

# 730 Articulated Truck

# **Technical Specifications**

Configurations and features may vary by region. Please consult your Cat® dealer for availability in your area.

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Engine		
Engine Model	Cat® C13	
Gross Power (SAE J1995)	280 kW	375 hp
Net Power (SAE J1349)	274 kW	367 hp
Engine Power (ISO 14396)	276 kW	370 hp
Bore	130 mm	5.1 in
Stroke	157 mm	6.2 in
Displacement	12.5 L	762.8 in <sup>3</sup>

- Advertised power is tested at 1,800 rpm.
- Advertised power is tested per the specified standard in effect at the time of manufacture.
- The net power advertised is the power available at the flywheel when the engine is equipped with alternator, air cleaner, muffler, and fan at minimum speed.
- Net power when the fan is at maximum speed is 254 kW (341 hp) per the SAE reference conditions.
- Meets U.S. EPA Tier 4 Final, EU Stage V, Korea Stage V, and Japan 2014 emission standards.
- Diesel exhaust fluid (DEF) used in Cat SCR systems must meet the requirements outlined in ISO 22241-1. ISO 22241-1 requirements are met by many brands of DEF, including those that carry the AdBlue or API certifications.

No Engine Derating Below	3810 m	12,500 ft
Peak Engine Torque Gross (SAE J1995:2014)	2141 N·m	1,579 lbf-ft
Peak Engine Torque Net (SAE J1349:2011)	2107 N·m	1,554 lbf-ft
Peak Engine Torque Speed	1,200 rpm	

Weights		
Rated Payload	28 tonnes	31 tons

#### **Air Conditioning System**

- The air conditioning system on this machine contains the fluorinated greenhouse gas refrigerant R134a or R1234yf. See the label or instruction manual for identification of the gas.
- If equipped with R134a (Global Warming Potential = 1430), the system contains 1.1 kg (2.4 lb) of refrigerant, which has a CO<sub>2</sub> equivalent of 1.716 metric tonnes (1.891 tons).

<b>Body Capacities</b>		
Heaped SAE 2:1	17.5 m³	23.0 yd³
Struck	13.3 m³	17.4 yd³
Tailgate Heaped SAE 2:1	18.8 m³	24.6 yd³
Tailgate Struck	13.9 m³	18.2 yd³
Transmission		
Enmond 1	0.1/1-	51.

Transmission		
Forward 1	8 km/h	5 mph
Forward 2	15 km/h	9 mph
Forward 3	22 km/h	14 mph
Forward 4	34 km/h	21 mph
Forward 5	47 km/h	29 mph
Forward 6	55 km/h	34 mph
Reverse 1	9 km/h	6 mph

#### **Sound Levels**

Interior Cab 72 dB(A)

- The declared dynamic operator sound pressure level is 72 dB(A) when ISO 6396:2008 is used to measure the value for an enclosed cab. The measurement was conducted at 70% of the maximum cooling fan's speed. The sound level may vary at different cooling fan speeds. The measurement was conducted with the cab doors and the cab windows closed. The cab was properly installed and maintained.
- Hearing protection may be needed when operating with an open operator station and cab or when not properly maintained or with doors/windows open for extended periods or in noisy environments.

Operating Weights		
Front Axle – Empty	15 000 kg	33,069 lb
Center Axle – Empty	4560 kg	10,053 lb
Rear Axle – Empty	4340 kg	9,568 lb
Total – Empty	23 900 kg	52,690 lb
Front Axle – Rated Load	3280 kg	7,231 lb
Center Axle – Rated Load	12 360 kg	27,249 lb
Rear Axle – Rated Load	12 360 kg	27,249 lb
Total – Rated Load	28 000 kg	61,729 lb
Front Axle – Loaded	18 280 kg	40,300 lb
Center Axle – Loaded	16 920 kg	37,302 lb
Rear Axle – Loaded	16 700 kg	36,817 lb
Total – Loaded	51 900 kg	114,420 lb

