Net Horsepower: 169 kW (227 hp)
Bucket Capacity: 2.6 m³ to 5.7 m³ (3.4 yd³ to 7.5 yd³)
Operating Weight: 20580 kg (45,370 lb)
ENGINE

* Make and model: Cummins QSC8.3
  Type: In-line, 6-cylinder
  Aspiration: Turbocharged and CAC
  Gross Horsepower SAE J1995: 179 kW (240 hp)
  Net Horsepower SAE J1349/ISO 9249: 169 kW (227 hp)
  Rated rpm: 2200 rpm
  Max. torque @ 1500 rpm: 1085 Nm (800 ft-lb)
  Displacement: 8.3 l (505 in³)
  Number of cylinders: 6
  Air cleaner: Dry type with service indicator
* Meets EU Stage IIIA and EPA Tier 3 emission regulations

TORQUE CONVERTER

Single stage, single phase type, 3.0 to 1 stall ratio.

TRANSMISSION

Countershaft type powershift, 4 speeds forward and 4 reverse. Power shifted gears are 1st to 2nd and 3rd to 4th. Manual shifted gears are 2nd to 3rd and reverse selection with machine stopped.

TRAVEL SPEEDS

<table>
<thead>
<tr>
<th>Gear</th>
<th>Forward &amp; Reverse</th>
</tr>
</thead>
<tbody>
<tr>
<td>1st</td>
<td>8.2 km/h (5.1 mph)</td>
</tr>
<tr>
<td>2nd</td>
<td>16.4 km/h (10.2 mph)</td>
</tr>
<tr>
<td>3rd</td>
<td>27.2 km/h (16.9 mph)</td>
</tr>
<tr>
<td>4th</td>
<td>42.4 km/h (26.3 mph)</td>
</tr>
</tbody>
</table>

AXLES & FINAL DRIVES

Full-floating axle shafts and planetary final drive. Four wheel drive. Front axle fixed, rear axle oscillates a total of 26°. Vertical wheel travel of 480 mm (18.9`). Conventional differentials.

STEERING SYSTEM

Articulated frame. Full hydraulic power (with hydraulic follow-up system) providing smooth, responsive steering at any engine speed. Auxiliary steering – ground driven.

Articulation, right and left: 40°

Turning radius outside of tires: 6.22 m (20.5')

BRAKES

Service - four wheel, air-over-hydraulic, dry disc.

Parking - air release, spring apply, disc type, on front axle with indicator light.

LOADERS LINKAGE

Parallel loader linkage with sealed pivot points; extended lubrication intervals.

TIRES

23.5 x 25 - 20 PR (L-3) standard

HYDRAULIC SYSTEM

Reservoir with sight gauge and 10-micron “spin-on” type filter.

Pumps, gear type driven from torque converter.

Output @ 2200 rpm and 16 MPa (2,320 psi):

- main, hydraulic equipment – 188 l/min (50 gpm)
- steering and hydraulic equipment – 160 l/min (42 gpm)

Valve: Low effort, 2-spool or 3-spool with relief valve.

Relief valve pressure: 16 MPa (2,320 psi).

Cylinders (double acting) - hardened chrome plated piston rods.

Boom - Bore and Stroke (2) = 160 x 860 mm (6.3” x 33.8”)

Bucket - Bore and Stroke (2) = 160 x 470 mm (6.3” x 18.5”)

Steering - Bore and Stroke (2) = 110 x 442 mm (4.3” x 17.4”)

Hydraulic cycle times: raise boom – 6 sec, dump bucket – 2 sec, lower boom – 3.5 sec.

HYDRAULIC CONTROLS

Boom positions: raise, hold, lower, float.

Bucket positions: rollback, hold dump.

