
R 998 SME Litronic

LIEBHERR

Crawler excavator



Generation

6.2

Engine

420 kW / 563 HP

Tier 4 Final

Operating weight

Backhoe: 101,400 kg / 223,550 lb

Shovel: 101,500 kg / 223,770 lb

Bucket capacity

Backhoe: 5.20–7.20 m³ / 6.80–9.42 yd³

Shovel: 5.10–6.50 m³ / 6.67–8.50 yd³

Experience progress: R 998 SME Super Mass Excavation

Equipment

- Wide choice of backhoe front boom and stick configurations
- Welded structure with cast steel components for improved stress-resistance and longer service life
- Safety check valves to prevent boom and stick cylinder pipes from bursting, with integrated regeneration system for lower fuel consumption

Buckets

- Different levels of protection to suit different areas of application:
 - Standard for loose, non-abrasive materials
 - HD for hard-to-break, moderately abrasive materials
 - HDV for highly abrasive materials
- Different blade designs:
 - straight (for earth-moving and grading)
 - semi-delta (for hard-to-break, hard-to-extract materials)
 - delta (for compacted or slightly cracked materials)

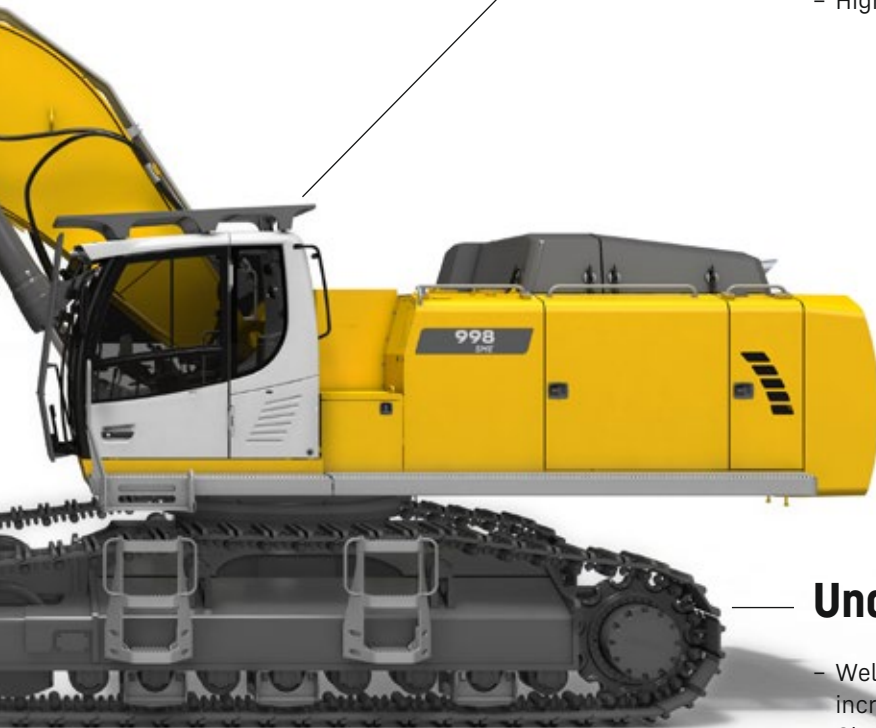


New functions / options

- **Liebherr Power Efficiency – Engine Control**
Up to 10% lower fuel consumption
- **Bucket Fill Assist**
Automatic bucket-filling cycle for increased productivity
- **Modetronic**
Customizable operating modes for optimum adjustment of work cycles to each type of application

Comfort

- Quiet, comfortable cab, the largest and most spacious in its category
- Seat with heater and pneumatic multi-directional shock absorption (air conditioning optional)
- High-resolution 9" color touchscreen



Undercarriage

- Welded undercarriage with rigid X profile for increased robustness
- Chamfered rack pads with double grouser for more maneuverability on difficult terrain
- Moulded two-tooth sprocket for longer service life
- Track rollers on double bearings for increased reliability and durability over time
- Stronger travel motor housing protection for improved resistance to wear and tear from hard, abrasive rocks

