



Cat[®] CP11 GC

Padfoot Drum Vibratory Soil Compactor

The Cat[®] CP11 GC Vibratory Soil Compactor features a padfoot drum and is ideally suited for cohesive and semi-cohesive soil applications. A reliable vibratory system, exceptional operator comfort and ease of use deliver dependable, economical production with performance that exceeds expectations.

Reliable Power

- A single propel pump design delivers excellent gradeability.
- Powered by a Cat[®] C3.6 engine that meets U.S. EPA Tier 4 Final, EU Stage V and Korea Stage V emission standards.
- Eco-mode limits engine RPM helping to reduce fuel consumption.
- Engine Idle Shutdown Timer reduces fuel burn and unnecessary idle time by shutting down the machine after a pre-set idling period.

Comfortable and Ergonomic Operator Station

- The ISO-mounted operator station and rubber floor mats help reduce noise and vibration for comfort during operation.
- Easy to use controls are grouped by function and a large display informs operators of machine performance.
- The seat, armrest and steering column are adjustable for all-day comfort.
- Operators are protected from the elements by a standard equipped ROPS/FOPS canopy or an optional climate-controlled ROPS/FOPS cab with hinged glass windows.
- Cab configurations can be upgraded to a deluxe high back air-ride seat to enhance operator comfort.

Safety Features

- Angled steps, handrails, and an antiskid surface help provide stability during entry and exit of the operator station.
- Internal and external mirrors are available to provide the operator with a broad view of the jobsite.
- Enhance visibility with an optional rear vision camera with large color touchscreen display for more complete operator control and safety.
- Optional operator presence seat sensor and seat belt switch.

Excellent Compaction Performance

- Exclusive eccentric weight design provides high reliability, smooth performance and low noise with a 3-year, 3000-hour maintenance interval.
- High static linear loads and amplitudes.
- The Auto-vibe function makes it easy to ensure consistent, high-quality compaction.
- A unique oval padfoot design delivers higher weight concentration and deeper penetration for increased compaction effort. Also available in a square pad design.

Enhance Quality and Productivity with Technology

- Optional Cat Compact technologies help you consistently meet compaction targets faster, more uniformly, and in fewer passes – saving on fuel and reducing rework and material costs.
 - Exclusive Machine Drive Power (MDP) is an energy-based measurement and can be used on all soil types in either static or vibratory mode.



Cat® CP11 GC Padfoot Drum Vibratory Soil Compactor

Virtually Maintenance Free

- Maintenance-free hitch with sealed-for-life bearings.
- Ground-level access to all maintenance points for easy service and fluid sampling.
- Monitor fluid conditions with regular sampling to help extend change intervals up to 500 hours engine oil, 3000 hours eccentric housing and hydraulic oil, and 12000 hours coolant.
- Extended maintenance intervals not only reduce downtime but decrease the amount of fluid and filters that are replaced over the life of the machine.

