

ZAXIS 470



HYDRAULIC EXCAVATOR

Model Code ZX470LCH-5B

Engine Rated Power 270 kW (362 HP)

Operating Weight ZX470LCH-5B: 48 500 - 50 400 kg

Backhoe Bucket ISO Heaped : 1.30 - 2.50 m³



WALK AROUND

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Higher productivity

The HIOS III B hydraulic system achieves higher productivity with better fuel consumption than the conventional ZAXIS model, which helps to reduce costs.

Larger swing power

The increased swing torque makes it easier to dig next to side walls and operate on slopes.

Added durability

With a strengthened boom, arm and ROPS cab, the ZAXIS 470 can work for lengthy periods in rugged environments.

Faster movement

The new hydraulic system increases the front attachment speed during combined and single operation.

Smooth operation

The new engine has improved the speed and precision of light-load operations such as grading.



ZAXIS Empower your Vision.

A desire to empower your vision is at the heart of the design of Hitachi large excavators. The ZAXIS 470 has been created with careful consideration of five key factors: performance, productivity, comfort, durability and reliability. Our aim is to provide our customers with high-quality and efficient machines that can work effectively in challenging environments. We also want operators to be able to work safely and comfortably, and ultimately to enjoy every aspect of using Hitachi construction machinery. And to help you enjoy the optimum availability of your machine, we have also incorporated a variety of easy maintenance features and developed the comprehensive Hitachi Support Chain after-sales programme.

Expanded leg room

The seat and console can slide further back on the new ZAXIS, providing a more comfortable working environment for the operator. The rightside console has been ergonomically re-designed.

Ultimate comfort

The heated air suspension seat is ideal in cold climates and absorbs vibration during operation minimising operator fatigue.

Easily accessible information

The large multi-function LCD monitor screen is easy to view in bright sunlight or darkness and provides technical data.

Quick and easy service access

The air conditioner condenser can be opened for easy cleaning. Inspection parts are conveniently located.





PERFORMANCE

Tight schedules on large-scale construction projects and production targets in quarries demand a consistently high level of performance from your machine. We understand that this is among the key criteria when customers choose to invest in a large Hitachi excavator. That's why we have prioritised performance characteristics with a variety of measures to increase speed to help you get the most from your machine.



Enhanced power and speed set a new standard



Higher level of performance

Operators around the world told us that the ideal large excavator attains more production. So our engineers used the latest innovations to create the new generation of Hitachi large excavators according to these criteria.

The new hydraulic system allows the operator to manoeuvre the machine easily and perform smooth combined operations quickly, whether the machine is digging or loading a dump truck. The front speed is increased by reducing the pressure loss in circuits and the swing torque has increased by 8%*.

The speed of light-load operations such as grading has also been improved due to larger volume of hydraulic flow.

Lower fuel with higher productivity

The success of your business is influenced by the productivity and efficiency of your equipment. Ultimately, your investment in Hitachi construction machinery can help you to meet production targets and compete successfully to win tenders within your market.

The HIOS III B hydraulic system allows you to achieve 8% higher productivity in H/P mode than the conventional ZAXIS model in the same mode (HP mode)*. In PWR mode, the ZAXIS 470 uses 13% less fuel, while maintaining almost the same level of productivity as the ZX-3 model in the same mode (HP mode)*. All modes therefore result in faster operation, with lower fuel consumption.

** Based upon typical work pattern collected via Global e-Service*

Key features

- 8% higher productivity in H/P mode*
- HIOS III B hydraulic system – higher productivity and lower fuel consumption
- Increased front speed
- Swing torque enhanced by 8%*
- 13% less fuel consumption in PWR mode (vs ZX-3 HP mode)*



PRODUCTIVITY

Hitachi engineers have developed the new ZAXIS large excavator range with the aim of achieving high productivity, with lower fuel consumption and a smaller environmental impact than its predecessors. The new ZAXIS 470 not only complies with the latest EU regulations on emissions standards, but it also exceeds previous levels of efficiency in busy quarries and other job sites. So you can feel confident your Hitachi machine will deliver a powerful and reliable performance, with increased emphasis on sustainability.



Delivering powerful and sustainable efficiency



Sustainable efficiency

The sustainable development of the Hitachi product range to minimise its impact on the environment continues to be one of our main priorities. To comply with EU emission control stage IIIB, we have ensured that our large excavators have been equipped with several environmentally friendly features.

A muffler filter has been installed on the ZAXIS 470 to capture air pollutants, which are automatically burnt thanks to an oxidation catalyst and exhaust temperature control. Nitrous oxide levels are also reduced by the variable geometry turbocharger and high volume-cooled EGR (Exhaust Gas Recirculation).

To reduce emissions, prevent fuel wastage and lower noise levels in the cab, the ZAXIS 470 has an Auto Shut-down feature. This automatically drops the engine revolutions to low idle and then stops the engine after the pilot shut-off lever has been raised.

In addition, the new ZAXIS large excavator has many recyclable parts, which also help to reduce its impact on the environment.

Powerful efficiency

The new ZAXIS 470 is equipped with a powerful new-generation Stage IIIB-compliant engine, which delivers higher productivity with greater fuel efficiency. It is 10 kW more powerful than the previous model and requires a reduced amount of engine oil and coolant, which also enhances the excavator's environmental performance and helps to lower maintenance costs. Using the EN590 fuel, compliant with the European standard, plus the genuine fuel filter and engine oil, Super Wide DH2 or equivalent, will ensure optimum engine efficiency.

The new engine has a common rail-type fuel injection system, which delivers the precise quantity of pressurised fuel to achieve effective combustion, and reduces fuel consumption and particulate matter. The HIOS IIIB hydraulic system has also been applied to the new ZAXIS 470 to reach higher yields with better fuel consumption than the previous model.