Experience progress: R 998 SME Super Mass Excavation Sho

Cab

- Cab riser for the best possible view of the loading area
- The largest and quietest cab in its category to date
- Mounted on viscoelastic rivets to absorb vibration
- Impact-resistant windscreen and roof glass panel
- Seat with heater and pneumatic multi-directional shock absorption (air conditioning optional)
- Large high-resolution colour touchscreen

Safety

- Completely unobstructed panoramic view, plus rear-view and side-view monitoring cameras for increased safety
- Retractable console for safe and easy access to the cab
- Impact-resistant windscreen and roof glass panel
- Cab riser for the best possible view of the loading area (optional)

Equipment second to none

- Cast steel components
- Shovel attachment with parallel drivetrain for powerful, even penetration
- Bucket cylinders located under the equipment for better protection
- Safety check valves to prevent boom cylinder pipes from bursting
- Front shovel with semi-automatic flap closure, ideally shaped for optimum material penetration and high filling rate



Level



Uppercarriage

- Left and right catwalks as standard; wide catwalks with hand rail optional
- Access platform for engine and hydraulic control block compartments to enable safe, ergonomic maintenance work
- Sleek design for a more extensive view
- New Tier 4 Final engine
- Heavier counterweight for more stability and improved performance

Maintenance

- Access platform for engine and hydraulic control block compartments to enable safe, ergonomic maintenance work
- Left and right catwalks as standard; wide catwalks with hand rail optional
- Automatic central lubrication system as standard
- Shut-off valve on hydraulic tank outlet as standard

Robust undercarriage

- Fitted with components from the next size up excavator
- Chamfered rack pads with double grouser for more maneuverability on difficult terrain
- Moulded two-tooth sprocket for longer service life
- Carrier rollers on double bearings for increased reliability and durability over time
- Stronger travel motor housing protection for improved resistance to wear and tear from hard, abrasive rocks

Technical data



Engine

Rating	
per SAE J1349	563 HP (420 kW) at 1,800 rpm
per ISO 9249	571 HP (420 kW) at 1,800 rpm
Torque	2,989 Nm at 1,300 rpm / 2,210 lbf ft at 1,300 rpm
Model	Liebherr D9508 A7 SCR
Type	8 cylinder V engine
Bore	128 mm / 5.0 in
Stroke	157 mm / 6.2 in
Displacement	16.16 l / 986 in³
Engine operation	4-stroke diesel Common-Rail
Exhaust gas treatment	Tier 4 Final SCR Filter Passive regeneration by thermo management
Cooling system	Water-cooled and integrated motor oil cooler, after-cooled and fuel cooled
Air cleaner	Dry-type air cleaner with pre-cleaner, primary and safety elements
Fuel tank	1,498 l / 396 gal
Urea tank	180 l / 48 gal
Electrical system	
Voltage	24 V
Batteries	2 x 180 Ah / 12 V
Starter	24 V / 7.8 kW
Alternator	Three-phase current 28 V / 140 A
Engine idling	Sensor controlled
Motor management	Connection to the integrated excavator system controlling via CAN-BUS to the economical utilisation of the service that is available



Hydraulic controls

Power distribution	Via control valves in single block with integrated safety valves
Flow summation	To boom and stick
Closed-loop circuit	For uppercarriage swing drive
Servo circuit	Electro-hydraulic control
Equipment and swing	Proportional via joystick levers
Travel	- Proportional control via foot pedals or removable levers - Speed pre-selection
Additional functions	Proportional regulation via foot pedals or mini-joystick



Hydraulic system

Hydraulic pumps	
For equipment and travel drive	Two Liebherr variable displacement, swashplate pumps
Max. flow	2 x 498 l/min. / 2 x 131 gpm
Max. pressure	350 bar / 5,076 psi
For swing drive	Reversible, variable displacement, swashplate pump, closed-loop circuit
Max. flow	315 l/min. / 83 gpm
Max. pressure	350 bar / 5,076 psi
Pump regulation	Electro-hydraulic with electronic engine speed sensing regulation, pressure compensation, flow compensation, high flow
Hydraulic tank	536 l / 142 gal
Hydraulic system	1,134 l / 300 gal
Filtration	2 full flow filters in return line with integrated fine filter area (5 µm / 2,500 mesh)
Cooling system	Cooler for transmission pump oil and cooler for oil and condenser of air-conditioning with hydrostatically controlled fan drives
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 digging performance and heavy-duty jobs
RPM adjustment	Stepless adjustment of engine output via RPM at each selected mode
Tool Control	20 pre-adjustable pump flows and pressures for add-on attachments



