

Material Handling Machine

LH 150 Industry

Litronic®

Operating Weight:
130,000 – 220,000 kg

Engine:
400 kW / 543 HP

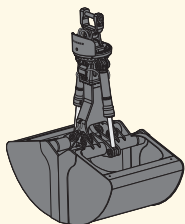
**Stage IV
Stage IIIA
Electro**

Max. System Performance:
661 kW

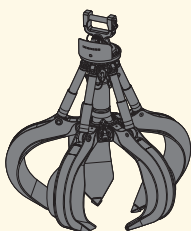


LIEBHERR

The Perfect Solution for Every Application



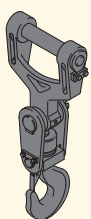
Shells for loose material



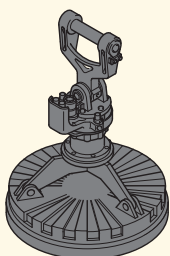
Multi-tine grab



Wood grab

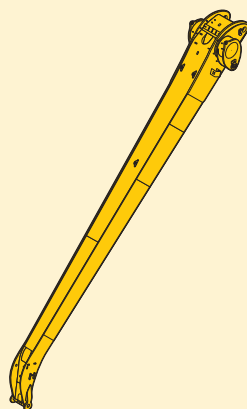


Load hook

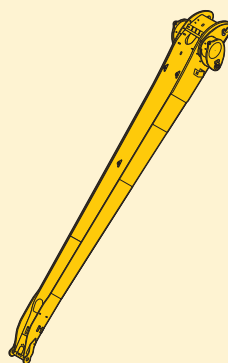


Magnet devices

Working Tools

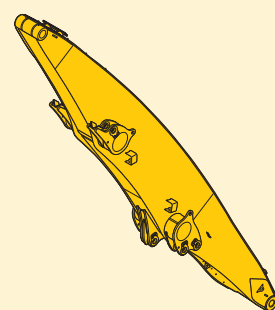


Angled stick

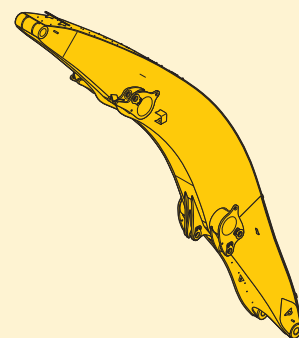


Straight stick

Sticks



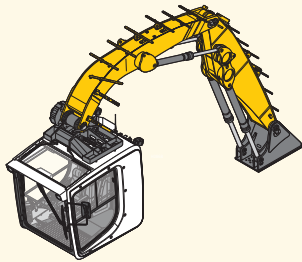
Straight boom



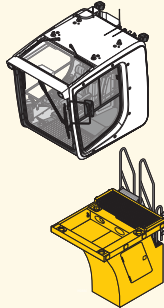
Angled boom

Booms

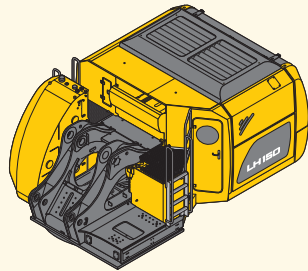
Cab Elevations



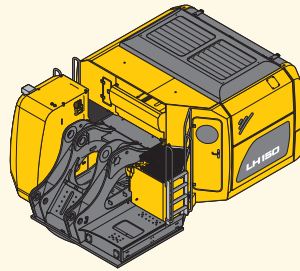
Hydraulic cab elevation



Rigid cab elevation



Diesel engine



Electric motor

Uppercarriage

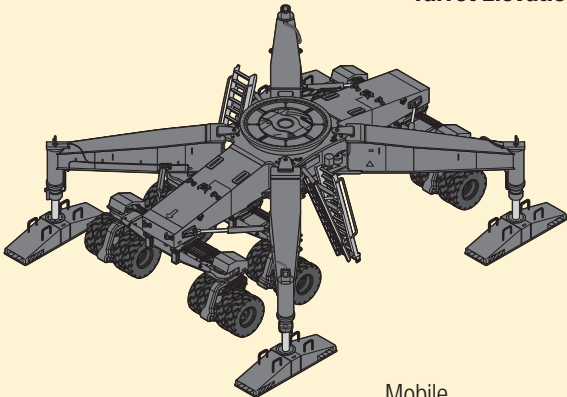


Turret 2,000 mm

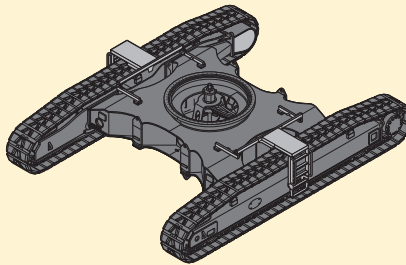


Turret 1,200 mm

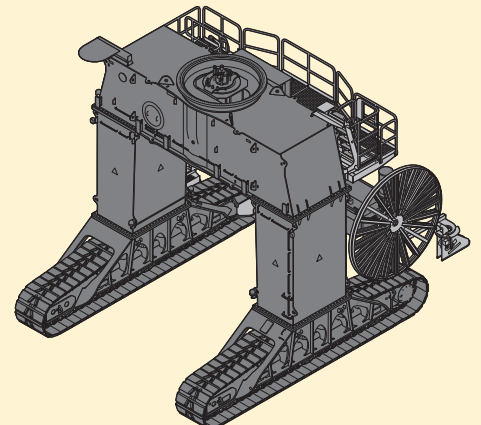
Turret Elevations



Mobile



Crawler



Gantry (Crawler and Rail-mounted)

Undercarriage

Technical Data



Diesel Engine

Rating per ISO 9249	400 kW (543 HP) at 1,700 RPM
Model	Liebherr D9508
Type	8 cylinder V-engine
Bore/Stroke	128/157 mm
Displacement	16.16 l
Engine operation	4-stroke diesel Common-Rail turbo-charged and after-cooled reduced emissions
Air cleaner	dry-type air cleaner with pre-cleaner, primary and safety elements
Engine idling	sensor controlled
Electrical system	
Voltage	24 V
Batteries	4 x 180 Ah/12 V
Alternator	three-phase current 28 V/180 A
Stage IV	
Harmful emissions values	in accordance with 97/68/EG stage IV
Emission control	Liebherr SCR technology
Fuel tank	2,800 l
Urea tank	180 l
Stage IIIA	
Harmful emissions values	in accordance with 97/68/EG stage IIIA
Fuel tank	2,800 l



Electric Motor

Rating	400 kW (543 HP) at 1,700 RPM
Model	Liebherr KGF1391
Type	three-phase squirrel cage motor electric motor auxiliary equipment (air-conditioning compressor, alternator 24 V)
Electrical system energy supply	Liebherr control cabinets uppercarriage and undercarriage with access protection, drive components heated and ventilated Liebherr frequency converter fed drive system heavy-duty version
Supply voltage	
Low voltage	380 – 690 V
High voltage	2.14 – 20 kV
Frequency	50/60 Hz
Engine idling	sensor controlled
Electrical system	battery-assisted control system, lighting, diagnostics system
Voltage	24 V
Batteries	2 x 180 Ah/12 V
Alternator	three-phase current 28 V/140 A



Cooling System

Diesel engine	water-cooled cooling system, consisting of a cooling unit for water and charge air and a 2 nd cooler for hydraulic oil, each with an infinitely variable, thermostatically controlled fan drive system
Electric motor	air-cooled cooling system for hydraulic oil with an infinitely variable, thermostatically controlled fan drive system frequency converter water-cooled



Hydraulic Controls

Power distribution	via control valves with integrated safety valves, simultaneous actuation of chassis and attachment. Swing drive in separate closed circuit
Servo circuit	
Attachment and swing	with electro-hydraulic pilot control and proportional joystick levers
Chassis	with electro-hydraulic pilot control and an additional proportional joystick lever
Additional functions	
Proportional control	proportionally acting transmitters on the joysticks for additional hydraulic functions



Hydraulic System

Hydraulic pump	
for attachment and travel drive	4 Liebherr axial piston variable displacement pumps
Max. flow	4 x 278 l/min.
Max. pressure	350 bar
for swing drive	reversible axial piston variable displacement pump, closed-loop circuit
Max. flow	455 l/min.
Max. pressure	260 bar
Hydraulic pump regulation and control	Positive Control multi-circuit hydraulic system for independent and demand controlled dosing via the hydraulic pumps; sensor-controlled
Hydraulic tank	1,240 l
Hydraulic system	1,850 – 1,900 l (depending on undercarriage version)
Hydraulic oil filter	3 main return filters with integrated partial micro filtration (5 µm), 1 high pressure filter for each main pump
MODE selection	adjustment of engine and hydraulic performance via a mode pre-selector to match application, e.g. for especially economical and environmentally friendly operation or for maximum material handling and heavy-duty jobs
S (Sensitive)	mode for precision work and lifting through very sensitive movements
E (ECO)	mode for especially economical and environmentally friendly operation
P (Power)	mode for high performance with low fuel consumption
P+ (Power-Plus)	mode for highest performance and for very heavy duty applications, suitable for continuous operation