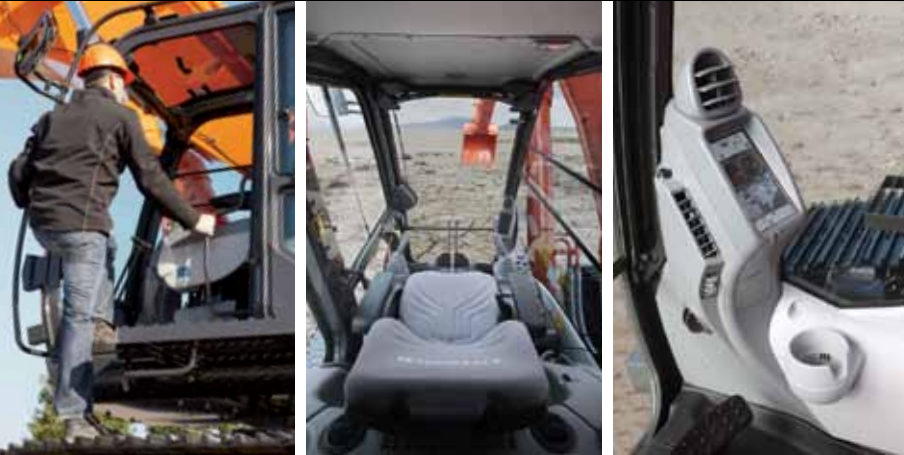
Key features

- Powerful and sustainable
- Stage IIIB-compliant engine
- Muffler filter that burns particulate matter
- Variable geometry turbocharger
- High volume-cooled EGR system
- HIOS IIIB hydraulic system – fuel efficiency and higher productivity
- Environmentally friendly design
- Auto Shut-down – fuel saving for carbon dioxide reduction



COMFORT

Open the door to the cab of the new ZAXIS 470 and it's clear to see that Hitachi engineers have paid just as much attention to the interior of the machine as they have to the exterior. A variety of user-friendly features and enhanced visibility contribute to a comfortable and safe working environment for operators. Our aim is to ensure that the experience of working with large Hitachi excavators is unrivalled in the construction industry.



The comfort of the cab exceeds expectations



From the comfort of the cab

It's essential for you to feel comfortable while you work, especially if you are operating an excavator for lengthy periods of time in a quarry or large-scale construction site. Hitachi has reviewed the ergonomic design of its ZAXIS excavator cab to ensure that you can complete your shift with ease and enjoy the rest of your day.

The fully adjustable air-suspension seat absorbs vibrations and helps to minimise operator fatigue. Its new sliding mechanism means that it can be moved back further than ever before. More leg room is also available as the space underneath the monitor has been expanded.

Enhanced visibility

Healthy and safety are of paramount importance in busy quarries and construction sites. With the latest innovations from Hitachi, the new ZAXIS offers enhanced visibility, particularly on the right-hand side of the machine, to help you avoid any unnecessary damage, and ultimately save you time and money.

The monitor and door have been repositioned, which improves your view and provides easier access to the cab. The excavator is also equipped with the latest rear-view camera, giving you a broader visual range.

User-friendly functionality

The advanced technology that is incorporated within the new ZAXIS is one of its many advantages. The ergonomic controls and the easy to view colour monitor place the power firmly in your hands.

The new multi-function LCD monitor with a seven-inch screen displays a comprehensive range of useful technical information. It allows you to check the machine's status and settings at a glance and has multi-lingual support in up to 32 languages.

For easy operation, the monitor and ergonomically designed switches have been repositioned and are both conveniently located on the right-hand side of the cab.

Enjoy your work

By creating a relaxed and pleasant workspace, our aim was to make your day in the cab of the new ZAXIS more enjoyable and therefore more satisfying.

If you enjoy listening to the radio as you work, you will find that the controls for the AM/FM stereo radio are now fully adjustable from the colour monitor. Alternatively, if you wish to plug in an MP3 player, an auxiliary socket has also been added to the sound system, so that you can work smoothly and efficiently to your favourite music.

Key features

- High-spec ROPS pressurised cab
- Enhanced visibility
- New colour LCD monitor

- Easily accessible real-time information
- Expansive leg room
- Ergonomically designed control panel



DURABILITY

Hitachi ZAXIS large excavators have gained an industry-leading reputation for reliability and durability. Our expertise in manufacturing high-quality construction machinery has been gained over more than 40 years. It is supported by an advanced technological approach that extends throughout the global Hitachi enterprise. So customers all around the world can be assured that their ZAXIS 470 is built to last and can be relied upon in the most challenging environments.



Reliability in the toughest conditions



Durable parts

Our large excavators have been designed to deliver increased levels of availability and productivity even on the toughest job sites. The aim behind manufacturing such durable machines was to ultimately ensure a lower cost of ownership for our customers.

The strengthened boom and arm on each new ZAXIS 470 are highlights of the machine's enhanced durable characteristics. Both features allow it to cope well with working long hours in rugged environments.

A filter-type high-performance water separator effectively captures moisture in the fuel, reducing impurities and helping to minimise any fuel-related engine problems. Dual fuel main filters and pre-filters are provided as standard on the ZAXIS 470 to reduce fuel system failures.

The fuel injector is protected by diamond-like carbon (DLC) coating, which enhances its reliability and durability, and the engine has a twin-layer fuel main filter that doubles filtration performance.

ROPS-compliant cab

A variety of safety measures, such as a strengthened cab, have been incorporated to minimise risks on the job site. The new ROPS-compliant CRES V (Center pillar reinforced structure) cab meets ISO standards and is designed to protect the operator while wearing a seatbelt.

The Roll-over Protective Structures (ROPS) standard is for hydraulic excavators with operating weights from six to 50 tonnes. The structure of the cab is therefore designed to protect the operator in the unlikely event of the machine tipping or rolling over.