Swing drive

Drive	Liebherr swashplate motor with integrated brake valve
Transmission	Liebherr compact planetary reduction gears
Swing ring	Liebherr, sealed race ball bearing swing ring, internal teeth
Swing speed	0-5.9 rpm stepless
Swing torque	295 kNm / 217,581 lbf ft
Holding brake	Wet multi-disc (spring applied, pressure released)



Cab

Cab	LED work headlights integrated in the ceiling, a door with a sliding window (can be opened on both sides), large storing box and several stowing possibilities, shock-absorbing suspension, sound damping insulating, tinted laminated safety glass, separate window shades for the sunroof window and windscreen, cigarette lighter and 12V plug, storage bins, lunchbox, cup holder
Operator's seat	Liebherr-Comfort seat, airsprung with automatic weight adjustment, vertical and longitudinal seat damping including consoles and joysticks. Seat and armrests adjustable separately and in combination (adjustable in length, height and inclination), seat heating as standard
Arm consoles	Oscillating consoles with seat, tiltable console left
Operation and displays	Large high-resolution operating unit, intuitive, color display with touchscreen, video-compatible, numerous setting, control and monitoring options, e.g. air conditioning control, fuel consumption, machine and attachment parameters
Air-conditioning	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



Undercarriage

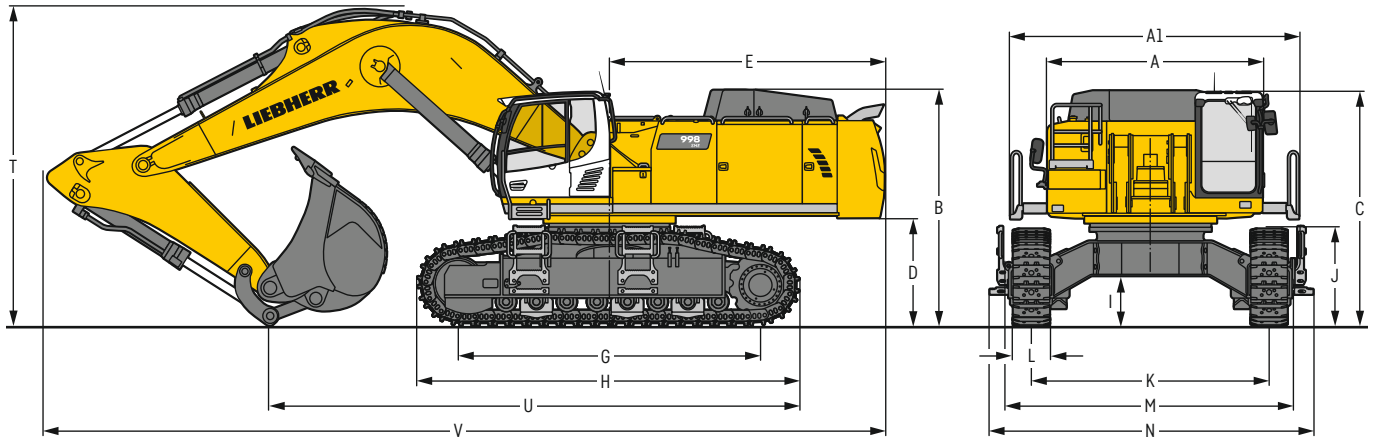
S-HD	Gauge 3,900mm / 12'10"
Drive	Liebherr swashplate motor with brake valves on both sides
Transmission	Liebherr compact planetary reduction gear
Maximum travel speed	3.7 km/h / 2.3 mph
Drawbar pull on crawler	645 kN / 145,002 lbf
Track components	BMP280, maintenance-free
Track rollers / Carrier rollers	8 / 2
Tracks	Sealed and greased
Track pads	Double grouser
Holding brake	Wet multi-disc (spring applied, pressure released)
Brake valves	Outside the travel motor
Lashing eyes	Integrated