Body Pl	ate
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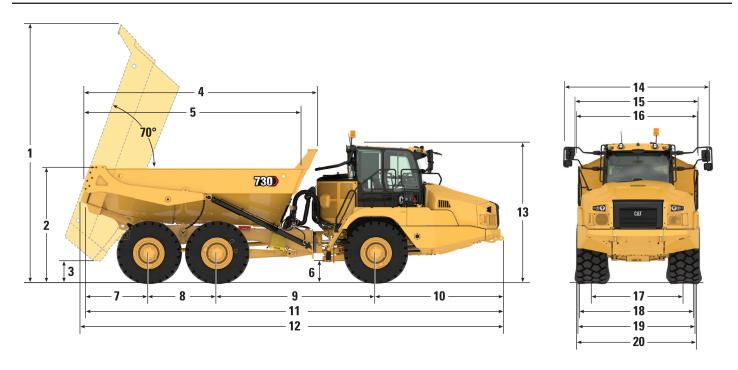
High strength Brinell HB450 wear resistant steel

Body Plate Thickness		
Front Plate	7 mm	0.28 in
Base Plate	13 mm	0.51 in
Side Plates	11 mm	0.43 in

Service Refill Capacities		
Fuel Tank	412 L	108.8 gal
DEF Tank	20 L	5.3 gal
Cooling System	83 L	21.9 gal
Hydraulic System	110 L	29.1 gal
Engine Crankcase	38 L	10.0 gal
Transmission	47 L	12.4 gal
Final Drives/Differential	125 L	33.0 gal
Output Transfer Gear Box	24 L	6.3 gal
<b>Body Hoist</b>		
Raise Time	12 Second	ls
Lower Time	8 Seconds	3
Standards		
Brakes	ISO 3450:2011	
Cab/Falling objects protective structure (FOPS)	ISO 3449:2005 Level II	
Cab/Rollover protective structure (ROPS)	ISO 3471:2008	
Steering	ISO 5010:	2019

#### **Dimensions**

All dimensions are approximate.



	mm	ft/in
1 Body Height Fully Tipped	6468	21'3"
2 Load Over Height	2916	9'5"
3 Ground Clearance – Body Fully Tipped	563	1'10"
4 Body Length	5783	19'0"
5 Body Length Inside	5411	17'9"
6 Ground Clearance	545	1'9"
7 Rear Axle Center to Body Rear	1556	5'1"
8 Mid Axle to Rear Axle Center	1700	5'7"
9 Mid Axle to Front Axle (Centers)	3979	13'1"
10 Front Axle Center to Machine Front	3210	10'6"
11 Overall Length	10 445	34'3"
12 Overall Length with Tailgate	10 593	34'8"
13 Height Transport Position	3508	11'6"
14 Overall Width	3676	12'1"
15 Width Over Tailgate/Width Including Tailgate	2984	9'10"
<b>16</b> Body Width	2902	9'6"
17 Track Width	2275	7'6"
<b>18</b> Width Over Tire	2877	9'5"
19 Width Over Fenders	2950	9'8"
20 Max Laden Over Tire Bulge	2950	9'8"

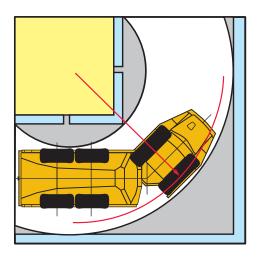
#### **Turning Circle**

Dimensions are for machines equipped with 23.5R25 tires.

Turning Dimensions		
Steer Angle – From Center Left/Right	45°	
SAE Turning Radius	7470 mm	294 in
Clearance Radius	8075 mm	318 in
Inside Radius	3879 mm	153 in
Aisle Width	5332 mm	210 in

