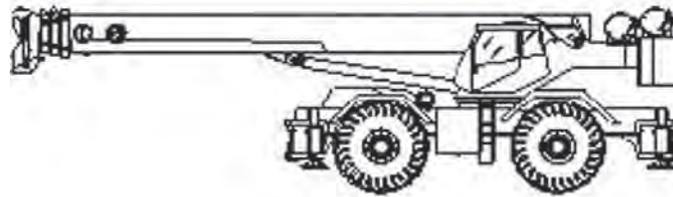




Rough Terrain Crane Specifications | RT1000



STANDARD BOOM EQUIPMENT

BOOM

40-126' (12.19-38.40 m) four section full power boom. Two mode boom extension allows the operator to select the best boom extension configuration for the task at hand. The boom is a high-strength four plate design, welded inside and out with anti-friction slide pads. Boom side plates are made with stamped impressions to reduce weight and increase strength. Dual boom hoist cylinders provides for boom elevation of -1 to +82°. Maximum tip height 134' (40.84 m).

BOOM HEAD

Welded to fourth section of boom. Six nylon load sheaves and two idler sheaves mounted on heavy duty, anti-friction bearings. Quick reeving boom head. Provisions made for side-stow jib mounting.

OPTIONAL BOOM EQUIPMENT

JIBS

38-60' (11.58-18.29 m) side stow swing-on lattice type jib. Single nylon sheave mounted on anti-friction bearing. Jib is extendible to 60' (18.29 m) by means of a 22' (6.71 m) manual pull-out tip section, roller supported for ease of extension. Jib is offsettable at 2°, 17°, or 30°. Maximum tip height is 193' (58.83 m).

HOOK BLOCK

Six metallic sheaves on anti-friction bearings with hook and hook latch. Quick reeving design does not require removal of wedge and socket from rope.

AUXILIARY BOOM HEAD

Removable auxiliary boom head has single nylon sheave mounted on anti-friction bearing. Removable pin-type rope guard for quick reeving. Installs on main boom peak only. Removal is not required for jib use.

HOOK AND BALL

9.2 ton (8.3 mt) top swivel ball with hook and hook latch.



ROUGH TERRAIN CRANE

RT1000

STANDARD UPPERSTRUCTURE EQUIPMENT

UPPERSTRUCTURE FRAME

All welded one-piece structure fabricated with high tensile strength alloy steel. Counterweight is bolted to frame.

TURNTABLE CONNECTION

Swing bearing is a single row, ball type, with internal teeth. The swing bearing is bolted to the revolving upperstructure and welded to the carrier frame.

SWING

A hydraulic motor drives a double planetary reduction gear for precise and smooth swing function. Swing speed (no load) is 1.5 rpm.

SWING BRAKE

Heavy duty multiple disc swing parking brake is spring applied, hydraulically released, and controlled from operator's cab via a dash mounted switch. A hydraulically operated momentary brake is foot controlled. A 360° house lock is standard.

RATED CAPACITY INDICATOR

Rated Capacity Indicator with visual and audible warning system and automatic function disconnects. Second generation pictographic display includes: boom radius, boom angle, boom length, allowable load, actual load, and percentage of allowable load registered by bar graph. Operator settable alarms provided for swing angle, boom length, boom angle, tip height, and work area exclusion zone. Anti-two block system includes audio/visual warning and automatic function disconnects.

OPERATORS CAB

Environmental cab with all steel construction, optimum visibility, tinted safety glass throughout, and rubber floor matting is mounted on vibration absorbing pads. The cab has a sliding door on the left side. Framed sliding window on the right side, hinged tinted all glass skylight and removable front windshield to provide optimum visibility of the load open or closed. Acoustical foam padding insulates against sound and weather. The deluxe six-way adjustable seat is equipped with a mechanical suspension and includes head and arm rests.

STANDARD CARRIER EQUIPMENT

CARRIER CHASSIS

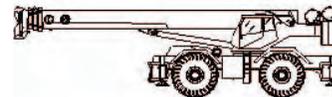
Chassis is Terex designed with four-wheel drive and four-wheel steer (4x4x4). Has box-type construction with reinforcing cross members, a precision machined turn table mounting plate and integrally welded outrigger boxes. Decking has anti-skid surfaces, including between the rear frame rails tool storage compartment, and access steps and handles are provided on the left and right sides and on the front and rear.