Key features

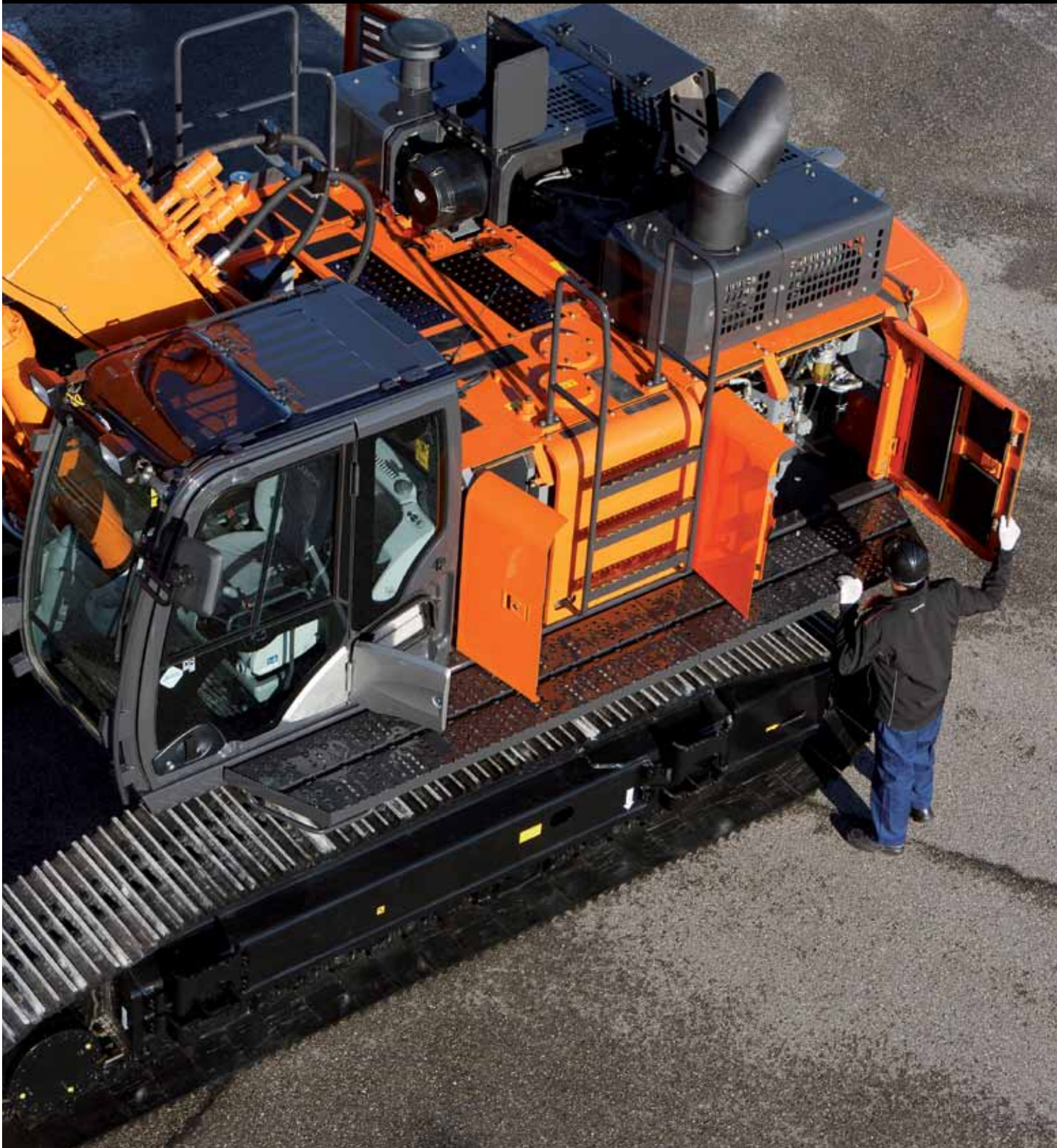
- Proven Hitachi quality
- ROPS-compliant CRES V cab
- Reinforced front attachment
- Reinforced undercarriage

- Dual fuel main filters and pre-filters
- More than 40 years of experience



MAINTENANCE

When it comes to the regular maintenance and cleaning of your ZAXIS 470, we know that convenience is of utmost importance. With a range of easily accessible features, Hitachi large excavators are now easier and quicker to maintain than ever before. This gives our customers more time to focus on the job at hand and guarantees the optimum availability that Hitachi machines can deliver.



Easily accessible features keep your machine working longer



Easy access

The design of the new ZAXIS 470 incorporates a range of convenient features for routine maintenance. They have been created by our engineers in order to save you time and make life a little less stressful. The multi-function LCD monitor allows you to manage machine maintenance information quickly and efficiently. And each time you turn on the ignition switch, you can also set the routine service schedule to help prevent breakdowns.

The fuel filters and engine oil filter can all be replaced from the excavator's walkway. Other work on the upper structure of the machine, like replacing the air cleaner, can be carried out easily.

Easy servicing

The new ZAXIS 470 is equipped with a solenoid fuel pump, which means there is no need to pump manually if the engine stops due to lack of fuel or while the main fuel filter is being changed.

The machine's utility space stores an electric grease pump, hose reel and tool box. This means that batteries and an electrical equipment box are conveniently located in one place.

Easy cleaning

To maximise productivity and ensure optimum levels of availability in the quarry or on any construction site, we have introduced a variety of quick solutions to the new ZAXIS 470 for routine maintenance and cleaning.

One example of these convenient features can be seen on the exterior of the machine, where the air conditioning condenser can be easily opened for cleaning the condenser and radiator located behind. The cleaning process is also easier thanks to the parallel positioning of the cooling package.

Key features

- Easy daily inspection
- Quick and easy service access
- Relocated filters
- Solenoid fuel pump



SUPPORT CHAIN

As soon as you become a Hitachi customer, you can rely on first-class after-sales service from your authorised dealer. Hitachi provides extensive support to each of the dealers within the European network, so that they can ensure your ZAXIS 470 continues to meet your requirements and exceed expectations. To further protect your investment in Hitachi construction machinery, we have introduced the Hitachi Support Chain after-sales programme. This gives you the flexibility to create a tailor-made service plan from the the following key-areas, "links" in the chain of service available from Hitachi via your local dealer.



Flexible after-sales programme to protect your investment

Global e-Service

The new ZAXIS excavator is equipped with a GPRS communication system*. This sends a wide range of machine data to the Hitachi main server. Via the Global e-Service database, you will have remote access to all of this data. All you need is an internet connection and your Global e-Service log-in details.

Global e-Service enables you and your dealer to download and share this data, helping you to remotely manage your fleet. The online facility also helps your dealer to proactively advise you on preventive maintenance and related special offers.

The latest information on the ZAXIS excavator is available 24/7 and includes operational data, such as the number of working hours, fuel consumption figures, working modes and location. This helps you to reduce running costs, plan jobs efficiently and keep up to date with machine maintenance – to ensure optimum performance and minimal downtime.

Technical support

The professional and highly trained Hitachi service team combine the global expertise and knowledge of Hitachi Construction Machinery with your local language and culture. We take a proactive approach towards customer service by continuously training our dealer personnel, so that the available global knowledge is passed on to each individual technician in our dealer network.

Extended warranty and service contracts

Every new Hitachi model is covered by a full manufacturer's warranty. However, your ZAXIS excavator may require extra protection due to severe working conditions or to minimise equipment repair costs. To meet these demands, our dealers offer the option of a unique extended warranty programme (HELP – Hitachi Extended Life Program) and comprehensive service contracts – the most effective way to optimise the performance of your new ZAXIS excavator.

Parts and Remanufactured Components

Hitachi offers different lines of parts and components to suit your specific needs. In addition to our range of genuine parts, there are other options available:

- If your machines have been working for several years, Hitachi can offer a second line of genuine parts as an attractively priced solution.
- For that highly demanding application or climate, Hitachi provides a line of parts with extra performance.
- When you are looking for an economical solution for preventive replacements, remanufactured components are the best option.

Whatever choice you make, you can be assured of the renowned Hitachi quality and warranty to give you added peace of mind.

Your Hitachi dealer can supply you with more details on each of the above parts lines.



