

HITACHI



SuperEX **EX700**

Rated engine HP (gross): 324 kW (435 PS)

Operating weights

Backhoe:

EX700: 67 600 kg (149 100 lb)

EX700H: 69 400 kg (153 000 lb)

Loading shovel:

EX700: 72 000 kg (158 800 lb)

EX700H: 73 000 kg (161 000 lb)

Backhoe bucket capacity:

PCSA heaped: 1.80 — 4.10 m³ (2.35 — 5.36 yd³)

CECE heaped: 1.60 — 3.60 m³

Loading shovel bucket capacity:

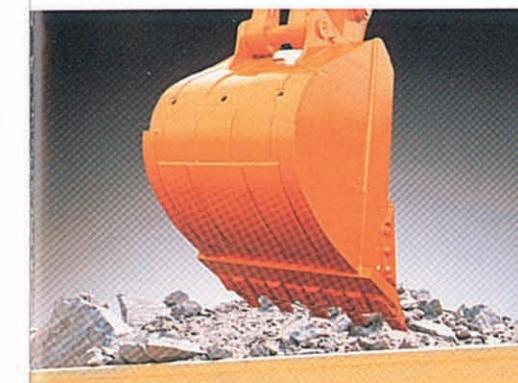
PCSA heaped: 3.60 — 4.40 m³ (4.71 — 5.75 yd³)

Outstanding Productivity.
Hitachi's Uncompromising
Commitment to the
Ultimate Machine.

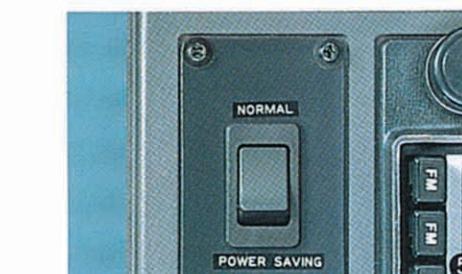
SuperEX EX700



① **Improved E-P control** for optimum control of the engine and pump according to worksite conditions for higher productivity. Optimum power and speed are always right at hand for increased productivity and for reduced fuel consumption.



② **Direct-injection, turbocharged, after-cooled engine** with a powerful 309 kW (420 PS). This engine combined with highly efficient a high pressure hydraulic system, results in more productivity with less fuel consumption.



③ **Boom-swing priority system** to boost work efficiency. The operator can give the priority to boom raise speed or swing speed according to worksite needs. This system makes possible efficient deep digging and constant-level dumping.

④ **Advanced Idling system — auto-idle and quick idle** — to reduce fuel loss and noise levels. When all the control levers are in neutral, the engine speed automatically reduces to mid range. Also, by depressing the foot switch, the operator can reduce the engine speed to idling speed while waiting for a dump truck to arrive, for example.

⑤ **Power saving system** to reduce pump delivery flow when the hydraulic pressure is released. This system reduces hydraulic energy loss, heat generation, and noise levels. When more power is needed to dig in hardpan or rock, the normal mode can be selected.

- Time-tested OHS (Optimum Hydraulic System) for excellent combined operation.
- Arm/boom/bucket merge circuit reduces work cycle times.
- Simplified hydraulic circuit provides energy savings.

Comfort-built Cab Speaks for Itself

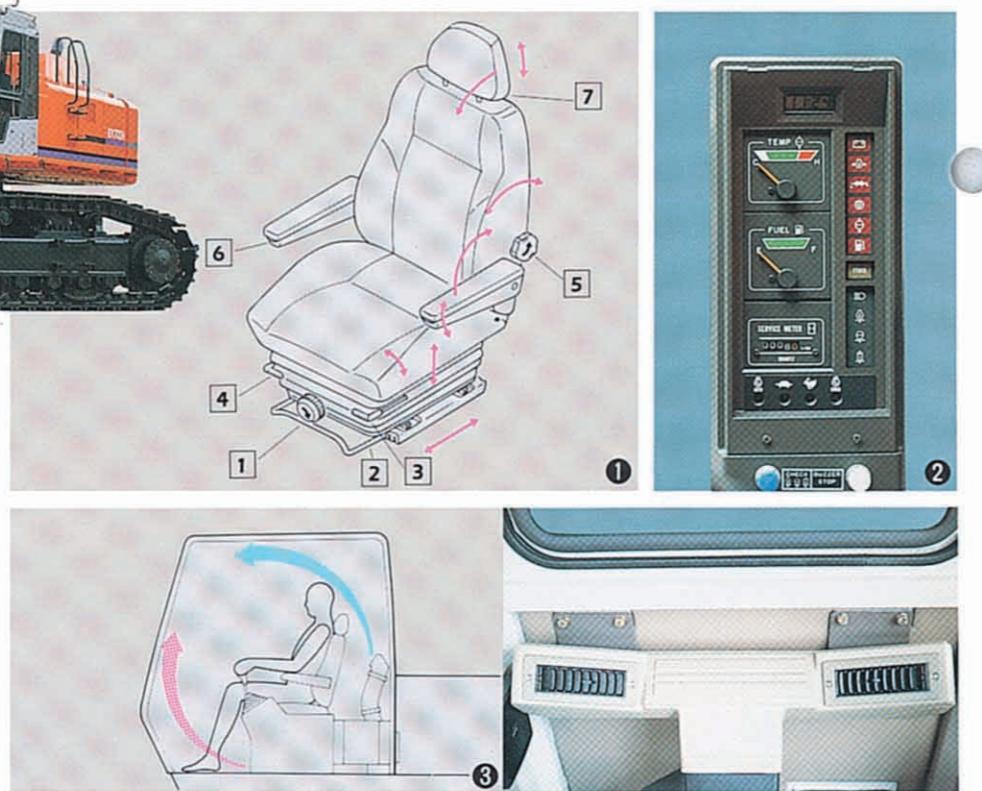


① 7-way adjustable operator seat with seat belt for increased operating efficiency and seating comfort, allowing long, continuous operation with less fatigue. The adjustments are:

- 1 Variable suspension to match operator weight.
- 2 Fore-and-aft positioning (17 positions over 160 mm (6.3"))
- 3 Seat height and seat angle (5 positions).
- 4 Reclining angle
- 5 Lumbar support
- 6 Armrest angle
- 7 Headrest tilt and height

② Easy-to-read monitor to allow the operator to check operating conditions at a glance. This wide monitor helps the operator to maximize machine performance.

③ Air conditioner (optional) with ample capacity (3 200 kcal) to keep the cab temperature and humidity at comfortable levels.



- Quick warm-up system for pilot circuits enables quick starts in cold weather.
- Pilot-control shut-off lever prevents unintended movement when entering and exiting the cab and when the machine is not in use.
- Bright halogen lights for superior nighttime illumination.
- Positive type swing parking brake.
- Windshield washer to keep the front window clean.
- Storable lower front window.



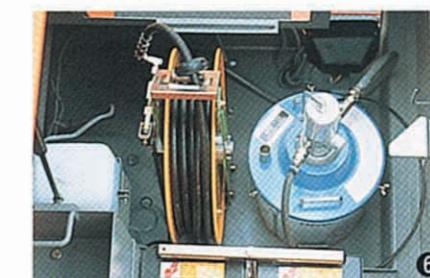
④ Large, reinforced rearview mirrors offering superior rear view.



⑤ Engine cover, box-structured for rigidity. With the help of pressurized gas cylinders, the cover can be opened wide to provide instant access for simple maintenance and service.



⑥ Air grease gun with hose reel for easy greasing, eliminating repositioning of the machine.



⑦ Single-point remote lubrication systems for simple, efficient lubrication of the front attachment and swing bearing.

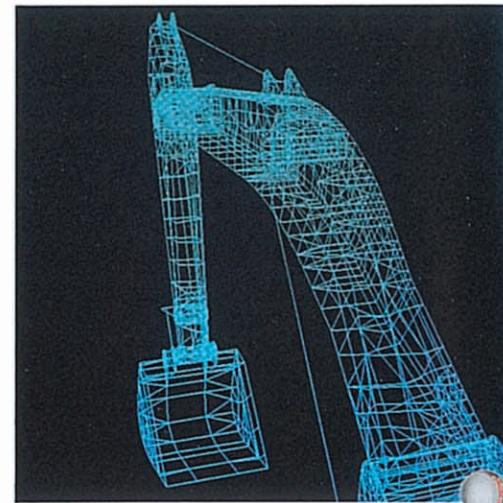


⑧ Ample utility space, provided behind the cab, to hold a spare grease can, pail can, and service tools.



Rugged Body Gives First-class Dependability

① Reinforced front attachment to allow the EX700 to tackle tougher jobs than ever. The boom and arm are reinforced and strengthened throughout, using thickened plates, oversized pins, strategically located bulkheads and backings, and increased weld bead lengths to resist stress concentration and counteract torsion. The result is ruggedness and durability for heavy-duty excavation and hydraulic hammer operation. The bucket is constructed with improved wear resistant steel plates.



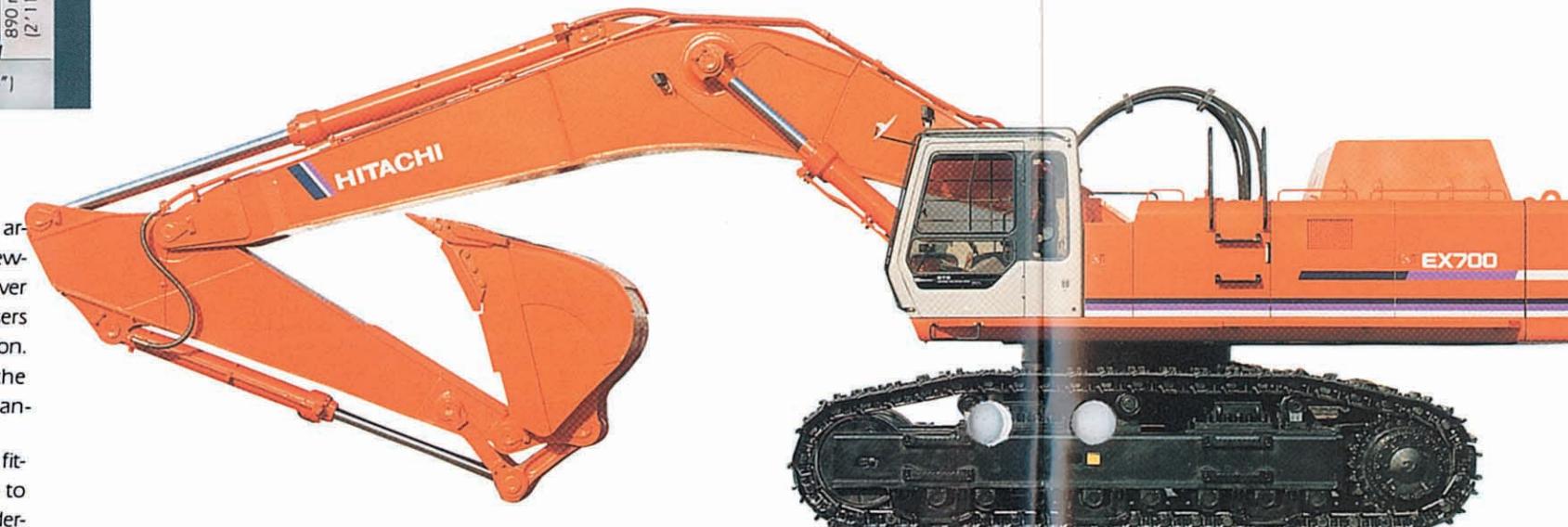
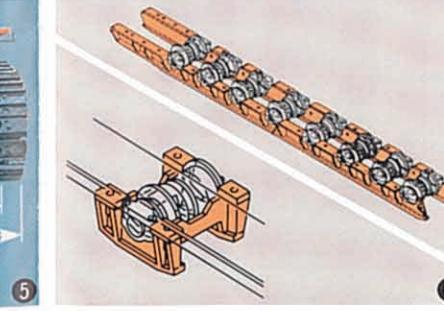
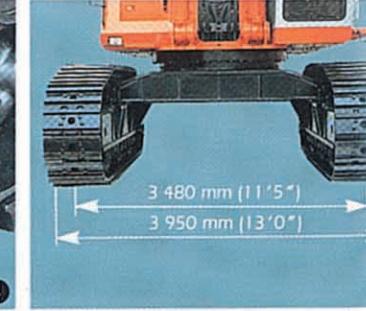
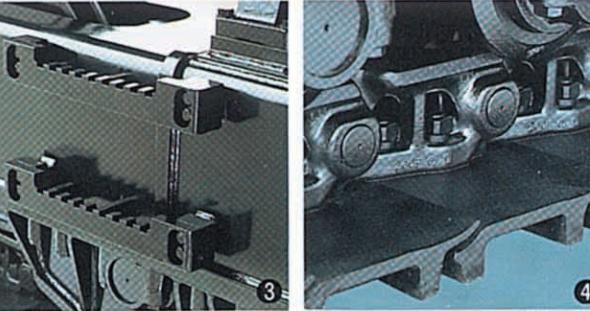
② Compact, durable travel motors arranged inside the track frames with fewer projections for unobstructed travel over rough terrain. Reinforced double grousers also help grip hardpan for added traction.