Swing Drive

Drive	Liebherr compact planetary reduction gear with Liebherr axial piston motor in a closed system with integrated brake valve
Swing ring	Liebherr, sealed race ball bearing swing ring, internal teeth
Swing speed	0 – 5.5 RPM stepless
Swing torque	260 kNm
Holding brake	wet multi-disc (spring applied, pressure released)

Operator's Cab

Cab	spacious operator cabin with profiled design, excellent view on working area, access from behind, fixed front, roof and base panel made of bullet proof glass, front screen with electrical heating, shock-absorbing suspension, sounddamping insulating, sliding window on left side, sun shadings, folding seat for instructor
Operator's seat	
Comfort	air cushioned operator's seat with headrest, lap belt, seat heater, adjustable seat cushion inclination and length, lockable horizontal suspension, automatic weight adjustment, adjustable suspension stiffness, pneumatic lumbar vertebrae support and passive seat climatisation with active coal
Option	
Premium	in addition to operator's seat comfort: active electronic weight adjustment (automatic readjustment), pneumatic low frequency suspension and active seat climatisation with active coal and ventilator
Control system	joysticks with arm consoles and swivel seat
Operation and displays	large high-resolution operating unit, self-explanatory, colour display with touchscreen, video-compatible, numerous setting, control and monitoring options, e.g. air conditioning control, fuel consumption respectively energy consumption, machine and tool parameters
Air-conditioning	
Diesel engine	automatic air-conditioning, recirculated air function, fast de-icing and demisting at the press of a button, air vents can be operated via a menu; recirculated air and fresh air filters can be easily replaced and are accessible from the outside; heating-cooling unit, designed for extreme outside temperatures, sensors for solar radiation, inside and outside temperatures
Electric motor	in addition to diesel engine: air-conditioned cab via weekly timer

Attachment

Type	high-strength steel plates at highly stressed points for the toughest requirements. Complex and stable mountings of attachment and cylinders
Hydraulic cylinders	Liebherr cylinders with special seal system as well as shock absorption
Energy recovering cylinder	Liebherr gas cylinder with special sealing and control system
Bearings	sealed, low maintenance

Undercarriage

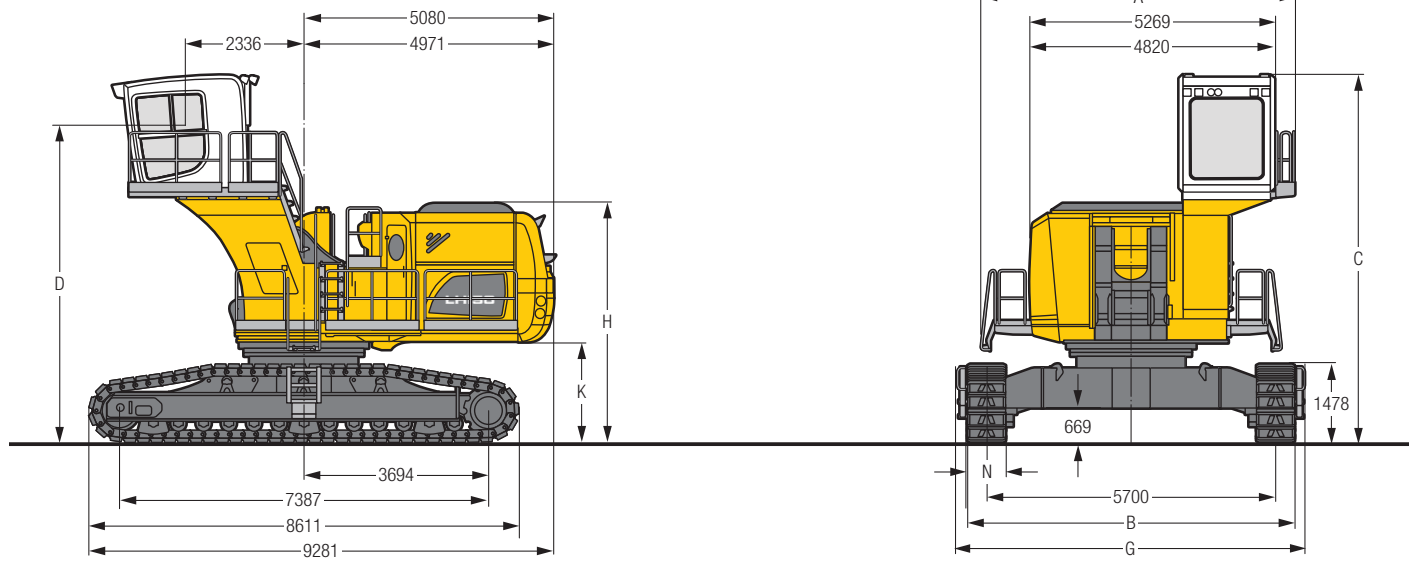
Mobile	
Drive	one axle drive per drive axle with Liebherr axial piston motor and functional brake valve on both sides
Travel speed	0 – 7.8 km/h stepless 0 – 4.2 km/h stepless (creeper speed)
Axles	wheelsets with suspended 40 t axles, with slewing drive rotating around the vertical axis, hydraulic cylinder for leveling
Position of wheelsets	6 steering axles, 2 powered and braked, for leveling and axle load distribution, interconnected by hydraulic
Option	8 steering axles, 2 powered and braked
Steering programs	front wheel, rear wheel and all-wheel steering, move to the side in crab steering possible, turning on the spot
Service brake	two circuit travel brake system with accumulator
Holding brake	wet multi-disc (spring applied, pressure released)
Stabilization	x-shaped 4 point support with 4 folding arms, one vertically positioned support cylinder per folding arm, support plates with ball-and-socket joint, removable
Crawler	
Drive	Liebherr compact planetary reduction gear with Liebherr axial piston motor per side of undercarriage
Travel speed	0 – 3.9 km/h stepless 0 – 1.7 km/h stepless (creeper speed)
Brake	functional brake valves on both sides
Holding brake	wet multi-disc (spring applied, pressure released)
Track pads	flat
Tracks	sealed and greased
Rail-mounted Gantry	
Chassis	rail travel drive designed for the respective load per undercarriage corner
Drive	compact planetary reduction gear with axial piston motor per rail travel drive
Brake	functional brake valves on both sides
Holding brake	per rail travel drive wet multi-disc (spring applied, pressure released)
Option	
Storm brakes	different designs

Complete Machine

Lubrication	Liebherr central lubrication system for uppercarriage and attachment, automatically
Mobile	Liebherr central lubrication system for undercarriage, automatically
Steps system	undercarriage ascent via ladders and platforms uppercarriage with platform left and right and cross-over possibility parts hot-dip galvanised, nonskid surface
Noise emission	
ISO 6396	L_{pA} (inside cab) = 70 dB(A)
2000/14/EC	L_{WA} (surround noise) = 108 dB(A)