REFILL CAPACITIES

<table>
<thead>
<tr>
<th>Component</th>
<th>Volume (Liters)</th>
<th>Volume (US gal)</th>
</tr>
</thead>
<tbody>
<tr>
<td>Fuel tank</td>
<td>300</td>
<td>(79.3)</td>
</tr>
<tr>
<td>Cooling system</td>
<td>32</td>
<td>(8.5)</td>
</tr>
<tr>
<td>Crankcase w/filters</td>
<td>19</td>
<td>(5.0)</td>
</tr>
<tr>
<td>Transmission system</td>
<td>95</td>
<td>(25)</td>
</tr>
<tr>
<td>Differential &amp; final drive</td>
<td>35</td>
<td>(9.2)</td>
</tr>
<tr>
<td>Hydraulic reservoir</td>
<td>230</td>
<td>(60.8)</td>
</tr>
</tbody>
</table>

INSTRUMENTATION

Gauges: brake system air pressure, engine coolant temp., engine lube oil pressure, engine oil temp., torque converter oil temp., fuel level, speedometer, voltmeter, hourmeter, tachometer.

Warning lights: engine coolant overheat, low engine lube oil pressure, low air pressure, low coolant level, ground driven steering, low fuel level, parking brake applied, filter service indicators (hydraulic and steering system, air cleaner)

Visual sight gauges for hydraulic reservoir and transmission.
### WORKING ATTACHMENTS

<table>
<thead>
<tr>
<th>BUCKET SELECTION</th>
<th>General Purpose</th>
<th>General Purpose with Ripper</th>
<th>Rock Bucket</th>
<th>Multipurpose Bucket</th>
<th>Light Material Bucket</th>
<th>Rock Bucket for Tool Carrier</th>
<th>High Dump Bucket</th>
<th>Coal and Agricultural</th>
</tr>
</thead>
<tbody>
<tr>
<td><strong>BUCKET CAPACITY</strong></td>
<td></td>
<td></td>
<td></td>
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<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>SAE Rated, m³ (yd³)</td>
<td>3.4 (4.5)</td>
<td>3.4 (4.5)</td>
<td>2.7 (3.5)</td>
<td>2.6 (3.4)</td>
<td>5.7 (7.5)</td>
<td>2.7 (3.5)</td>
<td>2.8 (3.7)</td>
<td>5.6 (7.3)</td>
</tr>
<tr>
<td>Struck, m³ (yd³)</td>
<td>3.02 (3.95)</td>
<td>3.02 (3.95)</td>
<td>2.45 (3.32)</td>
<td>1.73 (2.3)</td>
<td>4.58 (6.0)</td>
<td>2.03 (2.85)</td>
<td>2.50 (3.57)</td>
<td>4.5 (5.9)</td>
</tr>
<tr>
<td><strong>DUMP CLEARANCE AT MAX. HEIGHT AND 45° DUMP ANGLE</strong></td>
<td></td>
<td></td>
<td></td>
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</tr>
<tr>
<td>2.8 m (9’2”)</td>
<td>2.8 m (9’2”)</td>
<td>2.8 m (9’2”)</td>
<td>3.0 m (9’10”)</td>
<td>3.51 m (11’6”)</td>
<td>2.84 m (9’4”)</td>
<td>2.85 m (9’4”)</td>
<td>3.1 m (10’2”)</td>
<td></td>
</tr>
<tr>
<td><strong>REACH AT MAX. HEIGHT AND 45° DUMP ANGLE</strong></td>
<td></td>
<td></td>
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</tr>
<tr>
<td>3.1 m (10’2”)</td>
<td>3.1 m (10’2”)</td>
<td>3.05 m (10’)</td>
<td>3.0 m (9’10”)</td>
<td>2.92 m (9’7”)</td>
<td>3.05 m (10’0”)</td>
<td>4.18 m (13’9”)</td>
<td>4.18 m (13’9”)</td>
<td></td>
