

# 330D2 L

Hydraulic Excavator  
2017



## Engine

Engine Model	Cat® C7.1 ACERT™	
Engine Power (ISO 14396)	159 kW	213 hp
Net Power (SAE J1349/ISO 9249)	156 kW	209 hp

## Weights

Minimum Operating Weight	28 930 kg	63,780 lb
Maximum Operating Weight	29 420 kg	64,850 lb



*The Cat 330D2 L, combined with a new highly efficient hydraulic system, delivers excellent performance with lower fuel consumption and is designed and built for a variety of applications; from quarry to industrial material handling to construction, and more. It is powerful, reliable, and durable with great productivity and versatility, making it an ideal machine whatever your job.*

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**The 330D2 L comes with a number of new developments and features, including engine speed control, a new fuel filtration system, and a built-in economy mode to help decrease fuel consumption up to 15% (as compared to 329D L Tier 2/Stage II equivalent). A variable-speed fan with viscous clutch reduces noise and saves energy.**



# Key Features

A world-class design combining excellent performance with low fuel consumption and superior reliability.



## Performance/Efficiency

- Up to a 15% reduction in fuel consumption
- Fuel efficiency improved by pump and engine speed control
- Meets U.S. EPA Tier 3 and EU Stage IIIA equivalent emission standards
- Less maintenance, faster starts with electric fuel priming pump speeds up starts and fuel system maintenance and protect fuel pump from risk of air cavitation
- Long undercarriage to maximize stability and lift capacity
- Variable-speed fan to reduce noise and save energy

## **Ease of Operation**

- Ergonomically designed cab with easy-to-operate controls
- Multiple seat and joystick adjustment options to enhance comfort
- Excellent work site visibility from the cab to enhance productivity
- Optimized low-effort joystick controls to reduce operator fatigue
- New monitor with 40% larger viewing screen, 4× higher resolution and 42 language options

## **Reliability/Serviceability**

- Robust fuel system to improve reliability and less sensitivity to low-quality fuel
- Strong, durable carbody designed to work in the toughest operating conditions
- Electrical wires colored, numbered, and protected with thick braiding for ease of identification and long life
- Heavy-duty stress-relieved booms and heavy duty sticks standard
- Grease and Lubricated Tracks (GLT) for longer life
- New fuel injection system for improved reliability

## **Reduced Costs**

- Improved filtration efficiency and system robustness
- 500 hour service intervals for more uptime
- Two power modes: high horsepower and eco mode; eco mode reduces fuel consumption up to 15% with no loss in digging force

## **Technology**

- Integrated Cat technology solutions to increase production and minimize operating costs
- Product Link™ to report key information from the machine to any location

## **New Appearance**

- Modern, stylish look





# Engine

Designed for power, reliability and economy.

## Reliable Cat C7.1 ACERT Engine

The Cat C7.1 ACERT engine meets Tier 3 and Stage IIIA equivalent emission standards. The engine incorporates proven, robust components and precision manufacturing you can count on for reliable and efficient operation. It's less sensitive to low-quality fuel and also delivers reduced fuel consumption.

An ECO-Mode feature helps to reduce fuel consumption by up to 15% for fuel-conscious customers with no loss in digging or lifting forces.

## Isochronous Control

Isochronous engine speed control improves fuel efficiency and reduces fuel consumption and noise levels by managing pump and engine speed.

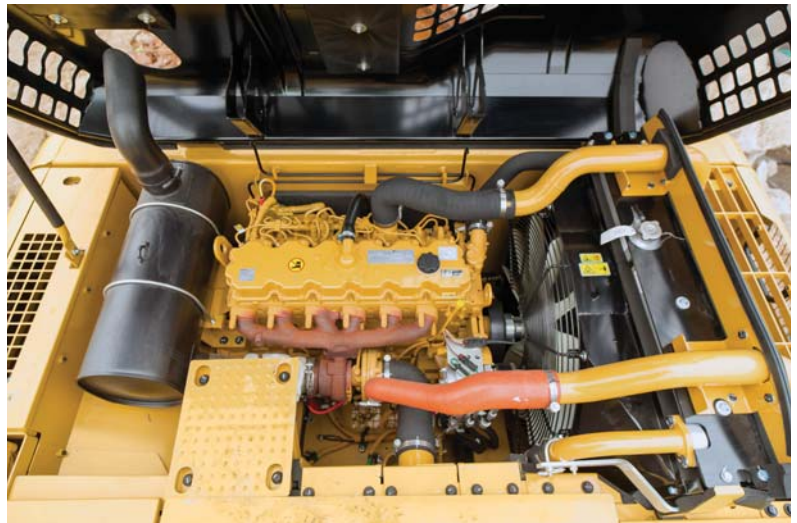
## Automatic Engine Control

Automatic engine control is activated during no-load or light-load conditions to minimize fuel consumption.

## Air Cleaner and Air Precleaner

The radial seal air filter features a double-layered filter core for more efficient filtration and is located in a compartment behind the cab.

A warning is displayed on the monitor when dust accumulates above a preset level. An air precleaner reduces the amount of dust and debris that enter the air intake system to help maximize engine performance by extending air filter life.



## Filtration System

The C7.1 ACERT engine features an improved filtration system to ensure good reliability of fuel injection system components. Intervals have been extended and the number of filters increased to three. The primary filter and the secondary twin filters improve filtration efficiency and machine robustness.

## Variable-Speed Fan

A variable-speed fan reduces fuel consumption and noise.

# Operator Station

Ergonomically designed to keep you comfortable and productive all day long.



## ROPS Certified Operator Station

The 330D2 L features a roll-over protective structure (ROPS) compliant cab as standard to meet OSHA and MSHA sound requirements.

This design also allows for a falling object guard system (FOGS) front windshield guard to be bolted directly to the cab, either at the factory or in the field, enabling the machine to meet all job site requirements.

## Monitor

The monitor features a large screen with high-resolution monitor. It is equipped with a warning lamp and buzzer for critical engine oil pressure, coolant temperature, and oil temperature.

Programmable in up to 42 languages, the monitor clearly displays critical information, including filters and fluid change intervals and the image from the standard rearview and RH sideview camera to enhance job site productivity and safety.



## Seat

The air suspension seat provides a variety of adjustments to accommodate a wide range of operators. All seats include a reclining back, upper and lower seat slide adjustments, and height and tilt adjustments.



## Controls

Operators can adjust the right and left joysticks for individual preferences, helping them become more comfortable and productive. Low-effort pilot-operated joystick controls are designed to match your natural wrist and arm position for maximum comfort and minimum fatigue.

## Climate Control

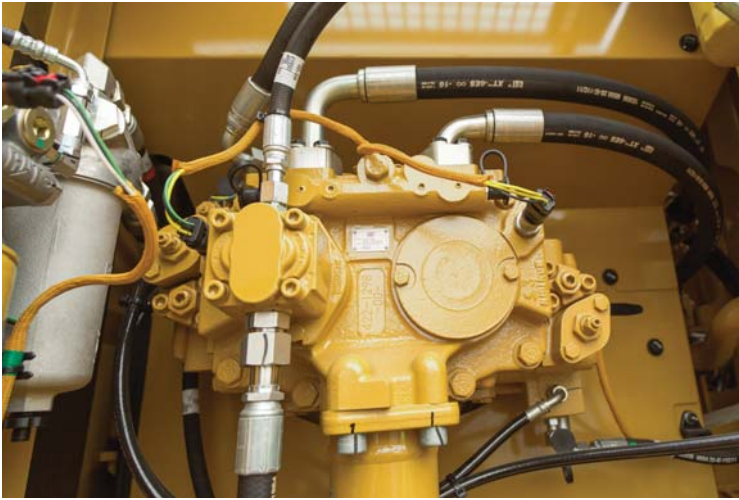
The 330D2 L offers positive filtered ventilation with a pressurized cab. Fresh air or recirculated air can be selected, which makes working in the heat and cold much more pleasant.