LH 150 C - Dimensions

Industry

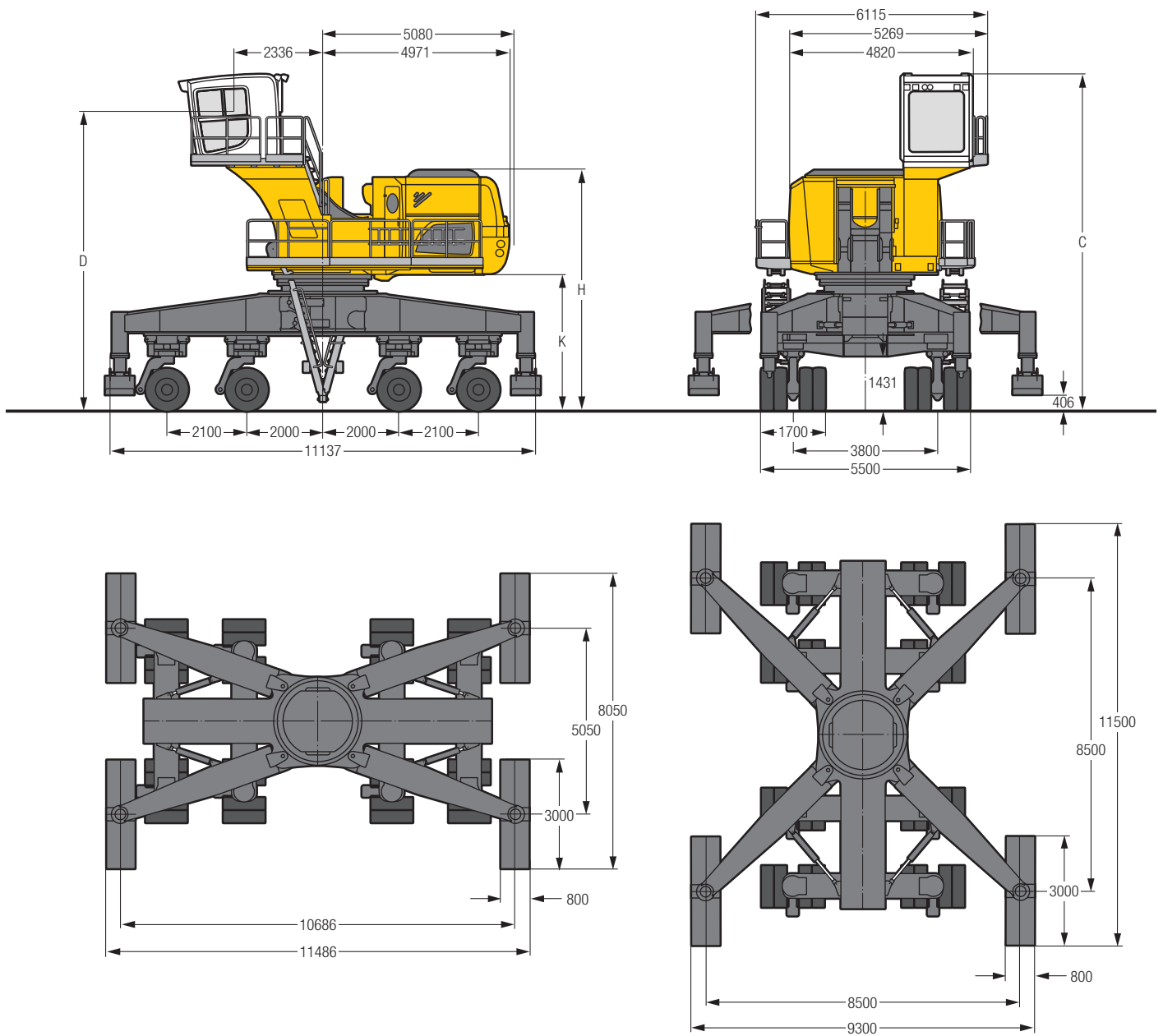


Increase type	LFC 250	
without turret	mm	
A	6,495	
C	7,266	
D	6,248	
H	4,722	
K	1,967	
N	750	1,000
B	6,450	6,700
G	6,964	7,214

Increase type	LFC 250	
Turret 2,000 mm	mm	
A	7,434	
C	9,266	
D	8,248	
H	6,722	
K	3,967	
N	750	1,000
B	6,450	6,700
G	6,964	7,214

LH 150 M - Dimensions

Industry

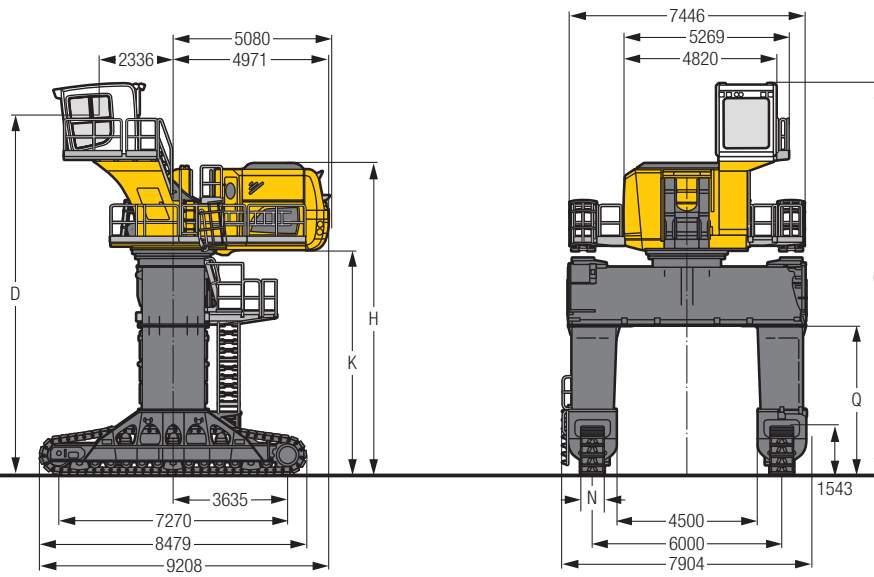


Increase type	LFC 250
without turret	mm
C	8,854
D	7,867
H	6,323
K	3,568

Increase type	LFC 250
Turret 2,000 mm	mm
C	10,854
D	9,867
H	8,323
K	5,568

LH 150 C Gantry - Dimensions

Industry

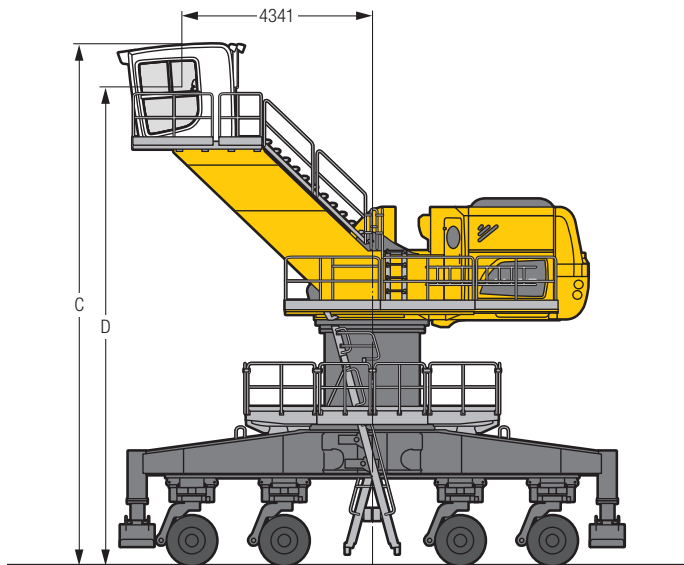


Increase type	LFC 250
Gantry 4,700 mm	mm
C	12,401
D	11,399
H	9,861
K	7,106
N	750 1,000
Q	4,700

Increase type	LFC 250
Gantry 5,500 mm	mm
C	13,201
D	12,199
H	10,661
K	7,906
N	750 1,000
Q	5,500

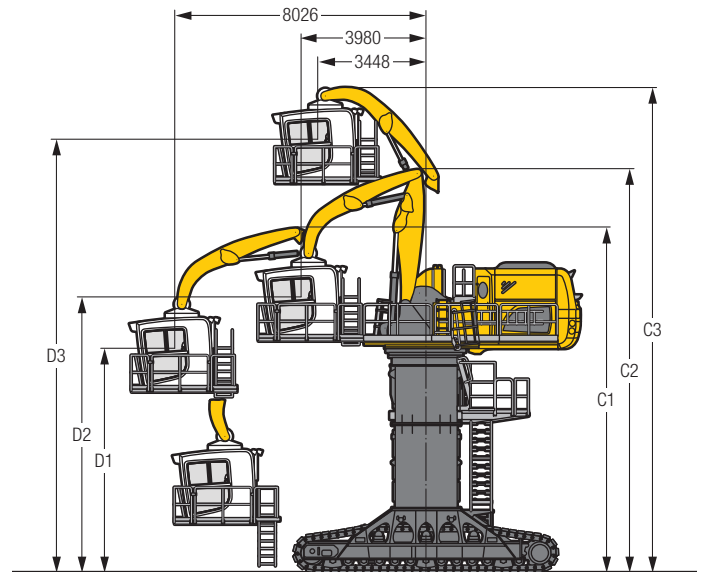
Choice of Cab Elevation

Cab Elevation LFC (Rigid Elevation)



Increase type		LFC 350	
LH 150 C			
Height		without turret	Turret 2,000 mm
C	mm	8,269	10,269
D	mm	7,252	9,252
LH 150 M			
Height		without turret	Turret 2,000 mm
C	mm	9,869	11,869
D	mm	8,866	10,866
LH 150 C			
Height		with gantry 4,700 mm	with gantry 5,500 mm
C	mm	13,406	14,206
D	mm	12,400	13,200

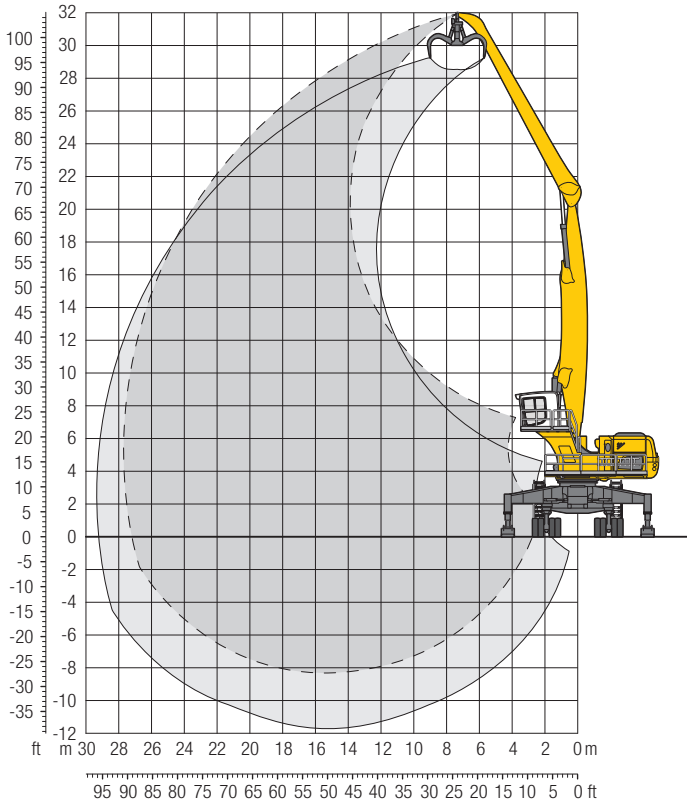
Cab Lift (Hydraulic Elevation)