③ Reinforced steps provided on the side of the track frame (H version: standard).

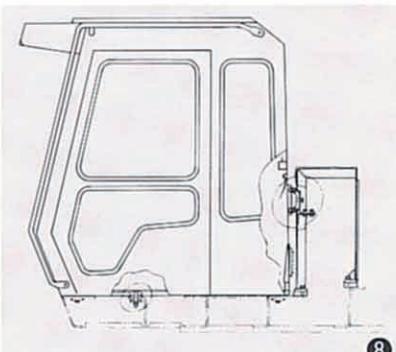
④ Large, strut-reinforced track links fitted with pin seals to keep dirt out to reduce internal wear. The oversized undercarriage offers sure-footed stability. Moreover, these robust designs enhance mobility and excavation.

⑤ Reinforced track frames extended up to 3 950 mm (13'0") for higher work stability and retracted to 3 480 mm (11'5") for easy transportation.

⑥ H track guards (H version: standard) and full length track guards (optional) designed to protect the track from damage. The H track guard is large enough to protect lower rollers and shoes from damage due to disengagement or rock. The full length track guard extends over the lower rollers for added protection.



⑦ Pressurized, air-tight cab with integrated headguard (H version: standard) to protect the operator from falling objects and to effectively seal out dirt and debris.



⑧ Stabilized 6-way mounting supports to increase resistance to shock and vibration. The cab is supported at six positions, similar to the EX400-3, and EX550, and at two positions at the rear (H version).

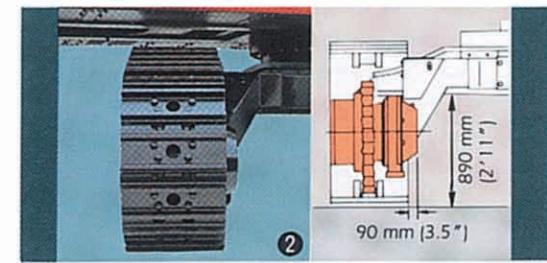
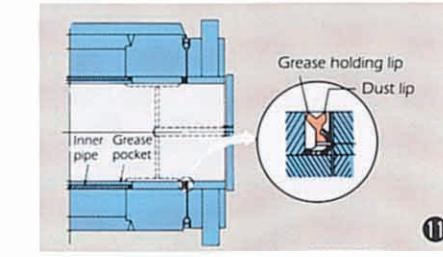


⑨ Pump bulkhead provided between pump and engine.

⑩ Two sturdy clamps provided to protect hydraulic hoses from wear and vibration.



⑪ Advanced front pin seal using reversing double lips to keep grease in. The pin is matched with a spacer to make the pin and bushing last longer.



② Compact, durable travel motors arranged inside the track frames with fewer projections for unobstructed travel over rough terrain. Reinforced double grousers also help grip hardpan for added traction.

③ Reinforced steps provided on the side of the track frame (H version: standard).

④ Large, strut-reinforced track links fitted with pin seals to keep dirt out to reduce internal wear. The oversized undercarriage offers sure-footed stability. Moreover, these robust designs enhance mobility and excavation.

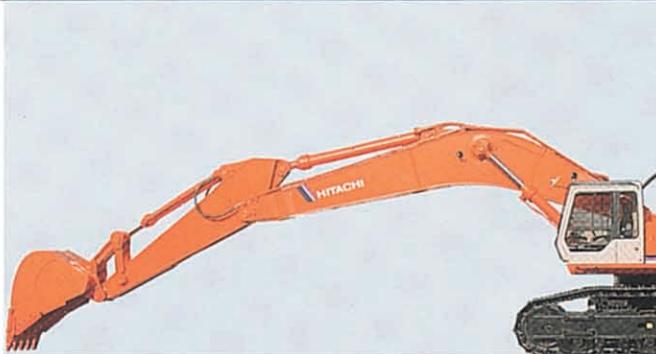
⑤ Reinforced track frames extended up to 3 950 mm (13'0") for higher work stability and retracted to 3 480 mm (11'5") for easy transportation.

⑥ H track guards (H version: standard) and full length track guards (optional) designed to protect the track from damage. The H track guard is large enough to protect lower rollers and shoes from damage due to disengagement or rock. The full length track guard extends over the lower rollers for added protection.

Variations of Front Attachments: The Right Tools for Your Job-specific Applications.

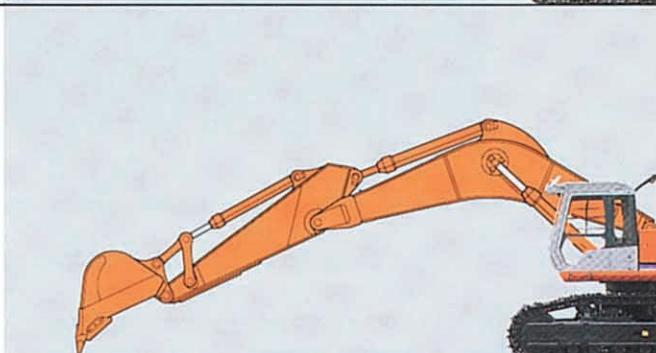
The EX700 is truly versatile, using a variety of front attachments. Take a look at job-specific designs, enhanced with built-in toughness.

The long-range front widens working ranges, and the BE front gives added loading power. All these fronts help more than ever to increase production in specific jobs.



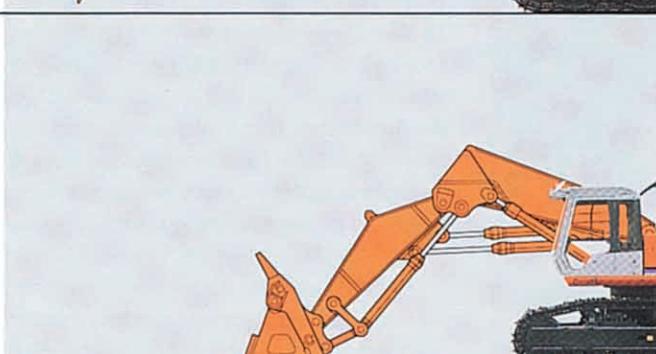
① EX700:

8.25 m (27' 1") boom/3.60 m (11' 10") arm/2.90 m³ (3.79 yd³): PCSA heaped bucket



② EX700H:

7.10 m (23' 4") BE-boom/3.60 m (11' 10") H-arm/
3.20 m³ (4.19 yd³): PCSA heaped rock bucket



③ EX700H: Loading shovel

4.00 m³ (5.23 yd³) Bottom dump bucket

The following are also optionally attachable to the EX700.

- * Headguard-integrated cab
- * H-track guard
- * Reinforced undercover
- * Reinforced step

	Boom	Arm
EX700	7.10 m (23' 4") BE-boom	2.95 m (9' 8") BE-arm
	8.25 m (27' 1")	2.95 m (9' 8"), 3.60 m (11' 10"), 4.40 m (14' 5"), 5.40 m (17' 9")
	10.0 m (32' 10")	5.40 m (17' 9")
EX700H	8.25 m (27' 1") H-boom	3.60 m (11' 10") arm
	8.25 m (27' 1") H-boom	3.60 m (11' 10") H-arm
EX700 EX700H	7.10 m (23' 4") BE-boom	3.60 m (11' 10") H-arm
	7.10 m (23' 4") BE-boom	2.95 m (9' 8") BE-arm
Loader front		

SPECIFICATIONS

ENGINE

Model	Cummins NTA855-C450
Type	4-cycle water-cooled, direct injection
Aspiration	Turbocharged
No. of cylinders	6
Rated flywheel horsepower	
DIN 6271, net	309 kW (420 PS) at 1 800 min ⁻¹ (rpm)
SAE J1349, net	309 kW (414 HP) at 1 800 min ⁻¹ (rpm)
Maximum flywheel horsepower	
SAE J1349, gross	324 kW (435 HP) at 1 800 min ⁻¹ (rpm)
Maximum torque	1 814 N.m (185 kgf.m, 1 338 lbf.ft) at 1 400 min ⁻¹ (rpm)
Piston displacement	14.00 L (854 in ³)
Bore and stroke	140 mm × 152 mm (5.5" × 6.0")
Batteries	2 × 12 V, 170 AH
Governor	Mechanical speed control by stepping motor

HYDRAULIC SYSTEM

Hitachi's ETS (Electronic Total control System) designed for higher job efficiency with less fuel consumption/noise.	
Main pumps	2 variable displacement axial piston pumps
Maximum oil flow	2 × 490 L/min (129.5 US gpm, 107.8 Imp gpm)
Pilot pump	1 gear pump
Maximum oil flow	1 × 30.2 L/min (8.0 US gpm, 6.6 Imp gpm)

Hydraulic Motors

Travel	2 axial piston motors with parking brake
Swing	2 axial piston motors

Relief Valve Settings

Implement circuit	29.4 MPa (300 kgf/cm ² , 4 270 psi)
Swing circuit	29.4 MPa (300 kgf/cm ² , 4 270 psi)
Travel circuit	31.4 MPa (320 kgf/cm ² , 4 550 psi)
Pilot circuit	3.9 MPa (40 kgf/cm ² , 570 psi)

Hydraulic Cylinders

Cylinder cushion mechanisms are provided for all cylinders to absorb shock when pistons reach their stroke ends.

Dimensions

Backhoe: Equipped with 8.25 m (27' 1") boom, 3.60 m (11' 10") arm, and 2.90 m³ (3.79 yd³): PCSA heaped

	Qty	Bore	Rode diameter
Boom	2	200 mm (7.87")	140 mm (5.51")
Arm	1	215 mm (7.87")	150 mm (5.91")
Bucket	1	190 mm (7.48")	130 mm (5.12")

Loading Shovel

	Qty	Bore	Rode diameter
Boom	2	200 mm (7.87")	140 mm (5.51")
Arm	1	200 mm (7.87")	140 mm (5.51")
Bucket	2	180 mm (7.09")	130 mm (5.12")
Dump	2	130 mm (5.12")	80 mm (3.15")
Level	1	200 mm (7.87")	140 mm (5.51")

Hydraulic Filters

All hydraulic circuits use hydraulic filters. A suction filter is built in suction line, and 10 µm full-flow filters in return circuit and swing/travel motor drain lines.

CONTROLS

Pilot controls for all functions. Hitachi original shockless valve and quick warm-up system built in the pilot circuit. Multi rotary pilot control valve is optionally available for selection of control lever direction.

Implement levers	2
Travel levers with pedals	2
Bucket open/close pedals (Loading shovel)	2

UPPERSTRUCTURE

Revolving Frame

Welded, sturdy box construction, using heavy-gauge steel plates for ruggedness. D-section frame for resistance to deformation.

Swing Mechanism

Axial piston motor with planetary gear is bathed in oil. Swing circle is single-row, shear-type ball bearing with induction-hardened internal gear. Internal gear and pinion gear are immersed in lubricant. Swing parking brake is spring-set/hydraulic-released disc type. Swing cushion valve built in swing motor absorbs shocks when stopping swing.

Swing speed

Operator's Cab

Independent, roomy cab, 940 mm (37") wide by 1 620 mm (64") high, conforming to ISO* Standards. Reinforced glass windows on 4 sides for excellent visibility. Front windows (upper and lower) are openable and storable in the cab. Adjustable, reclining seat with armrests and seat belt. Right and left control levers can be tilted fore and aft.

* International Standard Organization

UNDERCARRIAGE

Tracks

Tractor-type undercarriage. Welded track frame, using carefully selected materials for tough jobs. Side frame bolted to track frame. Lubricated track rollers, idlers, and sprockets with floating seals. Track shoes with double grouser made of induction-hardened rolled alloy. 750 mm (30") and 900 mm (35") wide double grouser shoes also available for backhoe. Heat-treated connecting pins with dirt seals. Hydraulic (grease) track adjusters with shock-absorbing recoil springs.

Numbers of Rollers and Shoes on Each Side

Upper rollers	3
Lower rollers	8
Track shoes	47
Track guard	2
	3 EX700H

Traction Device

Each track driven by axial piston motor through reduction gears for counter-rotation of the tracks. Sprockets are replaceable. Parking brake is spring-set/hydraulic-released disc type.

Travel speeds

High: 0 to 4.6 km/h (2.9 mph)

Low: 0 to 3.3 km/h (2.1 mph)

Maximum traction force

471 kN (48 000 kgf, 105 800 lbf)

Gradeability

35° (70%) continuous

WEIGHTS AND GROUND PRESSURE

Backhoe

EX700: Equipped with 8.25 m (27'1") boom, 3.60 m (11'10") arm, and 2.90 m³ (3.79 yd³): PCSA heaped bucket.

Shoe type	Shoe width	Operating weight	Ground pressure
Double grouser	650 mm (26")	67 600 kg (149 100 lb)	101.0 kPa (1.03 kgf/cm ² , 14.6 psi)
	750 mm (30")	68 300 kg (151 000 lb)	88.3 kPa (0.90 kgf/cm ² , 12.8 psi)
	900 mm (35")	69 400 kg (153 000 lb)	74.5 kPa (0.76 kgf/cm ² , 10.8 psi)

EX700H: Equipped with 8.25 m (27'1") H-boom, 3.60 m (11'10") H-arm, and 2.90 m³ (3.79 yd³): PCSA heaped rock bucket.