Equipment

Type	Combination of resistant steel plates and cast steel components
Hydraulic cylinders	Liebherr cylinders with seal and guidance systems
Bearings	Sealed, low maintenance
Lubrication	Automatic central lubrication system (except link and tilt geometry)
Hydraulic connections	Pipes and hoses equipped with SAE split-flange connections
Buckets	Standard equipped with Liebherr tooth system

Dimensions



		S-HD	mm/ft in		
A	Uppercarriage width		3,565 / 11' 8"		
AI	Uppercarriage width with catwalks		4,730 / 15' 6"		
B	Uppercarriage height		3,870 / 12' 8"		
C	Cab height		3,840 / 12' 7"		
D	Counterweight ground clearance		1,765 / 5' 9"		
E	Rear-end length		4,515 / 14' 10"		
G	Wheelbase		4,960 / 16' 3"		
H	Undercarriage length		6,250 / 20' 6"		
I	Undercarriage ground clearance		820 / 2' 8"		
J	Track height		1,595 / 5' 3"		
K	Track gauge		3,900 / 12' 10"		
L	Track pad width	500 / 20" 600 / 24" 750 / 30"			
M	Width over tracks	4,770 / 18' 8" 4,770 / 15' 8" 4,770 / 15' 8"			
N	Width over steps	5,315 / 17' 5" 5,315 / 17' 5" 5,315 / 17' 5"			

		Stick length	Mono boom SME 7.20m / 23'7"		
		m / ft in	direct mounting		
			mm / ft in		
T	Boom height	2.90 / 9' 6" SME	5,250 / 17' 3"		
		3.30 / 10' 10" SME	5,400 / 17' 9"		
U	Length on ground	2.90 / 9' 6" SME	8,700 / 28' 7"		
		3.30 / 10' 10" SME	8,500 / 27' 11"		
V	Overall length	2.90 / 9' 6" SME	13,800 / 45' 3"		
		3.30 / 10' 10" SME	13,450 / 44' 2"		
	Bucket		6.30 m ³ / 8.24 yd ³		

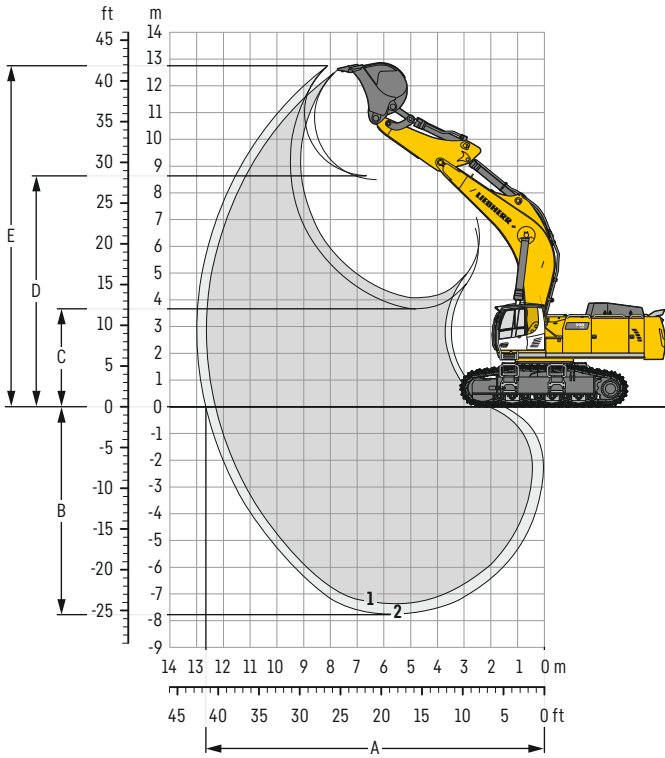
Transport dimensions

removable elements disassembled

		Mono boom SME 7.20m / 23'7"	
		mm / ft in	
Transport width		5,315 / 17' 5"	
		Stick	mm / ft in
		m / ft in	
Transport length	2.90 / 9' 6" SME	13,800 / 45' 3"	
	3.30 / 10' 10" SME	13,450 / 44' 2"	
Transport height	2.90 / 9' 6" SME	5,250 / 17' 3"	
	3.30 / 10' 10" SME	5,400 / 17' 9"	
Bucket		6.30 m ³ / 8.24 yd ³	