## Cab Structure and Mounts

The cab shell is attached to the frame with viscous rubber cab mounts that dampen vibrations and sound levels while enhancing operator comfort. Thick steel tubing along the bottom perimeter of the cab improves resistance to fatigue and vibration.

# Hydraulics

Cat hydraulics deliver power and precise control to keep material moving.



## Hydraulic System

Hydraulic system pressure from the two-hydraulic pump system delivers terrific digging performance and productivity.

## Pilot System

An independent pilot pump enables smooth, precise control for the front linkage, swing, and travel operations.

## Hydraulic Cylinder Snubbers

Snubbers are located at the rod-end of the boom cylinders and both ends of the stick cylinders to cushion shocks while reducing sound levels and extending component life.

## Hydraulic Return Capsule Filter

The capsule filter has a cartridge inside to avoid contamination when accessing, enabling changing without oil spillage. The capable filter takes out impurities and has a sensor that indicates to the operator if it's clogged.

## Component Layout

The hydraulic system and component locations have been designed to provide a high level of system efficiency. The main pumps, control valves, and hydraulic tank are located close together to allow for shorter tubes and lines between components, reducing friction loss and pressure drops.

## Hydraulic Cross-Sensing System

The hydraulic cross-sensing system utilizes each of two hydraulic pumps to 100 percent of engine power under all operating conditions. This improves productivity with faster implement speeds and quicker, stronger pivot turns.

## Auxiliary Hydraulic Valve

Control circuits are available as attachments to improve versatility. They allow operation of high- and medium-pressure tools such as shears, grapples, hammers, pulverizers, multi-processors, and vibratory plate compactors.

## Boom and Stick Regeneration Circuit

Boom and stick regeneration circuits save energy during boom-down and stick-in operation to increase efficiency and reduce cycle times and pressure loss for higher productivity, lower operating costs, and increased fuel efficiency.





## Undercarriage and Structures

Strong and durable, all you expect from Cat excavators.

### Robotic Welding

Up to 95% of the structural welds on a Cat excavator are completed by robots. Robotic welds achieve over three times the penetration of manual welds.

### Carbody Design and Track Roller Frames

The X-shaped, box-section carbody provides excellent resistance to torsional bending. Robot-welded track roller frames are press-formed pentagonal units that deliver exceptional strength and service life.

### Rollers and Idlers

Sealed and lubricated track rollers, carrier rollers, and idlers provide excellent service life to keep the machine in the field longer.

### Long Undercarriage

Long undercarriage maximizes stability and lift capacity.

### Tracks

The 330D2 L track links are assembled and sealed with grease to decrease internal bushing wear, reduce travel noise, and extend service life to lower operating costs.

### Counterweights

The 5.9 mt (6.5 t) standard weight makes a better choice for heavy lifting with long undercarriage. Counterweights are bolted directly to the main frame for extra rigidity.



# Front Linkage

Designed for flexibility, high productivity, and efficiency in a variety of applications.

## Heavy-Duty Reach Boom Front Linkage

The 6.15 m (10'2") heavy-duty (HD) reach boom is reinforced to be used in the severest applications for maximum digging capability. The boom is made of high-tensile-strength steel using a large box-section design with interior baffle plates and an additional bottom guard for long life and durability.

Booms and sticks are stress-relieved for added durability.

- R3.2 (10'6") CB2 HD sticks
- R2.65 (8'8") CB2 sticks
- Turkey: STD Boom + R2.65CB2
- Pacific Islands/Taiwan:  
HD Boom + R3.2CB2 HD





# Service and Maintenance

Simplified service and maintenance features save you time and money.



## Ground-Level Service

The design and layout of the 330D2 L was made with the service technician in mind. Most service locations are easily accessible at ground level to allow service and maintenance to get completed quickly and efficiently.

## Air Filter Compartment

The air filter features a double-element construction for superior cleaning efficiency. When the air cleaner plugs, a warning is displayed on the monitor screen inside the cab.

## Pump Compartment

A service door on the right side of the upper structure allows ground-level access to the pump, pilot filter, engine oil filter, and water separator with primary fuel filter.

## Radiator Compartment

The left rear service door allows easy access to the engine radiator, oil cooler, air-to-air-aftercooler, water separator, second and third fuel filters, and fuel cooler. A reserve tank and drain cock are attached to the radiator for simplified maintenance.

## Greasing Points

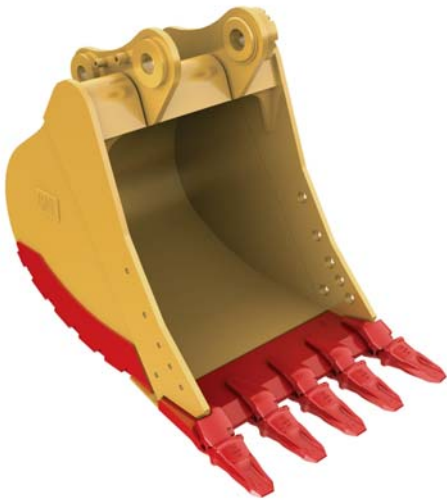
Conveniently located grease blocks help you get lube in hard-to-reach places, making routine boom, stick, and bucket linkage maintenance quick and easy.

## Diagnostics and Monitoring

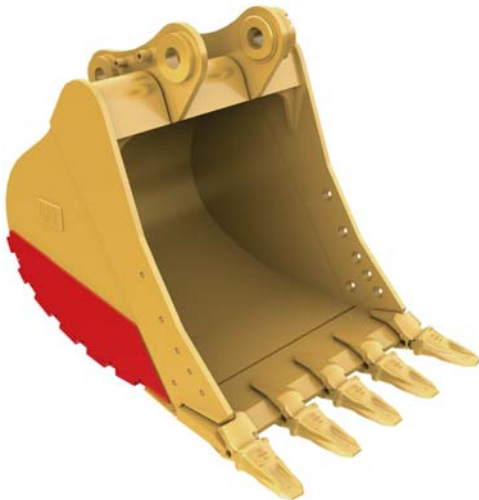
The 330D2 L is equipped with S·O·S<sup>SM</sup> ports to easily sample hydraulic and engine oil quality. Test ports are also conveniently located so you can test coolant and hydraulic pressure.

# Work Tools

Dig, hammer, rip, and cut with confidence.



①



②

Each Cat work tool attachment is designed to optimize the versatility and performance of your machine. An extensive range of buckets, compactors, grapples, multi-processors, rippers, crushers, pulverizers, hammers, and shears are available for your 330D2 L. Contact your local Cat dealer for more information on the attachments available in your region.

## Buckets

Cat buckets and Cat Ground Engaging Tools (GET) are designed and matched to the machine to ensure optimal performance and fuel efficiency.

### 1 – Heavy Duty Buckets (HD)

HD buckets are a good starting point when application conditions vary, especially when conditions include mixed dirt, clay, sand, and gravel.

### 2 – Severe Duty (SD)

For higher abrasion conditions such as well shot granite and caliche.

Example: Digging conditions where tip life ranges from 200 to 400 hours with Penetration Plus tips.



## Couplers

Quick couplers allow one person to change work tools in seconds for maximum performance and flexibility on a job site. One machine can move rapidly from task to task, and a fleet of similarly equipped machines can share a common work tool inventory.