Shoe type	Shoe width	Operating weight	Ground pressure
Double grouser	650 mm (26")	69 400 kg (153 000 lb)	103.0 kPa (1.05 kgf/cm ² , 14.9 psi)

EX700H: Equipped with 7.10 m (23'4") BE-boom, 3.60 m (11'10") H-arm, 2.90 m³ (3.79 yd³): PCSA heaped rock bucket.

Shoe type	Shoe width	Operating weight	Ground pressure
Double grouser	650 mm (26")	69 400 kg (153 000 lb)	103.0 kPa (1.05 kgf/cm ² , 14.9 psi)

EX700: Equipped with 7.10 m (23'4") BE-boom, 2.95 m (9'8") BE-arm, and 4.10 m³ (5.36 yd³): PCSA heaped bucket.

Shoe type	Shoe width	Operating weight	Ground pressure
Double grouser	650 mm (26")	69 400 kg (153 000 lb)	103.0 kPa (1.05 kgf/cm ² , 14.9 psi)
	750 mm (30")	70 100 kg (154 600 lb)	90.2 kPa (0.92 kgf/cm ² , 13.1 psi)
	900 mm (35")	71 200 kg (157 000 lb)	76.5 kPa (0.78 kgf/cm ² , 11.1 psi)

Note: Depending on the jobsite conditions, 750 mm (30") and 900 mm (35") double grouser shoe may not be recommended for rock, hard surface or forestry application.

Loading Shovel

EX700: Equipped with 4.00 m³ (5.23 yd³) bottom dump bucket

Shoe type	Shoe width	Operating weight	Ground pressure
Double grouser	650 mm (26")	72 000 kg (158 800 lb)	106.9 kPa (1.09 kgf/cm ² , 15.5 psi)

EX700H: Equipped with 3.60 m³ (4.71 yd³) bottom dump rock bucket

Shoe type	Shoe width	Operating weight	Ground pressure
Double grouser	650 mm (26")	73 000 kg (161 000 lb)	108.9 kPa (1.11 kgf/cm ² , 15.8 psi)

Backhoe Buckets

PCSA heaped	CECE heaped	Capacity		Width		No. of teeth	Weight	Recommendation						EX700H						
		Without side cutters	With side cutters	Without side cutters	With side cutters			7.10 m (23'4") BE-boom	8.25 m (27'1") boom	10.0 m (32'10") boom	2.95 m (9'8") arm	3.60 m (11'10") arm	4.40 m (14'5") arm	5.40 m (17'9") arm	5.40 m (17'9") arm	3.60 m (11'10") H-arm	3.60 m (11'10") H-arm	2.95 m (9'8") BE-arm	3.60 m (11'10") BE-arm	
		1.80 m ³ (2.35 yd ³)	2.00 m ³ (2.62 yd ³)	2.40 m ³ (3.14 yd ³)	2.90 m ³ (3.79 yd ³)	3.10 m ³ (4.05 yd ³)	4.10 m ³ (5.36 yd ³)	4.10 m ³ (5.36 yd ³)	4.20 m ³ (5.79 yd ³)	4.20 m ³ (5.79 yd ³)	4.30 m ³ (5.91 yd ³)									
1.80 m ³ (2.35 yd ³)	1.60 m ³	1 220 mm (4'0")	1 360 mm (4'6")	5	1 870 kg (4 120 lb)										◎					
2.00 m ³ (2.62 yd ³)	1.80 m ³	1 350 mm (4'5")	1 490 mm (4'11")	5	2 060 kg (4 540 lb)										◎					
2.40 m ³ (3.14 yd ³)	2.20 m ³	1 420 mm (4'8")	1 560 mm (5'1")	5	2 350 kg (5 180 lb)			◎	◎	◎					◎	◎				
2.90 m ³ (3.79 yd ³)	2.60 m ³	1 620 mm (5'4")	1 760 mm (5'9")	5	2 500 kg (5 510 lb)			◎	◎	○					◎	◎				
3.10 m ³ (4.05 yd ³)	2.80 m ³	1 730 mm (5'8")	1 870 mm (6'2")	5	2 630 kg (5 800 lb)			◎	○						○	○				◎
4.10 m ³ (5.36 yd ³)	3.60 m ³	—	2 050 mm (6'9")	5	3 500 kg (7 720 lb)	◎														●
4.20 m ³ (5.79 yd ³)	2.60 m ³	—	1 610 mm (5'3")	5	3 100 kg (6 840 lb)										●	●				●
4.20 m ³ (5.79 yd ³)	2.60 m ³	—	1 610 mm (5'3")	4	3 700 kg (8 160 lb)															●
4.30 m ³ (5.91 yd ³)	2.90 m ³	—	1 640 mm (5'5")	5	3 300 kg (7 280 lb)															●
4.30 m ³ (5.91 yd ³)	3.20 m ³	—	1 840 mm (6'0")	5	3 780 kg (8 330 lb)															●
4.30 m ³ (5.91 yd ³)	1.70 m ³	1 400 mm (4'7")	—	3	4 100 kg (9 040 lb)										●	●				●
4.20 m ³ (5.88 yd ³)	2.00 m ³	1 580 mm (5'2")	—	3	4 300 kg (9 480 lb)															●
One-point ripper	—	800 mm (2'7")	—	1	2 600 kg (5 730 lb)										●	●				●

*1. Rock bucket for H-front

*4: Ripper bucket

*5: Rock bucket for BE-front; *6: Rock and Ripper bucket equipped with side shroud.

SERVICE REFILL CAPACITIES

	liters	US gal	Imp gal
Fuel tank	800.0	211.4	176.0
Engine coolant	72.0	19.0	15.8
Engine oil	44.0	11.6	9.7
Pump drive	13.0	3.4	2.9
Swing mechanism [each side]	12.0	3.2	2.6
Travel final device [each side]	23.0	6.1	5.1
Hydraulic system			
Backhoe	660.0	174.4	145.2
Loading shovel	750.0	198.2	165.0
Hydraulic tank	340.0	89.8	74.8

BACKHOE ATTACHMENTS

Booms and arms of all-welded, box-section design. 7.10 m (23'4") BE-boom, 8.25 m (27'1") boom, 8.25 m (27'1") H-boom, 10.0 m (32'10") long boom, 2.95 m (9'8") arm, 2.95 m (9'8") BE-arm, 3.60 m (11'10"), 3.60 m (11'10") H-arm, 4.40 m (14'5") arm, and 5.40 m (17'9") arms are available. Bucket is of all-welded, high-strength steel structure. Side clearance adjust mechanism provided on the bucket joint bracket.

Booms and Arms are available as follows:

	Boom	Arm
EX700	7.10 m (23'4") BE-boom	2.95 m (9'8") BE-arm
	8.25 m (27'1")	2.95 m (9'8"), 3.60 m (11'10")
	10.0 m (32'10")	4.40 m (14'5"), 5.40 m (17'9")
	8.25 m (27'1") H-boom	5.40 m (17'9")
EX700H	8.25 m (27'1") H-boom	3.60 m (11'10") arm
	7.10 m (23'4") BE-boom	3.60 m (11'10") H-arm
	7.10 m (23'4") BE-boom	2.95 m (9'8") BE-arm
	7.10 m (23'4") H-boom	3.60 m (11'10") H-arm

Booms and arms of all-welded, box-section design. Efficient, automatic level crowding achieved by one-lever control because parallel link mechanism keeps the bucket digging angle constant, and level cylinder circuit maintains the bucket height constant. (Auto-Leveling Crowd Mechanism)

Capacity	Max. width	No. of teeth	Weight	Type
3.60 m ³ (4.71 yd ³)	2 300 mm (7'7")	6	6 080 kg (13 410 lb)	Bottom dump type rock bucket
4.00 m ³ (5.23 yd ³)	2 460 mm (8'1")	6	5 620 kg (12 390 lb)	Bottom dump type general purpose bucket
4.00 m ³ (5.23 yd ³)	2 360 mm (7'9")	6	4 980 kg (10 980 lb)	Tilt dump type rock bucket
4.40 m ³ (5.75 yd ³)	2 520 mm (8'3")	6	4 630 kg (10 210 lb)	Tilt dump type general purpose bucket

◎ Suitable for materials with density of 2 000 kg/m³ (3,370 lb/yd³) or less

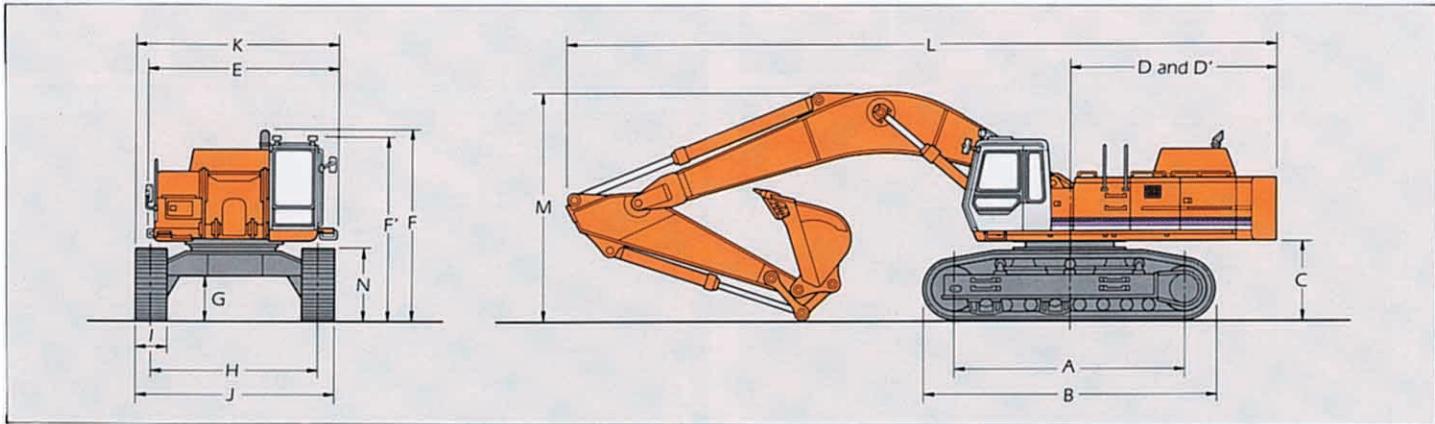
○ Suitable for materials with density of 1 600 kg/m³ (2,700 lb/yd³) or less

● Heavy-duty service



DIMENSIONS

BACKHOE EX700

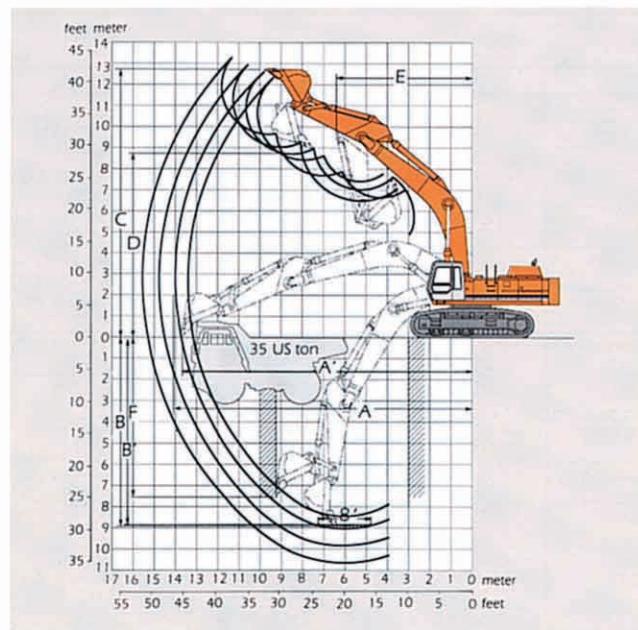


	EX700			EX700 with BE-front		
A Distance between tumblers	4 590 mm [15'1"]			4 590 mm [15'1"]		
B Undercarriage length	5 820 mm [19'1"]			5 820 mm [19'1"]		
*C Counterweight clearance	1 590 mm [5'3"]			1 590 mm [5'3"]		
D Rear-end swing radius	4 100 mm [13'5"]			4 100 mm [13'5"]		
D' Rear-end length	4 080 mm [13'5"]			4 080 mm [13'5"]		
E Overall width of upperstructure	3 790 mm [12'5"]			3 790 mm [12'5"]		
F Overall height	3 790 mm [12'5"]			3 790 mm [12'5"]		
F' Overall height of cab	3 520 mm [11'7"]			3 520 mm [11'7"]		
*G Min. ground clearance	890 mm [2'11"]			890 mm [2'11"]		
H Track gauge Extended/Retracted	3 300 mm [10'10"] /2 830 mm [9'3"]			3 300 mm [10'10"] /2 830 mm [9'3"]		
I Track shoe width	G650 mm [26"]	G750 mm [30"]	G900 mm [35"]	G650 mm [26"]	G750 mm [30"]	G900 mm [35"]
J Undercarriage width Extended/Retracted	3 950 mm/3 480 mm [13'0"]/[11'5"]	4 050 mm/3 580 mm [13'3"]/[11'9"]	4 200 mm/3 730 mm [13'9"]/[12'3"]	3 950 mm/3 480 mm [13'0"]/[11'5"]	4 050 mm/3 580 mm [13'3"]/[11'9"]	4 200 mm/3 730 mm [13'9"]/[12'3"]
K Overall width	4 050 mm [13'3"]	4 100 mm [13'5"]	4 200 mm [13'9"]	4 050 mm [13'3"]	4 100 mm [13'5"]	4 200 mm [13'9"]
L Overall length	14 070 mm [46'2"]			13 020 mm [42'9"]		
**M Overall height of boom	4 520 mm [14'10"]			5 020 mm [16'6"]		
N Track height	1 470 mm [4'10"]	1 470 mm [4'10"]	1 470 mm [4'10"]	1 470 mm [4'10"]	1 470 mm [4'10"]	1 470 mm [4'10"]

* Excluding track shoe lug ** Including hydraulic hose.