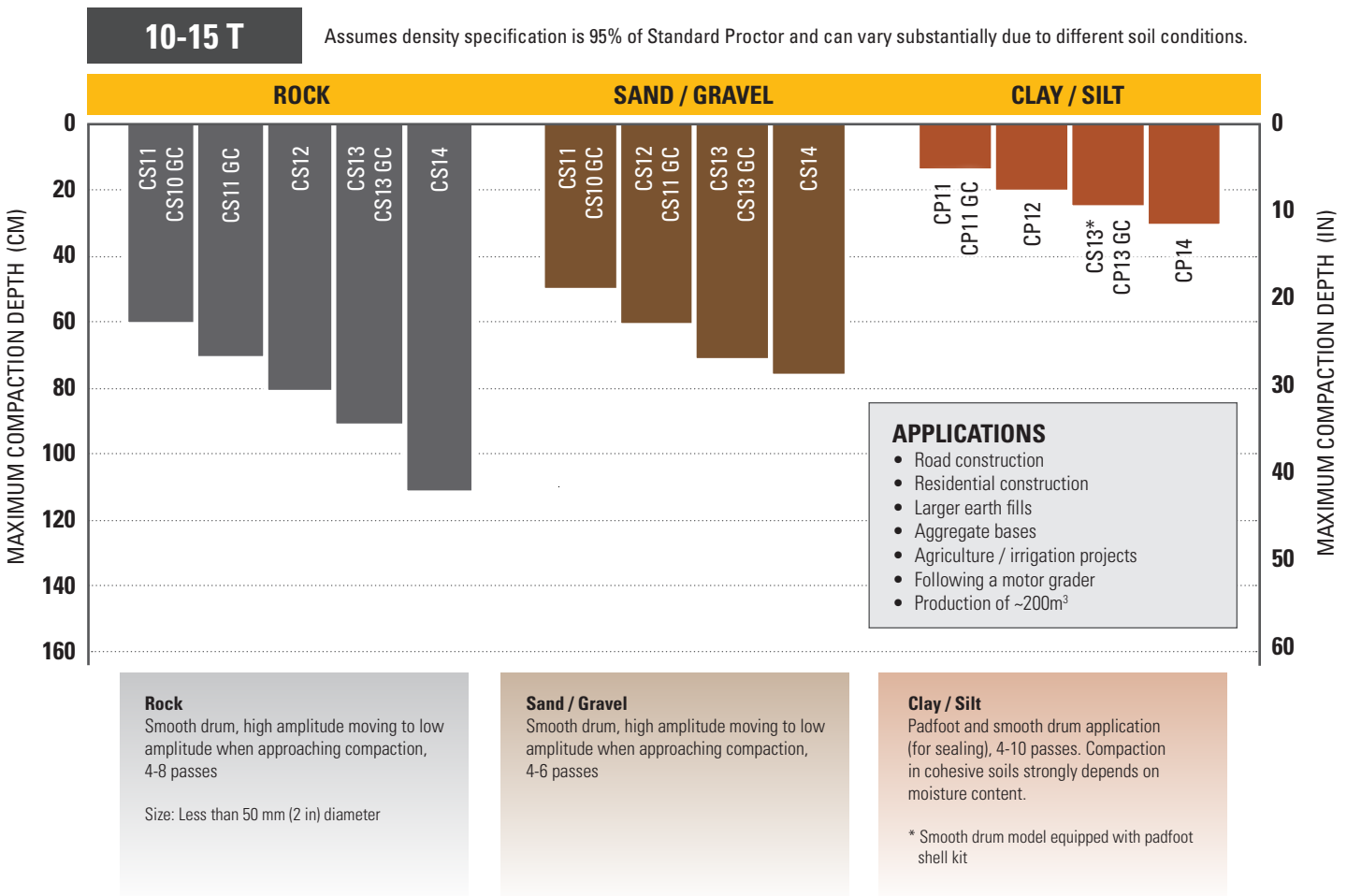
- VisionLink® takes the guesswork out of managing your entire fleet—regardless of size or equipment manufacturer*—by providing maintenance needs, machine hours, location, fuel usage, idle time, diagnostic codes, and more through interactive dashboards on your mobile device or desktop, helping you make informed decisions that lower costs, simplify maintenance, and improve safety and security on your jobsite.
- Remote Flash allows you to update onboard software without a technician being present, allowing you to initiate software updates when convenient, increasing your overall operating efficiency**
- Remote Troubleshoot allows your Cat dealer to perform diagnostic testing on your connected machine remotely**

* Data field availability can vary by equipment manufacturer and is provided through an application programming interface (API).

** Must be within cell range coverage.

Vibratory Soil Compactor Selection Guide

This chart helps you select which model is best suited for your work. Not all models listed are available in each region. Contact your Cat dealer representative for more information.