* The GPRS communication system is standard equipment for new ZAXIS excavators, however, the availability of the communication system depends on licensing regulations in your country. Please contact your Hitachi dealer for more information or to apply for a Global e-Service account.

Key features

- Check each of your machines from your office – 24/7
- Have a remote insight into fuel consumption
- Check the current and previous locations and movements of your machine(s)

- See maintenance status and items due for renewal on each of your machines
- Receive e-mail notifications for any machine alerts, unexpected movements and so on

SPECIFICATIONS

ENGINE

Model	Isuzu AL-6UZ1XZSA-01
Type	4-cycle water-cooled, common rail direct injection
Aspiration	Variable geometry turbocharged, intercooled, cooled EGR
Aftertreatment	Muffler filter
No. of cylinders	6
Rated power	
ISO 9249, net	H/P mode:
(Without Fan)	270 kW (362 HP) at 2 000 min ⁻¹ (rpm)
EEC 80/1269, net	H/P mode:
(Without Fan)	270 kW (362 HP) at 2 000 min ⁻¹ (rpm)
SAE J1349, net	H/P mode:
(Without Fan)	270 kW (362 HP) at 2 000 min ⁻¹ (rpm)
Maximum torque.....	1 435 Nm (146 kgf m) at 1 500 min ⁻¹ (rpm)
Piston displacement	9.839 L
Bore and stroke	120 mm x 145 mm
Batteries	2 x 12 V / 170 Ah

HYDRAULIC SYSTEM

Hydraulic Pumps

Main pumps	2 variable displacement axial piston pumps
Maximum oil flow	2 x 400 L/min
Pilot pump	1 gear pump
Maximum oil flow	34 L/min

Hydraulic Motors

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

Relief Valve Settings

Implement circuit	31.9 MPa (325 kgf/cm ²)
Swing circuit	28.4 MPa (290 kgf/cm ²)
Travel circuit	35.3 MPa (360 kgf/cm ²)
Pilot circuit	3.9 MPa (40 kgf/cm ²)
Power boost	35.3 MPa (360 kgf/cm ²)

Hydraulic Cylinders

	Quantity	Bore	Rod diameter
Boom	2	170 mm	115 mm
Arm	1	190 mm	130 mm
Bucket	1	170 mm	120 mm

UPPERSTRUCTURE

Revolving Frame

D-section frame for resistance to deformation.

Swing Device

Axial piston motor with planetary reduction gear is bathed in oil. Swing parking brake is spring-set/hydraulic-released disc type. Swing speed 9.5 min⁻¹ (rpm)

Operator's Cab

Independent spacious cab, 1 005 mm wide by 1 675 mm high, conforming to ISO* Standards.

* International Organization for Standardization

UNDERCARRIAGE

Tracks

Track shoes with triple grousers made of induction-hardened rolled alloy. 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	9
Track shoes	53
Track guard	2

Travel Device

Each track driven by axial piston motor through reduction gear for counterrotation of the tracks. Parking brake is spring-set/hydraulic-released disc type.

Automatic transmission system: High-Low.

Travel speeds	High : 0 to 5.5 km/h
	Low : 0 to 3.9 km/h

Maximum traction force ... 329 kN (33 600 kgf)

Gradeability 70% (35 degree) continuous

SOUND LEVEL

Sound level in cab according to ISO 6396 LpA 75 dB(A)
 External sound level according to ISO 6395 and
 EU Directive 2000/14/EC LwA 107 dB(A)

SERVICE REFILL CAPACITIES

Fuel tank 725.0 L
 Engine coolant 52.0 L
 Engine oil 41.0 L
 Swing device (each side) 6.5 L
 Travel device (each side) 11.0 L
 Hydraulic system 510.0 L
 Hydraulic oil tank 310.0 L

WEIGHTS AND GROUND PRESSURE

Operating weight and Ground pressure

Boom type	Arm type	Shoe grouser type	Shoe width	Operating weight	Ground pressure
7.0 m H	3.4 m H	Triple or double	600 mm	48 500 kg	82 kPa (0.84 kgf/cm ²)
		Triple	750 mm	49 300 kg	67 kPa (0.68 kgf/cm ²)
		Triple	900 mm	50 000 kg	57 kPa (0.58 kgf/cm ²)

Including 1.9 m³ rock bucket (ISO heaped)

Boom type	Arm type	Shoe grouser type	Shoe width	Operating weight	Ground pressure
7.0 m H	2.9 m BE	Triple or double	600 mm	48 600 kg	82 kPa (0.84 kgf/cm ²)
		Triple	750 mm	49 400 kg	67 kPa (0.68 kgf/cm ²)
		Triple	900 mm	50 100 kg	57 kPa (0.58 kgf/cm ²)

Including 2.1 m³ rock bucket (ISO heaped)

Boom type	Arm type	Shoe grouser type	Shoe width	Operating weight	Ground pressure
6.3 m BE	2.5 m BE	Triple or double	600 mm	49 000 kg	83 kPa (0.85 kgf/cm ²)
		Triple	750 mm	49 800 kg	68 kPa (0.69 kgf/cm ²)
		Triple	900 mm	50 400 kg	57 kPa (0.58 kgf/cm ²)

Including 2.5 m³ rock bucket (ISO heaped)

Boom type	Arm type	Shoe grouser type	Shoe width	Operating weight	Ground pressure
6.3 m BE	2.9 m BE	Triple or double	600 mm	48 800 kg	83 kPa (0.85 kgf/cm ²)
		Triple	750 mm	49 600 kg	68 kPa (0.69 kgf/cm ²)
		Triple	900 mm	50 200 kg	57 kPa (0.58 kgf/cm ²)

Including 2.3 m³ rock bucket (ISO heaped)