Increase type		LHC-D 1090 T			
Height		LH 150 C	LH 150 M	LH 150 C	LH 150 C
		Turret 2,000 mm	Turret 2,000 mm	Gantry 4,700 mm	Gantry 5,500 mm
C1	mm	7,835	9,423	10,970	11,770
C2	mm	9,714	11,302	12,849	13,649
C3	mm	12,328	13,916	15,463	16,263
D1	mm	3,993	5,581	7,128	7,928
D2	mm	5,621	7,209	8,756	9,556
D3	mm	10,658	12,246	13,793	14,593

LH 150 M - Attachment GA28

Industry – Kinematic 2A

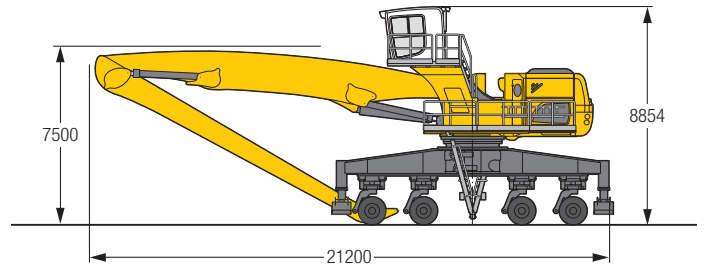


Operating Weight

The operating weight includes the basic machine with 4 point outriggers, rigid cab elevation, 32 solid tyres, straight boom 15.00 m, angled stick 13.50 m and grab model GMM 120-5/3.00 m³ semi-closed tines.

Weight 148,200 kg

Dimensions



m	Under-carriage	Attachment Length (m)														m																							
		6.0 m	7.5 m	9.0 m	10.5 m	12.0 m	13.5 m	15.0 m	16.5 m	18.0 m	19.5 m	21.0 m	22.5 m	24.0 m	25.5 m		27.0 m																						
31.5	4 pt. outr. down			13.7*	13.7*														13.0*	13.0*	9.4																		
30.0	4 pt. outr. down				14.0*	14.0*	12.1*	12.1*											10.7*	10.7*	12.9																		
28.5	4 pt. outr. down						13.9*	13.9*	12.3*	12.3*	10.2*	10.2*									9.4*	9.4*	15.4																
27.0	4 pt. outr. down								13.6*	13.6*	12.2*	12.2*	10.3*	10.3*							8.6*	8.6*	17.5																
25.5	4 pt. outr. down								14.4*	14.4*	13.4*	13.4*	12.0*	12.0*	10.2*	10.2*					8.0*	8.0*	19.2																
24.0	4 pt. outr. down								15.0*	15.0*	13.8*	13.8*	12.5*	12.5*	11.3*	11.3*	9.8*	9.8*					7.5*	7.5*	20.6														
22.5	4 pt. outr. down										13.7*	13.7*	12.4*	12.4*	11.3*	11.3*	10.3*	10.3*	9.1*	9.1*				7.2*	7.2*	21.9													
21.0	4 pt. outr. down										13.7*	13.7*	12.4*	12.4*	11.2*	11.2*	10.3*	10.3*	9.4*	9.4*	8.1*	8.1*			7.0*	7.0*	23.0												
19.5	4 pt. outr. down										13.7*	13.7*	12.3*	12.3*	11.2*	11.2*	10.3*	10.3*	9.4*	9.4*	8.7*	8.7*				6.8*	6.8*	23.9											
18.0	4 pt. outr. down											13.7*	13.7*	12.3*	12.3*	11.2*	11.2*	10.2*	10.2*	9.4*	9.4*	8.7*	8.7*	8.0*	8.0*			6.6*	6.6*	24.7									
16.5	4 pt. outr. down										15.3*	15.3*	13.7*	13.7*	12.3*	12.3*	11.2*	11.2*	10.2*	10.2*	9.4*	9.4*	8.6*	8.6*	8.0*	8.0*			6.5*	6.5*	25.5								
15.0	4 pt. outr. down										15.3*	15.3*	13.7*	13.7*	12.4*	12.4*	11.2*	11.2*	10.2*	10.2*	9.4*	9.4*	8.6*	8.6*	8.0*	8.0*	7.3*	7.3*			6.5*	6.5*	26.0						
13.5	4 pt. outr. down										17.4*	17.4*	15.4*	15.4*	13.8*	13.8*	12.4*	12.4*	11.2*	11.2*	10.2*	10.2*	9.4*	9.4*	8.6*	8.6*	7.9*	7.9*	7.3*	7.3*			6.4*	6.4*	26.5				
12.0	4 pt. outr. down										17.6*	17.6*	15.5*	15.5*	13.8*	13.8*	12.4*	12.4*	11.3*	11.3*	10.3*	10.3*	9.4*	9.4*	8.6*	8.6*	7.9*	7.9*	7.2*	7.2*			6.4*	6.4*	27.0				
10.5	4 pt. outr. down											19.6*	19.6*	17.7*	17.7*	15.6*	15.6*	13.9*	13.9*	12.5*	12.5*	11.3*	11.3*	10.3*	10.3*	9.4*	9.4*	8.6*	8.6*	7.9*	7.9*	7.2*	7.2*	6.5*	6.5*	6.3*	6.3*	27.3	
9.0	4 pt. outr. down																																				6.1*	6.1*	27.5
7.5	4 pt. outr. down	24.4*	24.4*	28.2*	28.2*	24.7*	24.7*	20.8*	20.8*	18.0*	18.0*	15.8*	15.8*	14.0*	14.0*	12.5*	12.5*	11.3*	11.3*	10.3*	10.3*	9.4*	9.4*	8.6*	8.6*	7.8*	7.8*	7.1*	7.1*	6.3*	6.3*	5.8*	5.8*	5.8*	5.8*	5.8*	5.8*	27.6	
6.0	4 pt. outr. down	38.9*	38.9*	30.4*	30.4*	24.9*	24.9*	21.0*	21.0*	18.1*	18.1*	15.8*	15.8*	14.0*	14.0*	12.5*	12.5*	11.3*	11.3*	10.2*	10.2*	9.3*	9.3*	8.5*	8.5*	7.7*	7.7*	6.9*	6.9*	6.1*	6.1*	5.6*	5.6*	5.6*	5.6*	5.6*	5.6*	27.7	
4.5	4 pt. outr. down	14.2*	14.2*	30.7*	30.7*	25.1*	25.1*	21.1*	21.1*	18.1*	18.1*	15.8*	15.8*	14.0*	14.0*	12.5*	12.5*	11.3*	11.3*	10.2*	10.2*	9.2*	9.2*	8.4*	8.4*	7.6*	7.6*	6.8*	6.8*	5.8*	5.8*	5.3*	5.3*	5.3*	5.3*	5.3*	5.3*	27.7	
3.0	4 pt. outr. down	7.7*	7.7*	18.4*	18.4*	25.1*	25.1*	21.1*	21.1*	18.1*	18.1*	15.8*	15.8*	14.0*	14.0*	12.5*	12.5*	11.2*	11.2*	10.1*	10.1*	9.1*	9.1*	8.2*	8.2*	7.4*	7.4*	6.5*	6.5*	5.5*	5.5*	4.9*	4.9*	4.9*	4.9*	4.9*	4.9*	27.6	
1.5	4 pt. outr. down	6.5*	6.5*	12.7*	12.7*	24.8*	24.8*	20.9*	20.9*	18.0*	18.0*	15.7*	15.7*	13.9*	13.9*	12.3*	12.3*	11.1*	11.1*	9.9*	9.9*	9.0*	9.0*	8.0*	8.0*	7.2*	7.2*	6.2*	6.2*	5.0*	5.0*	4.5*	4.5*	4.5*	4.5*	4.5*	4.5*	27.4	
0	4 pt. outr. down	6.5*	6.5*	11.1*	11.1*	19.3*	19.3*	20.6*	20.6*	17.7*	17.7*	15.5*	15.5*	13.6*	13.6*	12.1*	12.1*	10.8*	10.8*	9.7*	9.7*	8.7*	8.7*	7.7*	7.7*	6.8*	6.8*	5.7*	5.7*	4.3*	4.3*	4.1*	4.1*	4.1*	4.1*	4.1*	4.1*	27.1	
-1.5	4 pt. outr. down	7.1*	7.1*	10.8*	10.8*	17.0*	17.0*	19.8*	19.8*	17.2*	17.2*	15.0*	15.0*	13.3*	13.3*	11.8*	11.8*	10.5*	10.5*	9.3*	9.3*	8.3*	8.3*	7.3*	7.3*	6.3*	6.3*	5.1*	5.1*			3.6*	3.6*	3.6*	3.6*	26.8			
-3.0	4 pt. outr. down	7.9*	7.9*	11.1*	11.1*	16.2*	16.2*	18.7*	18.7*	16.3*	16.3*	14.3*	14.3*	12.7*	12.7*	11.2*	11.2*	10.0*	10.0*	8.8*	8.8*	7.7*	7.7*	6.7*	6.7*	5.5*	5.5*	4.1*	4.1*			3.7*	3.7*	3.7*	3.7*	25.8			
-4.5	4 pt. outr. down			11.7*	11.7*	16.2*	16.2*	17.1*	17.1*	15.1*	15.1*	13.3*	13.3*	11.8*	11.8*	10.4*	10.4*	9.2*	9.2*	8.1*	8.1*	6.9*	6.9*	5.8*	5.8*	4.5*	4.5*			4.1*	4.1*	4.1*	4.1*	4.1*	4.1*	24.4			
-6.0	4 pt. outr. down					16.5*	16.5*	14.9*	14.9*	13.4*	13.4*	11.9*	11.9*	10.5*	10.5*	9.3*	9.3*	8.1*	8.1*	7.0*	7.0*	5.8*	5.8*							4.6*	4.6*	4.6*	4.6*	4.6*	4.6*	4.6*	4.6*	22.4	
-7.5	4 pt. outr. down									11.1*	11.1*	10.0*	10.0*	8.9*	8.9*	7.8*	7.8*	6.7*	6.7*											5.8*	5.8*	5.8*	5.8*	5.8*	5.8*	5.8*	5.8*	19.2	