Cat® CP11 GC Padfoot Drum Vibratory Soil Compactor

Standard and Optional Equipment

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

	Standard	Optional		Standard	Optional
OPERATOR ENVIRONMENT			TECHNOLOGY SOLUTIONS		
ROPS/FOPS Canopy with Handrails, Floor Mat, Interior Rear View Mirror	✓		VisionLink®	✓	
ROPS/FOPS Cab with Climate Control, Floor Mat, Exterior Rear View Mirrors		✓	Remote Flash	✓	
Vinyl Suspension Seat	✓		Remote Troubleshoot	✓	
Deluxe High-back Air-ride Seat (Cab)		✓	Remote Disable	✓	
Sun/Debris Shields (Canopy)		✓	Measure – Machine Drive Power (MDP)		✓
Roll-down Sun Screen (Cab)		✓	Machine Speed Sensor		✓
Interior Rear View Mirror (Cab)		✓	POWERTRAIN		
Exterior Rear View Mirrors (Canopy)		✓	Cat® C3.6 Engine	✓	
Adjustable Tilting Steering Column	✓		Single Propel Pump	✓	
Rear View Camera with Color Touchscreen Display		✓	Fuel Filter, Water Separator, Priming Pump, Water Indicator	✓	
High Visibility 76 mm (3 in) Seat Belt	✓		Radiator/Hydraulic Oil Cooler	✓	
12-volt Power Outlet	✓		Dual Braking System	✓	
Horn, Backup Alarm	✓		Two-Speed Hydrostatic Transmission	✓	
Seat Belt Switch		✓	Limited Slip Differential	✓	
Sound Reduction Kit		✓	Transmission Guard		✓
VIBRATORY SYSTEM			ELECTRICAL		
Padfoot Drum – Oval or Square Pads	✓		12 volt Electrical System	✓	
Pod-Style Eccentric Weight Housings	✓		150 ampere Alternator	✓	
Dual Amplitude, Dual Frequency	✓		900 Cold-cranking Amps Battery Capacity	✓	
Auto-vibe Function	✓		Battery Disconnect Switch	✓	
Dual Adjustable Steel Scrapers	✓		OTHER		
			Sight Gauges for Hydraulic Oil Level and Radiator Coolant Level	✓	
			S•O•S SM Sampling Values: Engine Oil, Hydraulic Oil, and Coolant	✓	
			High Ambient Temperature Oil Factory Fill		✓
			Lug Tread Tires	✓	
			Working Lights (2 Forward, 2 Rear)	✓	
			Upgraded Lighting Package (4 Forward, 4 Rear)		✓
			Amber Rotating Beacon		✓

Cat® CP11 GC Padfoot Drum Vibratory Soil Compactor

Technical Specifications

Engine and Powertrain

Engine Model	Cat C3.6	
Emissions	U.S. EPA Tier 4 Final, EU Stage V, Korea Stage V	
Engine Power – ISO 14396:2002	90 kW	121 hp
Gross Power – SAE J1995:2014	91.7 kW	122.9 hp
Net Power – ISO 9249:2014*	83.7 kW	112.2 hp
Net Power – SAE J1349:2011*	82.9 kW	111.2 hp
Number of Cylinders	4	
Displacement	3.6 L	219.7 in ³
Stroke	120 mm	4.7 in
Bore	98 mm	3.9 in
Max. Travel Speed (Forward or Reverse)	11 km/h	6.8 mph
Theoretical Gradeability, with or without vibration**	55%	

* Net power advertised is the power available at the engine flywheel when equipped with a fan at maximum speed, air cleaner, clean emissions module, and alternator.

** Actual gradeability may vary based on site conditions and machine configuration. Refer to the Operation and Maintenance Manual for more information.