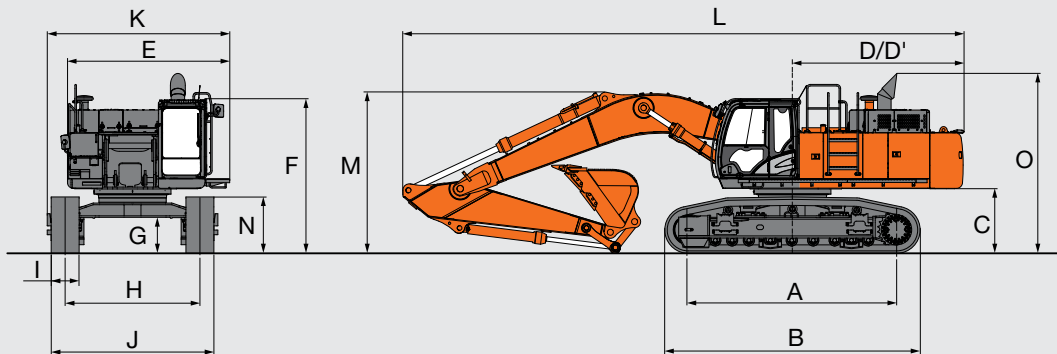
BUCKET AND ARM DIGGING FORCE

Boom length	ZAXIS 470LCH			
	6.3 m BE-boom		7.0 m H-boom	
	2.5 m BE-arm	2.9 m BE-arm	2.9 m BE-arm	3.4 m H-arm
Bucket digging force* ISO	295 kN (30 100 kgf)			296 kN (30 200 kgf)
Bucket digging force* SAE : PCSA	266 kN (27 100 kgf)			257 kN (26 200 kgf)
Arm crowd force* ISO	302 kN (30 700 kgf)	263 kN (26 900 kgf)		224 kN (22 900 kgf)
Arm crowd force* SAE : PCSA	294 kN (30 000 kgf)	256 kN (26 100 kgf)		215 kN (21 900 kgf)

* At power boost

SPECIFICATIONS

DIMENSIONS



Unit: mm

	ZAXIS 470LCH ^{*2}		
A Distance between tumblers	4 470		
B Undercarriage length	5 470		
^{*1} C Counterweight clearance	1 360		
D Rear-end swing radius	3 670		
D' Rear-end length	3 660		
E Overall width of upperstructure	3 480		
F Overall height of cab	3 330		
^{*1} G Min. ground clearance	737		
H Track gauge : Extended / Retracted	2 890 / 2 390		
I Track shoe width	G 600		
J Undercarriage width : Extended / Retracted	G 600	G 750	G 900
	3 490 / 2 990	3 640 / 3 140	3 790 / 3 290
K Overall width	3 820		
L Overall length	12 010		
M Overall height of boom	3 480		
N Track height	1 220		
O Overall height of base machine	3 870		

^{*1} Excluding track shoe lug G: Triple grouser shoe

^{*2} Equipped with 7.0 m H-boom and 3.4 m H-arm

Backhoe Buckets

Capacity		Width		No. of teeth	Weight	Recommendation			
ISO heaped	CECE heaped	Without side cutters	With side cutters			ZAXIS 470LCH			
						6.3 m BE-boom		7.0 m H-boom	
				2.5 m BE-arm	2.9 m BE-arm	2.9 BE-arm	3.4 H-arm		
^{*1} 1.9 m ³	1.7 m ³	1 480 mm	1 500 mm	5	2 070 kg	●	●	●	●
^{*1} 2.1 m ³	1.8 m ³	1 560 mm	1 580 mm	5	2 170 kg	●	●	●	—
^{*1} 2.3 m ³	2.0 m ³	1 680 mm	1 700 mm	5	2 260 kg	●	●	—	—
^{*1} 2.5 m ³	2.2 m ³	1 800 mm	1 820 mm	5	2 360 kg	●	—	—	—
^{*2} 1.3 m ³	1.2 m ³	1 170 mm	—	3	2 330 kg	●	●	●	●
One-point ripper				1	1 260 kg	●	●	●	●