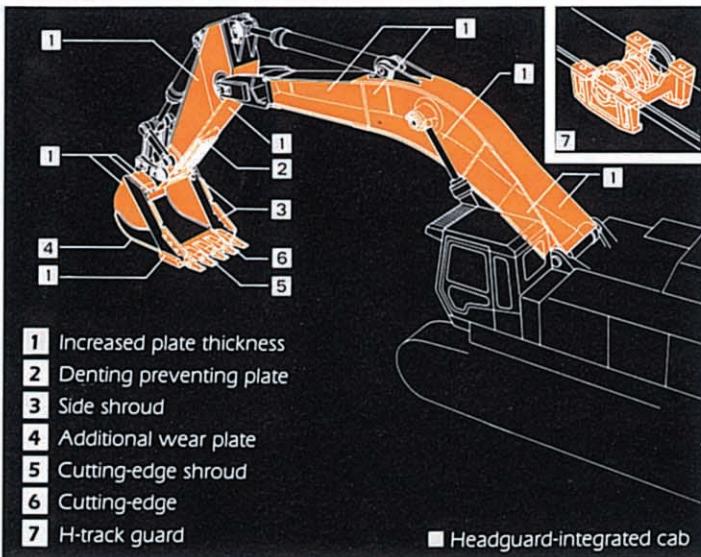
WORKING RANGES



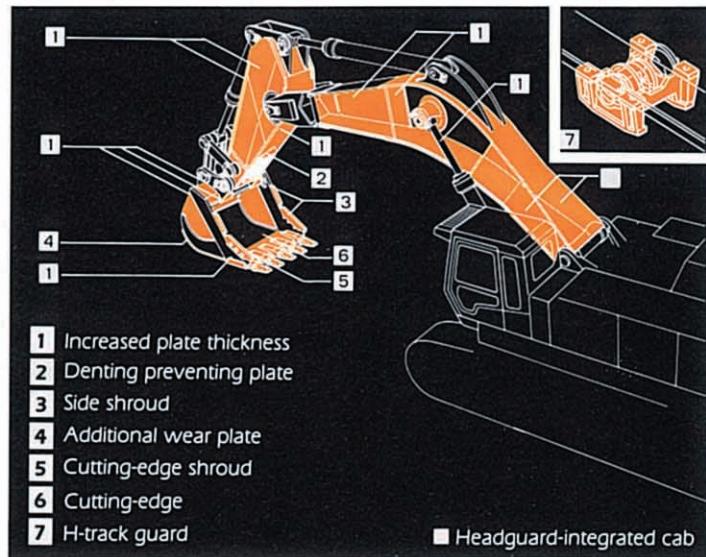
Boom length	EX700				
	7.10 m (23'4") BE-boom	8.25 m (27'1")			10.0 m (32'10")
Arm length	2.95 m (9'8") BE-arm	2.95 m (9'8")	3.60 m (11'0")	4.40 m (14'5")	5.40 m (17'9")
A Max. digging reach	12 360 mm [40'7"]	13 520 mm [44'4"]	14 090 mm [46'3"]	14 860 mm [48'9"]	15 690 mm [51'6"]
A' Max. digging reach (on ground)	12 040 mm [39'6"]	13 230 mm [43'5"]	13 810 mm [45'4"]	14 590 mm [47'10"]	15 430 mm [50'7"]
B Max. digging depth	7 240 mm [23'9"]	8 280 mm [27'2"]	8 920 mm [29'3"]	9 720 mm [31'11"]	10 600 mm [34'9"]
B' Max. digging depth (B' level)	7 100 mm [23'4"]	8 130 mm [26'8"]	8 790 mm [28'10"]	9 610 mm [31'6"]	10 500 mm [34'3"]
C Max. cutting height	11 490 mm [37'8"]	12 310 mm [40'5"]	12 710 mm [41'8"]	13 080 mm [42'11"]	13 390 mm [43'11"]
D Max. dumping height	7 700 mm [25'3"]	8 520 mm [27'11"]	8 730 mm [28'8"]	9 090 mm [29'10"]	9 640 mm [31'8"]
E Min. swing radius	5 480 mm [18'0"]	6 510 mm [21'4"]	6 400 mm [21'0"]	6 300 mm [20'8"]	6 290 mm [20'8"]
F Max. vertical wall depth	4 570 mm [15'0"]	5 810 mm [19'1"]	7 250 mm [23'9"]	8 340 mm [27'4"]	9 090 mm [29'10"]
Bucket digging force	353.1 kN [36 000 kgf 79 400 lbf]	294.2 kN [30 000 kgf 66 200 lbf]	32 000 lbf	32 000 lbf	50 700 lbf
Arm digging force	288.1 kN [29 400 kgf 64 800 lbf]	293.3 kN [29 600 kgf 65 300 lbf]	24 300 kgf 53 600 lbf	207.9 kN [21 200 kgf 46 700 lbf]	184.4 kN [18 800 kgf 41 500 lbf]

BACKHOE

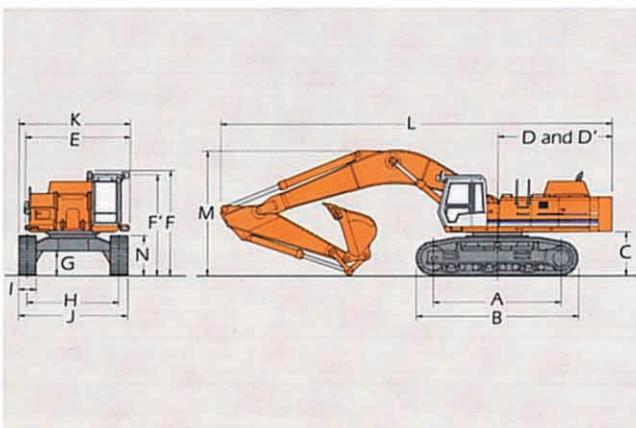
EX700H with H-front



EX700H with BE-front



DIMENSIONS

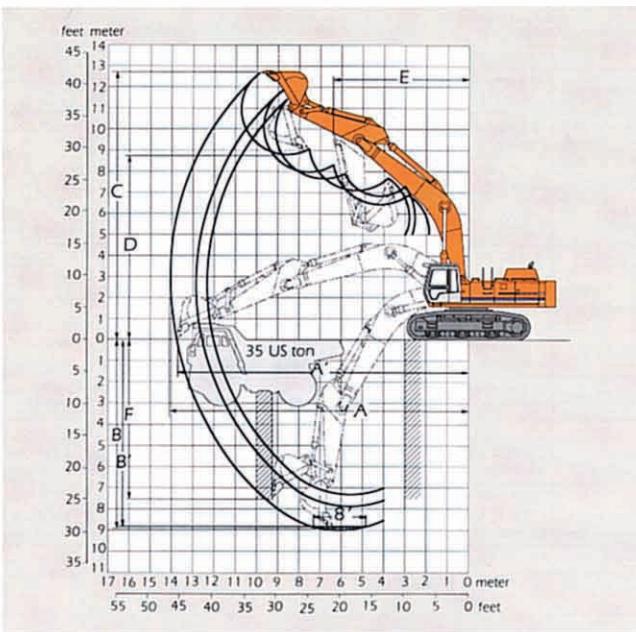


EX700H (With Headguard-Integrated cab)	
A	Distance between tumblers
B	Undercarriage length
*C	Counterweight clearance
D	Rear-end swing radius
D'	Rear-end length
E	Overall width of upperstructure
F	Overall height
F'	Overall height of cab
*G	Min. ground clearance
H	Track gauge Extended / Retracted
I	Track shoe width
J	Undercarriage width Extended / Retracted
K	Overall width
L	Overall length
**M	Overall height of boom
N	Track height

* Excluding track shoe lug ** Including hydraulic hose.
EX700H can be use 650 mm (26") track shoe only.



WORKING RANGES

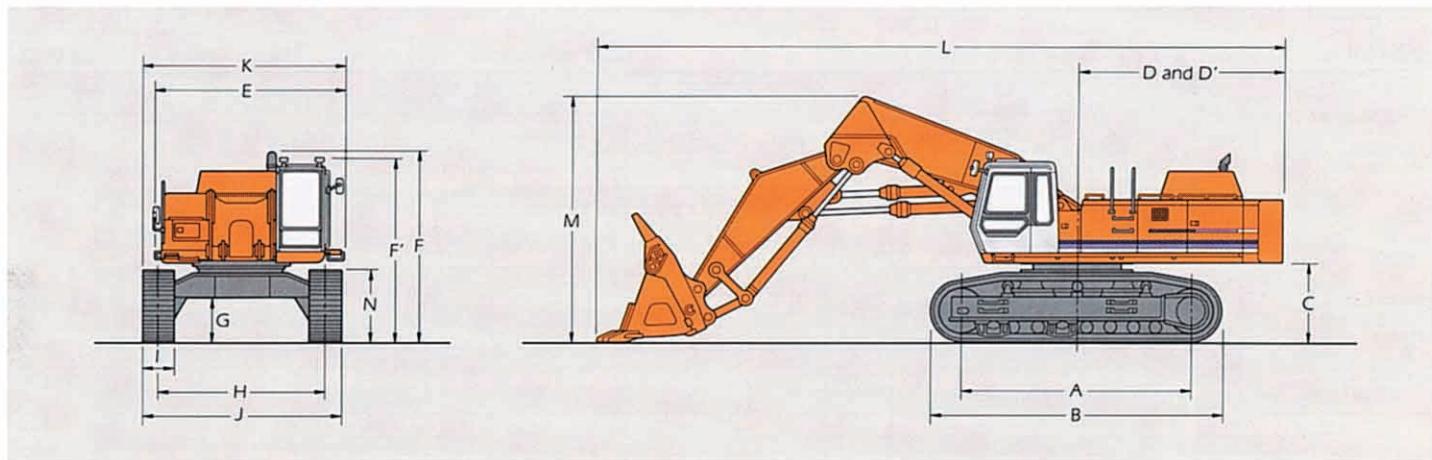


EX700H (With Headguard-Integrated cab)			
Boom length	8.25 m (27'1") H-boom	7.10 m (23'4") BE-boom	7.10 m (23'4") BE-boom
Arm length	3.60 m (11'10") H-arm	3.60 m (11'10") H-arm	2.95 m (9'8") BE-arm
A Max. digging reach	14 090 mm (46'3")	12 850 mm (42'2")	12 360 mm (40'7")
A' Max. digging reach (on ground)	13 810 mm (45'4")	12 550 mm (41'2")	12 040 mm (39'6")
B Max. digging depth	8 920 mm (29'3")	7 810 mm (25'7")	7 240 mm (23'9")
B' Max. digging depth (8' level)	8 790 mm (28'10")	7 680 mm (25'2")	7 100 mm (23'4")
C Max. cutting height	12 710 mm (41'8")	11 930 mm (39'2")	11 490 mm (37'8")
D Max. dumping height	8 730 mm (28'8")	7 980 mm (26'2")	7 700 mm (25'3")
E Min. swing radius	6 400 mm (21'0")	5 380 mm (17'8")	5 480 mm (18'0")
F Max. vertical wall depth	7 250 mm (23'9")	5 650 mm (18'6")	4 570 mm (15'0")
Bucket digging force	275.6 kN (28 100 kgf, 62 000 lbf)	275.6 kN (28 100 kgf, 62 000 lbf)	353.1 kN (36 000 kgf, 79 400 lbf)
Arm digging force	238.3 kN (24 300 kgf, 53 600 lbf)	238.3 kN (24 300 kgf, 53 600 lbf)	288.3 kN (29 400 kgf, 64 800 lbf)

LOADING SHOVEL

EX700/EX700H

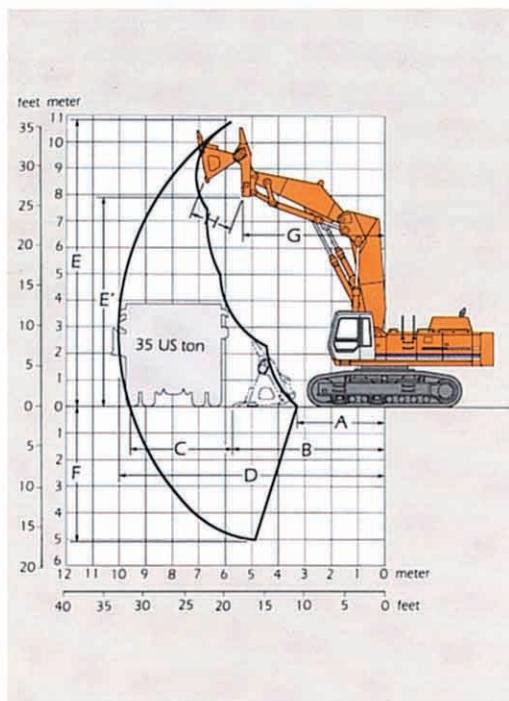
DIMENSIONS



EX700/EX700H (With Headguard-Integrated cab)	
A Distance between tumblers	4 590 mm (15'1")
B Undercarriage length	5 820 mm (19'1")
*C Counterweight clearance	1 590 mm (5'3")
D Rear-end swing radius	4 100 mm (13'5")
D' Rear-end length	4 080 mm (13'5")
E Overall width of upperstructure	3 790 mm (12'5")
F Overall height	3 790 mm (12'5")
F' Overall height of cab	EX700: 3 520 mm (11'7") EX700H: 3 650 mm (12'0")
*G Min. ground clearance	890 mm (2'11")
H Track gauge	3 300 mm (10'10")
I Track shoe width	G 650 mm (26")
J Undercarriage width	3 950 mm (13'0")
K Overall width	4 050 mm (13'3")
L Overall length	13 610 mm (44'8")
**M Overall height of boom	4 900 mm (16'1")
N Track height	1 470 mm (4'10")

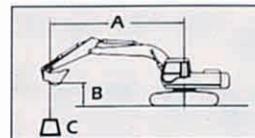
Notes: * Excluding track shoe lug. ** Including hydraulic hose.