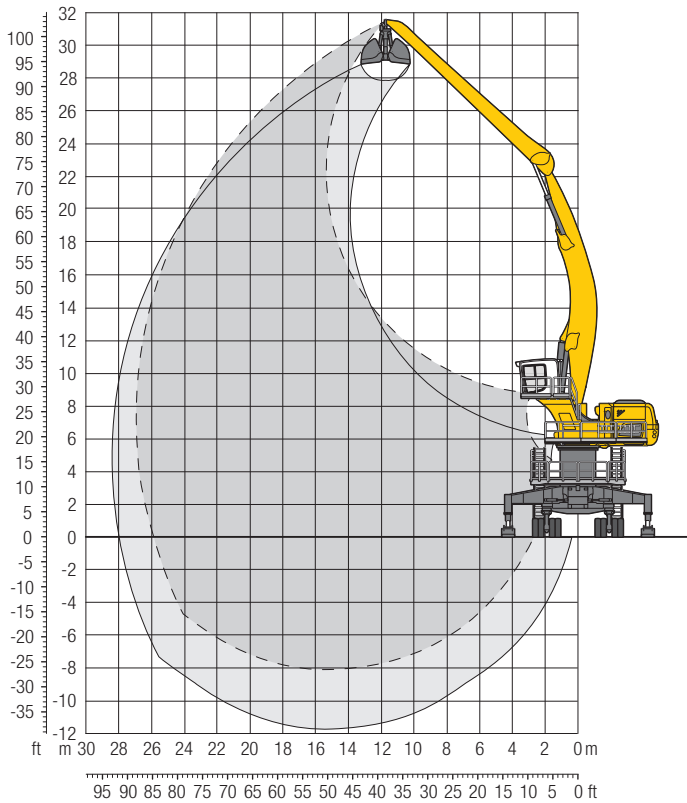
Height
 Can be slewed through 360°
 In longitudinal position of undercarriage
 Max. reach
 * Limited by hydr. capacity

The lift capacities on the stick end without attachment are stated in metric tons (t) and are valid on a firm, level supporting surface with blocked oscillating axle. These capacities can be slewed through 360° with the undercarriage in the transverse position. Capacities in the longitudinal position of the undercarriage (+/- 15°) are specified over the rigid axle with the stabilizers down. Indicated loads based on the ISO 10567 standard and do not exceed 75% of tipping or 87% of hydraulic capacity. The lift capacity values indicated are attained at the corresponding operating temperature. This operating temperature is ensured by continuous movement of the boom. Weights of fitted working tools (grabs, load hooks, etc.) and load accommodation equipment are to be deducted from the lift capacity values. The lift capacity of the unit is limited by its stability, the lifting capability of the hydraulic elements, or the maximum permissible lifting capacity of the load hook.

In accordance with the harmonised European Standard EN 474-5, hydraulic excavators used for lifting operations must be equipped with pipe fracture safety valves, an overload warning device, a load hook and a lift capacity chart.

LH 150 M HR - Attachment AG27

Industry – Kinematic 2D

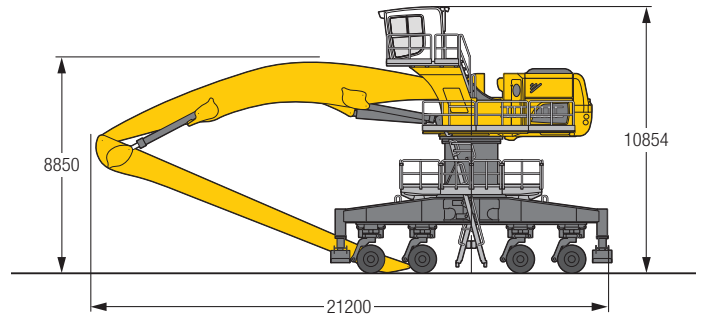


Operating Weight

The operating weight includes the basic machine with turret 2,000 mm, 4 point outriggers, rigid cab elevation, 32 solid tyres, angled boom 15.00 m, straight stick 13.50 m and grab model GMZ 120/6.00 m³ shells for loose material.

Weight 158,600 kg

Dimensions



m	Under-carriage	Attachment Lengths														m								
		6.0 m	7.5 m	9.0 m	10.5 m	12.0 m	13.5 m	15.0 m	16.5 m	18.0 m	19.5 m	21.0 m	22.5 m	24.0 m	25.5 m	27.0 m								
31.5	4 pt. outr. down					10.1*	10.1*														9.9*	9.9*	12.2	
30.0	4 pt. outr. down							10.5*	10.5*													8.8*	8.8*	14.8
28.5	4 pt. outr. down									10.7*	10.7*	8.7*	8.7*											16.9
27.0	4 pt. outr. down									12.1*	12.1*	10.6*	10.6*	8.7*	8.7*									18.6
25.5	4 pt. outr. down											11.0*	11.0*	10.1*	10.1*	8.3*	8.3*							20.0
24.0	4 pt. outr. down											10.9*	10.9*	10.1*	10.1*	9.3*	9.3*	7.7*	7.7*					21.3
22.5	4 pt. outr. down											10.9*	10.9*	10.0*	10.0*	9.3*	9.3*	8.6*	8.6*					22.4
21.0	4 pt. outr. down											10.9*	10.9*	10.0*	10.0*	9.3*	9.3*	8.6*	8.6*	8.1*	8.1*			23.3
19.5	4 pt. outr. down											10.9*	10.9*	10.0*	10.0*	9.3*	9.3*	8.6*	8.6*	8.1*	8.1*	7.1*	7.1*	24.1
18.0	4 pt. outr. down									12.0*	12.0*	11.0*	11.0*	10.1*	10.1*	9.3*	9.3*	8.6*	8.6*	8.1*	8.1*	7.6*	7.6*	24.8
16.5	4 pt. outr. down									12.1*	12.1*	11.0*	11.0*	10.1*	10.1*	9.3*	9.3*	8.7*	8.7*	8.1*	8.1*	7.6*	7.6*	25.4
15.0	4 pt. outr. down											13.6*	13.6*	12.2*	12.2*	11.1*	11.1*	10.2*	10.2*	9.4*	9.4*	8.7*	8.7*	25.9
13.5	4 pt. outr. down							15.5*	15.5*	13.8*	13.8*	12.4*	12.4*	11.2*	11.2*	10.3*	10.3*	9.4*	9.4*	8.7*	8.7*	8.1*	8.1*	26.3
12.0	4 pt. outr. down							18.0*	18.0*	15.7*	15.7*	14.0*	14.0*	12.5*	12.5*	11.3*	11.3*	10.4*	10.4*	9.5*	9.5*	8.8*	8.8*	26.6
10.5	4 pt. outr. down									18.0*	18.0*	16.0*	16.0*	14.2*	14.2*	12.7*	12.7*	11.5*	11.5*	10.5*	10.5*	9.6*	9.6*	26.8
9.0	4 pt. outr. down	34.1*	34.1*	26.9*	26.9*	22.2*	22.2*	18.8*	18.8*	16.3*	16.3*	14.4*	14.4*	12.9*	12.9*	11.6*	11.6*	10.6*	10.6*	9.7*	9.7*	8.9*	8.9*	26.9
7.5	4 pt. outr. down	35.5*	35.5*	27.8*	27.8*	22.8*	22.8*	19.3*	19.3*	16.7*	16.7*	14.6*	14.6*	13.0*	13.0*	11.8*	11.8*	10.7*	10.7*	9.8*	9.8*	9.0*	9.0*	26.9
6.0	4 pt. outr. down	16.7*	16.7*	28.6*	28.6*	23.3*	23.3*	19.7*	19.7*	16.9*	16.9*	14.9*	14.9*	13.2*	13.2*	11.9*	11.9*	10.8*	10.8*	9.9*	9.9*	9.1*	9.1*	26.9
4.5	4 pt. outr. down	10.9*	10.9*	20.7*	20.7*	23.8*	23.8*	20.0*	20.0*	17.2*	17.2*	15.1*	15.1*	13.4*	13.4*	12.0*	12.0*	10.9*	10.9*	9.9*	9.9*	9.1*	9.1*	26.8
3.0	4 pt. outr. down	9.4*	9.4*	15.4*	15.4*	24.2*	24.2*	20.3*	20.3*	17.4*	17.4*	15.3*	15.3*	13.5*	13.5*	12.1*	12.1*	11.0*	11.0*	10.0*	10.0*	9.1*	9.1*	26.5
1.5	4 pt. outr. down	9.2*	9.2*	13.6*	13.6*	21.3*	21.3*	20.4*	20.4*	17.6*	17.6*	15.4*	15.4*	13.6*	13.6*	12.2*	12.2*	11.0*	11.0*	10.0*	10.0*	9.1*	9.1*	26.2
0	4 pt. outr. down	9.4*	9.4*	13.0*	13.0*	18.9*	18.9*	20.4*	20.4*	17.6*	17.6*	15.4*	15.4*	13.6*	13.6*	12.2*	12.2*	11.0*	11.0*	9.9*	9.9*	9.0*	9.0*	25.8
-1.5	4 pt. outr. down	9.9*	9.9*	13.0*	13.0*	17.9*	17.9*	20.1*	20.1*	17.4*	17.4*	15.2*	15.2*	13.5*	13.5*	12.0*	12.0*	10.8*	10.8*	9.8*	9.8*	8.8*	8.8*	25.3
-3.0	4 pt. outr. down	10.5*	10.5*	13.3*	13.3*	17.6*	17.6*	19.4*	19.4*	16.9*	16.9*	14.9*	14.9*	13.2*	13.2*	11.8*	11.8*	10.5*	10.5*	9.5*	9.5*	8.5*	8.5*	24.7
-4.5	4 pt. outr. down			13.7*	13.7*	17.7*	17.7*	18.4*	18.4*	16.1*	16.1*	14.2*	14.2*	12.6*	12.6*	11.3*	11.3*	10.0*	10.0*	8.9*	8.9*	7.9*	7.9*	24.0
-6.0	4 pt. outr. down					18.1*	18.1*	16.9*	16.9*	14.9*	14.9*	13.2*	13.2*	11.8*	11.8*	10.5*	10.5*	9.3*	9.3*	8.1*	8.1*	7.0*	7.0*	21.9
-7.5	4 pt. outr. down									13.2*	13.2*	11.8*	11.8*	10.5*	10.5*	9.3*	9.3*	8.1*	8.1*			8.0*	8.0*	18.2

