# **ENGINE**

John Deere engineered and manufactured 6-cylinder diesel engine features replaceable wet-type cylinder liners that ensure superior heat dissipation and long engine life. A 20 percent increase in low-speed torque means more lugging power and quicker engine response under changing loads. Improved fuel efficiency combined with increased torque lets you do more work with less fuel.

Engine: John Deere 6076T
Rated power at 2200 rpm155 SAE net hp (116 kW)
162 SAE gross hp (121 kW)
Turbochargedstandard
Number of cylinders6
Displacement
Fuel consumption, typical (depending on duty cycle)4.0 to 6.0 gal./hr. (15 to 23 L/h)
Net torque at 1100 rpm
(42% torque rise)
Lubricationpressure system w/full flow filter and cooler
Aspirated air cleaner with restriction
indicatordual element, dry
Electrical system24 volt with 45-amp (1260 W) alternator
Batteriestwo 12-volt with 180-minute reserve capacity

# TRANSMISSION

Direct drive, planetary power shift transmission with modulated shift on-the-go speed selections in all eight forward and four reverse gears. There are five working speeds below 9 mph (15 km/h). Standard equipment also includes an inching pedal and tow disconnect.

### **TRAVEL SPEEDS**

(At 2200 engine rpm with 14.00-24 tires and no tire slip)

	rorward R		Kei	erse
Shift Lever Position	mph	(km/h)	mph	(km/h)
1	2.3	3.7	3.0	4.8
2	3.3	5.3	4.3	6.9
3	5.2	8.4	6.7	10.8
4	6.7	10.8	8.6	13.8
5	8.9	14.3		
6	11.5	18.5		
7	14.7	23.7		
8	25.2	40.6		

### FINAL DRIVE

Inboard-mounted planetary final drives are sealed in cool, filtered oil. The operator-controlled differential lock/unlock system allows the differential to easily be locked for maximum traction and unlocked for maneuverability in tight turns. Two-inch (51 mm) pitch tandem drive chains are sized for long life.

### RRAKES

Foot-operated hydraulic wet-disk power brakes are sealed in cool, filtered oil. They're self-adjusting and maintenance free. Standard equipment also includes a hand-operated, mechanical dry-disk parking brake. Both independent braking systems are effective on all four tandem wheels.

# FRONT AXLE

Heavy-duty, welded box construction.	
Front axle oscillation (total)32	degrees
Wheel lean (each direction)20	degrees

# **STEERING**

A John Deere innovation – all-hydraulic power frame articulation provides maximum maneuverability and productivity. Crab steering reduces side drift, positions the tandems on firm ground, and increases sideslope stability.

Frame articulation (both	right a	nd left)	25 degrees
Minimum turning radius			22 ft. (6.7 m)

# **HYDRAULICS**

The closed-center hydraulic system uses a pressure-controlled variable-displacement single hydraulic pump. Integral hydraulic control valve lockouts eliminate cylinder drift. O-ring face seal and fittings eliminate hydraulic leaks.

Hydraulic pump	6.0 cu	. in. (98 cm <sup>3</sup> )
Rated flow at 2200 engine rpm5	2.4 gpm	(198 L/min.)

TIRES AND RIMS					
Tire	Wheel	Tread	Overal	Width	Ground Clearance
Size	Front	Rear	Front	Rear	(Front Axle)
13.00-24 9 in. rim (229 mm)	76.60 in. (1.94 m)	79.60 in. (2.02 m)	7 ft. 10 in. (2.39 m)	7 ft. 10 in. (2.39 m)	22 in. (559 mm)
14.00-24 10 in. rim (254 mm)	76.60 in. (1.94 m)	79.60 in. (2.02 m)	8 ft. (2.44 m)	8 ft. (2.44 m)	22.5 in. (572 mm)
17.5-25 14 in. rim (356 mm)	79.40 in. (2.02 m)	82.40 in. (2.09 m)	8 ft. 6 in. (2.59 m)	8 ft. 6 in. (2.59 m)	23.2 in. (589 mm)

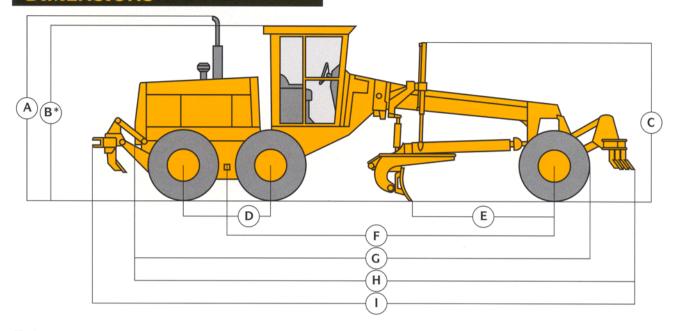
### CAPACITIES

	U.S.
Fuel tank	90 gal. (340 L)
Cooling system	10 gal. (38 L)
Engine lubrication, including filter	26 qt. (24.6 L)
Transmission and hydraulic system (refill)	23 gal. (87 L)
Tandem housings (each)	5 gal. (18.9 L)
Circle gearbox	4 qt. (3.8 L)

# **OPERATING WEIGHTS**

<b>SAE</b> With standard equipment	On Front Wheels 8 700 lb	Wheels	<b>Total</b> 31,250 lb.
		(10 229 kg)	
With standard equipment and scarifier		22,340 lb. (10 130 kg)	
With standard equipment, scarifier and ripper	(4476 kg)	(11 603 kg)	35,450 lb. (16 080 kg)
Typically equipped operating	a weights ra	ange un to	

Typically equipped operating weights range up to 38,470 lb. (17 450 kg).