Vibratory System

Nominal Amplitude – High	1.8 mm	0.071 in
Frequency at High Idle	30 Hz	1800 vpm
Frequency at Eco-Mode	28.6 Hz	1716 vpm
Nominal Amplitude – Low	0.89 mm	0.035 in
Frequency at High Idle	33 Hz	1980 vpm
Frequency at Eco-Mode	31.5 Hz	1890 vpm
Centrifugal Force		
Maximum @ 30 Hz (1800 vpm)	249 kN	55,932 lb
Minimum @ 33 Hz (1980 vpm)	148 kN	33,249 lb
VM Class at High Amplitude (Cab Configuration)	VM3	

Weights

Operating Weight

ROPS/FOPS Canopy		
Oval Padfoot Drum	11 235 kg	24,769 lb
Square Padfoot Drum	11 267 kg	24,840 lb
ROPS/FOPS Cab		
Oval Padfoot Drum	11 389 kg	25,109 lb
Square Padfoot Drum	11 421 kg	25,179 lb

Weight at Drum

ROPS/FOPS Canopy		
Oval Padfoot Drum	6345 kg	13,988 lb
Square Padfoot Drum	6377 kg	14,059 lb
ROPS/FOPS Cab		
Oval Padfoot Drum	6388 kg	14,084 lb
Square Padfoot Drum	6420 kg	14,154 lb

Operating weights are approximate and consider full fluids and 75 kg (165 lb) operator. Cab weights include heat and air conditioning.

Service Refill Capacities

Fuel Tank (total capacity)	213 L	56.3 gal
Diesel Exhaust Fluid (DEF) Tank	19 L	5 gal
Cooling System	18.5 L	4.9 gal
Engine Oil with Filter	11.6 L	3.1 gal
Eccentric Weight Housings (combined)	26 L	6.9 gal
Axle and Final Drives	10 L	2.6 gal
Hydraulic Tank	23 L	6.1 gal

Cat® CP11 GC Padfoot Drum Vibratory Soil Compactor

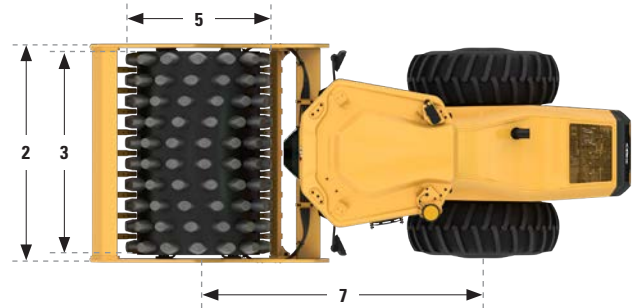
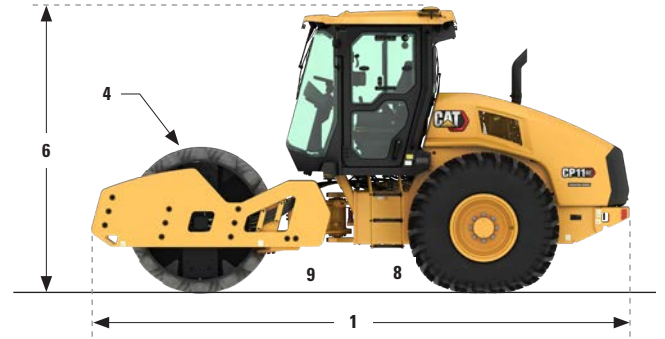
Technical Specifications

Dimensions

1	Overall Length	5.7 m	18.7 ft
2	Overall Width	2.3 m	7.5 ft
3	Drum Width	2134 mm	84 in
4	Drum Shell Thickness	25 mm	1 in
5	Drum Diameter	1549 mm	60.9 in
6	Overall Height	3 m	9.8 ft
7	Wheelbase	3 m	9.8 ft
8	Ground Clearance	516 mm	20.3 in
9	Curb Clearance	496 mm	19.5 in
	Inside Turning Radius	3.9 m	12.7 ft
	Hitch Articulation Angle	34°	
	Hitch Oscillation Angle	15°	

Padfoot Drum

	Number of Pads	140	
	Number of Chevrons	14	
	Oval Pads		
	Pad Height	127 mm	5 in
	Pad Face Area	74.4 cm ²	11.5 in ²
	Square Pads		
	Pad Height	100 mm	3.9 in
	Pad Face Area	123 cm ²	19.1 in ²



Cat® CP11 GC Padfoot Drum Vibratory Soil Compactor

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 www.caterpillar.com/en/company/sustainability.html.

