

Cat[®] 303 CR

MINI EXCAVATOR

FEATURES:

The Cat[®] 303 CR Mini Excavator delivers power and performance in a compact size to help you work in a wide range of applications.

ALL DAY COMFORT

Choose either a canopy or a sealed and pressurized cab which can be equipped with air conditioning, adjustable wrist rests, and a suspension seat to help keep you working comfortably all day long.

EASY TO OPERATE

 Controls are easy to use and the intuitive Next Generation LCD monitor provides easy to read machine information. An advanced touchscreen monitor can also be equipped.

STICK STEER TRAVEL MODE

Moving around the job site is even easier with the Cat Stick Steer option. Easily switch from traditional travel controls with levers and pedals to joystick controls to move the machine and to operate the blade. The benefit of less effort and improved control is in your hands!

BIG PERFORMANCE IN A COMPACT DESIGN

 Strong lift and dig performance helps you get the job done faster. The compact radius design lets you access and work in the tightest areas. Dozer float allows for easy clean up.

SAFETY ON THE JOB SITE

 Your safety is our top priority. The Cat mini excavator is designed to help keep you safe on the job. Courtesy work lights and a fluorescent retractable seat belt are just a couple of the safety features we've built into the machine.

SIMPLE SERVICE FOR LESS DOWNTIME

 Maintenance is quick and easy on the Cat mini excavator. Routine check points are easy to access at ground level through the side doors. The unique tilt up cab or canopy lets you reach additional service areas when needed.

LOWER OPERATING COSTS

 Equipped with features such as auto idle, auto engine shutdown, and efficient hydraulics with a variable displacement pump, the Cat mini excavator was designed with reducing your operating costs in mind.

UNMATCHED DEALER SUPPORT

 Your Cat dealer is here to help you reach your business goals.
 From providing equipment solutions to operator training to service needs and beyond, your Cat dealer is ready to help.

Specifications

Engine	
Engine Model	C1.1 Turbo
Net Power @ 2,400 rpm	
ISO 9249, 80/1269/EEC	17.6 kW
Gross Power @ 2,400 rpm	
SAE J1995:2014	18.4 kW
Bore	77.0 mm
Stroke	81.0 mm
Displacement	1.1 L

• Meets China Nonroad Stage IV emission standards.

- Net power advertised is the power available at the flywheel when the engine is at rated speed and rated power when the engine is installed with the factory configured fan, air intake system, exhaust system, and alternator with a minimum alternator load.
- Advertised power is tested per the specified standard in effect at the time of manufacture.

Weights

Minimum Operating Weight with Canopy*	3105 kg
Maximum Operating Weight with Canopy**	3480 kg
Minimum Operating Weight with Cab*	3220 kg
Maximum Operating Weight with Cab**	3600 kg

*Minimum Weight is based on rubber tracks, operator, full fuel tank, standard stick, blade, bucket and no extra counterweight.

**Maximum Weight is based on steel tracks, operator, full fuel tank, standard stick, blade, bucket and extra counterweight.



303 CR Mini Excavator

Weight Increase from Minimum ConfigurationCab115 kgCounterweight (extra)250 kg		
Cab	115 kg	
Counterweight (extra)	250 kg	
Steel Tracks	125 kg	

Travel System

 Travel Speed – High	4.5 km/h
Travel Speed – Low	2.6 km/h
Maximum Traction Force – High Speed	14.7 kN
Maximum Traction Force – Low Speed	31.4 kN
Ground Pressure – Minimum Weight	28.3 kPa
Ground Pressure – Maximum Weight	32.8 kPa
Gradeability (maximum)	30 degrees

Service Refill Capacities

Cooling System	4.0 L
Engine Oil	4.0 L
Fuel Tank	45.0 L
Hydraulic Tank	18.0 L
Hydraulic System	35.0 L

Hydraulic System

Load Sensing Hydraulics with Varia	able Displacement Piston Pump
Pump Flow @ 2,400 rpm	100 L/min
Operating Pressure – Equipment	245 bar
Operating Pressure – Travel	245 bar
Operating Pressure – Swing	176 bar
Auxiliary Circuit – Primary	
Flow*	65 L/min
Pressure*	245 bar
Digging Force – Stick (standard)	16.6 kN
Digging Force – Bucket	28.4 kN

*Flow and pressure are not combinable. Under load, as flow rises pressure goes down.