Key:	
A Height to top of exhaust	10 ft. 10 in. (3.30 m)
B Height to top of cab	10 ft. 1.5 in. (3.09 m)
C Height to top of blade lift cylinders	9 ft. 8 in. (2.95 m)
D Tandem axle spacing	5 ft. 0.7 in. (1.54 m)
E Bladebase	
F Wheelbase	
G Overall length	27 ft. 11 in. (8.51 m)
H Overall length with scarifier	30 ft. 3 in. (9.22 m)
I Overall length with scarifier and ripper	32 ft. 7 in. (9.93 m)
*Add 8.3 in. (210 mm) for full-height cab	
Add 1.0 in. (25.5 mm) for cab with air conditioning	

Add 0 in. (0 mm) for low profile canopy with ROPS

# **FUNCTION**

All-hydraulic, industry-preferred hand-lever placement of blade function controls (standard equipment). Blade lift controls include a float position. Conversion from two-hand to one-hand control is easily accomplished. Seven blade lift arm positions provide excellent blade positioning capabilities.

# **BLADE RANGE**

Lift above ground	18.5 in. (470 mm)
Blade side shift, right or left	26.9 in. (683 mm)
Shoulder reach outside wheels (fran	ne straight):
Right	83.0 in. (2.11 m)
Left	85.0 in. (2.16 m)
Pitch at ground line	49 deg. forward
	5 deg. back

Welded box construction.		
Width, minimum	12.07 in. (306.5 mm	ı)
Height, minimum	10.63 in. (270 mm	ı)
Thickness, sides	0.63 in. (16 mm	ı)
top and bottom	1.00 in. (25 mm	ı)
Weight per ft., minimum	118 lb./ft. (175.5 kg/m	ı)
Minimum vertical section modulus	117 in.3 (1917 cm <sup>3</sup>	5)
Average vertical section modulus at s	saddle149 in. <sup>3</sup> (2448 cm <sup>3</sup>	۱

Welded box construction machined for flatness with double ball and socket pivot connection.

Welded construction, heat-treated	for strength and machined for
flatness.	
Circle diameter	60 in. (1.5 m)
Rotation	
Driveh	
	with positive position lock
Sideshift, right	28.5 in. (724 mm)
left	31.0 in. (787 mm)

High-strength, wear-resistant, high-carbon steel.
Length
Height24 in. (610 mm)
Thickness

# **CUTTING EDGE**

Dura-Max® through-hardened	steel edge.	
Thickness and width	0.62 x 6.0 ir	n. (16 x 152 mm)

V-type manual three-pitch position with hydrony	raulic float.
Width of cut	4 ft. (1.22 m)
Number of teeth5	
Lift above ground	21.8 in. (554 mm)
Maximum penetration	13.3 in. (338 mm)
Shank size1	x 3 in. (25 x 76 mm)

Parallelogram linkage with manual v	
Width of cut	8 ft. (2.44 m)
Number of shanks	3 standard, 5 optional
Lift above ground	15.5 in. (394 mm)
Maximum penetration	14 in. (356 mm)
Shank size	2 x 5 in. (51 x 127 mm)

Parallelogram linkage with manual val	ve control and hydraulic float.
Ripper:	,
Width of cut	
Number of shanks	3 standard. 5 optional
Lift above ground	
Maximum penetration	14 in. (356 mm)
Shank size	2 x 5 in. (51 x 127 mm)
Scarifier:	,
Width of cut	6 ft. 10 in. (2.08 m)
Number of teeth	
Lift above ground	
Maximum penetration	
Shank size1	.25 x 4.0 in. (32 x 102 mm)
	(32 // 102 // // //

### **DDITIONAL STANDARD**

### **Engine/Power Train:** Air precleaner

Antifreeze Battery disconnect Fan guard Fuel filter and water separator Radiator trash screen Transmission tow disconnect 14.00-24, 10 PR, G2 tires

**Electrical System:** 

45 amp (1260 watt) alternator Batteries with 180 min. (625 CCA) reserve capacity Horn

Lights Driving (2)

Flashing and turn signals (4) Stop and tail (2) Reverse warning alarm

**Hydraulics:** Controls

Blade lift with float Blade pitch Blade sideshift Circle rotate Circle sideshift Frame articulate Wheel lean Hydraulic differential lock Hydraulic oil cooler Hydraulic pump, 6.0 cu. in. (98 cm3), 52.4 gpm (198 Lpm) Power brakes Power steering

Operator's Station: Adjustable front console Cushioned vinyl seat

Front windshield wiper Instrument lights Interior light Low profile cab with ROPS