ENGINE

- The Cat C3.6 is available in configurations that meet U.S. EPA Tier 4 Final, EU Stage V and Korea Stage V emission standards.
- Cat diesel engines are required to use ULSD (ultra-low sulfur diesel fuel with 15 ppm of sulfur or less) or 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.

**Tailpipe greenhouse gas emissions from lower-carbon intensity fuels are essentially the same as traditional fuels.*

AIR CONDITIONING SYSTEM

The air conditioning system on this machine contains the fluorinated greenhouse gas refrigerant R134a (Global Warming Potential = 1430). The system contains 2.2 kg (4.91 lb) of refrigerant, which has a CO₂ equivalent of 3.146 metric tonnes (3.468 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

With cooling fan speed at maximum value:

Operator Sound Pressure Level (ISO 6396:2008) – 81 dB(A)

Exterior Sound Power Level (ISO 6395:2008) – 107 dB(A)

- The operator sound pressure level is measured according to the test procedures and conditions specified in ISO 6396:2008 for a cab offered by Caterpillar, when properly installed and maintained and tested with the door and windows closed. The measurements were conducted at 100% of the maximum engine cooling fan speed.
- The exterior sound power level is measured according to the test procedures and conditions specified in ISO 6395:2008 for a Caterpillar machine that is properly equipped and maintained. The measurements were conducted at 100% of the maximum engine cooling fan speed.
- Hearing protection may be needed when operating with an open operator station and cab (when not properly maintained for doors/windows open) for extended periods or in noisy environment(s).

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.
 - Standard Eco-mode limits engine RPM, lowering overall fuel consumption
 - Optional compaction control technology reduces unnecessary passes, increasing operating efficiency
 - Extended maintenance intervals reduce fluid and filter consumption
 - Engine Idle Shutdown Timer reduces unproductive hours and fuel burned

RECYCLING

- The materials included in machines are categorized as below with approximate weight percentage. Because of variations of product configurations, the following values in the table may vary.

Material Type	Weight Percentage
Steel	79.39%
Iron	12.56%
Rubber	2.79%
Fluid	1.13%
Nonferrous Metal	1.12%
Other	1.12%
Uncategorized	0.80%
Plastic	0.50%
Mixed-Metal and Nonmetal	0.48%
Mixed Metal	0.11%
Mixed Nonmetallic	0.00%
Total	100%

- A machine with higher recyclability rate will ensure more efficient usage of valuable natural resources and enhance End-of-Life value of the product. According to ISO 16714:2008 (Earthmoving machinery – Recyclability and recoverability – Terminology and calculation method), recyclability rate is defined as percentage by mass (mass fraction in percent) of the new machine potentially able to be recycled, reused or both.

All parts in the bill of material are first evaluated by component type based on a list of components defined by the ISO 16714:2008 and Japan CEMA (Construction Equipment Manufacturers Association) standards. Remaining parts are further evaluated for recyclability based on material type.

Because of variations of product configurations, the following value in the table may vary.

Recyclability – 97%

Cat® CP11 GC Padfoot Drum Vibratory Soil Compactor

QEHQ2770-03 (02-2024)
Build Number: 01A
(U.S. EPA Tier 4 Final, EU Stage V,
Korea Stage V)

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

© 2024 Caterpillar
All rights reserved

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

CAT, CATERPILLAR, LET'S DO THE WORK, their respective logos, "Caterpillar Corporate Yellow," the "Power Edge" and Cat "Modern Hex" trade dress as well as corporate and product identity used herein, are trademarks of Caterpillar and may not be used without permission.

VisionLink is a trademark of Caterpillar Inc., registered in the United States and in other countries.