### Cat Pin Grabber Coupler

The Cat Pin Grabber coupler is easy to activate, easy to engage, and easy to disengage. Operating procedures are simple and easy to learn. It's the easiest way to improve productivity on every job site. One excavator can share buckets and a variety of attachments with similar size excavators. Managing your assets just got easier.

## E Series Hammers

E Series hammers bring together customer expectations of performance, quality, and serviceability along with Caterpillar manufacturing and logistics experience.

E Series hammers are quiet, and noise suppression is valuable in urban and restricted work areas.

## Pin On Rippers, Rip and Load Package

Constructed from high-strength steel and built to last, Cat rippers endure in the toughest conditions. The box-section structure is reinforced for maximum rigidity, transmitting the full machine power to the material being ripped. Rippers feature a replaceable wear tip, and most models also come equipped with a replaceable shank protector.

## Grapples

Cat grapples replace the bucket on Cat excavators, converting them to the ideal machine for handling loose material, sorting trash, and demolition site cleanup. An array of styles and sizes are available to match excavators to the task at hand.

## Multi-Processors

Multi-processors do the work of many types of demolition tools by use of interchangeable jaw sets. Changing jaws allows a single unit to crush, pulverize, and perform a variety of specialized cutting tasks such as cutting steel rebar and tanks.

## Shear

Cat shears are designed for Cat machines, taking full advantage of the hydraulic flows and pressures to enhance productivity without compromising safety or causing premature wear of the shear and carrier.

## Pulverizer

The excavator mounted mechanical pulverizer is a cost-effective tool for recycling demolished concrete debris. The bucket cylinder on the excavator powers the mechanical pulverizer. This eliminates the need for a dedicated cylinder and associated hydraulics and additional installation cost.

## Vibratory Plate Compactor

Compactors enhance the versatility of your excavator and makes compacting faster, more efficient, and cost-effective. Cat compactors are the superior choice for any job site's compaction tasks.

## Crusher

The hydraulic concrete crusher has taken modern demolition technology a step further. It is well suited for concrete demolition in residential areas. The hydraulic concrete crusher combines several concrete demolition operations in one piece of equipment:

- breaking out concrete from fixed structures
- pulverizing concrete
- cutting reinforcement rods and small steel profiles



# Cat Connect Technologies

Monitor, manage, and enhance job site operations.



Cat Connect makes smart use of technology and services to improve your job site efficiency. Using the data from technology-equipped machines, you'll get more information and insight into your equipment and operations than ever before.

Cat Connect technologies offer improvements in these key areas:



EQUIPMENT  
MANAGEMENT

**Equipment Management** – increase uptime and reduce operating costs.



PRODUCTIVITY

**Productivity** – monitor production and manage job site efficiency.



SAFETY

**Safety** – enhance job site awareness to keep your people and equipment safe.





### **Cat Connect LINK Technologies**

LINK technologies wirelessly connect you to your equipment, giving you access to essential information you need to know to run your business. Link data can give you valuable insight into how your machine or fleet is performing so you can make timely, fact-based decisions that can boost job site efficiency and productivity.

### **Product Link/VisionLink®**

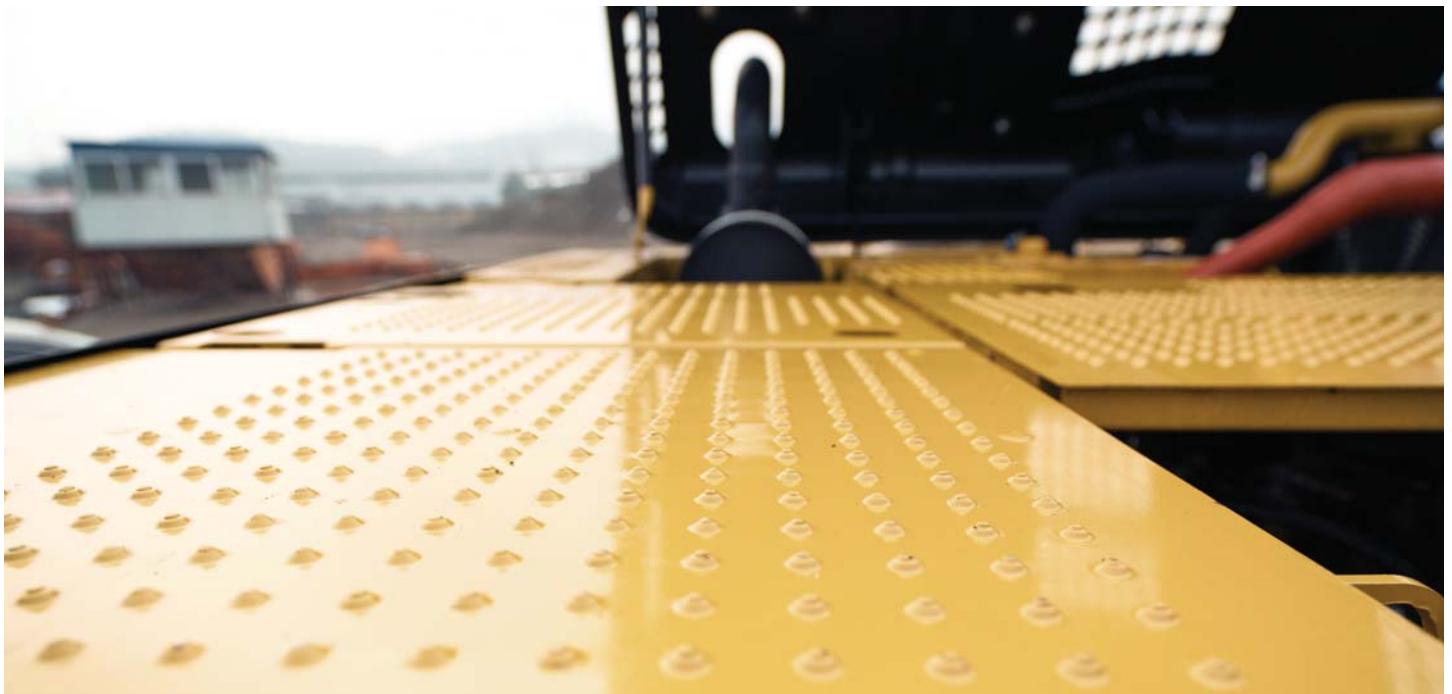
Product Link is deeply integrated into your machine, helping to take the guesswork out of equipment management. Easy access to timely information like machine location, hours, fuel usage, idle time and event codes via the online VisionLink user interface can help you effectively manage your fleet and lower operating costs.

### **Cat Connect DETECT Technologies**

DETECT technologies combine safety features, functionalities, and alerts to enhance your job site awareness and keep your people and assets safe.

### **Rearview and Sideview Cameras**

Rear vision and sideview cameras greatly enhance visibility behind and side of the machine, helping the operator work more safely and productively. The camera view is automatically displayed on the integrated in-cab monitor, increasing awareness of the working area around the machine and giving the operator the confidence to work more safely and efficiently at maximum potential.



# Safety

Features that help protect you day in and day out.

Anti-skid plating with countersunk bolts reduces the potential for slippage and trip hazards, providing a **safe platform** for all routine service and maintenance needs.

The standard **hydraulic lockout lever** isolates all hydraulic and travel functions in the lowered position. It is specifically designed to not allow the operator to leave the cab without first lowering it.