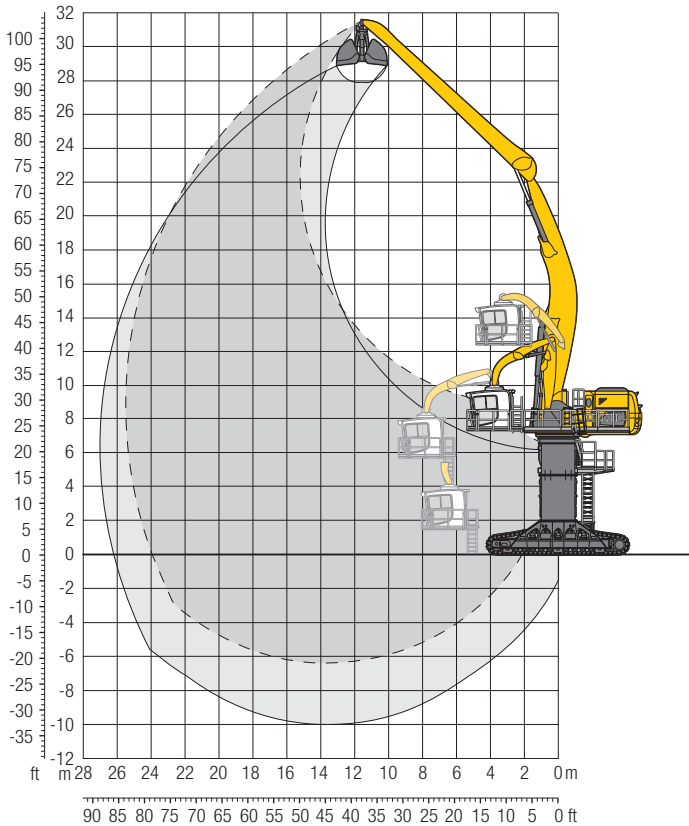
Height Can be slewed through 360° In longitudinal position of undercarriage Max. reach * Limited by hydr. capacity

The lift capacities on the stick end without attachment are stated in metric tons (t) and are valid on a firm, level supporting surface with blocked oscillating axle. These capacities can be slewed through 360° with the undercarriage in the transverse position. Capacities in the longitudinal position of the undercarriage (+/- 15°) are specified over the rigid axle with the stabilizers down. Indicated loads based on the ISO 10567 standard and do not exceed 75% of tipping or 87% of hydraulic capacity. The lift capacity values indicated are attained at the corresponding operating temperature. This operating temperature is ensured by continuous movement of the boom. Weights of fitted working tools (grabs, load hooks, etc.) and load accommodation equipment are to be deducted from the lift capacity values. The lift capacity of the unit is limited by its stability, the lifting capability of the hydraulic elements, or the maximum permissible lifting capacity of the load hook.

In accordance with the harmonised European Standard EN 474-5, hydraulic excavators used for lifting operations must be equipped with pipe fracture safety valves, an overload warning device, a load hook and a lift capacity chart.

LH 150 C Gantry - Attachment AG26

Industry – Kinematic 2D

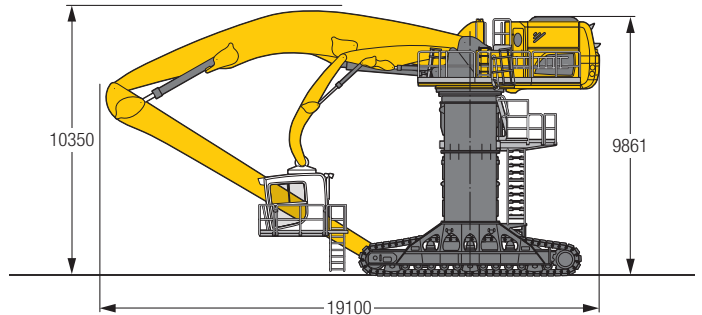


Operating Weight and Ground Pressure

The operating weight includes the basic machine with hydr. cab elevation, angled boom 13.50 m, straight stick 13.50 m and grab model GMZ 120/6.00 m³ shells for loose material.

Weight	171,700 kg
Pad width	750 mm
Ground pressure	on request

Dimensions



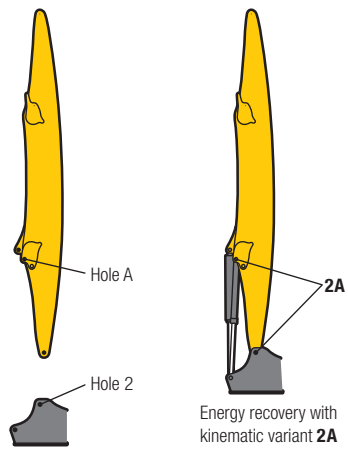
Height m	Under-carriage	Attachment Lengths (m)																m					
		6.0 m	7.5 m	9.0 m	10.5 m	12.0 m	13.5 m	15.0 m	16.5 m	18.0 m	19.5 m	21.0 m	22.5 m	24.0 m	25.5 m	27.0 m							
31.5	Gantry																			10.1*	10.1*	11.6	
30.0	Gantry									10.0*	10.0*										8.9*	8.9*	14.2
28.5	Gantry									10.1*	10.1*										8.2*	8.2*	16.2
27.0	Gantry									11.7*	11.7*	10.0*	10.0*								7.7*	7.7*	17.9
25.5	Gantry									12.3*	12.3*	11.4*	11.4*	9.6*	9.6*						7.4*	7.4*	19.3
24.0	Gantry											11.3*	11.3*	10.5*	10.5*	9.0*	9.0*				7.2*	7.2*	20.5
22.5	Gantry											11.2*	11.2*	10.5*	10.5*	9.9*	9.9*	8.1*	8.1*		7.0*	7.0*	21.5
21.0	Gantry											11.2*	11.2*	10.5*	10.5*	9.8*	9.8*	9.3*	9.3*		6.9*	6.9*	22.4
19.5	Gantry											12.2*	12.2*	11.3*	11.3*	10.5*	10.5*	9.8*	9.8*	9.3*	9.3*	8.3*	8.3*
18.0	Gantry											12.3*	12.3*	11.3*	11.3*	10.6*	10.6*	9.9*	9.9*	9.3*	9.3*	8.8*	8.8*
16.5	Gantry											12.4*	12.4*	11.5*	11.5*	10.7*	10.7*	10.0*	10.0*	9.4*	9.4*	8.8*	8.8*
15.0	Gantry											13.8*	13.8*	12.6*	12.6*	11.6*	11.6*	10.8*	10.8*	10.0*	10.0*	9.4*	9.4*
13.5	Gantry											15.7*	15.7*	14.1*	14.1*	12.9*	12.9*	11.8*	11.8*	10.9*	10.9*	10.2*	10.2*
12.0	Gantry											18.2*	18.2*	16.1*	16.1*	14.5*	14.5*	13.1*	13.1*	12.0*	12.0*	11.1*	11.1*
10.5	Gantry											16.7*	16.7*	14.9*	14.9*	13.4*	13.4*	12.3*	12.3*	11.3*	11.3*	10.4*	10.4*
9.0	Gantry	34.7*	34.7*	27.6*	27.6*	23.0*	23.0*	19.7*	19.7*	17.2*	17.2*	15.3*	15.3*	13.8*	13.8*	12.5*	12.5*	11.5*	11.5*	10.6*	10.6*	9.8*	9.8*
7.5	Gantry	37.1*	37.1*	29.2*	29.2*	24.0*	24.0*	20.4*	20.4*	17.7*	17.7*	15.7*	15.7*	14.1*	14.1*	12.8*	12.8*	11.7*	11.7*	10.8*	10.8*	10.0*	10.0*
6.0	Gantry	26.9*	26.9*	30.5*	30.5*	24.9*	24.9*	21.1*	21.1*	18.3*	18.3*	16.1*	16.1*	14.4*	14.4*	13.0*	13.0*	11.9*	11.9*	10.9*	10.9*	10.1*	10.1*
4.5	Gantry	16.5*	16.5*	31.6*	31.6*	25.7*	25.7*	21.7*	21.7*	18.7*	18.7*	16.4*	16.4*	14.7*	14.7*	13.2*	13.2*	12.0*	12.0*	11.0*	11.0*	10.1*	10.1*
3.0	Gantry	13.8*	13.8*	22.6*	22.6*	26.3*	26.3*	22.2*	22.2*	19.1*	19.1*	16.7*	16.7*	14.9*	14.9*	13.4*	13.4*	12.1*	12.1*	11.1*	11.1*	10.1*	10.1*
1.5	Gantry	13.0*	13.0*	19.3*	19.3*	26.6*	26.6*	22.4*	22.4*	19.3*	19.3*	16.9*	16.9*	15.0*	15.0*	13.5*	13.5*	12.2*	12.2*	11.0*	11.0*	10.0*	10.0*
0	Gantry	12.9*	12.9*	18.0*	18.0*	26.5*	26.5*	22.4*	22.4*	19.3*	19.3*	16.9*	16.9*	15.0*	15.0*	13.4*	13.4*	12.1*	12.1*	10.9*	10.9*	9.8*	9.8*
-1.5	Gantry	13.2*	13.2*	17.6*	17.6*	25.0*	25.0*	22.0*	22.0*	19.1*	19.1*	16.7*	16.7*	14.8*	14.8*	13.2*	13.2*	11.8*	11.8*	10.6*	10.6*	9.4*	9.4*
-3.0	Gantry	13.7*	13.7*	17.7*	17.7*	24.2*	24.2*	21.2*	21.2*	18.4*	18.4*	16.2*	16.2*	14.3*	14.3*	12.7*	12.7*	11.3*	11.3*	10.0*	10.0*	8.6*	8.6*
-4.5	Gantry			18.0*	18.0*	22.8*	22.8*	19.8*	19.8*	17.3*	17.3*	15.2*	15.2*	13.4*	13.4*	11.8*	11.8*	10.4*	10.4*	9.0*	9.0*		
-6.0	Gantry					17.6*	17.6*	15.5*	15.5*	13.7*	13.7*	12.0*	12.0*	10.5*	10.5*							10.2*	10.2*