Backhoe bucket

with mono boom SME 7.20 m / 23'7"



Digging envelope

without quick coupler		1	2
Stick length	m / ft in	2.90 / 9'6"	3.30 / 10'10"
		SME	SME
A Max. reach at ground level	m / ft in	12.30 / 40' 4"	12.65 / 41' 6"
B Max. digging depth	m / ft in	7.35 / 24' 1"	7.75 / 25' 5"
C Min. dumping height	m / ft in	4.05 / 13' 3"	3.65 / 12'
D Max. dumping height	m / ft in	8.50 / 27'11"	8.65 / 28' 5"
E Max. cutting height	m / ft in	12.60 / 41' 4"	12.75 / 41'10"

Forces

without quick coupler		1	2
Stick digging force (ISO 6015)	kN / lbf	426 / 95,770	394 / 88,580
Bucket digging force (ISO 6015)	kN / lbf	506 / 113,750	506 / 113,750
Stick digging force (SAE J1179)	kN / lbf	406 / 91,270	377 / 84,750
Bucket digging force (SAE J1179)	kN / lbf	454 / 102,060	454 / 102,060

Operating weight and ground pressure

The operating weight includes the basic machine with counterweight 16.0t / 35,270 lb, mono boom SME 7.20 m / 23'7", stick SME 2.90 m / 9'6" and HDV bucket with semi-delta cutting edge 6.30 m³ / 8.24 yd³ (7,600 kg / 16,760 lb).

Undercarriage		S-HD		
Pad width	mm / in	500 / 20"	600 / 24"	750 / 30"
Weight	kg / lb	97,700 / 215,390	98,400 / 216,930	99,400 / 219,140
Ground pressure	kg/cm ² / psi	1.81 / 25.7	1.52 / 21.6	1.23 / 17.5

The operating weight includes the basic machine with counterweight 18.0t / 39,680 lb, mono boom SME 7.20 m / 23'7", stick SME 2.90 m / 9'6" and HDV bucket with semi-delta cutting edge 6.30 m³ / 8.24 yd³ (7,600 kg / 16,760 lb).

Undercarriage		S-HD		
Pad width	mm / in	500 / 20"	600 / 24"	750 / 30"
Weight	kg / lb	99,700 / 219,800	100,400 / 221,340	101,400 / 223,550
Ground pressure	kg/cm ² / psi	1.84 / 26.2	1.55 / 22.0	1.25 / 17.8

Buckets Machine stability per ISO 10567* (75% of tipping capacity)

	Cutting width		Capacity ISO 7451	Weight	S-HD undercarriage SME equipment (with track pads 750 mm / 30")	
	mm	ft in			2.90	3.30
HD ¹⁾	2,350	7'9"	6.20	6,500	▲	■
	2,500	8'2"	6.80	6,800	■	▲
	2,500	8'2"	6.80	6,500	■	▲
HD ²⁾	2,550	8'4"	7.20	7,000	▲	■
	2,200	7'3"	5.20	7,200	▲	▲
HDV ³⁾	2,350	7'9"	5.70	7,300	▲	■
	2,350	7'9"	6.30	7,600	■	▲
	2,350	7'9"	8.24	16,760	■	▲

* Indicated loads are based on ISO 10567, at maximum reach, and may be swung 360° on firm and even ground

¹⁾ HD bucket with semi-delta cutting edge and teeth Z 100 (appropriate for materials above classification 6, according to VOB, Section C, DIN 18300)