</tr>
<tr>
<td><strong>OVERALL LENGTH, BUCKET AT CARRY POSITION</strong></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>1.07 m (3’6”)</td>
<td>1.07 m (3’6”)</td>
<td>1.12 m (3’8”)</td>
<td>1.85 m (6’1”)</td>
<td>1.25 m (4’1”)</td>
<td>1.11 m (3’8”)</td>
<td>1.36 m (4’6”)</td>
<td>2.0 m (6’7”)</td>
<td></td>
</tr>
<tr>
<td><strong>OVERALL LENGTH, BUCKET ON GROUND</strong></td>
<td></td>
<td></td>
<td></td>
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<td></td>
</tr>
<tr>
<td>8.07 m (26’6”)</td>
<td>8.07 m (26’6”)</td>
<td>8.12 m (26’8”)</td>
<td>8.17 m (26’10”)</td>
<td>8.23 m (27”)</td>
<td>8.08 m (26’5”)</td>
<td>8.28 m (27’2”)</td>
<td>8.48 m (27’10”)</td>
<td></td>
</tr>
<tr>
<td><strong>TURNING RADIUS, OUTSIDE CORNER OF BUCKET AT SAE CARRY</strong></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>6.22 m (20’5”)</td>
<td>6.22 m (20’5”)</td>
<td>6.23 m (20’5”)</td>
<td>7.3 m (23’11”)</td>
<td>6.58 m (21’7”)</td>
<td>6.32 m (20’9”)</td>
<td>6.58 m (21’7”)</td>
<td>6.72 m (22”)</td>
<td></td>
</tr>
<tr>
<td><strong>BREAKOUT FORCE</strong></td>
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<td></td>
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<tr>
<td>140 kN (31,472)</td>
<td>140 kN (31,472)</td>
<td>140 kN (31,472)</td>
<td>86 (19,333)</td>
<td>140 kN (31,472)</td>
<td>140 kN (31,472)</td>
<td>140 kN (31,472)</td>
<td>104 (23,380) –</td>
<td></td>
</tr>
<tr>
<td><strong>STATIC TIPPING LOAD</strong></td>
<td></td>
<td></td>
<td></td>
<td></td>
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<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>– Straight, kg (lb)</td>
<td>17660 (38,933)</td>
<td>17660 (38,933)</td>
<td>17660 (38,933)</td>
<td>15090 (33,627)</td>
<td>14050 (30,975)</td>
<td>14470 (31,901)</td>
<td>14300 (31,526)</td>
<td>13850 (30,534)</td>
</tr>
<tr>
<td>– Full Turn, kg (lb)</td>
<td>15180 (33,466)</td>
<td>15180 (33,466)</td>
<td>15180 (33,466)</td>
<td>12500 (27,558)</td>
<td>11550 (25,463)</td>
<td>11450 (25,243)</td>
<td>12050 (26,565)</td>
<td>11450 (25,243)</td>
</tr>
<tr>
<td><strong>WEIGHT OF BUCKET</strong></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>kg (lb)</td>
<td>1090 (2,403)</td>
<td>1250 (2,756)</td>
<td>1360 (2,988)</td>
<td>1580 (3,483)</td>
<td>1780 (3,924)</td>
<td>1200 (2,646)</td>
<td>2090 (4,608)</td>
<td>2400 (5,291)</td>
</tr>
<tr>
<td><strong>OPERATING WEIGHT</strong></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>kg (lb)</td>
<td>20580 (45,370)</td>
<td>20740 (45,723)</td>
<td>20850 (45,966)</td>
<td>21480 (47,377)</td>
<td>21270 (46,892)</td>
<td>20540 (45,282)</td>
<td>21580 (47,575)</td>
<td>21740 (47,928)</td>
</tr>
</tbody>
</table>