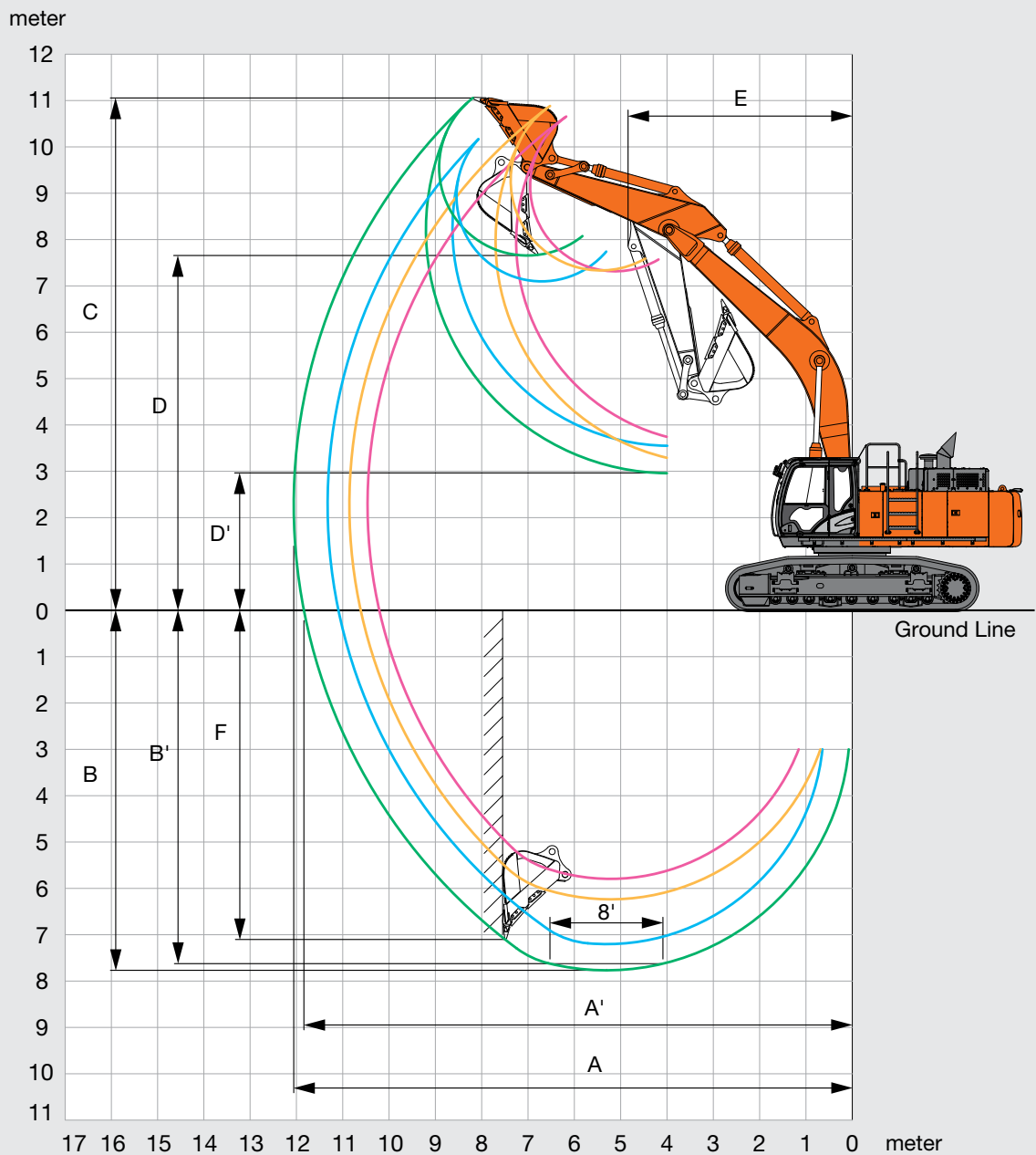
^{*1} Rock bucket

^{*2} Ripper bucket

● Heavy-duty service

— Not applicable

WORKING RANGES



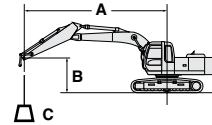
Unit: mm

Arm length	ZAXIS 470LCH			
	6.3 m BE-boom		7.0 m H-boom	
	2.5 m BE-arm	2.9 m BE-arm	2.9 m BE-arm	3.4 m H-arm
A Max. digging reach	10 460	10 750	11 330	12 060
A' Max. digging reach (on ground)	10 210	10 500	11 090	11 840
B Max. digging depth	5 790	6 130	7 200	7 770
B' Max. digging depth (8' level)	5 620	5 970	7 000	7 630
C Max. cutting height	10 660	10 790	10 170	11 060
D Max. dumping height	7 320	7 440	7 100	7 650
D' Min. dumping height	3 670	3 250	3 520	2 940
E Min. swing radius	4 090	3 930	5 020	4 840
F Max. vertical wall	4 260	4 650	4 270	7 100

Excluding track shoe lug

LIFTING CAPACITIES

- Notes: 1. Ratings are based on ISO 10567.
 2. Lifting capacity does not exceed 75% of tipping load with the machine on firm, level ground or 87% full hydraulic capacity.
 3. The load point is the center-line of the bucket pivot mounting pin on the arm.
 4. *Indicates load limited by hydraulic capacity.
 5. 0 m = Ground.



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

For lifting capacities, subtract bucket and quick hitch weight from lifting capacities.

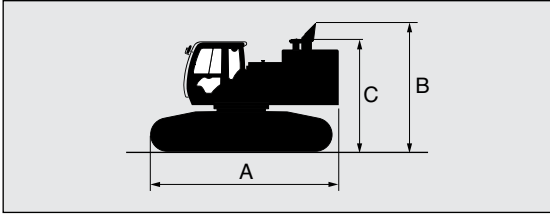
ZAXIS 470LCH

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

Conditions	Load point height	Load radius										At max. reach				
		3.0		4.5		6.0		7.5		9.0		meter				
H-Boom 7.0 m	7.5															
H-Arm 3.4 m	6.0															
Counterweight 9 080 kg Shoe 600 mm	4.5			*20 820	*20 820	*15 830	14 850	*13 320	10 610	*11 870	8 010	*7 690	6 830	9.9		
	3.0			*23 560	21 130	*18 040	13 990	*14 500	10 160	12 330	7 760	*8 010	6 460	10.1		
	1.5			*15 310	*15 310	*19 670	13 300	*15 480	9 760	12 080	7 540	*8 580	6 340	10.1		
	0 (Ground)			*18 350	*18 350	*20 330	12 900	15 570	9 480	11 900	7 370	*9 490	6 470	9.9		
	-1.5	*13 430	*13 430	*25 370	19 670	*19 970	12 750	15 420	9 350	11 830	7 320	*10 970	6 900	9.4		
	-3.0	*21 880	*21 880	*23 700	19 870	*18 540	12 810	*14 650	9 380			*11 900	7 790	8.7		
	-4.5	*24 740	*24 740	*19 780	*19 780	*15 620	13 070	*11 580	9 660			*11 530	9 630	7.5		
H-Boom 7.0 m	7.5															
BE-Arm 2.9 m	6.0					*14 570	*14 570	*12 840	10 820			*11 040	8 460	8.7		
Counterweight 9 080 kg Shoe 600 mm	4.5			*22 370	22 270	*16 570	14 510	*13 800	10 410	*12 260	7 860	*11 440	7 550	9.2		
	3.0					*18 590	13 650	*14 850	9 970	12 200	7 640	*11 290	7 080	9.5		
	1.5					*19 900	13 020	*15 650	9 590	11 970	7 440	11 130	6 930	9.5		
	0 (Ground)			*19 760	19 470	*20 190	12 710	15 440	9 360	11 840	7 310	11 450	7 090	9.2		
	-1.5	*16 120	*16 120	*24 850	19 570	*19 480	12 640	15 350	9 280			12 410	7 640	8.7		
	-3.0	*26 480	*26 480	*22 100	19 840	*17 640	12 780	*13 860	9 390			*12 940	8 840	7.9		
	-4.5			*17 630	*17 630	*14 010	13 160					*12 430	11 570	6.6		
BE-Boom 6.3 m	7.5					*14 000	*14 000					*7 980	*7 980	7.2		
BE-Arm 2.9 m	6.0					*14 870	*14 870	*13 590	10 910			*7 750	*7 750	8.1		
Counterweight 9 080 kg Shoe 600 mm	4.5			*21 170	*21 170	*16 610	14 960	*14 290	10 620			*7 850	*7 850	8.6		
	3.0			*25 410	21 610	*18 590	14 170	*15 220	10 230			*8 230	7 920	8.9		
	1.5			*27 710	20 460	*20 070	13 520	*15 990	9 880			*8 940	7 760	8.9		
	0 (Ground)			*27 650	20 050	*20 550	13 140	15 780	9 650			*10 170	8 000	8.6		
	-1.5	*24 230	*24 230	*25 930	20 050	*19 780	13 030	*15 400	9 590			*12 350	8 740	8.1		
	-3.0	*28 670	*28 670	*22 490	20 330	*17 350	13 190					*13 630	10 410	7.2		
	-4.5															
BE-Boom 6.3 m	7.5					*14 660	*14 660					*12 280	*12 280	6.8		
BE-Arm 2.5 m	6.0					*15 410	*15 410	*14 050	10 720			*11 890	10 090	7.8		
Counterweight 9 080 kg Shoe 600 mm	4.5			*22 060	*22 060	*17 050	14 700	*14 590	10 450			*12 020	8 830	8.3		
	3.0					*18 890	13 910	*15 410	10 070			*12 600	8 210	8.6		
	1.5					*20 170	13 300	15 900	9 740			12 960	8 050	8.6		
	0 (Ground)			*27 110	19 850	*20 370	12 980	15 680	9 550			13 490	8 320	8.3		
	-1.5			*24 990	19 930	*19 290	12 930	*14 860	9 550			*14 110	9 180	7.7		
	-3.0			*21 130	20 290	*16 350	13 170					*13 640	11 170	6.8		
	-4.5															
H-Boom 7.0 m	7.5							*11 640	11 570			*7 710	*7 710	8.7		
H-Arm 3.4 m	6.0							*12 260	11 310	*10 920	8 420	*7 590	*7 590	9.4		
Counterweight 9 080 kg Shoe 900 mm	4.5			*20 820	*20 820	*15 830	15 230	*13 320	10 900	*11 870	8 230	*7 690	7 030	9.9		
	3.0			*23 560	21 700	*18 040	14 360	*14 500	10 440	*12 460	7 990	*8 010	6 660	10.1		
	1.5			*15 310	*15 310	*19 670	13 680	*15 480	10 040	12 450	7 760	*8 580	6 540	10.1		
	0 (Ground)			*18 350	*18 350	*20 330	13 280	*15 980	9 760	12 270	7 600	*9 490	6 670	9.9		
	-1.5	*13 430	*13 430	*25 370	20 240	*19 970	13 130	*15 790	9 630	12 210	7 540	*10 970	7 110	9.4		
	-3.0	*21 880	*21 880	*23 700	20 440	*18 540	13 190	*14 650	9 660			*11 900	8 030	8.7		
	-4.5	*24 740	*24 740	*19 780	19 780	*15 620	13 450	*11 580	9 940			*11 530	9 910	7.5		