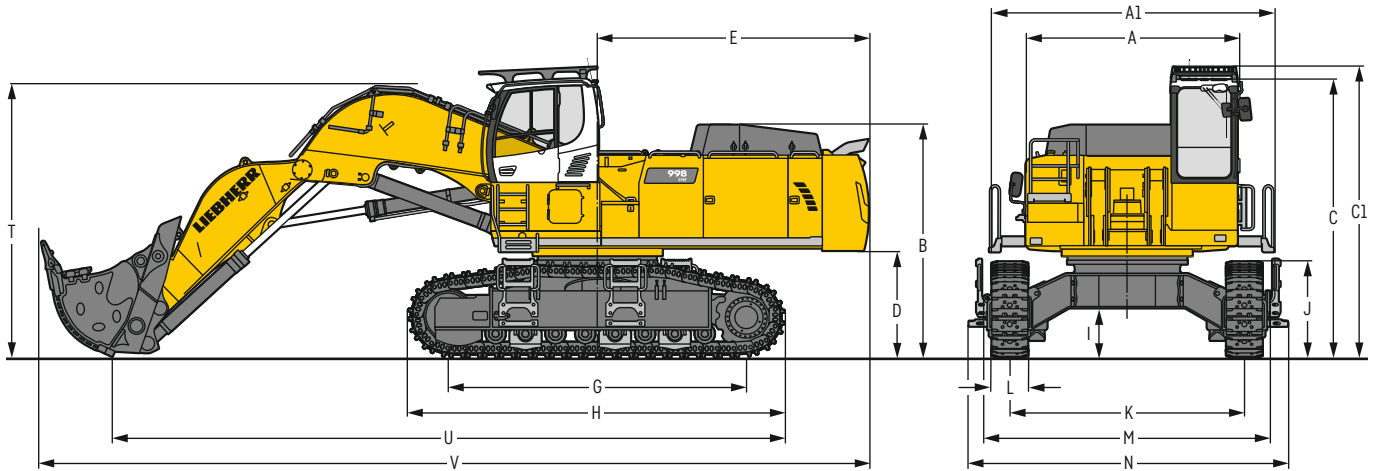
²⁾ HD bucket with semi-delta cutting edge and teeth Z 90 (appropriate for materials above classification 6, according to VOB, Section C, DIN 18300)

³⁾ HDV bucket with semi-delta cutting edge and teeth Z 100 (appropriate for materials above classification 6, according to VOB, Section C, DIN 18300)

Other buckets available upon request

Max. material weight ▲ = ≤ 2.0 t/m³ / 3,400 lb/yd³, ■ = ≤ 1.8 t/m³ / 3,000 lb/yd³, ▲ = ≤ 1.65 t/m³ / 2,800 lb/yd³, ■ = ≤ 1.5 t/m³ / 2,500 lb/yd³

Dimensions front shovel



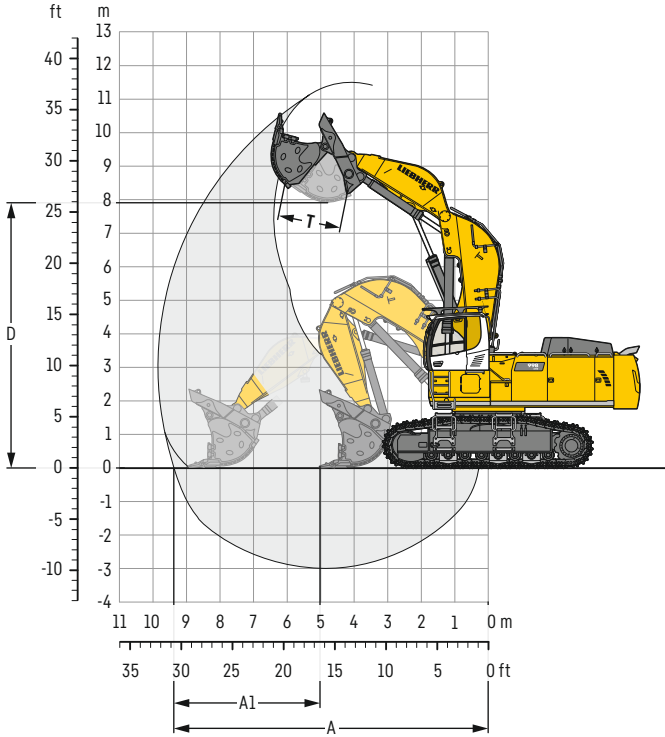
	S-HD	mm / ft in		S-HD	mm / ft in
A	Uppercarriage width	3,565 / 11' 8"	I	Undercarriage ground clearance	820 / 2' 8"
A1	Uppercarriage width with catwalks	4,730 / 15' 6"	J	Track height	1,595 / 5' 3"
B	Uppercarriage height	3,870 / 12' 8"	K	Track gauge	3,900 / 12' 10"
C	Cab height	4,650 / 15' 3"	L	Track pad width	500 / 20" 600 / 24" 750 / 30"
C1	Cab height with FOPS top guard	4,845 / 15' 11"	M	Width over tracks	4,770 / 18' 8" 4,770 / 15' 8" 4,770 / 15' 8"
D	Counterweight ground clearance	1,765 / 5' 9"	N	Width over steps	5,315 / 17' 5" 5,315 / 17' 5" 5,315 / 17' 5"
E	Rear-end length	4,515 / 14' 10"	T	Boom height	4,550 / 14' 11"
G	Wheelbase	4,960 / 16' 3"	U	Length on ground	11,200 / 36' 9"
H	Undercarriage length	6,250 / 20' 6"	V	Overall length	13,800 / 45' 3"