WORKING RANGES



Type of bucket	Bottom dump type	Tilt dump type
A Min. digging distance	3 290 mm (10'10")	3 090 mm (10'2")
B Min. level crowding distance	5 730 mm (18'10")	5 730 mm (18'10")
C Level crowding distance	3 800 mm (12'6")	3 800 mm (12'6")
D Max. digging reach	10 000 mm (32'10")	10 000 mm (32'10")
E Max. cutting height	10 840 mm (35'7")	10 840 mm (35'7")
E' Max. dumping height	7 910 mm (25'11")	4 570 mm (15'0")
F Max. digging depth	5 040 mm (16'6")	5 040 mm (16'6")
G Working radius at max. dumping height	5 340 mm (17'6")	6 300 mm (20'8")
H Max. bucket opening width	1 600 mm (5'3")	—
Crowding force	441.3 kN (45 000 kgf, 99 200 lbf)	441.3 kN (45 000 kgf, 99 200 lbf)
Breakout force	431.5 kN (44 000 kgf, 97 000 lbf)	431.5 kN (44 000 kgf, 97 000 lbf)

LIFTING CAPACITIES



A: Load radius
B: Load point height
C: Lifting capacity

METRIC MEASURE

EX700

Rating over-side or 360 degrees Rating over-front Unit: 1 000 kg

Conditions	Load point height m	Load radius										At max. reach							
		4 m		6 m		8 m		10 m		12 m		14 m		15 m					
																@ m			
Boom 8.25 m Arm 2.95 m Bucket PCSA: 3.10 m ³ CECE: 2.80 m ³ Shoes 650 mm	10															*7.82 8.77 6.82 6.82 5.80 5.80 5.31 5.31 5.23 5.23 6.48 6.48	*7.82 9.23 *7.47 *8.85 *7.44 *8.82 *7.66 *8.26 *8.15 *8.20 *9.17 9.96	10.8	
	8							*8.77 9.89 *10.4 *10.4 *12.7 *12.7 *12.5 13.3 12.2 12.2 11.6 11.6 11.4 11.4 *21.4 *23.1 *16.7	*8.77 *10.7 *9.20 *9.20 9.53 *11.3 9.01 *12.3 *14.7 *17.7 *16.0 *17.7 *16.2 *17.5 *16.2 *20.4 *24.6 *18.9 *18.9 *16.7 *16.7									12.0	
	6															5.80 5.80 5.31 5.31 5.23 5.23 5.56 5.56 5.56 5.56	*7.44 *8.82 *7.66 *8.26 *8.15 *8.20 *8.69 *8.69 *8.69 *8.69	12.7	
	4															5.31 5.31 5.23 5.23 5.23 5.23 5.56 5.56 5.56 5.56	*7.66 *8.26 *8.15 *8.20 *8.69 *8.69 13.0	13.0	
	2															5.23 5.23 5.56 5.56 5.56 5.56	*8.15 *8.20 *8.69 *8.69 *8.69 *8.69	12.9	
	0 (Ground)															5.56 5.56 5.56 5.56 5.56 5.56	*8.69 *8.69 *8.69 *8.69 *8.69 *8.69	12.4	
	-2															6.48 6.48	*9.17 9.96	11.5	
	-4																		
	-6																		
Boom 8.25 m Arm 3.60 m Bucket PCSA: 2.90 m ³ CECE: 2.60 m ³ Shoes 650 mm	10															*4.72 *5.72	*4.72 *5.72	11.5	
	8															*4.50 *5.48	*4.50 *5.48	12.6	
	6															*4.50 *5.48	*4.50 *5.48	13.3	
	4															*4.67 5.24	*4.67 *5.68	13.5	
	2															*5.02 5.14	*5.02 *6.08	13.5	
	0 (Ground)															*5.39 5.39	*5.62 *6.76	13.0	
	-2															6.12 6.12	*6.61 *7.87	12.2	
	-4															7.70 7.70	*8.34 *9.82	10.8	
	-6															10.4 10.4	*11.5 *14.0	9.0	
Boom 8.25 m Arm 4.40 m Bucket PCSA: 2.40 m ³ CECE: 2.20 m ³ Shoes 650 mm	8															*3.41 *4.26	*3.41 *4.26	13.4	
	6															*3.40 *4.26	*3.40 *4.26	14.0	
	4															*3.54 *4.41	*3.54 *4.41	14.3	
	2															*3.82 4.60	*3.82 *4.73	14.2	
	0 (Ground)															*4.30 4.79	*4.30 *5.28	13.8	
	-2															*5.07 5.35	*5.07 *6.15	13.1	
	-4															*6.38 6.53	*6.38 *7.62	11.8	
	-6															8.53 8.53	*10.7 *12.8	9.92	
	-8																		

Equipped with heavy lifting system (option)

Notes: 1. Ratings are based on SAE J1097.
2. Lifting capacity of the EX Series does not exceed 75% of tipping load with the machine on firm, level ground or 87% of full hydraulic capacity.
3. The load point is a hook (not standard equipment) loaded on the back of the bucket.
4. *Indicates load limited by hydraulic capacity.

METRIC MEASURE

EX700

 Rating over-side or 360 degrees

 Rating over-front

Unit: 1 000 kg

Conditions	Load point height m	Load radius										At max. reach				
		4 m		6 m		8 m		10 m		12 m		14 m				
													@ m			
Boom 8.25 m Arm 5.40 m Bucket PCSA: 2.00 m ³ CECE: 1.80 m ³ Shoes 650 mm	8									*6.00	*6.00			*2.72	*2.72	14.3
	6									*7.19	*7.19			*3.47	*3.47	
	4									*7.10	*7.10			*2.72	*2.72	14.9
	2									7.66	*8.75			*3.46	*3.46	
	0 (Ground)									*8.53	*8.53	7.34	*7.74	*2.82	*2.82	15.1
	-2									*10.4	*10.4	7.34	*9.52	*3.59	*3.59	
	-4													*4.02	*4.02	14.0
	-6													4.90	4.94	
	-8													*5.00	*5.00	12.9
	-10													5.76	*6.04	
Boom 10.0 m Arm 5.40 m Bucket PCSA: 1.80 m ³ CECE: 1.60 m ³ Shoes 650 mm	8													*6.78	*6.78	11.2
	6													7.52	*8.06	
	4															
	2															
	0 (Ground)															
	-2															
	-4															
	-6															
	-8															
	-10															
Boom 7.10 m BE-boom Arm 2.95 m BE-arm Bucket PCSA: 4.10 m ³ CECE: 3.60 m ³ Shoes 650 mm	8													*6.84	*6.84	9.33
	6													*8.23	*8.23	
	4													*6.37	*6.37	10.7
	2													*7.72	*7.72	
	0 (Ground)															
	-2															
	-4															
	-6															
	-8															
	-10															

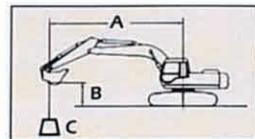
 Equipped with heavy lifting system (option)

Notes: 1. Ratings are based on SAE J1097.

2. Lifting capacity of the EX Series does not exceed 75% of tipping load with the machine on firm, level ground or 87% of full hydraulic capacity.

3. The load point is a hook (not standard equipment) loaded on the back of the bucket.

4. *Indicates load limited by hydraulic capacity.



A: Load radius
B: Load point height
C: Lifting capacity

METRIC MEASURE

EX700H

Rating over-side or 360 degrees Rating over-front Unit: 1 000 kg

Conditions	Load point height m	Load radius								At max. reach		
		①	②	①	②	①	②	①	②	①	②	@ m
Boom 8.25 m H-boom Arm 3.60 m H-arm Bucket PCSA: 2.90 m ³ CECE: 2.60 m ³ Shoes 650 mm	10											*4.45 *4.45 11.5
	8							*7.96 *7.96				*5.45 *5.45 12.6
	6							*9.83 *9.83				*4.23 *4.23 13.3
	4			*17.0 *17.0	*17.0 *17.0	*11.7 *11.7	*11.7 *11.7	9.17 *9.44	6.25 *8.02			*5.21 *5.21 13.5
				*20.4 *20.4	*20.4 *20.4	13.7 *14.3	13.7 *14.3	9.17 *11.6	6.25 *9.44			4.84 *5.40 13.5
	2					12.5 *13.9	12.5 *13.9	8.57 *10.6	5.99 *8.90			4.73 *4.74 13.5
	0 (Ground)					11.7 *15.5	11.7 *15.5	8.10 *11.6	5.78 *8.96			4.98 *5.34 13.0
				*16.4 *16.4	*16.4 *16.4	11.7 *17.7	11.7 *17.7	8.10 *12.2	5.78 *8.96			4.98 *6.48 13.0
	-2			18.4 *22.7	18.4 *22.7	11.4 *16.0	11.4 *16.0	7.86 *12.0				5.70 *6.33 12.2
				18.4 *27.3	18.4 *27.3	11.4 *17.3	11.4 *17.3	7.86 *12.0				5.70 *7.60 12.2
Boom 7.10 m BE-boom Arm 3.60 m H-arm Bucket PCSA: 3.20 m ³ Rock bucket CECE: 2.90 m ³ Rock bucket Shoes 650 mm	-4	*21.6 *21.6	18.7 *21.2	*21.2 *21.2	11.5 *15.4	11.5 *15.4	7.93 *11.4					7.29 *8.07 10.8
		*23.3 *23.3	18.7 *23.3	18.7 *25.5	11.5 *15.5	17.4 *15.5	7.93 *12.1					7.29 *9.56 10.8
	-6	*24.5 *24.5	18.1 *24.5	*18.1 *24.5	11.9 *18.1	11.9 *18.1	13.2 *16.1					
		*29.5 *29.5	19.3 *29.5	*21.9 *29.5	11.9 *19.3	11.9 *19.3	16.1 *21.9					
	8 m					*9.59 *9.59	*9.59 *9.59					*6.46 *6.46 10.7
						*11.7 *11.7	*11.7 *11.7					*7.81 *7.81 10.7
	6 m					*10.3 *10.3	*10.3 *10.3					*6.42 *6.42 11.5
Boom 7.10 m BE-boom Arm 2.95 m BE-arm Bucket PCSA: 3.60 m ³ Rock bucket CECE: 3.20 m ³ Rock bucket Shoes 650 mm	4 m			*16.4 *16.4	*16.4 *16.4	*12.0 *12.0	8.54 *10.2					5.93 *6.71 11.8
				*19.7 *19.7	*19.7 *19.7	13.3 *14.6	8.54 *12.6					5.93 *8.10 11.8
	2 m					12.2 *14.0	8.08 *11.0					5.81 *7.33 11.7
	0 (Ground)					12.2 *17.0	8.08 *12.4					5.81 *8.80 11.7
				18.5 *22.8	18.5 *22.8	11.5 *15.5	7.72 *11.6					6.30 *8.43 11.2
				18.5 *27.4	18.5 *27.4	11.5 *17.6	7.72 *12.0					6.30 *9.95 11.2
	-2 m			18.4 *22.4	18.4 *22.4	11.2 *15.7						
Boom 7.10 m BE-boom Arm 2.95 m BE-arm Bucket PCSA: 3.60 m ³ Rock bucket CECE: 3.20 m ³ Rock bucket Shoes 650 mm	-4 m	*27.5 *27.5	18.8 *27.5	18.8 *19.9	11.5 *19.9	*13.9 *13.9						
		*32.9 *32.9	18.8 *32.9	18.8 *24.0	11.5 *24.0	17.0 *20.2						
	6 m					*9.95 *9.95	*8.50 *8.50					*3.97 *3.97 12.1
						*12.0 *12.0	9.90 *10.0					*4.92 *4.92 12.4
	4 m			*15.4 *15.4	*15.4 *15.4	*11.8 *11.8	9.56 *10.2					*4.21 *4.21 12.4
				*18.3 *18.3	*18.3 *18.3	*14.3 *14.3	9.56 *12.4					*5.20 *5.20 12.3
	2 m			*20.3 *20.3	*20.3 *20.3	13.4 *14.1	9.03 *11.3					*4.69 *4.69 12.3
Boom 7.10 m BE-boom Arm 2.95 m BE-arm Bucket PCSA: 3.60 m ³ Rock bucket CECE: 3.20 m ³ Rock bucket Shoes 650 mm	0 (Ground)			21.2 *24.2	21.2 *24.2	13.4 *17.0	9.03 *13.4					*5.74 *5.74 11.8
				19.6 *23.3	19.6 *23.3	12.5 *15.9	8.57 *12.2					*5.51 *5.51 11.8
				19.6 *27.7	19.6 *27.7	12.5 *18.7	8.57 *12.9					6.34 *6.66 11.8
	-2 m	*18.6 *18.6	19.2 *23.7	19.2 *23.7	12.0 *16.6	8.34 *12.4						*6.92 *6.92 10.7
		*20.2 *20.2	19.2 *28.3	19.2 *28.3	12.0 *18.2	8.34 *12.6						7.52 *8.25 10.7
	-4 m	*31.6 *31.6	19.4 *22.1	19.4 *22.1	12.1 *15.8							
		*37.6 *37.6	19.4 *26.4	19.4 *26.4	12.1 *18.2							
6 m				*17.5 *17.5	*17.5 *17.5							
				20.2 *21.2	20.2 *21.2							