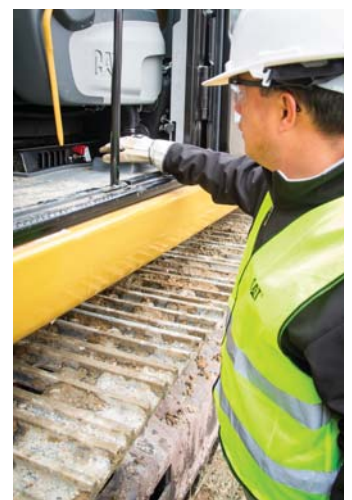
**Three circuit breakers** protect critical electrical components to increase machine uptime.

A **battery disconnect switch** helps to deter theft by isolating the battery and enhances safety when servicing the machine.

A full length **firewall** separates the engine from the hydraulic pump and offers protection in the event of an incident.

Ground level **shut-off switch** stops all fuel to the engine when activated and shuts down the machine.

**Fan Guard** – The engine radiator fan is completely enclosed by fine wire mesh, reducing the risk of an accident.





A large yellow Caterpillar excavator is the central focus, parked on a dirt construction site. Two workers, wearing white hard hats and high-visibility safety vests, are standing in front of the machine. One worker's vest has the 'CAT' logo on the back. They appear to be in a discussion with the machine. The background shows a clear blue sky and some distant structures.

# Complete Customer Support

Cat dealer services help you operate longer  
with lower costs.

## Product Support

You can maximize your machines' uptime with the Cat worldwide dealer network. You can also decrease your repair costs by utilizing Cat remanufactured components while contributing to sustainable development.

## Machine Selection

What are the job requirements and machine attachments? What production do you need? Your Cat dealer can provide recommendations to help you make the right machine configuration.

## Purchase

You can ensure lower owning and operating costs by utilizing unique Cat dealer services and financing options.

## Customer Support Agreements

Cat dealers offer a variety of customer support agreements and work with you to develop a plan to meet your specific needs. These plans can cover the entire machine, including attachments, to help protect your investment.

## Operation

You can boost your profits by improving your operators' techniques. Your Cat dealer has videos, literature, and other ideas to help increase productivity. Caterpillar also offers simulators and certified operator training to help maximize the return on your investment.

## Replacement

Repair, rebuild, or replace? Your Cat dealer can help you evaluate the cost involved so you can make the best choice for your business.

# 330D2 L Hydraulic Excavator Specifications

## Engine

Engine Model	Cat C7.1 ACERT	
Type	Electronic control fuel injection	
Engine Power (ISO 14396)	159 kW	213 hp
Net Power (SAE J1349/ISO 9249)	156 kW	209 hp
Displacement	7.1 L	428 in <sup>3</sup>
Bore	105 mm	4.13 in
Stroke	135 mm	5.31 in
Engine rpm		
Operation	1,700 rpm	
Travel	1,800 rpm	
Low-Idle Speed	950 rpm	
Maximum Torque (torque peak) @ 1,400 rpm	900 N·m	663.8 lbf-ft
Maximum Altitude (without derate)	3000 m	9,842 ft
Maximum Altitude (with derate)	5000 m	16,404 ft

- All engine horsepower (hp) are metric including front page.
- The C7.1 ACERT engine meets Tier 3 and Stage IIIA equivalent emission standards.
- Net power advertised is the power available at the flywheel when the engine is equipped with fan, air cleaner, muffler, and alternator.
- Full engine net power up to 3000 m (9,842 ft) altitude (engine derating required above 3000 m [9,842 ft]).
- Power rating at 1800 rpm.

## Weights

Minimum Operating Weight*	28 930 kg	63,780 lb
Maximum Operating Weight**	29 420 kg	64,850 lb

\*Turkey: 6.15 m (20'2") reach boom, R2.65CB2 (8'8") stick,

1.54 m<sup>3</sup> (2.02 yd<sup>3</sup>) bucket, 600 mm (24") triple grouser track shoes

\*\*Pacific Islands/Taiwan: 6.15 m (20'2") HD reach boom, R3.2CB2 (10'6") HD stick, 1.54 m<sup>3</sup> (2.02 yd<sup>3</sup>) bucket, 600 mm (24") triple grouser track shoes

## Swing Mechanism

Swing Speed	9.6 rpm	
Maximum Swing Torque	105 kN·m	77,350 lbf-ft

## Sound Performance

ISO 6396 – Operator Noise (Closed)	71 dB(A)
ISO 6395 – Spectator Noise	104 dB(A)

## Standards

Brakes	ISO 10265:2008
Cab/FOGS	SAE J1356 FEB88
	ISO 10262:1998
Cab/ROPS	ISO 12117-2:2008

## Drive

Maximum Gradeability	35°/70%	
Maximum Travel Speed	5.3 km/h	3.4 mph
Maximum Drawbar Pull	248 kN	55,753 lbf

## Service Refill Capacities

Fuel Tank Capacity	520 L	137.4 gal
Cooling System	31 L	8.2 gal
Engine Oil	22 L	5.8 gal
Swing Drive	10 L	2.6 gal
Final Drive (each)	6 L	1.6 gal
Hydraulic System (including tank)	310 L	81.9 gal
Hydraulic Tank	257 L	67.9 gal

## Hydraulic System

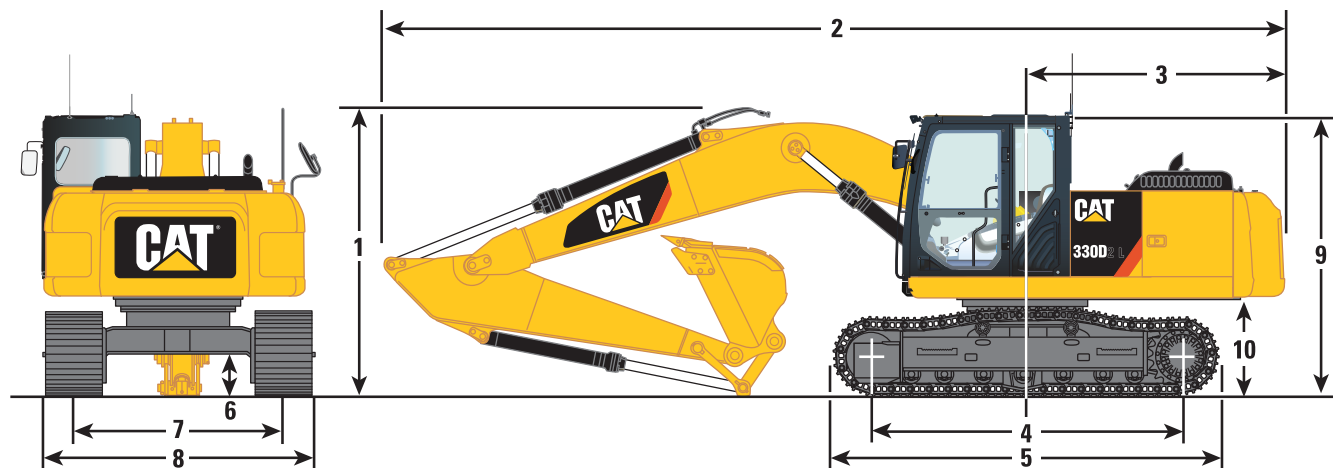
Main System – Maximum Flow at Travel H/L (1,800 rpm)	254 × 2 (508 total) L/min	67.1 × 2 (134.2 total) gal/min
Main System – Maximum Flow at Travel L/L (1,750 rpm)	247 × 2 (494 total) L/min	65.2 × 2 (130.4 total) gal/min
Main System – Maximum Flow (each) at Operation (1,700 rpm)	240 × 2 (480 total) L/min	63.4 × 2 (126.8 total) gal/min
Swing System – Maximum Flow	240 L/min	63.4 gal/min
Maximum Pressure – Equipment	35 MPa	5,076 psi
Maximum Pressure – Travel	35 MPa	5,076 psi
Maximum Pressure – Swing	27.5 MPa	3,983 psi
Pilot System – Maximum Flow	23.1 L/min	6.1 gal/min
Pilot System – Maximum Pressure	3920 kPa	569 psi
Boom Cylinder – Bore	140 mm	5.5 in
Boom Cylinder – Stroke	1407 mm	55.4 in
Stick Cylinder – Bore	150 mm	5.9 in
Stick Cylinder – Stroke	1646 mm	64.8 in
CB2 Bucket Cylinder – Bore	135 mm	5.3 in
CB2 Bucket Cylinder – Stroke	1156 mm	45.5 in



# 330D2 L Hydraulic Excavator Specifications

## Dimensions

All dimensions are approximate.