Transport dimensions

removable elements disassembled

	Shovel equipment
	mm / ft in
Transport width	5,315 / 17' 5"
Transport length	13,800 / 45' 3"
Transport height	4,845 / 15' 11"
Shovel	6.00 m ³ / 7.85 yd ³

Front shovel



Digging envelope

A	Max. reach at ground level	m/ft in	9.35/30' 8"
A1	Max. crowd length	m/ft in	3.90/12'10"
D	Max. dumping height	m/ft in	8.00/26' 3"
T	Bucket opening width	mm/ft in	1,825/ 6'

Forces

Max. crowd force	kN/lbf	690/155,120
Max. crowd force at ground level	kN/lbf	490/110,160
Max. breakout force	kN/lbf	500/112,410

Operating weight and ground pressure

The operating weight includes the basic machine with counterweight 16.0t/35,270 lb, cab elevation 800mm/2'7", operator's cab protective guard, shovel equipment SME and front shovel 6.00m³/7.85 yd³ (10,000 kg/22,050 lb), level II.

Undercarriage	S-HD			
	mm/in	500/20"	600/24"	750/30"
Pad width	kg/lb	99,800/220,020	100,500/221,570	101,500/223,770
Weight	kg/cm ² /psi	1.84/26.2	1.55/22.0	1.25/17.8
Ground pressure				

Front Shovels

Cutting width	Capacity ISO 7461	Weight	Wear kit level		
				S-HD undercarriage	Shovel equipment
mm	m ³	kg			
ft in	yd ³	lb			
2,700	5.10	8,450	I	▲	▲
8'10"	6.67	18,630			
2,700	5.10	9,100	II	▲	▲
8'10"	6.67	20,060			
2,700	5.10	10,150	III	▲	▲
8'10"	6.67	22,380			
2,700	5.60	8,750	I	▲	▲
8'10"	7.32	19,290			
2,700	5.60	9,500	II	▲	▲
8'10"	7.32	20,940			
2,700	5.60	11,000	III	▲	▲
8'10"	7.32	24,250			
2,700	6.00	9,000	I	▲	▲
8'10"	7.85	19,840			
2,700	6.00	10,000	II	■	■
8'10"	7.85	22,050			
2,700	6.00	11,300	III	■	■
8'10"	7.85	24,910			
3,150	6.50	10,300	I	■	■
10'4"	8.50	22,710			
3,150	6.50	11,000	II	▲	▲
10'4"	8.50	24,250			
3,150	6.50	12,900	III	■	■
10'4"	8.50	28,440			