Equipped with heavy lifting system (option)

Notes: 1. Ratings are based on SAE J1097.
2. Lifting capacity of the EX Series does not exceed 75% of tipping load with the machine on firm, level ground or 87% of full hydraulic capacity.

3. The load point is a hook (not standard equipment) loaded on the back of the bucket.

4. *Indicates load limited by hydraulic capacity.

ENGLISH MEASURE

EX700

Rating over-side or 360 degrees

Rating over-front

Unit: 1 000 lb

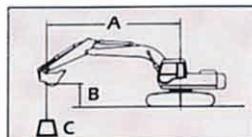
Conditions	Load point height ft	Load radius										At max. reach									
		15 ft		20 ft		25 ft		30 ft		35 ft		40 ft		45 ft		50 ft					
Boom 27'1" Arm 9'8" Bucket PCSA: 4.05 yd ³ Shoes 26"	30							*19.2	*19.2						*16.8	*16.8	37'5"				
	25							*22.7	*22.7						17.1	*19.9					
								*19.9	*19.9						14.5	*16.4	39'11"				
	20							*24.3	*24.3						14.5	*19.5					
	15							*23.6	*23.6	*21.0	*21.0	18.4	*19.9		12.9	*16.4	41'6"				
								*28.6	*28.6	25.1	*25.7	18.4	*24.5		12.9	*19.4					
	10							*27.6	*27.6	*23.1	*23.1	17.8	*20.7		11.9	*16.7	42'5"				
	5							32.7	*33.4	23.9	*28.2	17.8	*25.5		11.9	18.5					
	0 (Ground)							30.4	*32.0	22.6	*25.6	17.1	*22.0		11.5	*17.3					
								30.4	*38.7	22.6	*31.2	17.1	25.7		11.5	18.0					
	-5							28.7	*35.6	21.4	*27.8	16.4	*23.3		11.6	18.2					
								28.7	*42.9	21.4	32.3	16.4	25.0		11.6	18.2	42'0"				
	-10							27.7	*37.6	20.7	*29.5	15.9	*24.3		12.3	19.2	40'8"				
								27.7	42.2	20.7	31.4	15.9	24.4		12.3	19.2					
	-15							27.3	*38.0	20.3	*30.1	15.7	24.2		13.7	*20.2	38'7"				
								27.3	41.8	20.3	31.0	15.7	24.2		13.7	21.1					
	-20							40.2	*46.7	27.4	*37.0	20.3	*29.5	15.9	*23.3	16.2	*20.1	35'6"			
								40.2	*56.1	27.4	41.9	20.3	31.1	15.9	24.5	16.2	*24.0				
Boom 27'1" Arm 11'10" Bucket PCSA: 3.79 yd ³ Shoes 26"	25									*18.7	*18.7				*9.89	*9.89	41'10"				
	20									20.0	*22.5				12.1	*12.1					
										*20.5	*20.5	*19.3	*19.3		9.91	*9.91	43'5"				
	15									*24.9	*24.9	19.6	*23.6		12.1	*12.1					
	10									*31.5	*31.5	23.9	*25.5	18.2	*22.1	13.9	*17.5				
	5									32.2	*37.9	23.9	*30.9	18.2	26.8	13.9	*20.7				
	0 (Ground)									30.3	*35.5	22.7	*28.1	17.5	*23.6	13.6	*20.2				
										30.3	*42.6	22.7	33.6	17.5	26.0	13.6	20.6				
	-5									*37.8	*37.8	29.1	*38.2	21.8	*30.0	16.9	*24.9	13.3			
										40.9	*40.9	29.1	43.7	21.8	32.6	16.9	25.4	13.3			
										40.9	*51.5	28.5	*39.3	21.3	*31.1	16.5	25.1	11.9			
										40.9	*59.2	28.5	43.0	21.3	32.1	16.5	25.1	13.0			
	-10									*40.4	*40.4	41.1	*49.8	28.4	*38.8	21.2	*31.0	16.5			
										*43.7	*43.7	41.1	*59.4	28.4	42.9	21.2	31.9	16.5			
	-15									*58.9	*58.9	41.7	*46.4	28.8	*36.7	21.5	*29.2	15.0			
										69.8	*70.2	41.7	*55.5	28.8	43.3	21.5	32.2	15.0			
	-20									*50.9	*50.9	40.6	*40.6	29.6	*32.1	22.4	*23.9	18.7			
										61.0	*61.0	42.8	*48.8	29.6	*38.8	22.4	*29.2	18.7			
Boom 27'1" Arm 14'5" Bucket PCSA: 3.14 yd ³ Shoes 26"	30									*14.7	*14.7				*7.68	*7.68	42'4"				
	25									*17.6	*17.6				9.58	9.58					
											*16.6	*16.6				7.49	*7.49	44'7"			
	20										*20.4	*20.4				9.37	*9.37				
											*17.3	*17.3	*13.4	*13.4		7.49	*7.49	46'0"			
	15										*20.7	*20.7	*18.8	*18.8	14.7	*17.8		7.68			
	10										*25.3	*25.3	19.4	*23.0	14.7	21.8		9.59			
	5										*38.6	*38.6	*28.9	*23.7	18.5	*20.6	14.2	*18.7			
	0 (Ground)										46.1	*46.1	33.2	*34.8	24.5	*28.8	18.5	*25.2	14.2		
											43.6	*46.0	31.1	*33.4	23.2	*26.5	17.7	*22.4	13.7		
	-5										43.6	*54.8	31.1	*40.1	23.2	*32.2	17.7	26.3	13.7		
											41.6	*48.3	29.5	*36.8	22.1	*28.9	17.0	*24.0	13.3		
											41.6	*52.2	29.5	*44.1	22.1	32.9	17.0	25.6	13.3		
											40.8	*51.6	28.6	*38.7	21.4	*30.5	16.5	25.0	13.0		
											40.8	*60.3	28.6	43.2	21.4	32.2	16.5	25.0	20.1		
	-10										*36.6	40.7	*51.1	28.3	*39.1	21.1	*31.0	16.3	24.8		
											*39.6	40.7	*60.9	28.3	42.8	21.1	31.8	16.3	24.8		
	-15										*56.9	*56.9	41.1	*48.8	28.4	*38.0	21.1	*30.2	16.5	*24.2	
											*61.3	*61.3	41.1	*58.3	28.4	42.9	21.1	31.8	16.5	25.0	
	-20										*57.5	*57.5	41.9	*44.3	28.9	*34.8	21.6	*27.3		12.9	*15.0
											*68.6	*68.6	41.9	*53.1	28.9	*42.0	21.6	32.4		20.7	*19.9
	-25										*46.8	*46.8	*36.5	*36.5	*28.1	*28.1				15.6	*18.2
											*56.2	*56.2	43.3	*44.1	30.1	*34.2				18.4	*18.4

Equipped with heavy lifting system (option)

Notes: 1. Ratings are based on SAE J1097.

2. Lifting capacity of the EX Series does not exceed 75% of tipping load with the machine on firm, level ground or 87% of full hydraulic capacity.

3. The load point is a hook (not standard equipment) loaded on the back of the bucket.
4. *Indicates load limited by hydraulic capacity.



A: Load radius
B: Load point height
C: Lifting capacity

ENGLISH MEASURE

EX700

Rating over-side or 360 degrees Rating over-front Unit: 1 000 lb

Conditions	Load point height ft	Load radius										At max. reach			
		15 ft	20 ft	25 ft	30 ft	35 ft	40 ft	45 ft	50 ft			@ft ln			
Boom 27'1" Arm 17'9" Bucket PCSA: 2.62 yd³ Shoes 26"	30									*8.75	*8.75		*6.14	*6.14	
	25									*10.8	*10.8		*7.79	*7.79	
	20									*13.2	*13.2		*5.98	*5.98	
	15									*15.8	*15.8		*7.62	*7.62	
	10	*33.4	*33.4	*26.0	*26.0	*21.9	*21.9	*19.4	*19.4	*15.7	*15.7	*15.6	*6.13	*6.13	
	5	*39.8	*39.8	*31.3	*31.3	26.0	*26.6	19.8	*23.7	15.3	*21.8	11.8	*8.14	*8.14	
	0 (Ground)	*41.8	*41.8	*31.1	*31.1	24.5	*25.1	18.8	*21.5	14.7	*19.1	11.5	*13.4	*6.88	
	-5	46.4	*49.8	32.9	*37.3	24.5	*30.4	18.8	*26.2	14.7	21.8	11.5	*16.1	*8.66	
	-10	43.5	*47.9	31.0	*35.3	23.3	*28.0	18.0	*23.4	14.1	*20.4	11.2	*12.8	*7.55	
	-15	43.5	*57.0	31.0	*42.3	23.3	*33.8	18.0	26.6	14.1	21.2	11.2	*15.4	*9.41	
	-20	*23.3	*23.3	41.9	*51.2	30.0	*38.1	22.3	*30.2	17.3	*25.0	13.7	20.8	*8.49	*8.49
	-25	*25.4	*25.4	41.9	*60.9	30.0	*44.2	22.3	33.1	17.3	25.9	13.7	20.8	*10.5	*10.5
	-30	*34.1	*34.1	41.2	*52.2	29.0	*39.6	21.7	*31.4	16.9	25.4	13.5	20.5	*9.84	*9.84
	-35	*36.9	*36.9	41.2	*62.1	29.0	*43.5	21.7	32.5	16.9	25.4	13.5	20.5	11.6	*12.0
	-40	*48.2	*48.2	41.2	*51.3	28.8	*39.5	21.5	*31.5	16.8	25.3	13.6	*18.7	*11.9	*11.9
	-45	*52.0	*52.0	41.2	*61.1	28.8	*43.2	21.5	32.3	16.8	25.3	13.6	20.6	13.5	*14.3
	-50	*64.6	*64.6	41.7	*48.5	29.0	*37.8	21.7	*30.1	17.1	*24.0			*15.2	*15.2
	-55	68.9	*72.7	41.7	*57.8	29.0	*43.5	21.7	32.5	17.1	25.6			16.9	*18.1
	-60	*56.4	42.7	*43.0	29.7	*33.6	22.4	*26.1							
	-65	*67.2	*67.2	42.7	*51.5	29.7	*40.5	22.4	*31.8						
Boom 32'10" Arm 17'9" Bucket PCSA: 2.35 yd³ Shoes 26"	30									*11.3	*11.3		*7.05	*7.05	
	25									13.8	*14.5		*8.80	*8.80	
	20									*11.6	*11.6	*11.4	*6.98	*6.98	
	15									*14.7	*14.7	13.6	*8.72	*8.72	
	10									*12.5	*12.5	*11.9	*9.59	*9.59	
	5									*15.8	*15.8	13.3	*15.2	*10.1	
	0 (Ground)									*17.8	*17.8	*15.3	*11.7	8.31	
	-5									*22.0	*22.0	*19.2	*12.2	*7.87	
	-10									*26.7	*26.7	*20.8	*12.7	*7.50	
	-15									*32.6	*32.6	*25.3	*15.5	*7.50	
	-20									30.7	*30.9	*23.6	*19.3	*7.50	
	-25									30.7	*37.7	*23.6	*24.0	*7.50	
	-30									29.0	*33.9	*22.2	*21.0	*7.50	
	-35									29.0	*41.2	*22.2	*31.9	*7.50	
	-40									*19.0	*19.0	*28.1	*18.7	*7.50	
	-45									*13.5	*13.5	*27.1	*19.6	*7.50	
	-50									*14.9	*14.9	*29.4	*16.6	*7.50	
Boom 23'4" BE-boom Arm 9'8" BE-arm Bucket PCSA: 5.36 yd³ Shoes 26"	25									*23.1	*23.1	*21.9	*14.0	*14.0	
	20									*28.2	*28.2	*23.9	*16.9	*16.9	
	15									*32.5	*32.5	*26.3	*14.3	*14.3	
	10									*39.0	*39.0	*32.0	*17.4	*17.4	
	5									*30.3	*30.3	*22.0	*15.1	*15.1	
	0 (Ground)									30.8	*36.8	*22.0	*15.1	*15.1	
	-5									29.0	*34.1	*20.9	*17.3	*17.3	
	-10									29.0	*41.2	*20.9	*20.7	*20.7	
	-15									39.8	*49.6	*27.1	*27.1	*27.1	
	-20									61.4	*61.4	*40.0	*27.2	*27.2	
	-25									68.2	*73.3	*40.0	*20.9	*20.9	
	-30									*52.9	*52.9	*41.0	*17.1	*17.1	
	-35									*63.6	*63.6	*41.0	*17.1	*17.1	
	-40									*44.8	*44.8	*35.4	*17.1	*17.1	
	-45									*54.5	*54.5	*43.1	*17.1	*17.1	
	-50									*27.7	*36.6	*20.1	*17.1	*17.1	

Equipped with heavy lifting system (option)

Notes: 1. Ratings are based on SAE J1097.

