

Product Specifications For 775 (07)



Operating Specifications

Nominal Payload Class (100%)	64.6 t
Top Speed - Loaded	67.6 km/h
Body Capacity - SAE 2:1	42.23 m ³
Maximum Allowable Payload (120%)*	77.5 t
Note (2)	* Refer to the Caterpillar 10/10/20 Payload Policy for maximum gross machine weight limitations.
Maximum Working Payload (110%)	71.1 t
Note (1)	Capacity with Dual Slope body – no liner.
Target Payload (100%)	64.6 t

Engine

Engine Model	Cat® C27
Rated Engine Speed	2000 r/min
Gross Power - SAE J1995:2014	615 kW
Net Power - SAE J1349:2011	584 kW
Net Power - ISO 9249	590 kW
Net Power - 80/1269/EEC	590 kW

Bore	137 mm
Stroke	152 mm
Displacement	27 l
Peak Torque - Speed	1300 r/min
Engine Power - ISO 14396	607 kW
Net Torque	3896 N·m
Note (3)	No engine derating required up to 3810 m (12,500 ft) for Tier 2 Equivalent.
Note (1)	Power rating applies at 2,000 rpm when tested under the specified condition for the specified standard.
Note (2)	Ratings based on SAE J1995 standard air conditions of 25° C (77° F) and 100 kPa (29.61 Hg) barometer. Power based on fuel having API gravity of 35 at 16° C (60° F) and an LHV of 42 780 kJ/kg (18,390 BTU/lb) when engine used at 30° C (86° F).

Capacity - Dual Slope - 100% Fill Factor

Struck	32.6 m ³
Heaped (SAE 2:1)*	42.2 m ³
Note (2)	*ISO 6483:1980
Note (1)	Contact your local Cat dealer for body recommendation.

Capacity - Flat Floor - 100% Fill Factor

Struck	32.3 m ³
Heaped (SAE 2:1)*	42.2 m ³

Note (1)

Contact your local Cat dealer for body recommendation.

Note (2)

*ISO 6483:1980

Weight Distributions - Approximate

Front Axle - Empty	52 %
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Front Axle - Loaded	34 %
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Rear Axle - Empty	48 %
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Rear Axle - Loaded	66 %
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Transmission

Forward - 1	10.8 km/h
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Forward - 2	15.1 km/h
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Forward - 3	20.4 km/h
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Forward - 4	27.4 km/h
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Forward - 5	37 km/h
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Forward - 6	50.1 km/h
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Forward - 7	67.6 km/h
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Reverse	14.1 km/h
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Note

Maximum travel speeds with standard 24.00R35 (E4) tires.

Final Drives

Differential Ratio	3.64:1
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Planetary Ratio	4.80:1
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Total Reduction Ratio

17.49:1

Brakes

Brake Surface - Front

655 cm²

Brake Surface - Rear

61269 cm²

Brake Standards

ISO 3450:2011

Service Refill Capacities

Fuel Tank

795 l

Cooling System

154 l

Differential - Final Drives

140 l

Steering Tank

36 l

Steering System - Including Tank

54 l

Torque Converter - Transmission System - HRC

70 l

Torque Converter - Transmission System - LRC

61 l

Crankcase

90 l

Brake/Hoist Hydraulic Tank

176 l

Brake Hoist System

322 l

Body Hoists

Pump Flow - High Idle

448 l/min

Relief Valve Setting - Raise

17250 kPa

Relief Valve Setting - Lower

3450 kPa

Body Raise Time - High Idle	9.5 s
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Body Lower Time - Float	13 s
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Body Power Down - High Idle	13 s
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Weights - Approximate

Maximum Gross Vehicle Weight	111812 kg
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Suspension

Empty Loaded Cylinder Stroke Front	234 mm
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Empty Loaded Cylinder Stroke Rear	149 mm
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Rear Axle - Oscillation	8.1°
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Tires

Note (1)	Productive capabilities of the 775G truck are such that, under certain job conditions, TKPH (TMPH) capabilities of standard or optional tires could be exceeded and, therefore, limit production.
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Note (2)	Caterpillar recommends the customer evaluate all job conditions and consult the tire manufacturer for proper tire selection.
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Standard Tire	24.00R35 (E4)
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ROPS

FOPS Standards	Falling Objects Protective Structure (FOPS) meets ISO 3449:2005 Level II FOPS criteria.
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ROPS Standards	Rollover Protective Structure (ROPS) for cab offered by Caterpillar meets ISO 3471:2008 ROPS criteria.
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Sound

Sound Standards (1) The operator Equivalent Sound Pressure Level (Leq) is 76 dB(A) when SAE J1166 FEB2008 is used to measure the value for an enclosed cab. This is a work cycle sound exposure level. The cab was properly installed and maintained. The test was conducted with the cab doors and the cab windows closed.