Regions	Pacific Islands/Taiwan	Turkey
	Reach Boom* 6.15 m (20'2")	
<b>Stick Type</b>	<b>R3.2CB2 (10'6")</b>	<b>R2.65CB2 (8'8")</b>
<b>1</b> Shipping Height**	3330 mm (10'11")	3420 mm (11'3")
<b>2</b> Shipping Length	10 360 mm (34'0")	10 370 mm (34'0")
<b>3</b> Tail Swing Radius	3080 mm (10'1")	3080 mm (10'1")
<b>4</b> Length to Center of Rollers		
Long Undercarriage	3990 mm (13'1")	3990 mm (13'1")
<b>5</b> Track Length		
Long Undercarriage	4860 mm (15'11")	4860 mm (15'11")
<b>6</b> Ground Clearance***	480 mm (19")	480 mm (19")
<b>7</b> Track Gauge		
Long Undercarriage	2590 mm (8'6")	2590 mm (8'6")
<b>8</b> Transport Width		
Long Undercarriage		
600 mm (24") Shoes	3190 mm (10'6")	3190 mm (10'6")
<b>9</b> Cab Height**	3040 mm (10'0")	3040 mm (10'0")
<b>10</b> Counterweight Clearance***	1100 mm (3'7")	1100 mm (3'7")
<b>Bucket Type</b>	SD	SD
<b>Bucket Tip Radius</b>	1690 mm (5'7")	1690 mm (5'7")

\*HD Reach boom is same as Reach boom.

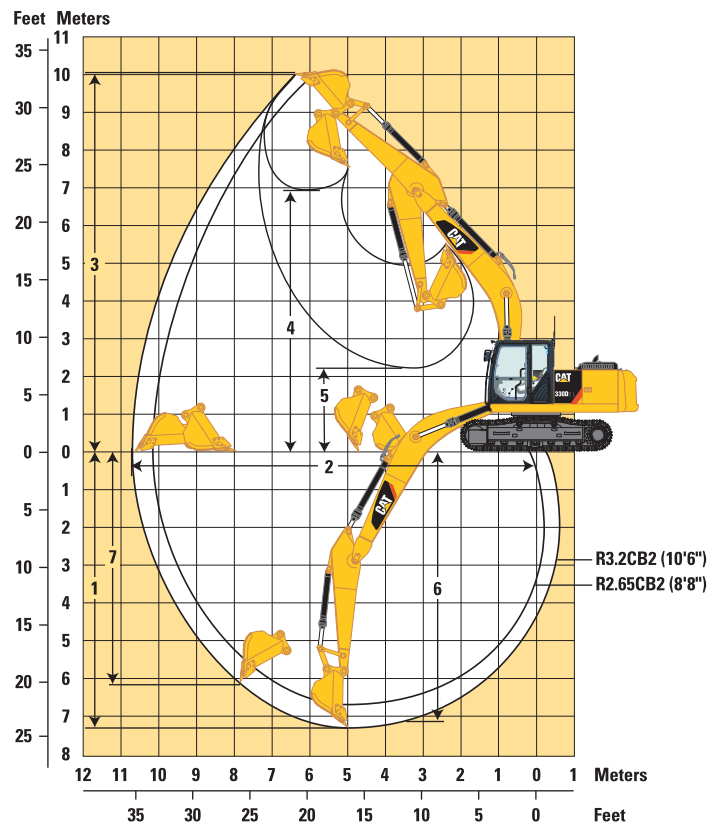
\*\*Including shoe lug height.

\*\*\*Without shoe lug height.

# 330D2 L Hydraulic Excavator Specifications

## Working Ranges

All dimensions are approximate.



Regions	Pacific Islands/Taiwan	Turkey
	Reach Boom* 6.15 m (20'2")	
Stick Type	3.2 m (10'6")	2.65 m (8'8")
Bucket	1.54 m³ (2.01 yd³)	1.54 m³ (2.01 yd³)
1 Maximum Digging Depth	7290 mm (23'11")	6740 mm (22'1")
2 Maximum Reach at Ground Level	10 720 mm (35'2")	10 240 mm (33'7")
3 Maximum Cutting Height	10 040 mm (32'11")	9930 mm (32'7")
4 Maximum Loading Height	6900 mm (22'8")	6760 mm (22'2")
5 Minimum Loading Height	2250 mm (7'5")	2800 mm (9'2")
6 Maximum Depth Cut for 2440 mm (8'1") Level Bottom	7130 mm (23'5")	6560 mm (21'6")
7 Maximum Digging (Vertical Wall)	6160 mm (20'3")	5840 mm (19'2")
Bucket Type	SD	SD
Bucket Tip Radius	1690 mm (5'7")	1690 mm (5'7")

\*HD Reach boom is same as Reach boom.



# 330D2 L Hydraulic Excavator Specifications

## Operating Weight and Ground Pressure

Boom	6.15 m (20'2") Reach	6.15 m (20'2") HD Reach
Stick	R2.65CB2	HD R3.2CB2
Total Weight (600 TG)	28 930 kg (63,780 lb)	29 420 kg (64,850 lb)
<b>Ground Pressure</b>		
Long Undercarriage		
600 mm (24") TG (LC)	55.0 kPa (8.0 psi)	55.9 kPa (8.1 psi)

The ground pressure information is based on operating weights shown below.

ISO 6016 configuration: machine (upper and lower structure), front structure, 100% full fuel tank, fluids at normal level (i.e.: oils/water/lubricants), bucket (currently = WW major bucket) without fill materials, 75 kg (165 lb) operator.

Notes: No optional attachments are included, the bucket is empty.

# 330D2 L Hydraulic Excavator Specifications

## Major Component Weights for Standard Undercarriage

<b>Base Machine – Includes: Boom Cylinders, Pins, Fluids</b>	7290 kg (16,070 lb)
Full Fuel Tank	430 kg (950 lb)
Counterweight	5860 kg (12,920 lb)
Boom (includes lines, pins, and stick cylinder)	
Reach Boom – 6.15 m (20'2")	2270 kg (5,000 lb)
Reach Boom HD – 6.15 m (20'2")	2420 kg (5,340 lb)
Stick (includes lines, stick pins, bucket pins, bucket cylinder, and bucket linkage)	
R3.2CB2 HD (10'6")	1610 kg (3,550 lb)
R2.65CB2 (8'8")	1270 kg (2,800 lb)
Undercarriage	
Long Undercarriage	6630 kg (14,620 lb)
Tracks (Long Undercarriage)	
600 mm (24") TG shoe	3580 kg (7,890 lb)