#### **Steering**

Lock to Lock 4.75 seconds at 60 rpm



#### **Optimal Loader/Truck Pass Matching**

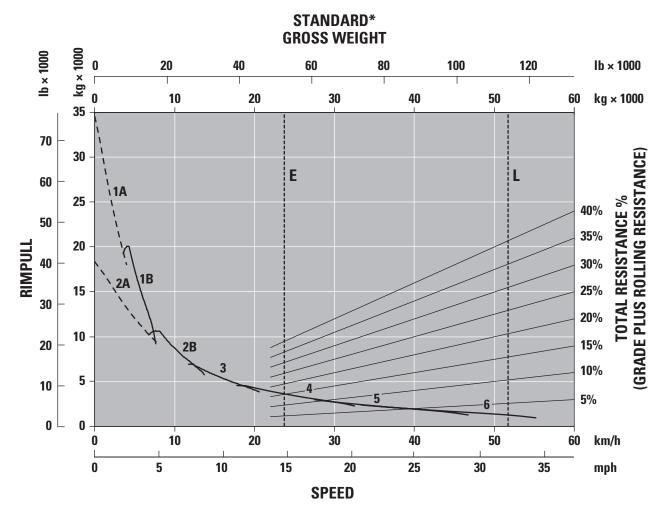
Hydraulic Excavators	349/352	336
Passes	4-5	5-6

Wheel Loaders	972/972 XE	966/966 XE	962	950
Passes	3-4	4	4-5	5

An optimum system match gives you a major productivity advantage. The 730 is an excellent match for the Cat 349/352 and 336 Hydraulic Excavators and Cat 972, 966, 962, and 950 Wheel Loaders. Having matched loading and hauling tools results in increased production and lower system costs per unit of volume moved.

#### **Gradeability/Speed/Rimpull**

To determine performance, read from Gross Weight down to % Total Resistance. Total Resistance equals actual % grade plus 1% for each 10 kg/metric ton (20 lb/ton) of Rolling Resistance. From this point, read horizontally to the curve with the highest attainable speed range. Then, go down to Maximum Speed. Usable Rimpull depends on traction available.



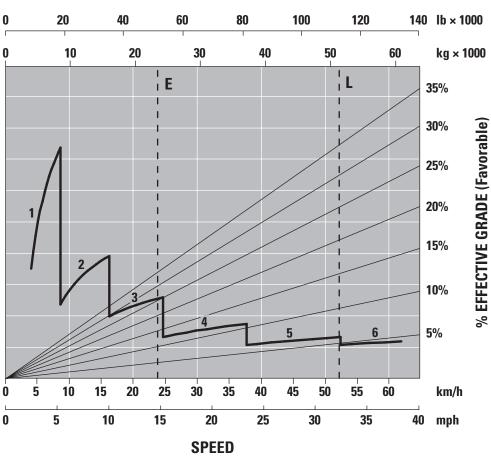
- 1A 1st Gear (Converter Drive)
- 1B 1st Gear (Direct Drive)
- 2A 2nd Gear (Converter Drive)
- 2B 2nd Gear (Direct Drive)
- 3 3rd Gear
- 4 4th Gear
- 5 5th Gear
- 6 6th Gear

- E Empty 23 725 kg (52,305 lb)
- L Loaded 51 725 kg (114,034 lb)
- \* at sea level

#### **Retarding Performance**

To determine performance, read from Gross Weight down to % Effective Grade. Effective Grade equals actual % favorable grade plus 1% for each 10 kg/metric ton (20 lb/ton) of Rolling Resistance. From this point, read horizontally to the curve with the highest attainable speed range. Then, go down to Maximum Speed. Retarding effect on these curves represents full application of the retarder.





- 1 1st Gear
- 2 2nd Gear
- $3-3rd\ Gear$
- 4 4th Gear
- 5 5th Gear
- 6 6th Gear

E – Empty 23 725 kg (52,305 lb) L – Loaded 51 725 kg (114,034 lb)

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### 730 Articulated Truck Standard & Optional Equipment