TRANSPORTATION

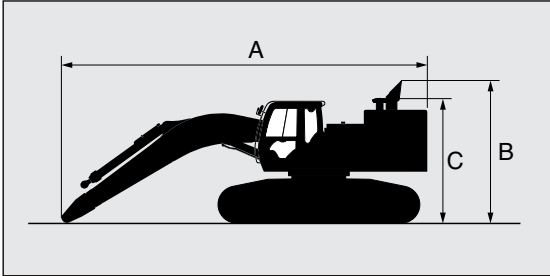
BASIC MACHINE (WITHOUT COUNTERWEIGHT)



Shoe width	A	B	C ¹	Overall width ²	Weight
600 mm				2 990 mm	29 400 kg
750 mm	5 690 mm	3 870 mm	3 400 mm	3 140 mm	30 200 kg
900 mm				3 290 mm	30 900 kg

¹ Without exhaust funnel
² Undercarriage retracted

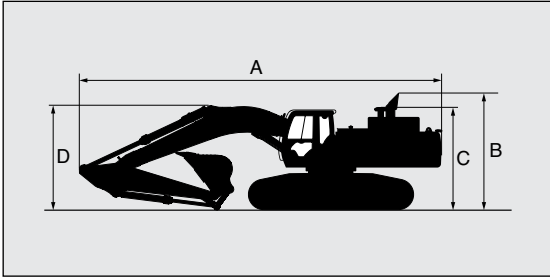
BASIC MACHINE FITTED WITH BOOM AND NO SIDEWALK



Boom length	Shoe width	A	B	C ¹	Overall width ²	Weight
6.3 m BE	600 mm	9 150 mm	3 870 mm	3 400 mm	2 990 mm	34 800 kg
	750 mm				3 140 mm	35 600 kg
	900 mm				3 290 mm	36 300 kg
7.0 m H	600 mm	9 910 mm	3 870 mm	3 400 mm	2 990 mm	34 700 kg
	750 mm				3 140 mm	35 500 kg
	900 mm				3 290 mm	36 200 kg

¹ Without exhaust funnel
² Undercarriage retracted

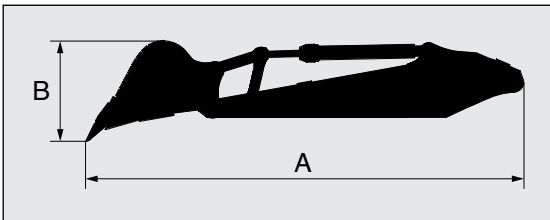
BASIC MACHINE FITTED WITH FRONT AND SIDEWALK



Boom length	6.3 m BE		7.0 m H	
	2.5 m BE	2.9 m BE	2.9 m BE	3.4 m H
Arm length				
A	11 660 mm	11 320 mm	12 100 mm	12 010 mm
B	3 870 mm			
C ¹	3 400 mm			
D	4 300 mm	3 740 mm	3 600 mm	3 480 mm

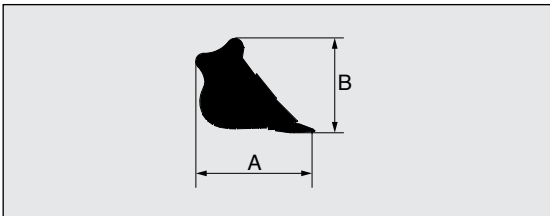
¹ Without exhaust funnel

ARM AND BUCKET



Arm	Bucket SAE, PCSA heaped	A	B	Overall width	Weight
2.5 BE	2.50 m ³	5 650 mm	1 470 mm	1 820 mm	5 000 kg
2.9 BE	2.30 m ³	6 030 mm	1 340 mm	1 700 mm	4 660 kg
3.4 H	1.90 m ³	6 370 mm	1 470 mm	1 500 mm	4 800 kg

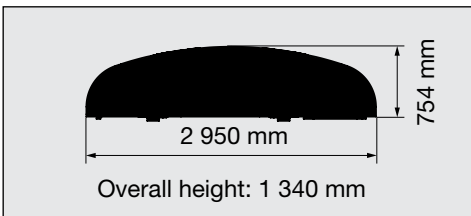
BUCKET



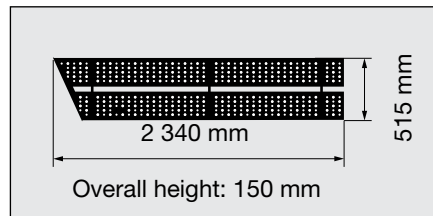
Rock bucket

Bucket		A	B	Overall width	Weight
ISO heaped	CECE heaped				
1.9 m ³	1.7 m ³	2 030 mm	1 480 mm	1 500 mm	2 070 kg
2.1 m ³	1.8 m ³	1 950 mm	1 650 mm	1 580 mm	2 170 kg
2.3 m ³	2.0 m ³	1 950 mm	1 650 mm	1 700 mm	2 260 kg
2.5 m ³	2.2 m ³	1 950 mm	1 650 mm	1 820 mm	2 360 kg