## Bucket and Stick Forces

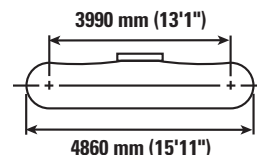
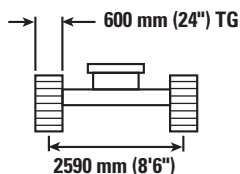
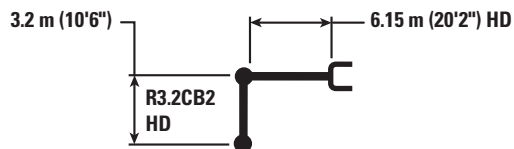
Stick Type	Reach Boom* 6.15 m (20'2")	
	R3.2 HD (10'6")	R2.65 (8'8")
<b>Bucket Capacity</b>	<b>1.54 m³ (2.01 yd³)</b>	<b>1.54 m³ (2.01 yd³)</b>
<b>Cutting Edge</b>		
Bucket Digging Force (ISO)	179 kN (40,152 lbf)	179 kN (40,152 lbf)
Stick Digging Force (ISO)	126 kN (28,374 lbf)	145 kN (32,526 lbf)
<b>Bucket Tip</b>		
Bucket Digging Force (SAE)	154 kN (34,709 lbf)	154 kN (34,709 lbf)
Stick Digging Force (SAE)	122 kN (27,423 lbf)	139 kN (31,263 lbf)

\*Reach and HD Reach booms.



# 330D2 L Hydraulic Excavator Specifications

## 330D2 L HD Reach Boom Lift Capacities – Counterweight: 5.9 mt (6.5 t) – Without Bucket



		1.5 m/5.0 ft		3.0 m/10.0 ft		4.5 m/15.0 ft		6.0 m/20.0 ft		7.5 m/25.0 ft		9.0 m/30.0 ft			
															m ft
7.5 m	kg													*5100	7.28
25.0 ft	lb													*11,250	23.9
6.0 m	kg									*7000	5550			*4850	8.23
20.0 ft	lb									*15,150	11,900			*10,650	27.0
4.5 m	kg							*8200	7650	*7400	5400			*4800	8.83
15.0 ft	lb							*17,800	16,500	*16,150	11,600			*10,550	29.0
3.0 m	kg					*12 650	11 100	*9550	7250	*8100	5200	*5900	3900	*4950	9.14
10.0 ft	lb					*27,200	23,950	*20,700	15,600	*17,450	11,150			*10,850	30.0
1.5 m	kg					*15 100	10 350	*10 850	6850	7900	5000	6000	3800	*5250	9.19
5.0 ft	lb					*32,550	22,250	*23,500	14,750	16,950	10,750	*12,400	8,200	*11,500	30.2
0 m	kg					*16 200	9950	10 850	6600	7700	4850			*5750	8.99
0 ft	lb					*35,050	21,350	23,250	14,200	16,600	10,400			*12,650	29.5
-1.5 m	kg	*6300	*6300	*9950	*9950	*16 200	9850	10 700	6450	7650	4750			6400	8.53
-5.0 ft	lb	*14,050	*14,050	*22,600	*22,600	*35,050	21,150	22,950	13,950	16,450	10,250			14,050	28.0
-3.0 m	kg	*11 400	*11 400	*16 150	*16 150	*15 200	9900	10 700	6500	7700	4800			7400	7.74
-10.0 ft	lb	*25,550	*25,550	*36,650	*36,650	*32,850	21,300	23,000	14,000	16,600	10,400			16,350	25.4
-4.5 m	kg			*17 550	*17 550	*12 850	10 150	*9500	6700					*8300	6.52
-15.0 ft	lb			*37,700	*37,700	*27,600	21,850	*20,100	14,450					*18,300	21.4



ISO 10567



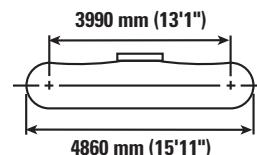
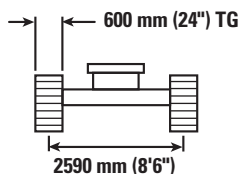
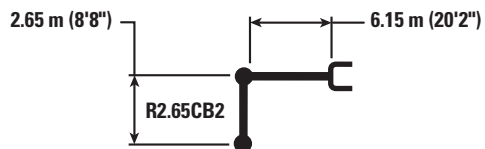
\*Indicates that the load is limited by hydraulic lifting capacity rather than tipping load. The above loads are in compliance with hydraulic excavator lift capacity standard ISO 10567:2007. They do not exceed 87% of hydraulic lifting capacity or 75% of tipping load. Weight of all lifting accessories must be deducted from the above lifting capacities. Lifting capacities are based on the machine standing on a firm, uniform supporting surface. The use of a work tool attachment point to handle/lift objects, could affect the machine lift performance.

Lift capacity stays with  $\pm 5\%$  for all available track shoes.

Always refer to the appropriate Operation and Maintenance Manual for specific product information.

# 330D2 L Hydraulic Excavator Specifications

## 330D2 L HD Reach Boom Lift Capacities – Counterweight: 5.9 mt (6.5 t) – Without Bucket



		3.0 m/10.0 ft		4.5 m/15.0 ft		6.0 m/20.0 ft		7.5 m/25.0 ft			
											m ft
7.5 m 25.0 ft	kg lb					*17,200 *17,200				*6700 *14,800	6.67 21.9
6.0 m 20.0 ft	kg lb					*8000 *17,450	7900 17,000	*7600 *14,300	5500 11,750	*6300 *13,850	7.70 25.3
4.5 m 15.0 ft	kg lb			*11 050 *23,700	*11 050 *23,700	*9000 *19,450	7600 16,400	*8000 *17,500	5400 11,600	*6200 *13,650	8.34 27.4
3.0 m 10.0 ft	kg lb			*13 900 *29,850	10 950 23,650	*10 250 *22,200	7250 15,600	8150 17,500	5250 11,250	*6350 *13,950	8.67 28.4
1.5 m 5.0 ft	kg lb			*15 550 *34,450	10 350 22,250	11 150 24,000	6900 14,900	7950 17,100	5050 10,900	6350 14,000	8.72 28.6
0 m 0 ft	kg lb			*16 500 *35,850	10 100 21,700	10 950 23,500	6700 14,450	7800 16,800	4950 10,650	6550 14,350	8.51 27.9
-1.5 m -5.0 ft	kg lb	*9700 *22,150	*9700 *22,150	*16 100 *34,900	10 050 21,650	10 850 23,300	6650 14,300	7800 16,750	4900 10,600	7100 15,650	8.02 26.3
-3.0 m -10.0 ft	kg lb	*18 250 *41,650	*18 250 *41,650	*14 650 *31,700	10 200 21,900	10 950 23,500	6700 14,450			8400 18,650	7.18 23.6
-4.5 m -15.0 ft	kg lb	*15 350 *15 350	*15 350 *15 350	*11 650 *24,850	10 500 22,600					*8450 *18,550	5.83 19.1



ISO 10567



\*Indicates that the load is limited by hydraulic lifting capacity rather than tipping load. The above loads are in compliance with hydraulic excavator lift capacity standard ISO 10567:2007. They do not exceed 87% of hydraulic lifting capacity or 75% of tipping load. Weight of all lifting accessories must be deducted from the above lifting capacities. Lifting capacities are based on the machine standing on a firm, uniform supporting surface. The use of a work tool attachment point to handle/lift objects, could affect the machine lift performance.

Lift capacity stays with  $\pm 5\%$  for all available track shoes.

Always refer to the appropriate Operation and Maintenance Manual for specific product information.