AXLES AND SUSPENSION

Rear axle is a planetary drive/steer type with 12.0" (0.30m) of total oscillation. Automatic oscillation lockouts that engage when the superstructure is swung 10° in either direction. An oscillation lock out override is provided. Front axle is a planetary drive/steer type, rigid mounted to the frame for increased stability.

STEERING

Hydraulic four-wheel full power steering for two-wheel, four-wheel coordinated or four-wheel crab steer is easily controlled by steering wheel. Independent rear wheel steering is controlled by a dash mounted switch. A rear axle centering light is provided.



CONTROLS

Armrest mounted dual axis controls for winch(s), swing, and boom elevation. Winch rotation indication incorporated into control handles. Steering wheel tilts and telescopes, armrest swings up to improve access and egress. Vernier adjustable hand throttle included. Steering column mounted turn signal and shift controls. Switches include ignition, lights, horn (in the steering wheel hub and on the swing control handle), windshield wiper and washer, roof window wiper, defroster, steering mode, parking brake, outriggers. 360° house lock is operated via a cable. Winch speed shift switches are mounted on the dash. Foot control pedals include swing brake, boom telescope, service brake, and accelerator.

INSTRUMENTATION AND ACCESSORIES

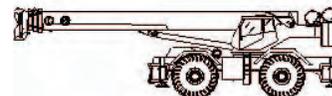
In-cab gauges include speedometer, tachometer, dual air pressure, bubble level, engine oil pressure, fuel, engine temperature, voltmeter, transmission temperature, and hydraulic oil temperature. Indicators include low air, high water temperature, low oil pressure, high transmission temperature, and low coolant level audio/visual warning, hoist drum rotation indicator(s), and Rated Capacity Indicator. Accessories include fire extinguisher; light package including headlights, taillight, brake lights, directional signals, four-way hazard flashers, dome light, and back-up lights with audible back-up alarm; windshield washer/wiper; skylight wiper; R.H. and L.H. rear view mirrors; dash lights; and seat belt. Circuit breakers/fuses protect electrical circuits.

HYDRAULIC CONTROL VALVES

Valves are mounted on the side of the upperstructure and are easily accessible. Valves have hydraulic pilot operators and include one two spool valve for boom elevation and telescope. One two spool valve for main and auxiliary winch, and one single spool valve for swing. Quick disconnects are provided for ease of installation of pressure check.

OPTIONAL EQUIPMENT

Auxiliary Winch • Single axis armrest mounted controllers • LP Heater/Defroster • Hydraulically powered Air Conditioner with or without hydraulic heater • Diesel Heater/Defroster • Work Lights • Rotating Beacon



Clearance	Turning Radius: (to CL of outside tire)	Curb Radius
Two-wheel:	41' 3" (12.6m)	43' 0" (13.1m)
Four-wheel:	22' 10" (7.0 m)	24' 10" (7.6 m)

TRANSMISSION

Range shift type power-shift transmission with integral torque converter provides eight speeds forward and six speeds reverse with neutral safety start. Four wheel drive is manually selected with low range and two wheel drive with high range. Automatic pulsating back-up alarm.





ROUGH TERRAIN CRANE

RT1000

STANDARD CARRIER EQUIPMENT (CONTINUED)

MULTI-POSITION OUT AND DOWN OUTRIGGERS

Fully independent hydraulic outriggers may be utilized fully extended to 25' 2" (7.67 m) centerline to centerline, in their 1/2 extended position, or fully retracted for maximum flexibility. Easily removable Almag floats, each with an area of 254 in² (1639 cm²), stow on the outrigger boxes at their point of use. Complete controls and a sight leveling bubble are located in the operator's cab.

WHEELS AND TIRES

Disc type wheels with full tapered bead seat rim. 155" (3.9 m) wheel base.

TIRES

Wide earthmover (E3) style tread tires provide life and flotation.
32.25 x 29 - 32 P.R.-std.
29.5 x 29 34 P.R.-opt.

SERVICE BRAKES

Split system full air 20.25" (513 mm) x 4" (101 mm) wedge type drum brakes on all wheels.

PARKING BRAKE

Front and rear axle equipped, with spring-set, air released parking brakes.

OPTIONAL EQUIPMENT

Immersion Heater, Pintle Hook, Clearance Lights, Front Mounted Winch

HYDRAULIC SYSTEM

HYDRAULIC PUMPS

Four gear type pumps, consisting of two tandem pumps, driven off the transmission. Combined system capability is 147 gpm (557 lpm). Includes pump disconnect on winch and boom pump.