Height
 Can be slewed through 360°
 In longitudinal position of undercarriage
 Max. reach
 * Limited by hydr. capacity

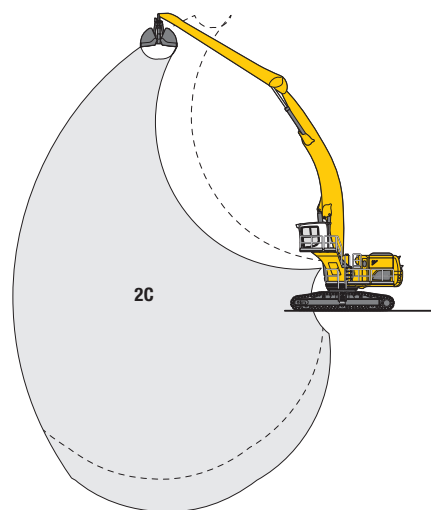
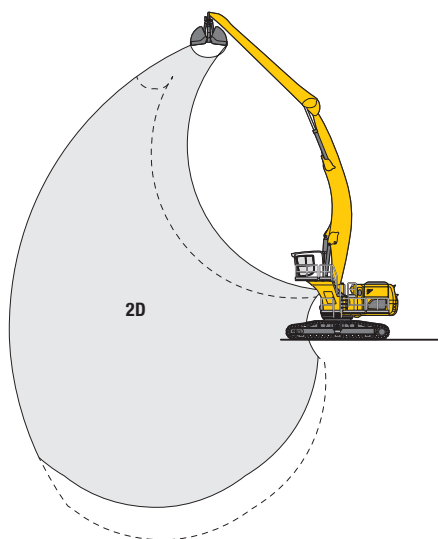
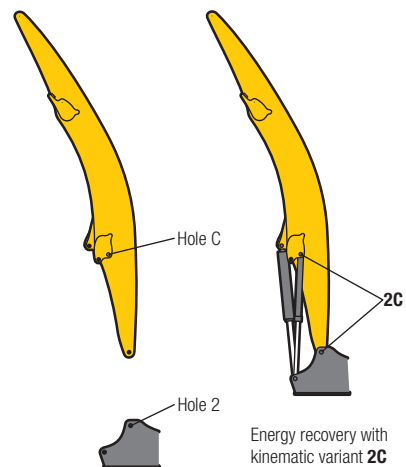
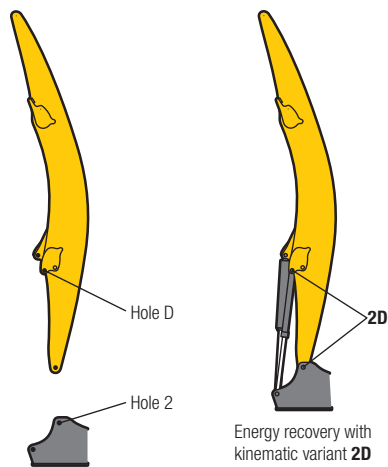
The lift capacities on the stick end without attachment are stated in metric tons (t) and can be slewed through 360° on a firm, level supporting surface. Capacities are valid for 750 mm wide flat pads. Indicated loads based on the ISO 10567 standard and do not exceed 75% of tipping or 87% of hydraulic capacity. The lift capacity values indicated are attained at the corresponding operating temperature. This operating temperature is ensured by continuous movement of the boom. Weights of fitted working tools (grabs, load hooks, etc.) and load accommodation equipment are to be deducted from the lift capacity values. The lift capacity of the unit is limited by its stability, the lifting capability of the hydraulic elements, or the maximum permissible lifting capacity of the load hook.

In accordance with the harmonised European Standard EN 474-5, hydraulic excavators used for lifting operations must be equipped with pipe fracture safety valves, an overload warning device, a load hook and a lift capacity chart.

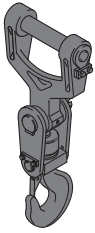
Kinematic Variant 2A



Kinematic Variant 2D/2C

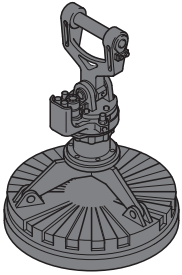


Altered range curve with additional reach depth, e.g. for unloading from ships



Load Hook with Suspension

Max. load	t	25
Weight	kg	255



Magnet Devices/Lifting Magnets

Generator	kW	30
Electromagnets with suspension		
Power	kW	22
Diameter of magnet	mm	1,900
Weight	kg	5,090

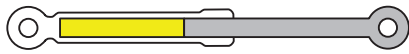
Liebherr ERC-System

Efficiency
as standard



ERC System – More performance, less consumption

Lowering the equipment stores energy in the ERC system. This stored energy is then made available to the machine to provide additional engine power. When the equipment is raised the stored energy is released and is reflected in powerful, homogeneous operating cycles. The result is a clear saving on fuel – and, at the same time, even greater performance.



1. Attachment fitting raised /
Energy released

B



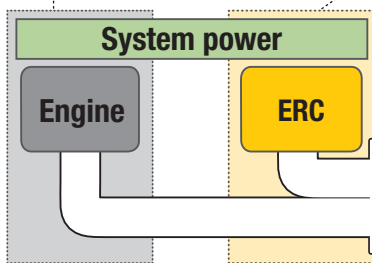
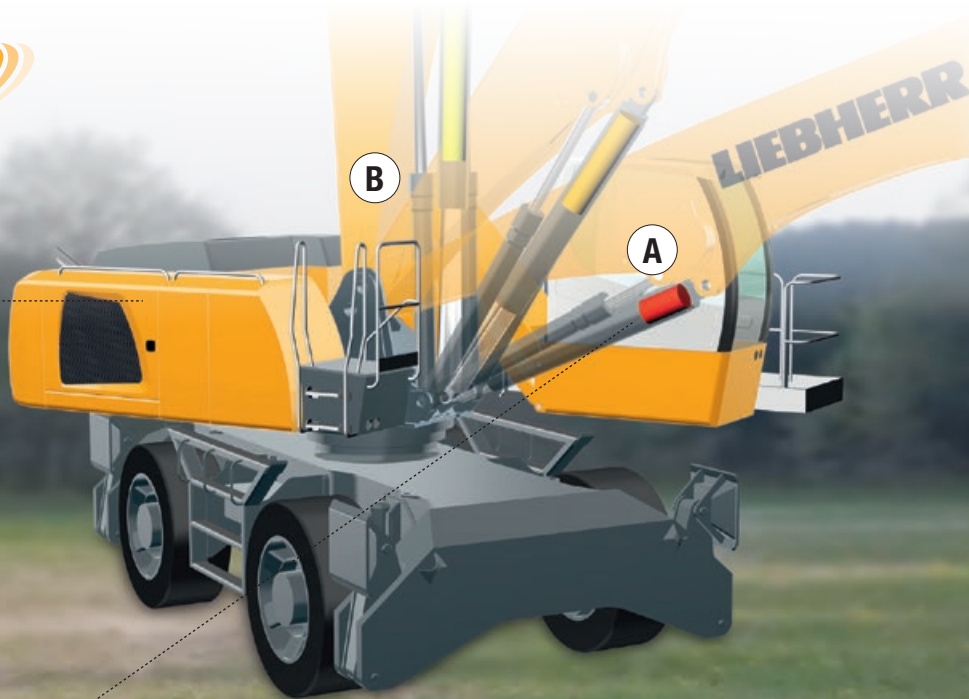
2. Lower attachment fitting / Store energy
4. Raise attachment fitting / Release energy



