with intermittent wipers
●	Upper rear windshield washers with intermittent wipers
▲	Powered cab precleaner
▲	Decelerator pedal
▲	Flip-down right-hand cab beacon bracket
●	Front window sun visor
▲	Retractable rear sunshade
●	Rearview mirrors, exterior (2) (SAE J985)
▲	Heated exterior mirrors (2) (SAE J985)

670 P-TIER	Operator's Station *(continued)*
▲	Fire extinguisher
▲	High-resolution rear camera with dedicated in-cab monitor (in some markets)
▲	High-resolution front/rear-camera combination with dedicated in-cab monitor
●	Retractable seat belt, 76 mm (3 in.) (SAE 386)
▲	AM/FM radio with auxiliary and Weather Band (WB)
●	Push-button-activated cruise control
	Electrical
●	100-amp alternator (Tier 3/Stage IIIA and Tier 2/Stage II)
●	130-amp alternator (FT4/Stage V [optional for Tier 3/Stage IIIA and Tier 2/Stage II])
▲	200-amp alternator (FT4/Stage V)
●	Batteries (2), 1,010 CCA with 190-min. reserve capacity (Tier 3/Stage IIIA and Tier 2/Stage II)
●	Batteries (2), 1,400 CCA with 440-min. reserve capacity (FT4/Stage V [optional for Tier 3/Stage IIIA and Tier 2/Stage II])
●	Left-hand engine compartment service-check light
●	Transporting lights (4 halogen)
●	Grading lights (10 halogen)
▲	Deluxe grading lights (18 halogen)

670 P-TIER	Electrical *(continued)*
▲	Premium grading lights (18 LED)
●	Multifunction/multi-language diagnostic LCD color monitor
●	Reverse warning alarm (SAE J994)
●	LED brake and turn lights
	Moldboard
	Patented pre-stressed, high strength, wear resistant:
●	3.66 m x 610 mm x 22 mm (12 ft. x 24 in. x ⅞ in.)
▲	3.96 m x 686 mm x 25 mm (13 ft. x 27 in. x 1 in.)
▲	4.27 m x 610 mm x 22 mm (14 ft. x 24 in. x ⅞ in.)
▲	4.27 m x 686 mm x 25 mm (14 ft. x 27 in. x 1 in.)
●	Quick-change and jackscrew-adjustable moldboard side-shift extreme-duty wear inserts
▲	610-mm (24 in.) left- or right-hand extensions for 610-mm (24 in.) moldboard
▲	610-mm (24 in.) left- or right-hand extensions for 686-mm (27 in.) moldboard
▲	Reversible overlay endbits
	Overall Vehicle
●	JDLink™ wireless communication system (available in specific countries; see your dealer for details)

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Net engine power is with standard equipment including air cleaner, exhaust system, alternator, and cooling fan at test conditions specified per ISO 9249. No derating is required up to 3050-m (10,000 ft.) altitude. Specifications and design subject to change without notice. Wherever applicable, specifications are in accordance with SAE standards. Except where otherwise noted, these specifications are based on a unit with standard equipment; 14.0 x 610-mm (24 in.) 12 PR G2, Bias tires; and 3.66-m x 610-mm x 22-mm (12 ft. x 24 in. x ⅞ in.) high-strength, wear-resistant moldboard with 16-mm x 152-mm (0.63 in. x 6 in.) Dura-Max® through-hardened-steel cutting edges. Weights include lubricants, coolants, full fuel tank, and 79-kg (175 lb.) operator.

Additional equipment *(continued)*

Key: ● Standard ▲ Optional or special

See your John Deere dealer for further information.

670 P-TIER	Overall Vehicle *(continued)*
●	Diesel exhaust fluid (DEF) (FT4/Stage V only) and ground-level fuel filling
●	Fluid-sampling ports for engine oil and coolant, hydraulic oil, and axle and transmission fluids
●	Vandal-protection locking for: Cab doors / Top tank radiator-access door / Engine coolant surge tank / Hydraulic reservoir cap / Battery-disconnect switch / Ground-level electrical master disconnect switch / Fuel-tank door and cap / Toolbox
●	Environmental drains with hoses for engine, transmission, hydraulic, differential fluids, and engine coolant
●	Hydraulically driven cool-on-demand reversing fan
●	Banked easy-access vertical spin-on filters for hydraulic, transmission, and axle fluids
●	Engine rotary ejector precleaner
●	Automatic differential lock
●	Engine-stall prevention and auto shutdown
▲	Adjustable rotary engine precleaner (FT4/Stage V)
●	Heavy-duty air cleaner (FT4/Stage V)
●	Single-input circle drive with slip clutch
▲	Single-input circle drive

670 P-TIER	Overall Vehicle *(continued)*
▲	Heavy-duty dual-input circle drive with slip clutch
▲	Premium circle
▲	Auto-Shift transmission
▲	Auto-Shift PLUS transmission
▲	Blade-impact-absorption system
▲	Front and/or rear wheel fenders
▲	Quick-service bank for transmission, hydraulic, engine oil, and engine coolant fluid changes
▲	Sound-absorption package (Tier 3/ Stage IIIA and Tier 2/Stage II)
▲	Wheel chocks
	Automation (optional with Grade Pro)
▲	Automation Suite
▲	Auto-Articulation
▲	Auto-Pass
▲	Blade Flip
▲	Machine Presets
▲	Machine-Damage Avoidance
	Front Attachments
●	Front push block
▲	V-type front scarifier with float position, 5 shanks
▲	Mid-mount scarifier with float position, 11 shanks
▲	Front Balderson-style lift group with float position

670 P-TIER	Front Attachments *(continued)*
▲	Front-mounted dozer blade, 2464 mm (97 in.)
▲	Front-mounted dozer blade, 2667 mm (105 in.)
	Rear Attachments
●	Full bottom guard with access panel and side guards for rear vehicle protection
▲	Rear-mounted ripper/scarifier combination with rear hitch and pin, 3 ripper shanks
▲	Rear counterweight with rear hitch and pin
▲	Scarifier shanks (9) with teeth for rear ripper scarifier
▲	Extra ripper shanks (2) with teeth for rear ripper/scarifier
	Grade Pro Option
●	Low-profile Grade Pro cab utilizing laminated glass with fixed lower front and side opening windows
●	Premium heated, leather/fabric, high-wide-back, air-suspension seat with armrests
▲	Dual-joystick controls
▲	Fingertip armrest-mounted controls including lever steering
●	Steering wheel
●	Cross slope
●	Return to straight

Net engine power is with standard equipment including air cleaner, exhaust system, alternator, and cooling fan at test conditions specified per ISO 9249. No derating is required up to 3050-m (10,000 ft.) altitude. Specifications and design subject to change without notice. Wherever applicable, specifications are in accordance with SAE standards. Except where otherwise noted, these specifications are based on a unit with standard equipment; 14.0 x 610-mm (24 in.) 12 PR G2, Bias tires; and 3.66-m x 610-mm x 22-mm (12 ft. x 24 in. x ⅞ in.) high-strength, wear-resistant moldboard with 16-mm x 152-mm (0.63 in. x 6 in.) Dura-Max® through-hardened-steel cutting edges. Weights include lubricants, coolants, full fuel tank, and 79-kg (175 lb.) operator.

MG670PAB (25-02)

JOHN DEERE