- Main winch pump**
- ▶ 42.2 gpm (159.7 lpm) @ 3,200 psi (225.0 kg/cm²)
- Boom Hoist and Telescope Pump**
- ▶ 47.3 gpm (179.0 lpm) @ 3,200 psi (225.0 kg/cm²)
- Swing Pump**
- ▶ 25.3 gpm (95.8 lpm) @ 2,000 psi (140.6 kg/cm²)
- Power Steering, Outrigger and Winch Boost Pump**
- ▶ 32.3 gpm (122.3 lpm) @ 2,500 psi (175.8 kg/cm²)

FILTRATION

Full flow oil filtration system with two externally mounted 10 micron replaceable return line filters and one 20 micron pressure line filter.

HYDRAULIC RESERVOIR

All steel, welded construction with diffuser. Provides easy access to filters and is equipped with a dipstick and filtered air breather. Capacity is 303 gal (1147 liters). Hydraulic oil cooler is standard.

MAIN WINCH SPECIFICATIONS

Hydraulic winch with bent axis piston motor and planetary reduction gearing provides two-speed operation with equal speeds for power up and down. Winch is equipped with an integral automatic brake grooved drum, tapered flanges, standard cable roller on drum, and an electronic drum rotation indicator.

Performance	LO-Range	HI-Range
▶ Max line speed (no load)		
▶ First layer	185 fpm (56.4m/min)	387 fpm (118.0 m/Min.)
▶ Fifth layer	252 fpm (76 m/min)	526 fpm (160.3 m/Min.)
▶ Max. line pull-first layer	20,400 lb (9 253 kg)	8,520 lb (3 865 kg)
▶ Max. line pull-fifth layer	15,020 lb (6 813 kg)	6,274 lb (2 846 kg)
▶ Permissible line pull	6,000 lb (7 257 kg)	
Drum Dimensions	Drum Capacity	
▶ 16.00" (406 mm) drum diameter	Max. Storage: 847' (258.2 m)	
▶ 20.75" (527 mm) length	Max. useable: 682' (207.9 m)*	
▶ 25.0" (635 mm) flange dia.		
▶ Cable: 3/4" x 690' (19 mm x 210.3 m)		
▶ Cable type: 3/4" (19mm) 6x37 IWRC, XIPS right regular lay, preformed.		
▶ Min. breaking strength 29.4 tons (26.6 mt)		

*Based on minimum flange height above top layer to comply with ANSI B30.5

OPTIONAL AUXILIARY WINCH

Hydraulic two-speed winch with bent axis piston motor, equal speed power up and down, planetary reduction with integral automatic brake, grooved drum with tapered flanges, drum roller, and rotation indicator.

Performance	
▶ Max. line speed (no load) Fifth layer	526 fpm (160.3 m/min)
▶ Max. line pull First layer	20,400 lb (9 253 kg)
Drum Dimensions and Capacity	(Same as main winch)

OPTIONAL HOIST LINE

Main winch and optional auxiliary winch: 3/4" (19 mm) rotation resistant compacted strand 18x19 wire rope. Min. breaking strength 32.4 tons (29.37 mt).

ENGINE SPECIFICATIONS

Make and Model	Cummins 6CTA8.3L
▶ Type	6 cylinder
▶ Bore and Stroke	4.49 x 5.32" (114x135 mm)
▶ Displacement	504.5 in ³ (8.27 L)
▶ Rated HP	260 hp (194 kw) @ 2200 rpm
▶ Maximum Gross HP	275 hp (205 kw) @ 2000 rpm
▶ Maximum Gross Torque	828 lb•ft(1123 N•m) @ 1300 rpm
▶ Aspiration	turbocharged & charge air cooled
▶ Air Filter	dry type
▶ Electrical System	24 volt
▶ Alternator	70 amp
▶ Battery	(2) 8D 12V-1125 CCA
▶ Fuel Capacity	80 gal (303 L)

PERFORMANCE (STANDARD ENGINE)