All dimensions, weights and performance values per SAE J732, where applicable.
Specifications shown include all standard equipment and 23.5 x 25, 20 PR (L-3) tires.
Machine stability, weight and performance are affected by optional attachments.

**WORKING ATTACHMENTS**

- **General purpose buckets with teeth, spade nose, straight edge and bolt-on cutting edge**
- **Rock bucket, spade nose**
- **Rock bucket with teeth**
- **Coal and agricultural, ejector bucket**
- **High dump bucket**
- **Light material bucket**
- **Multipurpose bucket**
- **Belt conveyor vicinity clean up bucket**
- **Fork-lift attachment for use with tool carrier**
- **Hydraulic grapple**
  - Lifting capacity - 5500 kg
  - Width - 1.8 m (7’1")
  - Clamp diameter - min/max 0.23 m/1.8 m (9’7/1")
- **Fork-lift attachment**
  - Lifting capacity - 5500 kg (12,125 lb)
  - Width - 2.4 m (9’4")
STANDARD EQUIPMENT

- Air cleaner, dry type with service indicator
- Alarm, back-up
- Alternator, 70 A
- Auxiliary steering – ground driven
- Axles, conventional differentials
- Back-up lights
- Batteries, (2) 12 V, 1150 A
- Beacon light, rotating
- Boom kickout
- Brakes; service - four wheel, air - over - hydraulic, dry disc; parking – disc type, front axle mounted
- Cab standard, w/seat belt, inside mirror, sun visor, wipers w/washers, dome light and heater
- CE accessories: fire extinguisher, first aid kit, grease gun, tools
- Cooling module; includes radiator, transmission and torque converter oil cooler and charge air cooler
- Counterweight, 2650 kg (5,842 lb)
- Engine hood, sloped
- Fan, hydraulically driven, suction type, variable speed
- Fenders, front and rear
- Filters, engine oil and fuel, hydraulics, transmission-torque converter
- Grill, rear, vertically hinged
- Horn, electric
- Hydraulic control, single lever (joystick)
- Instruments:
  - Gauges: brake system air pressure, engine coolant temp., engine lube oil pressure, engine oil temp., torque converter oil temp., fuel level, speedometer, voltmete, hourmeter, tachometer
  - Sight gauges: hydraulic reservoir, transmission oil
  - Warning lights: engine coolant overheat, low engine lube oil pressure, low air pressure, low coolant level, ground driven steering, low fuel level, parking brake applied, filter service indicators (hydraulic and steering system, air cleaner)
- Ladder, left and right side
- Lights, working and traveling, 4 front and 2 rear, 2 stop and tail, turn signals
- Master electrical disconnect
- Mirrors, LH and RH, rear view, outside
- Seat, suspension type, adjustable height, tilting, forward and backward movement
- Starting, 24V
- Steering, hydrostatic, articulated frame
- Tires, tubeless 23.5 x 25, 20 PR (L-3)
- Tire inflation kit
- Torque converter, single stage
- Towing pin
- Transmission, powershift, hydraulic control, 2nd to 3rd gear shifted mechanically
- Valve, 2-spool
- Vandalism protection

OPTIONAL ATTACHMENTS

- Air conditioner and heater/pressurizer/defroster
- Arctic package
- Brake lines guards (for severe service and forestry application)
- Centralized lubricating system
- Hydraulic kit; includes 3-spool valve, piping, controls and auxiliary lever
- Set of filters for 1000-1500-2000h maintenance
- Superstructure w/sound suppression package
- Tool carrier, quick coupler
  Working attachments for use w/tool carrier:
  - bucket, general purpose, spade nose, 3.4 cu.m (4.5 cu.yd)
  - bucket, general purpose, straight edge w/teeth, 3.4 cu.m (4.5 cu.yd)
  - rock bucket, straight edge w/teeth, 2.7 cu.m (3.5 cu.yd)
  - fork-lift attachment, 7000 kg (15,430 lb) lifting capacity
- Working attachments:
  - bucket, general purpose, 3.4 cu.m (4.5 cu.yd) w/teeth and ripper
- bucket, general purpose, 3.4 cu.m (4.5 cu.yd), w/teeth
- bucket, general purpose, 3.4 cu.m (4.5 cu.yd), spade nose
- bucket, general purpose, 3.4 cu.m (4.5 cu.yd), spade nose w/bolt-on cutting edge
- bucket, general purpose, 3.4 cu.m (4.5 cu.yd), straight edge w/bolt-on cutting edge
- coal and agricultural, ejector bucket, 5.6 cu.m (7.3 cu.yd)
- high dump bucket, 2.8 cu.m (3.7 cu.yd), w/teeth
- light material bucket, 5.7 cu.m (7.5 cu.yd)
- multipurpose bucket, 2.6 cu.m (3.4 cu.yd), w/teeth
- rock bucket, 2.7 cu.m (3.5 cu.yd), spade nose
- rock bucket, 2.7 cu.m (3.5 cu.yd), spade nose w/teeth
- rock bucket, 2.7 cu.m (3.5 cu.yd), straight edge w/teeth
- bucket, belt conveyor vicinity clean up
- fork-lift attachment, 5500 kg (12,125 lb) lifting capacity
- hydraulic grapple, 5500 kg (12,125 lb) lifting capacity

Specifications subject to change without notice. Illustrations and pictures may include optional equipment and may not include all standard equipment.