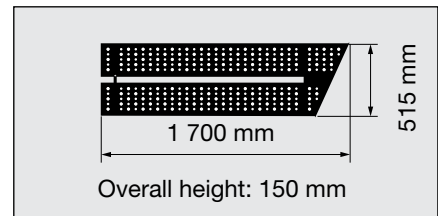
COUNTERWEIGHT 9 080 kg



LEFT FRONT SIDEWALK 44 kg



LEFT REAR SIDEWALK 30 kg



● Standard equipment ○ Optional equipment

ENGINE

Auto idle system	●
Cartridge-type engine oil filter	●
Cartridge-type fuel filter	●
Dry-type air double filter with evacuator valve (with air filter restriction switch for monitor)	●
Fan guard	●
Fuel pre-filter	●
Isolation-mounted engine	●
Muffler filter	●
Power mode control [H/P (High Power) PWR (Power) ECO (Economy)]	●
Pre-cleaner	○
Radiator, oil cooler and intercooler with dust protective net	●
Radiator reserve tank	●
50 A alternator	●

HYDRAULIC SYSTEM

Accessories for breaker	○
Accessories for breaker & crusher	○
Accessories for 2 speed selector	○
Auto power lift	●
Boom mode selector system	●
Control valve with main relief valve	●
Drain filter	●
Engine speed sensing system	●
E-P control system	●
Extra port for control valve	●
Full-flow filter	●
Hose rupture valve	○
Pilot filter	●
Power boost	●
Quick warm-up system for pilot circuit	●
Shockless valve in pilot circuit	●
Suction filter	●
Work mode selector	●

CAB

Additional fuse box	●
Adjustable armrests	●
All-weather sound suppressed steel cab	●
AM-FM radio	●
Ashtray	●
Auto control air conditioner	●
Auto-idle selector	●
AUX. terminal and storage	●
Cab : ROPS for excavators compliant cab	●
Laminated round glass (green color) front window	●
Windows on front, upper, lower and left side can be opened	●
OPG top guard fitted Level II (ISO10262)	○
OPG front guard fitted Level II (ISO10262)	○
Cigarette lighter	●
Drink holder	●
Engine shut-off switch	●
Electric double horn	●
Evacuation hammer	●
Floor mat	●
Footrest	●
Front window washer	●
Glove compartment	●
Hot & cool box	●
Intermittent windshield wiper	●
LED room light with door courtesy	●
Pilot control shut-off lever	●
Rain guard for cab	○
Retractable seat belt	●
Rubber radio antenna	●
Seat : Adjustable reclining air suspension with heater	●
Short wrist control levers	●
Storage box	●
Sun visor (front)	○
Sun visor (side)	○
Transparent roof with slide curtain	●
6 fluid-filled elastic mounts	●
12 V power outlet	○

MONITOR SYSTEM

Alarm buzzers: overheat, engine oil pressure, overload	●
Alarms: overheat, engine warning, engine oil pressure, alternator, minimum fuel level, air filter restriction, work mode, overload, etc	●
Display of meters: water temperature, hour, fuel rate, clock	●
Other displays: work mode, auto-idle, glow, rearview monitor, operating conditions, etc	●

LIGHTS

2 cab lights	○
4 cab lights	○
2 working lights	●
Additional working lights (boom right side)	○

UPPER STRUCTURE

Electric fuel refilling pump with auto stop	●
Electrical grease pump with hose-reel	●
Fuel level float	●
Hydraulic oil level gauge	●
Ladder	●
Rear view camera	●
Rear view mirror (right & left side)	●
Sidewalk (cab side)	●
Swing parking brake	●
Tool box	●
Utility space	●
170 Ah batteries	●
4.5 mm thickness undercover	●
9 080 kg counterweight	●

UNDERCARRIAGE

Bolt-on sprocket	●
Full track guard	○
Hydraulic track adjuster	●
Idler track adjuster	●
Reinforced track links with pin seals	●
Travel motor covers	●
Travel parking brake	●
Track undercover	○
Upper and lower rollers	●
2 track guard (each side)	●
600 mm triple grouser shoes	●
750 mm shoe with standard track guard	○
900 mm shoe with standard track guard	○

FRONT ATTACHMENTS

Attachment basic piping	○
Centralized lubrication system	●
Damage prevention plate and square bars	●
Dirt seal on all bucket pins	●
Flanged pin	●
Monolithically cast bucket link A	●
1.9 m ³ (ISO heaped) rock bucket (with dual type side shrouds)	○
7.0 m H-boom and 3.4 m H-arm	●
6.3 m BE-boom	○
2.5 m BE-arm	○
2.9 m BE-arm	○
Reinforced welded link A	○
Reinforced link B	●

MISCELLANEOUS

Anti-slip steps and handrails	●
Lockable fuel refilling cab	●
Lockable machine covers	●
Onboard information controller	●
Standard tool kit	●
Theft deterrent system	●
Travel direction mark on track frame	●



Built on the foundation of superb technological capabilities, Hitachi Construction Machinery is committed to providing leading-edge solutions and services to contribute as a reliable partner to the business of customers worldwide.

Hitachi Environmental Vision 2025

The Hitachi Group released the Environmental Vision 2025 to curb annual carbon dioxide emissions. The Group is committed to global production while reducing environmental impact in life cycles of all products, and realizing a sustainable society by tackling three goals — prevention of global warming, recycling of resources, and enhancement of ecosystem.

Reducing Environmental Impact by New ZAXIS

Hitachi makes a green way to cut carbon emissions for global warming prevention according to LCA*. New ZAXIS utilizes lots of technological advances, including the new ECO mode, and Isochronous Control. Hitachi has long been committed to recycling of components, such as aluminum parts in radiators and oil cooler. Resin parts are marked for recycling.

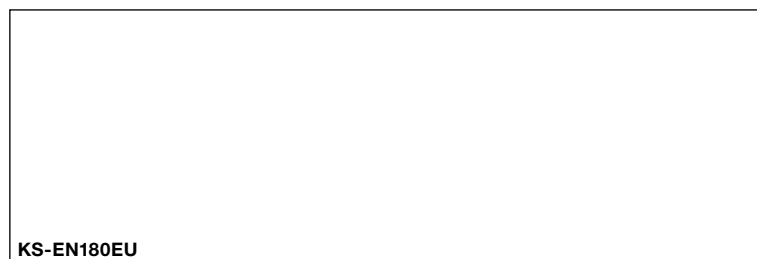
*Life Cycle Assessment – ISO 14040



Prior to operating this machine, including satellite communication system, in a country other than a country of its intended use, it may be necessary to make modifications to it so that it complies with the local regulatory standards (including safety standards) and legal requirements of that particular country. Please do not export or operate this machine outside the country of its intended use until such compliance has been confirmed. Please contact your Hitachi dealer in case of questions about compliance.

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 with some differences in color and features. Before use, read and understand the Operator's Manual for proper operation.



KS-EN180EU