# 330D2 L Hydraulic Excavator Specifications

## Work Tool Offering Guide\*

Boom Type		Reach Boom	HD Reach Boom
		6.15 m (20'2")	6.15 m (20'2")
Stick Size		R2.65 (8'8")	HD R3.2 (10'6")
Hydraulic Hammer		H140Es H160Es^ ^^	H140Es H160Es^ ^^
Multi-Processor		MP324 CC Jaw MP324 D Jaw MP324 P Jaw MP324 U Jaw MP324 S Jaw MP324 TS Jaw	MP324 CC Jaw MP324 D Jaw MP324 P Jaw MP324 U Jaw MP324 S Jaw MP324 TS Jaw
Crusher		P325	P325
Pulverizer		P225	P225
Demolition & Sorting Grapple		G320B-D/R G325B-D	G320B-D/R G325B-D
Scrap & Demolition Shear		S320B S325B S340B#	S320B S325B S340B#
Compactor (Vibratory Plate)		CVP110	CVP110
Orange Peel Grapple			
Rippers			
Pin Grabber Coupler	Cat-PG	These work tool are available for the 330D2 L. Consult your Cat dealer for proper work tool match.	
Dedicated Quick Coupler	CW45s		
	CW45		

These work tool are available for the 330D2 L.  
Consult your Cat dealer for proper work tool match.

\* Offerings not available in all areas. Matches are dependent on excavator configurations. Consult your Cat dealer to determine what is offered in your area and for proper work tool match.

# Boom Mount

^ Work over the front only with Dedicated Quick Coupler (Pin-on and Dedicated Quick Coupler)

^^ Work over the front only with Cat-PG (Pin-on, Dedicated Quick Coupler and Cat-PG)

Note: Demolition & Sorting Grapple: D-Demolition shells, R-Recycling shells.

# 330D2 L Hydraulic Excavator Specifications

## Bucket Specifications and Compatibility

	Linkage	Width		Capacity		Weight		Fill	HD Reach Boom	Reach Boom
									6.15 m (20'2")	6.15 m (20'2")
									Stick	
									HD 3.2 m (10'6")	R2.65 (8'8")
									Shoes	
		mm	in	m³	yd³	kg	lb	%	600 mm (24")	600 mm (24")
<b>Without Quick Coupler</b>										
General Duty (GD)	CB	750	30	0.71	0.93	730	1,609	100	●	●
	CB	1050	42	1.12	1.46	864	1,903	100	●	●
	CB	1200	48	1.33	1.74	927	2,044	100	●	●
	CB	1350	54	1.54	2.02	1009	2,224	100	⊖	●
	CB	1500	60	1.76	2.30	1074	2,366	100	⊖	X
	DB	1350	53	1.64	2.14	1173	2,585	100		
	DB	1500	59	1.88	2.46	1275	2,809	100		
	DB	1650	65	2.12	2.77	1352	2,979	100		
	DB	1800	71	2.36	3.08	1453	3,202	100		
Heavy Duty (HD)	CB	1350	54	1.54	2.02	1134	2,499	100	⊖	●
	CB	1500	60	1.76	2.30	1229	2,708	100	○	X
	DB	1350	54	1.64	2.14	1447	3,189	100		
	DB	1500	60	1.88	2.46	1542	3,399	100		
	DB	1650	66	2.12	2.77	1673	3,687	100		
Severe Duty (SD)	CB	1350	54	1.56	2.04	1245	2,744	90	⊖	●
	DB	1650	66	2.15	2.81	1827	4,028	90		
Maximum load pin on (payload + bucket)								kg	3635	4239
								lb	8,012	9,343

The above loads are in compliance with hydraulic excavator standard EN474, they do not exceed 87% of hydraulic lifting capacity or 75% of tipping capacity with front linkage fully extended at ground line with bucket curled.

Capacity based on ISO 7451.

Bucket weight with General Duty tips.

### Maximum Material Density:

● 2100 kg/m³ (3,500 lb/yd³)

⊖ 1500 kg/m³ (2,500 lb/yd³)

○ 1200 kg/m³ (2,000 lb/yd³)

X Not allowed per structures matching guide

Caterpillar recommends using appropriate work tools to maximize the value customers receive from our products. Use of work tools, including buckets, which are outside of Caterpillar's recommendations or specifications for weight, dimensions, flows, pressures, etc. may result in less-than-optimal performance, including but not limited to reductions in production, stability, reliability, and component durability. Improper use of a work tool resulting in sweeping, prying, twisting and/or catching of heavy loads will reduce the life of the boom and stick.



# 330D2 L Hydraulic Excavator Specifications

## Bucket Specifications and Compatibility

	Linkage	Width		Capacity		Weight		Fill	HD Reach Boom	Reach Boom
									6.15 m (20'2")	6.15 m (20'2")
									Stick	
									HD 3.2 m (10'6")	R2.65 (8'8")
									Shoes	
		mm	in	m³	yd³	kg	lb	%	600 mm (24")	600 mm (24")
<b>With Pin Grabber Coupler</b>										
General Duty (GD)	CB	750	30	0.71	0.93	730	1,609	100	●	●
	CB	1050	42	1.12	1.46	864	1,903	100	●	●
	CB	1200	48	1.33	1.74	927	2,044	100	⊖	●
	CB	1350	54	1.54	2.02	1009	2,224	100	○	⊙
	CB	1500	60	1.76	2.30	1074	2,366	100	○	⊖
	DB	1350	53	1.64	2.14	1173	2,585	100		
	DB	1650	65	2.12	2.77	1352	2,979	100		
	DB	1800	71	2.36	3.08	1453	3,202	100		
Heavy Duty (HD)	CB	1350	54	1.54	2.02	1134	2,499	100	○	⊖
	CB	1500	60	1.76	2.30	1229	2,708	100	◇	X
	DB	1350	54	1.64	2.14	1447	3,189	100		
	DB	1500	60	1.88	2.46	1542	3,399	100		
	DB	1650	66	2.12	2.77	1673	3,687	100		
Severe Duty (SD)	CB	1350	54	1.56	2.04	1245	2,744	90	○	⊙
	DB	1650	66	2.15	2.81	1827	4,028	90		
Maximum load pin on (payload + bucket)								kg	3130	3734
								lb	6,900	8,231

The above loads are in compliance with hydraulic excavator standard EN474, they do not exceed 87% of hydraulic lifting capacity or 75% of tipping capacity with front linkage fully extended at ground line with bucket curled.

Capacity based on ISO 7451.

Bucket weight with General Duty tips.

### Maximum Material Density:

- 2100 kg/m³ (3,500 lb/yd³)
- ⊙ 1800 kg/m³ (3,000 lb/yd³)
- ⊖ 1500 kg/m³ (2,500 lb/yd³)
- 1200 kg/m³ (2,000 lb/yd³)
- ◇ 900 kg/m³ (1,500 lb/yd³)

X Not allowed per structures matching guide

Caterpillar recommends using appropriate work tools to maximize the value customers receive from our products. Use of work tools, including buckets, which are outside of Caterpillar's recommendations or specifications for weight, dimensions, flows, pressures, etc. may result in less-than-optimal performance, including but not limited to reductions in production, stability, reliability, and component durability. Improper use of a work tool resulting in sweeping, prying, twisting and/or catching of heavy loads will reduce the life of the boom and stick.