Mirrors

Interior rearview Outside rearview (2)

Seat belt

Switch-operated differential lock control

Tilt steering Tinted glass

**Instruments and Indicators:** Dual level monitor system Alternator voltage warning light Brake pressure warning light with audible alarm Engine air cleaner restriction warning light

Engine coolant temperature warning light with audible alarm Engine oil pressure warning light with audible alarm Hydraulic oil filter restriction warn-

ing light Park brake engaged (in gear) warning light with audible alarm Saddle locking pin disengaged warning light

Transmission oil filter restriction warning light

Transmission oil pressure warning light

Transmission oil temperature warning light with audible alarm Indicator lights

Differential lock engaged Turn signal and hazard warning Gauges

Articulation indicator Fuel Hourmeter

### Moldboard:

12 ft. x 24 in. (3.66 m x 610 mm) moldboard with .62 x 6 in. (16 x 152 mm) through hardened Dura-Max cutting edge

# OPTIONAL OR SPECIAL EQUIPMENT

Ib

(Add these weights to SAE standard equipment operating weight to obtain total operating weight.)

	lb.	kg		lb.	kg
Engine/Power Train:			13 ft. x 24 in. (3.96 m x 610 mm) moldboard with .62 x		
Cold weather ether starting aid	3	1	6 in. (16 x 152 mm) through hardened Dura-Max cut-		
Coolant heater	2	1	ting edge	60	27
Operator's Station:			13 ft. x 24 in. (3.66 m x 610 mm) moldboard with .75 x		
Air conditioner with R134a refrigerant, pressurizer, and			8 in. (19 x 203 mm) through hardened Dura-Max cut-		
heavy-duty alternator	177	80	ting edge	196	89
Cab, full height with ROPS	82	37	14 ft. x 24 in. (4.27 m x 610 mm) moldboard with .62 x		
Canopy, low profile with ROPS	-226	-103	6 in. (16 x 152 mm) through hardened Dura-Max cut-		
Control conversion (moves LH blade control to RH side)	2	1	ting edge	119	54
Defroster fan	4	2	14 ft. x 24 in. (4.27 m x 610 mm) moldboard with .75 x		
Defroster fans (dual)	8	4	8 in. (19 x 203 mm) through hardened Dura-Max cut-		
Floormat	9	4	ting edge	265	120
Heater – 20,000 Btu/hr (5.9 kW)	16	7	Extensions, 2 ft. (610 mm) right or left (less cutting edge)	220	100
Heater – 40,000 Btu/hr (11.7 kW)	31	14	Overlay end bits (1 pair)		
Heater – 25,000 Btu/hr (7.3 kW), roof mounted for use			6 in. (152 mm)	62	28
with air conditioner	17	8	8 in. (203 mm)	77	35
Seat belt, 3 in. (76 mm)	3	1	Attachments:		
Seat, deluxe suspension vinyl with armrests	90	41	Bottom guard, general purpose	170	77
Seat, deluxe suspension cloth with armrests	90	41	Bottom guard, heavy duty with rear hitch	610	277
Windows, openable lower front	7	3	Dozer blade, front mounted – 106 x 31.6 in. (2.69 m x		
Windshield washers, front and rear	15	7	803 mm)	1490	676
Wipers/washers, lower front windows	7	3	4.3 in. (109 mm) dig below ground		
Wiper, rear window	5	2	29.9 in. (759 mm) lift above ground		
Electrical System:			Engine side shields	60	27
Alternator, 50 amp (1400 watt)	17	8	Front weight	550	250
Batteries, heavy-duty with 320 min. (1100 CCA) reserve			Pushblock, front	1750	793
capacity	101	46	Rear hitch	61	28
Beacon wiring and switch	2	1	Ripper, rear mounted with hitch and 3 shanks	2470	1120
Blade lights (2 mounted under cab)	4	2	Ripper/scarifier, rear mounted with hitch, 3 ripper shanks		
Work lights (2 front, 2 rear)	12	5	and 9 scarifier teeth	3284	1489
24 volt to 12 volt 5-amp converter	3	1	Scarifier, front mounted with 5 teeth	1730	785
24 volt to 12 volt 20-amp battery balancer	3	1	Toolbox	11	5
Hydraulics:			Tires:		
Auxiliary function valve for front-mounted equipment	3	1	13.00-24, 12 PR, G2 tires on 9 in. rims	24	11
Auxiliary function valve for rear-mounted equipment	50	23	14.00-24, 12 PR, G2 tires on 9 in. rims	108	49
Hydraulics for front-mounted equipment	19	9	14.00-24, 12 PR, G2 tires on 10 in. 3-piece rims	475	215
Moldboards:			14.00-24 radial tires on 10 in. 3-piece rims	697	316
12 ft. x 24 in. (3.66 m x 610 mm) moldboard with .75 x			17.5-25, 12 PR, L2 tires on 14 in. 3-piece rims	947	429
8 in. (19 x 203 mm) through hardened Dura-Max cut-			Other tire sizes available		
ting edge	126	57			