Swing System

Machine Swing Speed	9.0 rpm
Boom Swing – Left	75 Degrees
Boom Swing – Right	50 Degrees

Blade

Width	1550 mm
Height	350 mm

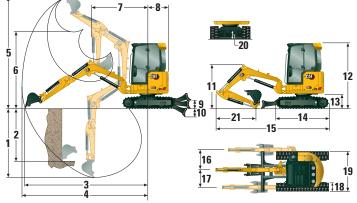
Certification – Cab and Canopy

Roll Over Protective Structure (ROPS)	
Tip Over Protective Structure (TOPS)	
Top Guard	

ISO 12117-2:2008 ISO 12117:1997 ISO 10262:1998 (Level I)

Sound

Operator Sound Pressure (ISO 6396:2008)	78 dB(A)
Average Exterior Sound Pressure (ISO 6395:2008)	94 dB(A)



Dimensions

lard Stick
50 mm
20 mm
30 mm
80 mm
10 mm
70 mm
50 mm
75 mm
90 mm
85 mm
35 mm
00 mm
80 mm
70 mm
70 mm
10 mm
70 mm
40 mm
00 mm
50 mm
50 11111
10 mm

†Overall Shipping Length depends on blade position during shipment.

Cab

Lift Capacities – Lift Point Radius				– 2 m Lift Point Radius – 3 m			Lift Point Radius (Maximum)					
Minimum Configuration		n	Over Front		Over	Front		Over Front				
			Blade			Blade			Blade			
	Lift Point Height		Down	Blade Up	Over Side	Down	Blade Up	Over Side	Down	Blade Up	Over Side	m
3 m	Standard Stick	kg				*792	630	548	*848	441	385	3.67
2 m	Standard Stick	kg				*998	601	520	*864	349	303	4.16
1 m	Standard Stick	kg				*1352	553	475	*903	321	278	4.29
0 m	Standard Stick	kg	*1280	1003	823	*1522	525	448	*955	335	289	4.11

Minimum Weight includes cab, rubber tracks, no extra counterweight, operator, full fuel tank and blade.

Lift Capacities –		Lift Point Radius – 2 m			Lift Point Radius – 3 m			Lift Point Radius (Maximum)				
Maximum Configuration		Over Front			Over Front			Over Front				
	Lift Point Height		Blade Down	Blade Up	Over Side	Blade Down	Blade Up	Over Side	Blade Down	Blade Up	Over Side	m
3 m)	Standard Stick	kg				*792	*792	647	*848	573	464	3.67
2 m	Standard Stick	kg				*998	773	620	*864	461	372	4.16
1 m	Standard Stick	kg				*1352	725	576	*903	429	345	4.29
0 m	Standard Stick	kg	*1280	*1280	990	*1522	697	549	*955	449	360	4.11

Maximum Weight includes cab, steel tracks, extra counterweight, operator, full fuel tank and blade.

Canopy

Lift Capacities –		Lift Point Radius – 2 m			Lift Point Radius – 3 m			Lift Point Radius (Maximum)				
Minimum Configuration		Over Front			Over Front			Over	Front			
			Blade	Dia ta Ua	0	Blade	Dia ta the	0	Blade	Dia ta the	0	l
	Lift Point Height		Down	Blade Up	Over Side	Down	Blade Up	Over Side	Down	Blade Up	Over Side	m
3 m	Standard Stick	kg				*792	603	526	*848	420	368	3.67
2 m	Standard Stick	kg				*998	574	498	*864	331	289	4.16
1 m	Standard Stick	kg				*1352	526	453	*903	304	264	4.29
0 m	Standard Stick	kg	*1280	952	784	*1522	498	426	*955	317	275	4.11

Minimum Weight includes canopy, rubber tracks, no extra counterweight, operator, full fuel tank and blade.

Lift Capacities –		Lift Point Radius – 2 m			Lift Point Radius – 3 m			Lift Point Radius (Maximum)				
Maximum Configuration		Over Front			Over Front			Over Front				
			Blade			Blade			Blade			
	Lift Point Height		Down	Blade Up	Over Side	Down	Blade Up	Over Side	Down	Blade Up	Over Side	m
3 m	Standard Stick	kg				*792	774	627	*848	552	449	3.67
2 m	Standard Stick	kg				*998	746	600	*864	443	359	4.16
1 m	Standard Stick	kg				*1352	698	555	*903	412	332	4.29
0 m	Standard Stick	kg	*1280	1269	954	*1522	670	529	*955	431	346	4.11

Maximum Weight includes canopy, steel tracks, extra counterweight, operator, full fuel tank and blade.