2. Lifting capacity of the EX Series does not exceed 75% of tipping load with the machine on firm, level ground or 87% of full hydraulic capacity.

3. The load point is a hook (not standard equipment) loaded on the back of the bucket.

4. *Indicates load limited by hydraulic capacity.

ENGLISH MEASURE

EX700H

 Rating over-side or 360 degrees

 Rating over-front

Unit: 1 000 lb

Conditions	Load point height ft	Load radius										At max. reach		
		15 ft	20 ft	25 ft	30 ft	35 ft	40 ft	45 ft	50 ft	15 ft	20 ft	15 ft	20 ft	@ft in
Boom 27'1" H-boom Arm 11'10" H-arm Bucket PCSA: 3.79 yd ³ Shoes 26"	25									*17.6	*17.6			
	20									19.2	*21.8			
	15									*19.3	*19.3	*18.1	*18.1	
	10									*23.7	*23.7	18.8	*22.5	
	5									*33.3	*33.3	*25.6	*25.6	
	0									*40.0	*40.0	*31.1	*31.1	
	-5									29.2	*34.0	21.7	*26.7	
	-10									29.2	*41.1	21.7	32.3	
	-15									*36.8	*36.8	28.0	*36.5	
	-20									39.8	*39.9	28.0	42.1	
										39.5	*49.6	27.3	*37.6	
										39.5	*58.3	27.3	41.5	
Boom 23'4" (7.10 m) BE-boom Arm 11'10" (3.60 m) H-arm Bucket PCSA: 4.19 yd ³ (3.20 m ³) Rock bucket Shoes 26" (650 mm)	-5									*39.5	*39.5	39.7	*48.0	
	-10									*42.8	*42.8	39.7	*57.6	
	-15									*56.8	*56.8	40.4	*44.6	
	-20									*68.1	*68.1	40.4	*53.7	
	0									39.8	*49.4	27.5	*36.4	
	5									39.8	*59.2	27.5	42.2	
	10									39.4	*49.1	26.9	*37.0	
	15									39.4	*59.0	26.9	41.6	
	20									*60.3	*60.3	39.7	*46.4	
	-10									67.7	*72.2	39.7	*55.8	
	-15									*51.9	*51.9	*40.4	*40.4	
	-20									*62.5	*62.5	40.7	*49.0	
Boom 23'4" (7.10 m) BE-boom Arm 9'8" (2.95 m) BE-arm Bucket PCSA: 4.71 yd ³ (3.60 m ³) Rock bucket Shoes 26" (650 mm)	25									*18.7	*18.7			
	20									*22.0	*22.0			
	15									*21.1	*21.1			
	10									*25.7	*25.7			
	5									*25.5	*25.5	*22.8	*22.8	
	0									*30.7	*30.7	25.6	*27.7	
	-5									*38.5	*38.5	29.9	*29.9	
	-10									*46.0	*46.0	33.6	*35.9	
	-15									44.6	*45.9	31.4	*34.1	
	-20									44.6	*54.7	31.4	*41.0	
										42.2	*50.2	29.8	*37.3	
										42.2	*59.9	29.8	44.6	

 Equipped with heavy lifting system (option)

Notes: 1. Ratings are based on SAE J1097.

2. Lifting capacity of the EX Series does not exceed 75% of tipping load with the machine on firm, level ground or 87% of full hydraulic capacity.

3. The load point is a hook (not standard equipment) loaded on the back of the bucket.

4. *Indicates load limited by hydraulic capacity.



STANDARD EQUIPMENT

Standard equipment may vary by country, so please consult your Hitachi dealer for details.

ENGINE

- 75 A alternator
- Dry-type air filter with evacuator valve
- Cartridge-type engine oil filter
- Cartridge type engine oil bypass filter
- Cartridge type fuel filter
- Radiator and oil cooler with dust protective net
- Radiator reserve tank
- Fan guard
- Isolation-mounted engine
- Auto-idle system
- Quick-idle system

HYDRAULIC SYSTEM

- ETS
- E-P control system (power mode selector)
- OHS
- FPS
- Boom-swing priority system
- Power saving system
- Hydraulic warm-up control system for hydraulic oil
- Quick warm-up system for pilot circuit
- Shockless valve in pilot circuit
- Swing cushion valve in swing circuit

- Control valve with main relief valve
- Extra port for control valve
- Suction filter
- Full-flow filter
- Pilot filter

CAB

All-weather sound-suppressed steel cab equipped with reinforced, tinted (bronze color) glass windows, openable front windows-upper, and lower and both side windows with intermittent windshield wipers, front window washer, side mirror, adjustable suspension seat with armrests, footrest, electric double horn, AM-FM radio with digital clock, auto-idle switch, quick-idle switch, seat belt, cigarette lighter, ashtray, parcel pocket, floor mat, and pilot control shut-off lever, travel alarm with cancel switch (North America only).

MONITOR SYSTEM

- Meters:
Hourmeter, engine coolant temperature gauge and fuel meter.

- Warning lamps:
Alternator charge, engine oil pressure, engine overheat, engine oil filter clog, air cleaner clog and minimum fuel level.

Pilot lamps:

Engine preheat, engine oil level, engine coolant level and hydraulic oil level.

Alarm buzzers:

Engine oil pressure and engine overheat

LIGHTS

- 4 working lights and 1 cab light

UPPERSTRUCTURE

- Undercover
- 12 500 kg (27 600 lb) counterweight
- Fuel level gauge
- Hydraulic oil level gauge
- Tool box
- Utility space
- Rearview mirror
- Swing parking brake

UNDERCARRIAGE

- Travel parking brake
- Travel motor covers
- Track guards and hydraulic track adjuster
- Bolt-on sprocket

- Upper rollers and lower rollers
- Reinforced track links with pin seals
- 650 mm (26") double grouser shoes

FRONT ATTACHMENTS

- Bucket clearance adjust mechanism
- Centralized lubrication system
- Dirt seals on all bucket pins
- 8.25 m (27'1") boom
- 3.60 m (11'10") arm
- 2.90 m³ (3.79 yd³): PCSA heaped bucket

MISCELLANEOUS

- Standard tool kit
- Lockable machine covers
- Fuel filling cap
- Skid-resistant tapes, left service walkway and handrails.

EX700H(Heavy-duty version)

- Headguard-integrated cab (pressurized type)
- H-boom 8.25 (27'1") for backhoe
- H-arm 3.60 m (11'10") for backhoe
- H-track guard
- Reinforced undercover
- Reinforced steps on the side frames



OPTIONAL EQUIPMENT

Optional equipment may vary by country, so please consult your Hitachi dealer for details.

- 750 mm (30") double grouser shoes
- 900 mm (35") double grouser shoes
- Full-length track guard
- Air conditioner (pressurized cab)
- Pneumatic grease gun with hose reel
- Hose rupture valve
- Swing alarm with lamps
- Travel alarm with cancel switch

- Electric fuel refilling pump
- Heavy lifting system
- Auto lubricator
- Front window shutter-preventing film (except Headguard-integrated cab)
- Headguard-integrated cab (with pressurizer kit)

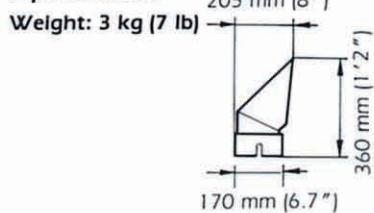
- H-track guard
- Reinforced undercover for upperstructure
- Reinforced steps on the side frames

TRANSPORTATION

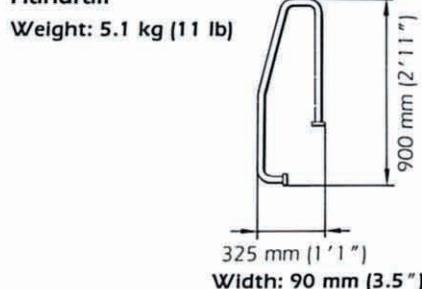
- Easily assembled owing to local assembling system requiring no welding.
- Overall width of below 3 500 mm (11'6") during transportation.

UPPERSTRUCTURE/UNDERCARRIAGE

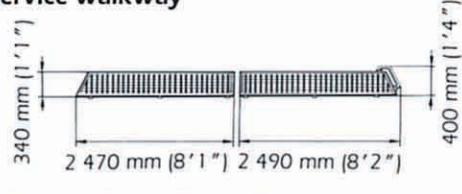
Pipe exhaust



Handrail

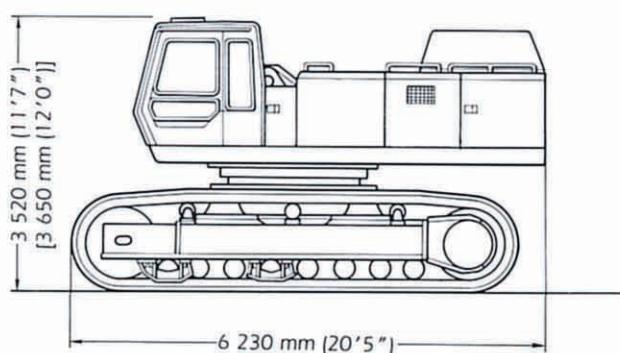


Service walkway



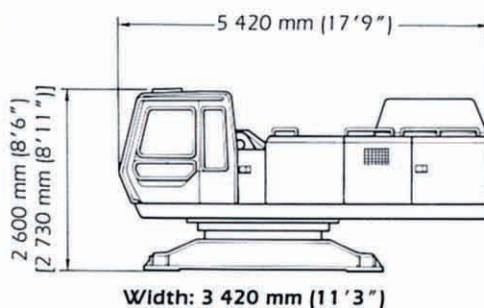
Weight: 28 kg (62 lb) Weight: 29 kg (64 lb)
Height: 115 mm (4.5")

Basic machine



Upperstructure

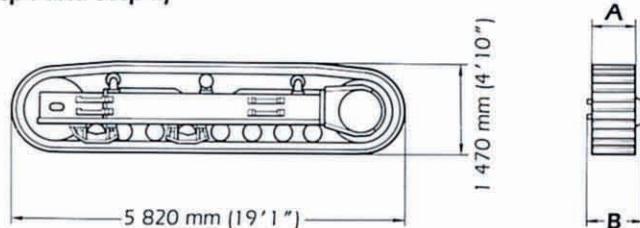
Weight: 20 660 kg (45 560 lb)



Shoe width	Overall width	Weight
650 mm (26")	3 480 mm (11'5")	40 500 kg (89 300 lb)
750 mm (30")	3 580 mm (11'9")	41 200 kg (90 850 lb)
900 mm (35")	3 730 mm (12'3")	42 020 kg (92 650 lb)

[] are with headguard-integrated cab
(H-version: Standard)

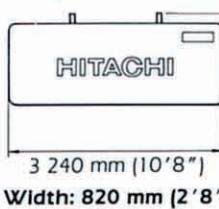
Side frames (With step I and step II)



A (Shoe width)	B	Weight
650 mm (26")	830 mm (2'9")	9 920 kg (21 880 lb) × 2
750 mm (30")	830 mm (2'9")	10 270 kg (22 650 lb) × 2
900 mm (35")	900 mm (2'11")	10 680 kg (23 550 lb) × 2

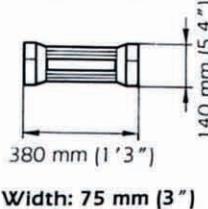
Counterweight

Weight: 12 500 kg (27 000 lb)