# 330D2 L Hydraulic Excavator Specifications

## Bucket Specifications and Compatibility

	Linkage	Width		Capacity		Weight		Fill	HD Reach Boom	Reach Boom
									6.15 m (20'2")	6.15 m (20'2")
									Stick	
									HD 3.2 m (10'6")	R2.65 (8'8")
									Shoes	
		mm	in	m³	yd³	kg	lb	%	600 mm (24")	600 mm (24")
<b>With Quick Coupler (CW45, CW45s)</b>										
General Duty (GD)	CB	750	30	0.7	0.9	693	1,526	100	●	●
	CB	1350	54	1.5	2.0	1008	2,221	100	○	⊙
	CB	1500	60	1.76	2.30	1074	2,366	100	○	⊖
	CB	1650	66	1.97	2.58	1157	2,550	100	◇	X
	DB	1050	41	1.17	1.54	986	2,172	100		
	DB	1200	47	1.40	1.84	1064	2,345	100		
	DB	1350	53	1.64	2.14	1142	2,517	100		
	DB	1500	59	1.88	2.46	1245	2,745	100		
	DB	1650	65	2.12	2.77	1323	2,917	100		
Heavy Duty (HD)	CB	1050	42	1.12	1.46	986	2,174	100	⊙	●
	CB	1350	54	1.54	2.02	1134	2,499	100	○	⊙
	CB	1500	60	1.76	2.30	1229	2,709	100	◇	⊖
	CB	1650	66	1.97	2.58	1302	2,869	100	◇	X
	DB	1350	54	1.64	2.14	1417	3,122	100		
	DB	750	30	0.73	0.95	973	2,144	100		
	DB	1500	60	1.88	2.46	1514	3,337	100		
	DB	1650	66	2.12	2.77	1647	3,629	100		
	DB	1800	72	2.36	3.08	1746	3,848	100		
Severe Duty (SD)	DB	1050	42	1.17	1.54	1282	2,826	90		
	DB	1500	60	1.91	2.50	1661	3,661	90		
	DB	1650	66	2.15	2.81	1802	3,971	90		
Maximum load with coupler (payload + bucket)								kg	3171	3775
								lb	6,989	8,320

The above loads are in compliance with hydraulic excavator standard EN474, they do not exceed 87% of hydraulic lifting capacity or 75% of tipping capacity with front linkage fully extended at ground line with bucket curled.

Capacity based on ISO 7451.

Bucket weight with General Duty tips.

### Maximum Material Density:

● 2100 kg/m³ (3,500 lb/yd³)

⊙ 1800 kg/m³ (3,000 lb/yd³)

⊖ 1500 kg/m³ (2,500 lb/yd³)

○ 1200 kg/m³ (2,000 lb/yd³)

◇ 900 kg/m³ (1,500 lb/yd³)

X Not allowed per structures matching guide

Caterpillar recommends using appropriate work tools to maximize the value customers receive from our products. Use of work tools, including buckets, which are outside of Caterpillar's recommendations or specifications for weight, dimensions, flows, pressures, etc. may result in less-than-optimal performance, including but not limited to reductions in production, stability, reliability, and component durability. Improper use of a work tool resulting in sweeping, prying, twisting and/or catching of heavy loads will reduce the life of the boom and stick.



## Standard Equipment

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

### ENGINE

- C7.1 ACERT electronic control engine
- Meets Tier 3 and Stage IIIA equivalent emission standards
- 3000 m (9,842 ft) altitude capability without derating (Maximum 5000 m [16,404 ft] with derate from 3000 m [9,842 ft])
- Radial seal air filters (primary and secondary filter)
- Glow plugs
- Automatic engine speed control with one touch low idle
- High ambient cooling package 52° C (126° F)
- Starting kit, cold weather, <–32° C (–26° F) (Turkey only)
- Water separator with water level indicator sensor
- Radiator and oil cooler side by side with enough space for cleaning
- Two speed travel
- Electric (priming) pump
- Power modes (Eco and High Power)
- Variable fan with viscous clutch
- New fuel filtration system (primary ×1, twin main ×2)
- Up to B20 biodiesel fuel capability
- Air-to-air-aftercooler

### HYDRAULIC SYSTEM

- Regeneration circuits for boom and stick
- Auxiliary hydraulic valve
- Reverse swing damping valve
- Automatic swing parking brake
- Boom drift reducing valve
- Stick drift reducing valve
- High performance hydraulic return filters
- Hydraulic main pump
- Universal seal used in cylinders
- Capability of installing additional valves, pumps, circuits
- Boom and stick high pressure lines
- Hammer circuit, foot pedal operated
- Heavy lift mode

### CAB

- Pressurized cab
- Air suspension seat
- Positive filtered ventilation
- Adjustable armrest
- Flexible seat belt, retractable (51 mm [2 in])
- 70/30 split front windshield
- Laminated upper front windshield and tempered other windows
- Sliding upper door window
- Openable front windshield with assist device
- Openable roof hatch
- Removable lower windshield, within cab storage bracket
- Pillar mounted upper windshield wiper and washer
- Bi-level air conditioner (automatic) with defroster (pressurized function)
- Full color and full graphic LCD display with warning, filter/fluid change, and working hour information
- Control lever joysticks, seat integrated
- Neutral lever (lock out) for all controls
- Travel control pedals with removable hand levers
- Two stereo speakers
- Radio mounting
- Beverage holder
- Coat hook
- Interior lighting
- Ashtray and lighter
- Rear window, emergency exit
- Capability to install two additional pedals
- Bolt-on FOGS (Falling Objects Guarding System) capability
- 12V-10A power supply
- Sun screen
- Radio 24V

### FRONT LINKAGE

- Bucket linkage, CB2-family without lifting eye

### UNDERCARRIAGE

- Idler and segmented track guiding guards
- Towing eyes on base frame
- Grease lubricated track GLT2, resin
- Long undercarriage
- 600 mm (24 in) triple grouser shoes
- Segmented track guiding guard (three pieces)
- (HD) bottom
- (HD) travel motor
- Swivel guard

### ELECTRICAL

- Batteries (2 – 900 CCA)
- Capability to connect a beacon

### LIGHTS

- Working light, storage box mounted
- Interior lighting
- Cab mounted working lights
- Right mounted boom light for reach boom

### SAFETY AND SECURITY

- Cat one key security system
- Door and compartment locks
- Signaling/warning horn
- Rearview camera and RH sideview camera
- Fire wall between engine and pump compartment
- Emergency engine shutoff switch
- Rear window, emergency exit
- Battery disconnect switch
- Cap locks on fuel and hydraulic tanks
- Lockable tool box

### COUNTERWEIGHT

- 5860 kg (12,920 lb) counterweight

### TECHNOLOGY

- Product Link

# 330D2 L Optional Equipment

## Optional Equipment

Optional equipment may vary. Consult your Cat dealer for details.

### CAB

- Falling Objects Guarding System (FOGS)

### DEALER INSTALLED KITS

- Seat belt, retractable (51 mm/2" width) with flexible buckle
- Seat belt, retractable (76 mm/3" width) with flexible buckle
- Hammer return filter circuit for ROPS
- HD swivel guard (16 mm/0.63" thick)
- FOGS, openable front guard and fixed top guard + cab mirror for RH side track edge, use with front guard + cab lights for with guard for ROPS vandalism guard for ROPS

### FRONT LINKAGE

#### Regional Configurations

##### Turkey

- R6.15m (20'2") reach boom
  - R2.65CB2 (8'8") reach stick
  - 600 mm (24") width, 11 mm (0.43") thick TG for long undercarriage

##### Pacific Islands/Taiwan

- HD R6.15m (20'2") reach boom
  - HD R3.2CB2 (10'6") reach stick
  - 600 mm (24") width, 11 mm (0.43") thick TG for long undercarriage





For more complete information on Cat products, dealer services, and industry solutions, visit us on the web at [www.cat.com](http://www.cat.com)

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(Turkey, Pacific Islands, Taiwan)

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