*The above loads are in compliance with hydraulic excavator lift capacity rating standard ISO 10567:2007 and they do not exceed 87% of hydraulic lifting capacity or 75% of tipping capacity. The excavator bucket weight is not included on this chart. Lifting capacities are for standard stick.

Standard and Optional Equipment

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

	Standard	Optional
ENGINE		
Cat® C1.1 Turbo Engine (China Nonroad IV)	✓ ✓	
Automatic Engine Idle	 ✓	
Automatic Engine Shutdown		
Automatic Two Speed Travel	✓	
Fuel Water Separator	 ✓	
Power on Demand (not available in all regions)		
Variable Displacement Piston Pump	✓	
Load Sensing/Flow Sharing Hydraulics	✓	
HYDRAULICS	1	
Smart Tech Electronic Pump	•	
Accumulator	✓	
Automatic Swing Brake	<u>√</u>	
One and Two Way Auxiliary Flow	✓	
Continuous Auxiliary Flow	~	
Auxiliary Hydraulic Lines		✓
Auxiliary Line Ball Valve Connect		~
OPERATOR ENVIRONMENT		
Tilt-up Canopy or Tilt-Up Cab	✓	
Cab with Air Conditioning	✓	
Cab with Heater	✓	
Top Guard ISO 10262:1998 Level I	\checkmark	
ROPS – ISO 12117-2:2008	\checkmark	
TOPS – ISO 12117:1997	\checkmark	
Stick Steer Mode	\checkmark	
Travel Cruise Control	\checkmark	
Control Pattern Changer (optional in some regions)	√	
Adjustable Wrist Rests	\checkmark	
Washable Floor Mat	\checkmark	
Travel Pedals and Hand Levers	\checkmark	
Machine Security	\checkmark	
Standard Key with Pass Code	\checkmark	
Fabric Suspension Seat (Cab only)	\checkmark	
Vinyl Suspension Seat (Canopy only)	✓	
Hydraulic Lockout – All Controls	✓	
Retractable High Visibility Seat Belt (75 mm)	\checkmark	
Coat Hook	\checkmark	
Cup Holder	\checkmark	
Storage Pocket	\checkmark	
Skylight	✓	
Mounting Bosses for Front	✓	
Signaling/Warning Horn	✓	
Interior Light (Cab only)	√	
LED Front Lights		√
LED Boom Light	√	
Utility Space for Mobile Phone	· ✓	
Mirrors Left and Right		

	Standard	Optional
OPERATOR ENVIRONMENT (continued)		
Next Generation Color LCD Monitor (IP66)	✓	
– Fuel Level and Coolant Temperature Gauges	✓	
 Maintenance and Machine Monitoring 	✓	
– Performance and Machine Adjustments	✓	
– Numeric Security Code	\checkmark	
– Multiple Languages	✓	
– Hour Meter with Wake Up Switch	✓	
– Jog Dial (cab only)	✓	
Next Generation Advanced Monitor		\checkmark
– Touch Screen		\checkmark
– Site Reference System		\checkmark
– High Definition Camera Capable (IP68 and IP69K)		\checkmark
– Numeric Security Code		\checkmark
UNDERCARRIAGE		
Rubber Belt (300 mm wide)		\checkmark
Steel Track (300 mm wide)	\checkmark	
Dozer Blade	\checkmark	
Dozer Blade Float	\checkmark	
Tie Downs on Track Frame	\checkmark	
BOOM, STICK AND LINKAGES		
One Piece Boom (2200 mm)	\checkmark	
Standard Stick (1260 mm)	\checkmark	
ELECTRICAL		
12 Volt Battery	\checkmark	
Software (machine and monitor)	\checkmark	
Maintenance Free Battery	\checkmark	
Battery Disconnect	\checkmark	
Signaling/Warning Horn	\checkmark	
12 Volt Power Socket	\checkmark	
Product Link™ PL243 (regulations apply)		\checkmark
OTHER		
Extra Counterweight (250 kg/551 lb)		\checkmark

For more complete information on Cat products, dealer services, and industry solutions, visit us on the web at **www.cat.com**

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Materials and specifications are subject to change without notice. Featured machines in photos may include additional equipment. See your Cat dealer for available options.

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