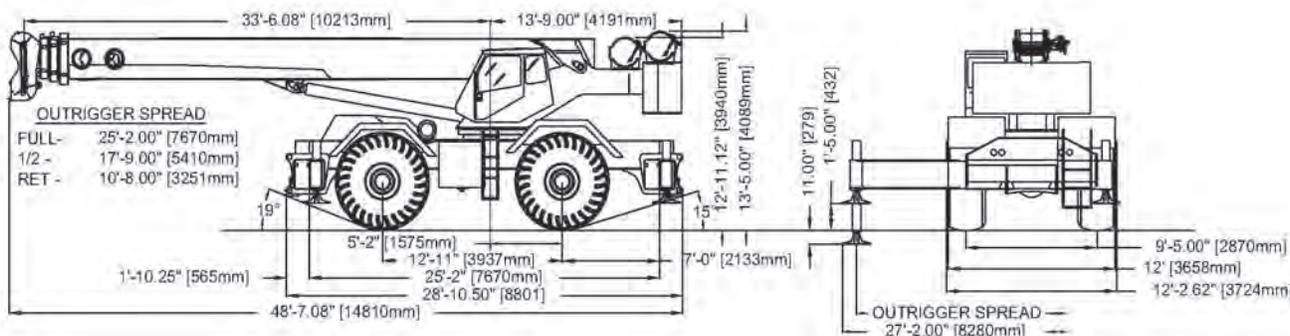
Transmission Gear	Forward Drive	Max. Speed	Max. Tractive Effort	Gradeability @ Stall
▶ 1	4-wheel	1.7 mph (2.7 kph)	72,050 lb (32 681 kg)	70.3%
▶ 2	4-wheel	3.7 mph (6.0 kph)	34,075 lb (15 456 kg)	27.1%
▶ 3	4-wheel	6.4 mph (10.3 kph)	19,641 lb (8 909 kg)	14.3%
▶ 4	4-wheel	10.4 mph (16.7 kph)	12,181 lb (5 525 kg)	8.0%
▶ 5	2-wheel	4.3 mph (6.9 kph)	29,159 lb (13 226 kg)	22.6%
▶ 6	2-wheel	9.2 mph (14.8 kph)	13,780 lb (6 250 kg)	9.4%
▶ 7	2-wheel	15.5 mph (24.9 kph)	7,919 lb (3 592 kg)	4.5%
▶ 8	2-wheel	24.8 mph (39.9 kph)	4,916 lb (2 230 kg)	2.0%

All performance data is based on a gross vehicle weight of 121,000 lb (54 885 kg). 33.25x29 tires, 4x4 drive Performance may vary due to engine performance. Gradeability data is theoretical and is limited by tire slip, machine stability, or oil pan design.



GENERAL DIMENSIONS

1. Dimensions given assume the boom is fully retracted in travel position and 33.25 x 29 tires.
2. Minimum ground clearance under: Hydraulic Reservoir-21.0", Access ladders-17.25"



WEIGHTS & AXLE LOADS	GROSS WEIGHT LB	UPPER FACING FRONT		GROSS WEIGHT KG	UPPER FACING FRONT	
		FRONT	REAR		FRONT	REAR
Base Crane with 25,610 lb (11 616kg) Counterweight	116,588	49,466	67,122	52 883	22 437	30 446
Add Options:						
38'-60" (11.58-18.29 m) Swing-on Jib (Stowed)	+ 2,688	+ 3,870	- 1,182	+ 1 219	+ 1 755	- 536
Auxiliary Boom Head	+ 142	+ 447	- 305	+ 64	+ 202	- 138
Auxiliary Winch with 6x37 Wire Rope	+ 718	- 460	+ 1,178	+ 326	- 208	+ 534
100T (90.7 mt) 7-Sheave Hook Block	+ 2,120	+ 3,556	- 1,436	+ 962	+ 1 613	- 651
100T (90.7 mt) 6-Sheave Hook Block	+ 1,735	+ 2,910	- 1,175	+ 787	+ 1 320	- 533
75T (68.0 mt) 5-Sheave Hook Block	+ 1,608	+ 2,697	- 1,089	+ 729	+ 1 223	- 494
9.2T (10.8 mt) Hook and Ball	+ 722	+ 759	- 37	+ 327	+ 344	- 17
Pintle Hook - Rear	+ 45	- 25	+ 70	+ 20	- 11	+ 31
Substitute:	+ 110	- 60	+ 170	+ 50	- 27	+ 77
690' (210.2 m) of 18x19 lass spin resistant wire rope						
29.5x29-34 PR Tires	- 1,776	- 888	- 888	- 806	- 403	- 403

Note: Weights are for Terex supplied equipment and are subject to 2% variation due to manufacturing tolerances.

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