#### **Standard and Optional Equipment**

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

	Standard	Optional
OPERATOR ENVIRONMENT		
Air conditioning	✓	
Adjustable air vents	✓	
Combined gear selection and hoist control lever	✓	
Glass windows: front, laminated and tinted; sides and rear, toughened and tinted	✓	
Heater and defroster with four-speed fan	✓	
Infrared glass, high ambient cab		✓
Liquid Crystal Display (LCD): alert indicator, selected gear and direction, speed or auto shift, review Operation and Maintenance Manual (OMM), primary steering failure warning, seat belt warning, secondary steering failure warning, Diesel Particulate Filter (DPF) regeneration filter, secondary steering energy source engaged, hour meter, retarder active	<b>√</b>	
Mirrors, exterior	✓	
Mirrors, heated motorized		<b>√</b>
Machine operation monitoring system: action lamp, engine oil pressure, primary steering system, left and right turn signal, high beam, coolant temperature, tachometer, parking brake, fuel level, transmission oil temperature, brake system, transmission hold, hoist control, hydraulic system, charging system, retarder, transmission fault, traction control system, check engine lamp	<b>V</b>	
Radio, Bluetooth® stereo system		✓
Seats: operator – fully adjustable, air suspension, retractable lap belt; trainer – padded with retractable lap belt	✓	
Seat, heated/cooled		✓
Operator seat belt, four-point		✓
Secondary steering, electro hydraulic	✓	
Storage: cup holder, flask receptacle, under seat storage, door pocket, behind operator seat storage, coat hook	✓	
Sun visor	✓	
Tilt and telescopic steering wheel	✓	
Touchscreen display incorporating the rearview camera video feed	✓	
Window blinds		✓
Windows (tinted) opening both sides	✓	
Windshield wiper and washer, two speed, intermittent (front)	✓	
Window wiper and washer, two speed (rear)		✓

	Standard	Optional
TECHNOLOGY		·
Cat® Detect with Stability Assist	✓	
Cat Payload		<b>√</b>
Machine Security System (MSS)		✓
Product Link Cellular PLE643	✓	
Product Link Dual PLE683		✓
ELECTRICAL AND LIGHTING		
Batteries (two) maintenance-free	✓	
Cold weather start attachment		✓
Engine block heater		✓
Ether start		✓
Electrical system: 24-volt, 10A 24- to 12-volt converter	✓	
Flashing LED beacon		
Horn	<b>√</b>	
Lighting systems: cab interior, two head	<b>√</b>	
lamps, two width marker, two reversing, work		
light/cab access light, two stop/tail lights, front		
and rear direction indicators		
Main disconnect switch	<b>√</b>	
Remote starting receptacle (cables not included)	<b>√</b>	
Roof mounted LED work lights		<b>√</b>
POWERTRAIN		
Auto shift six-speed forward and single-speed reverse transmission	✓	
Cat C13 engine	✓	
CX31 transmission	<b>√</b>	
Cat Clean Emission Module (CEM)	<b>√</b>	
and exhaust aftertreatment package		
Differentials: standard with automatic	✓	
clutched inter- and cross-axle differential locks		
Dual circuit oil immersed, enclosed	✓	
brakes - all wheels Retarder: engine compression brake		
Three axle, six-wheel drive		
SAFETY	,	
Reverse alarm	1	
Rearview camera	<u> </u>	
Rollover protective structure/falling objects		
protective structure (ROPS/FOPS) cab		
GUARDS		
Crankcase	✓	
Front dump body spill guard, integral part of	✓	
fabricated body		
Radiator	✓	
Rear window	<b>√</b>	

## 730 Articulated Truck Standard & Optional Equipment

#### **Standard and Optional Equipment**

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

	Standard	Optional
OTHER STANDARD AND OPTIONAL EQUIPMENT		
Auto lube installation for automatic greasing of bearings		✓
Bare chassis (no body) standard wheel base		✓
Bare chassis (no body) long wheel base		✓
Body liners		✓
Cold weather coolant -51° C (-60° F)		✓
Exhaust heated body		✓
Fast fuel fill		✓
Fuel additive, anti-waxing		<b>√</b>

	Standard	Optional
OTHER STANDARD AND OPTIONAL EQUIPMENT	(CONTINUED	)
Mud flaps: wheel arch and body mounted with transportation tiebacks	✓	
Scissor tailgate		✓
S·O·S <sup>SM</sup> sampling valves	✓	
Sound suppression (standard in some countries)*	✓	
Tires, six 23.5R25, radial	✓	
Tires, six 750/65R25, radial		✓
Vandalism protection: lockable caps	✓	
Wheel chocks		✓

<sup>\*</sup> EFTA countries are EU countries plus Iceland, Norway, Lichtenstein, Switzerland, Türkiye and UK.