Sound Standards (2) The exterior sound pressure level for the standard machine measured at a distance of 15 m (49 ft) according to the test procedures specified in SAE J88:2008, mid-gear moving operation is 86 dB(A).

Sound Standards (3) Hearing protection may be needed when operating with an open operator station and cab (when not properly maintained or doors/windows open) for extended periods or in a noisy environment.

Steering

Turning Diameter - Front 22 m

Steering Standards ISO 5010:2007

Steer Angle 31 °

Turning Circle - Clearance Diameter 25 m

775 (07) Standard Equipment

NOTE

Standard and optional equipment may vary. Consult your Cat dealer for details.

POWER TRAIN

Cat C27 US EPA Tier 2/EU Stage II Equivalent diesel engine:

- Air cleaner with precleaner (2)
- Air-To-Air Aftercooler (ATAAC)
- Electric start
- Engine idle shutdown
- Ether starting aid
- Exhaust muffler
- NGMR radiator

For non-regulated regions only:

- Direct drive fan
- MEUI-A fuel system

Braking system:

- Extended Life Brakes
- Automatic Retarder Control (ARC)
- Manual retarder (utilizes rear oil-cooled, multiple disc brakes)
- Brake release motor (towing)
- Dry disc brakes (front)
- Front brake disconnect switch (front)
- Oil-cooled multiple disc brakes (rear)
- Brake wear indicator (rear)
- Parking brake
- Secondary brake
- Service brake

Transmission:

- 7-speed automatic powershift with:
Electronic Clutch Pressure Control (ECPC)
Advanced Productivity Electronic Control Strategy (APECS)
- Automatic neutral idle
- Autostall
- Second gear start

SUSPENSION SYSTEMS

Suspension, front and rear (EU compliant)

ELECTRICAL

Alarm backup

Alternator, 120 Amp

Autolube power supply ready

Batteries, maintenance-free, 12V (2), 1,400 CCA combined

Electrical system, 25 Amp, 24V to 12V converter

Lighting system:

- Backup light (halogen)
- Directional signals/hazard warning (front and rear LED)
- Engine compartment light
- Headlights, (halogen) with dimmer
- Operator access courtesy lights
- Side profile lights
- Stop/tail lights (LED)

Service center containing:

- Battery jump start
- Breakers with spare fuses
- Lockout switch
- Ports, ET, and VIMS
- Service lockout switch (power without engine start)

TECHNOLOGY PRODUCTS

Economy Modes, standard and adaptive

Product Link, cellular or satellite
Traction Control System (TCS)
Truck Production Management System
Vital Information Management System (VIMS)

OPERATOR ENVIRONMENT

Advisor display:

- Air cleaner service indicator
- Fluid level monitoring
- Fuel level monitoring
- Display languages (market based)

Air conditioning/heat

Automatic temperature control

Ashtray and cigarette lighter

Coat hook

Cup holders (4)

Diagnostic connection port, 24V

Entertainment radio ready:

- 5 amp converter
- Speakers
- Antenna
- Wiring harness

Foot rest

Gauges/indicators:

- Brake oil temperature gauge
- Coolant temperature gauge
- Engine overspeed indicator
- Fuel level
- Hour meter
- Speedometer with odometer
- Tachometer
- Transmission gear indicator

Hoist lever

Horn

Light - courtesy

Light - dome

Mirrors, non-heated

Power port, 24V and 12V (2)

Rollover Protection (ROPS)/Falling Object Protection (FOPS)

Seat, Cat Comfort Series III:

- Full air suspension
- Retractable 3-point seat belt with shoulder harness

Seat, training with lap belt

Steering wheel, padded, tilt and telescopic

Storage compartment

Sun visor

Throttle lock

Window, hinged, right side (emergency exit)

Window, powered, left side
Windshield wiper intermittent and washer

GUARDS

Driveline
Engine crankcase
Fan

FLUIDS

Antifreeze
Extended life coolant to -34° C (-30° F)
Grouped ground-level filters

OTHER STANDARD EQUIPMENT

Body down indicator
Body safety pin (secures body in up position)
Center-mounted rims
Fuel tank, 795 L (210 gal)
Ground level battery disconnect
Ground level engine shutdown
Ground level grease fittings
Operator Maintenance Manual (OMM)
Rims 17 × 35
Rock ejectors
Secondary steering (electric)
Tie down eyes
Tow hooks (front)/tow pin (rear)
Vandalism protection locks

775 (07) Optional Equipment

NOTE

Standard and optional equipment may vary. Consult your Cat dealer for details.

OPTIONAL EQUIPMENT

Body heat
Body liner
Body sideboards
Cab precleaner
Cat Engine Brake
Clustered grease fittings
Cold weather packages
Fluid fill service center
HID lights
Mirrors, convex

Mirrors, heated

Spare rim

Visibility package (meets ISO 5006 requirements)

Wheel chocks

Work Area Vision System (WAVS)