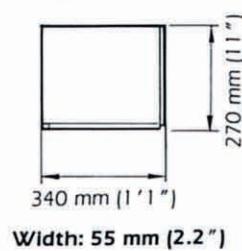
Step

Weight: 3 kg (7 lb) × 2



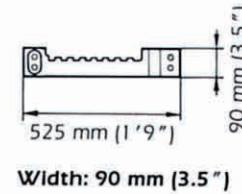
Motor piping cover

Weight: 8 kg (18 lb) × 2



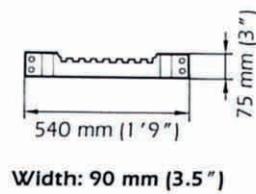
Step: I

Weight: 8 kg (18 lb) × 2



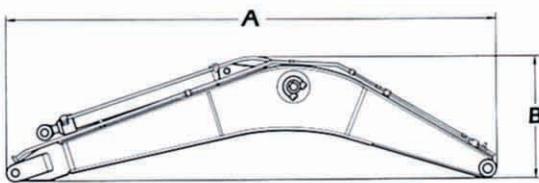
Step: II

Weight: 6 kg (13 lb) × 6

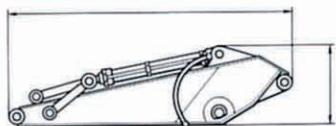


BACKHOE ATTACHMENTS

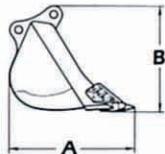
Boom



Arm

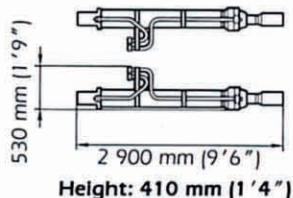


Bucket



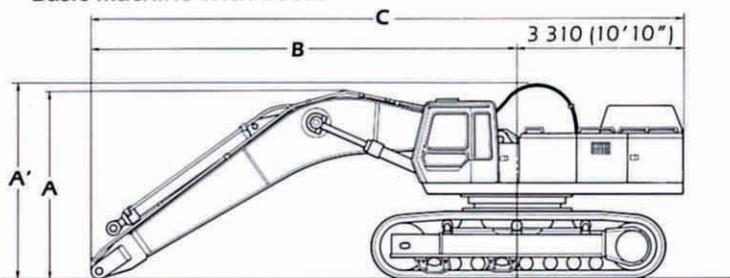
Boom cylinders

Weight: 700 kg (1 540 lb) × 2



Height: 410 mm (1'4")

Basic machine with boom



	Boom length	A	B	Width	Weight
EX700	8.25 m (27'1")	8 580 mm (28'1")	2 110 mm (6'11")	1 420 mm (4'8")	6 850 kg (15 100 lb)
	10.0 m (32'10")	10 330 mm (33'11")	2 320 mm (7'7")	1 420 mm (4'8")	7 760 kg (17 110 lb)
EX700H	*8.25 m (27'1")	8 580 mm (28'1")	2 110 mm (6'11")	1 420 mm (4'8")	6 800 kg (15 610 lb)
EX700	**7.10 m (23'4")	7 560 mm (24'10")	2 510 mm (8'3")	1 420 mm (4'8")	6 970 kg (15 370 lb)

* H-boom, ** BE-boom

	Arm length	A	B	Width	Weight
EX700	2.95 m (9'8")	4 390 mm (14'5")	1 680 mm (5'6")	840 mm (2'9")	4 140 kg (9 130 lb)
	3.60 m (11'10")	5 020 mm (16'6")	1 400 mm (4'7")	840 mm (2'9")	3 560 kg (7 850 lb)
	4.40 m (14'5")	5 820 mm (19'1")	1 460 mm (4'9")	840 mm (2'9")	3 860 kg (8 510 lb)
	5.40 m (17'9")	6 820 mm (22'5")	1 270 mm (4'2")	840 mm (2'9")	3 920 kg (8 640 lb)
EX700H	*3.60 m (11'10")	5 020 mm (16'6")	1 400 mm (4'7")	840 mm (2'9")	3 840 kg (8 470 lb)
EX700	**2.95 m (9'8")	4 390 mm (14'5")	1 680 mm (5'6")	840 mm (2'9")	4 280 kg (9 440 lb)

* H-arm, ** BE-arm

Capacity	PCSA heaped	CECE heaped	A	B	Width	Weight
1.80 m ³ (2.35 yd ³)	1.60 m ³	2 115 mm (6'11")	1 735 mm (5'8")	1 360 mm (4'6")	1 870 kg (4 120 lb)	
2.00 m ³ (2.62 yd ³)	1.80 m ³	2 115 mm (6'11")	1 735 mm (5'8")	1 490 mm (4'11")	2 060 kg (4 540 lb)	
2.40 m ³ (3.14 yd ³)	2.20 m ³	2 220 mm (7'3")	1 870 mm (6'2")	1 560 mm (5'1")	2 350 kg (5 180 lb)	
2.90 m ³ (3.79 yd ³)	2.60 m ³	2 220 mm (7'3")	1 870 mm (6'2")	1 760 mm (5'9")	2 500 kg (5 510 lb)	
3.10 m ³ (4.05 yd ³)	2.80 m ³	2 220 mm (7'3")	1 870 mm (6'2")	1 870 mm (6'2")	2 630 kg (5 800 lb)	
4.10 m ³ (5.30 yd ³)	3.60 m ³	2 350 mm (7'9")	1 950 mm (6'5")	2 050 mm (6'9")	3 500 kg (7 720 lb)	
*2.90 m ³ (3.79 yd ³)	2.60 m ³	2 240 mm (7'4")	1 920 mm (6'4")	1 610 mm (5'3")	3 100 kg (6 840 lb)	
*2.90 m ³ (3.79 yd ³)	2.60 m ³	2 310 mm (7'7")	1 990 mm (6'6")	1 610 mm (5'3")	3 700 kg (8 160 lb)	
*3.20 m ³ (4.19 yd ³)	2.90 m ³	2 310 mm (7'7")	1 990 mm (6'6")	1 640 mm (5'5")	3 300 kg (7 280 lb)	
*3.60 m ³ (4.71 yd ³)	3.20 m ³	2 330 mm (7'8")	1 970 mm (6'6")	1 840 mm (6'0")	3 780 kg (8 330 lb)	
1.90 m ³ (2.48 yd ³)	1.70 m ³	2 370 mm (7'9")	2 010 mm (6'7")	*1 400 mm (4'7")	4 100 kg (9 040 lb)	
2.20 m ³ (2.88 yd ³)	2.00 m ³	2 370 mm (7'9")	2 010 mm (6'7")	*1 580 mm (5'2")	4 300 kg (9 480 lb)	
One-point ripper	—	2 500 mm (8'2")	1 300 mm (4'3")	***800 mm (2'7")	2 600 kg (5 730 lb)	

* Rock bucket, ** Ripper bucket, *** Without side cutters

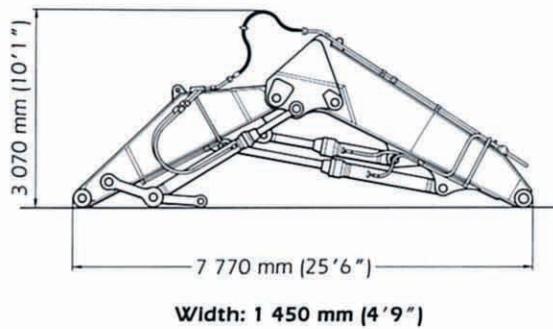
	Boom length	Shoe width	Overall width	Weight	A	A'	B	C
EX700	8.25 m (27'1")	650 mm (26")	3 480 mm (11'5")	49 010 kg (108 070 lb)	3 730 mm (12'3")	3 920 mm (12'10")	8 330 mm (27'4")	11 640 mm (38'2")
		750 mm (30")	3 580 mm (11'9")	49 710 kg (109 610 lb)				
		900 mm (35")	3 730 mm (12'3")	50 810 kg (112 040 lb)				
EX700H	*8.25 m (27'1")	650 mm (26")	3 480 mm (11'5")	49 750 kg (109 700 lb)	3 730 mm (12'3")	3 920 mm (12'10")	8 330 mm (27'4")	11 640 mm (38'2")
		650 mm (26")	3 480 mm (11'5")	49 130 kg (108 330 lb)				
		750 mm (30")	3 580 mm (11'9")	49 830 kg (109 880 lb)				
EX700	**7.10 mm (23'4")	650 mm (26")	3 730 mm (12'3")	50 930 kg (112 300 lb)	3 860 mm (12'8")	3 890 mm (12'9")	7 180 mm (23'7")	10 490 mm (34'5")
		750 mm (30")	3 580 mm (11'9")	49 830 kg (109 880 lb)				
		900 mm (35")	3 730 mm (12'3")	50 930 kg (112 300 lb)				

* H-boom, ** BE-boom

LOADING SHOVEL ATTACHMENTS

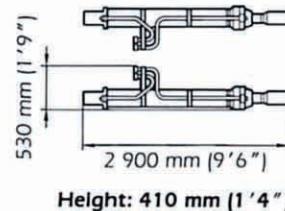
Boom & arm assembly

Weight: 11 450 kg (25 250 lb)

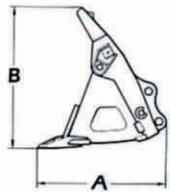


Boom cylinders

Weight: 700 kg (1 540 lb) × 2



Bucket

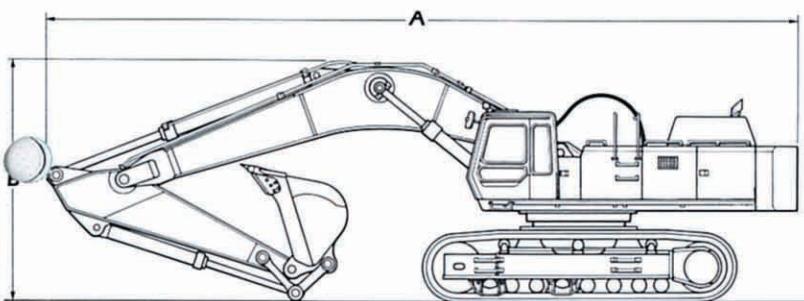


Bucket capacity	A mm [ft/in]	B mm [ft/in]	Max. width mm [ft/in]	Weight kg [lb]	Type
3.60 m ³ (4.71 yd ³)	2 280 (7'6")	2 570 (8'5")	2 300 (7'7")	6 080 (13 410)	Bottom dump type rock bucket
4.00 m ³ (5.23 yd ³)	2 300 (7'7")	2 570 (8'5")	2 460 (8'1")	5 620 (12 390)	Bottom dump type general purpose bucket
4.00 m ³ (5.23 yd ³)	2 290 (7'6")	2 560 (8'5")	2 360 (7'9")	4 980 (10 980)	Tilt dump type rock bucket
4.40 m ³ (5.75 yd ³)	2 290 (7'6")	2 560 (8'5")	2 520 (8'3")	4 630 (10 210)	Tilt dump type general purpose bucket

OVERALL

BACKHOE: Basic machine with 2.90 m³
(3.79 yd³; PCSA heaped)

BE-type with BE-front attachments



	A	B	Width
EX700	14 070 mm (46'2")	* ¹ 4 520 mm (14'10")	3 480 mm (11'5")
EX700H	14 070 mm (46'2")	* ¹ 4 520 mm (14'10")	3 480 mm (11'5")
EX700*³	13 020 mm (42'9")	* ² 5 020 mm (16'6")	3 480 mm (11'5")
EX700H*⁴	12 920 mm (42'5")	4 840 mm (15'11")	3 480 mm (11'5")

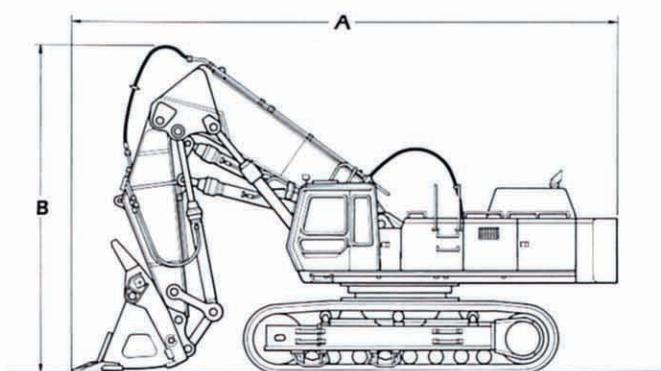
Notes: *¹ Max. height with pipe.

*² Max. height with hose.

*³ With BE-front.

*⁴ With BE-boom and H-arm.

LOADING SHOVEL: Basic machine with 4.00 m³



A: 9 830 mm (32'3")

B: 5 910 mm (19'5")

Width: 3 480 mm (11'5")

© Hitachi Construction Machinery Co., Ltd.

Head Office: Nippon Bldg., 6-2, 2-chome, Ohtemachi,
Chiyoda-ku, Tokyo 100, Japan

Telephone: Tokyo (03) 3245-6388

Facsimile: Tokyo (03) 3246-2609

Telex: J32539 HITACONJ

Cable Address: "TOKHITACHIKENKI"

These specifications are subject to change without notice.
Illustrations and photos show the standard models, and may or may not include optional
equipment, accessories, and all standard equipment.

Printed in Japan KG-S [H, H] (GT3-S, KG-S)