3. Attachment fitting lowered /
Energy stored

A

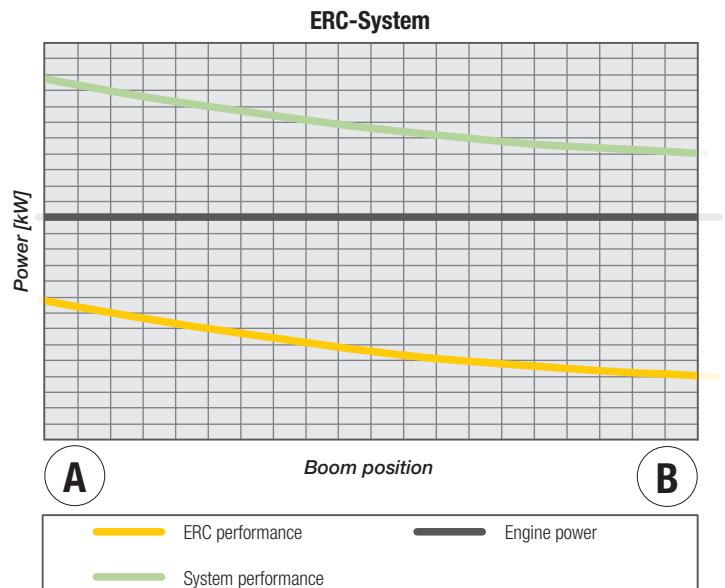
ERC




- increased overall power
- fuel savings of up to 30 %
- lower running costs
- reduced pollutant and noise emissions


System power


The energy recovery cylinder is a storage system which is independent of the diesel engine. The system performance of material handling machines fitted with the ERC system is composed of the installed engine power and the energy recovery cylinder. When the equipment is raised, energy from the ERC system is supplied in addition to the power from the diesel engine.




Equipment

 Undercarriage	150 C	150 C HR	150 M	150 M HR	150 C Gantry
6 steering axles, 2 powered and braked			•	•	
8 steering axles, 2 powered and braked			+	+	
Support plates, variants			•	•	
Axle load monitoring			•	•	
Working lights on undercarriage, LED			•	•	•
Track pads, variants	+	+			+
Individual control outriggers			•	•	
Three-piece chain guide	•	•			•
Outrigger monitoring system			•	•	
Tyres, variants			+	+	
Warning beacons			•	•	

 Uppercarriage					
Refuelling system, variants	+	+	+	+	+
Generator	+	+	+	+	+
Main battery switch for electrical system	•	•	•	•	•
Engine hood, hydraulic operable	•	•	•	•	•
Walk-in engine bay	•	•	•	•	•
Warning beacon on uppercarriage, LED	+	+	+	+	+
Side hood on the right, hydraulic operable	•	•	•	•	•
Tool equipment, extended	•	•	•	•	•


 Hydraulic System					
Shut-off valve between hydraulic tank and pump(s)	•	•	•	•	•
Pressure test fittings	•	•	•	•	•
Accumulator for controlled lowering of the attachment with the engine shut down	•	•	•	•	•
Electronic pump regulation	•	•	•	•	•
Hydraulic oil filter with integrated microfilter	•	•	•	•	•
Liebherr hydraulic oil from -20 °C to +40 °C	•	•	•	•	•
Liebherr hydraulic oil, biologically degradable	+	+	+	+	+
Liebherr hydraulic oil, specially for warm or cold regions	+	+	+	+	+
Magnetic rod in hydraulic tank	•	•	•	•	•
Bypass filter	+	+	+	+	+
Preheating hydraulic oil	+	+	+	+	+


 Engine					
Air pre-filter with dust discharge	+	+	+	+	+
Preheating fuel	+	+	+	+	+
Preheating coolant	+	+	+	+	+
Preheating engine oil	+	+	+	+	+


 Cooling System					
Reversible fan drive, fully automatic	+	+	+	+	+

• = Standard, + = Option
 * = optionally extendable after one year

Options and/or special attachments, supplied by vendors other than Liebherr, are only to be installed with the knowledge and approval of Liebherr in order to retain warranty.

 Operator's Cab	150 C	150 C HR	150 M	150 M HR	150 C Gantry
Cab lights rear, LED	•	•	•	•	•
Cab lights front, LED (under rain cover)	•	•	•	•	•
Armrest adjustable	•	•	•	•	•
Circular bubble level	•	•	•	•	•
Driver profile, personalised (max. 5 drivers)	•	•	•	•	•
Operator's seat Comfort	•	•	•	•	•
Operator's seat Premium	+	+	+	+	+
Driving alarm (acoustic signal is emitted during travel, can be switched ON/OFF)	+	+	+	+	+
Fire extinguisher	•	•	•	•	•
Cab elevation, hydraulic with double parallelogram (LHC-D)	+	+	+	+	+
Cab elevation, rigid (LFC)	•	•	•	•	•
Automatic air conditioning	•	•	•	•	•
Electric cooler	•	•	•	•	•
LIDAT Plus (extended Liebherr data transfer system)*	•	•	•	•	•
Bullet proof glass (front, roof and bottom window)	•	•	•	•	•
Proportional control	•	•	•	•	•
Radio Comfort, control via display with handsfree set	+	+	+	+	+
Preparation for radio installation	•	•	•	•	•
Warning beacon on cab, LED	+	+	+	+	+
Top guard	+	+	+	+	+
Front guard	+	+	+	+	+
Auxiliary heating, adjustable (week time switch)	•	•	•	•	•
Flashing light (xenon)	+	+	+	+	+

 Attachment					
Boom lights, 2 pieces, LED	•	•	•	•	•
Stick lights, 4 pieces, LED	•	•	•	•	•
Boom shutoff (retract/extend), electronically	•	•	•	•	•
AutoLift	+	+	+	+	+
Pressure warning mechanism hoist cylinder	•	•	•	•	•
ERC system	•	•	•	•	•
Boom cylinder cushioning	•	•	•	•	•
Industrial stick with quick coupling	+	+	+	+	+
Stick camera (with separate monitor), bottom side, with protection	+	+	+	+	+
Load torque limitation	+	+	+	+	+
Liebherr multi coupling system	+	+	+	+	+
Pipe fracture safety valves hoist cylinders	•	•	•	•	•
Pipe fracture safety valve stick cylinder	•	•	•	•	•
Protection for piston rod, energy recovering cylinder	+	+	+	+	+
Protection for bottom side of stick	+	+	+	+	+
Stick shutoff (retract/extend), electronically	•	•	•	•	•
Retract stick without pressure	•	•	•	•	•
Overload warning device	+	+	+	+	+

 Complete Machine					
Special coating, variants	+	+	+	+	+
Monitoring					
Rear view monitoring with camera	•	•	•	•	•
Side view monitoring with camera	+	+	+	+	+

The Liebherr Group of Companies



Wide Product Range

The Liebherr Group is one of the largest construction equipment manufacturers in the world. Liebherr's high-value products and services enjoy a high reputation in many other fields. The wide range includes domestic appliances, aerospace and transportation systems, machine tools and maritime cranes.

Exceptional Customer Benefit

Every product line provides a complete range of models in many different versions. With both their technical excellence and acknowledged quality, Liebherr products offer a maximum of customer benefits in practical application.

State-of-the-art Technology

To provide consistent, top quality products, Liebherr attaches great importance to each product area, its components and core technologies. Important modules and components are developed and manufactured in-house, for instance the entire drive and control technology for construction equipment.

Worldwide and Independent

Hans Liebherr founded the Liebherr family company in 1949. Since that time, the enterprise has steadily grown to a group of more than 130 companies with over 41,000 employees located on all continents. The corporate headquarters of the Group is Liebherr-International AG in Bulle, Switzerland. The Liebherr family is the sole owner of the company.

www.liebherr.com

Liebherr-Hydraulikbagger GmbH

Liebherrstraße 12, D-88457 Kirchdorf/Iller
☎ +49 7354 80-0, Fax +49 7354 80-72 94
www.liebherr.com, E-Mail: info.lhb@liebherr.com
www.facebook.com/LiebherrConstruction