### 730 Environmental Declaration

The following information applies to the machine at the time of final manufacture as configured for sale in the regions covered in this document. The content of this declaration is valid as of the date issued; however, content related to machine features and specifications are subject to change without notice. For additional information, please see the machine's Operation and Maintenance Manual.

For more information on sustainability in action and our progress, please visit <a href="https://www.caterpillar.com/en/company/sustainability">https://www.caterpillar.com/en/company/sustainability</a>.

#### **Engine**

- The Cat<sup>®</sup> C13 engine meets U.S. EPA Tier 4 Final, EU Stage V, Korea Stage V, and Japan 2014 emission standards.
- Cat diesel engines are required to use ULSD (ultra-low sulfur diesel fuel with 15 ppm of sulfur or less) and are compatible\* with ULSD blended with the following lower-carbon intensity fuels\*\* up to:
- 20% biodiesel FAME (fatty acid methyl ester)\*\*\*
- 100% renewable diesel, HVO (hydrotreated vegetable oil and GTL (gas-to- liquid) fuels

Refer to guidelines for successful application. Please consult your Cat dealer or "Caterpillar Machine Fluids Recommendations" (SEBU6250) for details.

- \* While Caterpillar engines are compatible with these alternative fuels, some regions may not allow their use.
- \*\* Tailpipe greenhouse gas emissions from lower-carbon intensity fuels are essentially the same as traditional fuels.
- \*\*\* Engines with no aftertreatment devices can use higher blends, up to 100% biodiesel (for use of blends higher than 20% biodiesel, consult your Cat dealer).

#### **Air Conditioning System**

- The air conditioning system on this machine contains the fluorinated greenhouse gas refrigerant R134a or R1234yf. See the label or instruction manual for identification of the gas.
- If equipped with R134a (Global Warming Potential = 1430), the system contains 1.1 kg (2.4 lb) of refrigerant which has a CO<sub>2</sub> equivalent of 1.716 metric tonnes (1.891 tons).

#### **Paint**

- Based on best available knowledge, the maximum allowable concentration, measured in parts per million (PPM), of the following heavy metals in paint are:
- Barium < 0.01%
- Cadmium < 0.01%
- Chromium < 0.01%
- Lead < 0.01%

#### **Sound Performance**

#### Interior Cab

#### 72 dB(A

- The declared dynamic operator sound pressure level is 72 dB(A) when ISO 6396:2008 is used to measure the value for an enclosed cab. The measurement was conducted at 70% of the maximum cooling fan's speed. The sound level may vary at different cooling fan speeds. The measurement was conducted with the cab doors and the cab windows closed. The cab was properly installed and maintained.
- Hearing protection may be needed when operating with an open operator station and cab or when not properly maintained or doors/windows open for extended periods or in noisy environments.

#### **Oils and Fluids**

- Caterpillar factory fills with ethylene glycol coolants. Cat Diesel Engine Antifreeze/Coolant (DEAC) and Cat Extended Life Coolant (ELC) can be recycled. Consult your Cat dealer for more information.
- Cat Bio HYDO Advanced is an EU Ecolabel approved biodegradable hydraulic oil.
- Additional fluids are likely to be present; please consult the Operations and Maintenance Manual or the Application and Installation guide for complete fluid recommendations and maintenance intervals.

#### **Features and Technology**

- The following features and technology may contribute to fuel savings and/or carbon reduction. Features may vary. Consult your Cat dealer for details.
  - Economy mode minimizes fuel consumption without impacting productivity
  - Optimize airflow and enhance power and fuel efficiency with innovative air-management systems
- Maximize uptime and reduce cost with world-class support from the Cat dealer network
- Uniquely combined hoist and transmission level allows for easy, intuitive control and cuts operator interaction by as much as 50%

AEXQ2714-03 (05-2025) Replaces AEXQ2714-02 Build Number: 04A (Aus-NZ, Europe, Japan, N Am)

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

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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