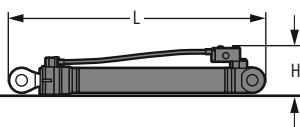
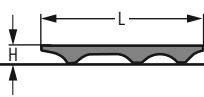
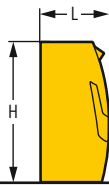
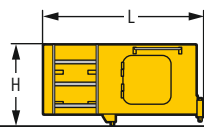
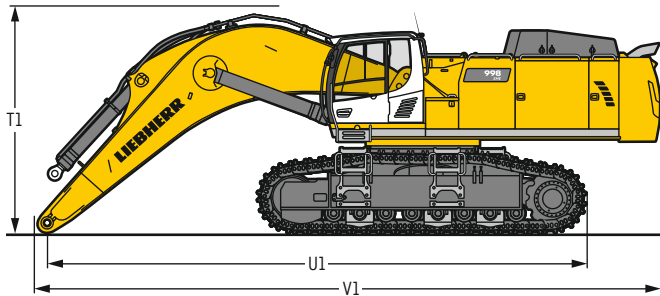
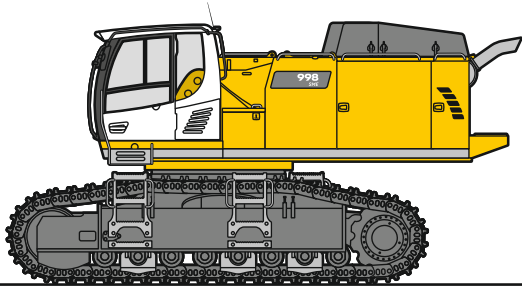
Level I: For non-abrasive materials, such as limestone without flint inclusion, shot material or easily breakable rock, i.e., deteriorated rock, soft limestone, shale, etc.

Level II: For pre-blasted heavy rock, or deteriorated, cracked material (classification 3 to 4, according to DIN 18300)

Level III: For highly-abrasive materials such as rock with a high silica content, sandstone etc.

Max. material weight ▲ = ≤ 2.0t/m³/3,400lb/yd³, ■ = ≤ 1.8t/m³/3,000lb/yd³, ▲ = ≤ 1.65t/m³/2,800lb/yd³, ■ = ≤ 1.5t/m³/2,500lb/yd³

Dimensions and weights



Basic machine

Track pads	mm / in	500 / 20"	600 / 24"	750 / 30"
Weight with backhoe equipment and S-HD undercarriage without counterweight	kg / lb	56,600 / 124,780	57,300 / 126,330	58,350 / 128,640
Weight with shovel equipment and S-HD undercarriage without counterweight	kg / lb	56,700 / 125,000	57,400 / 126,550	58,450 / 128,860

Machine without stick

T1	mm / ft in	4,250 / 13'11"
U1	mm / ft in	10,300 / 33'10"
V1	mm / ft in	11,850 / 39'11"

Cab elevation

		800 mm / 2'7"
L Length	mm / ft in	1,890 / 6'2"
H Height	mm / ft in	925 / 3'
Width	mm / ft in	1,370 / 4'6"
Weight	kg / lb	600 / 1,320

Counterweight

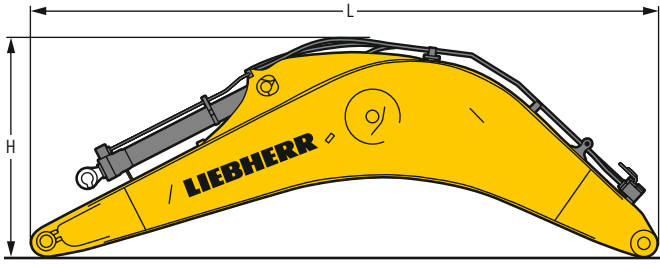
L Length	mm / ft in	775 / 2'7"	775 / 2'7"
H Height	mm / ft in	1,595 / 5'3"	1,595 / 5'3"
Width	mm / ft in	3,360 / 11'	3,360 / 11'
Weight	kg / lb	16,000 / 35,270	18,000 / 39,680

Upper protection screen

L Length	mm / ft in	1,960 / 6'5"
H Height	mm / ft in	190 / 7"
Width	mm / ft in	1,110 / 3'8"
Weight	kg / lb	75 / 170

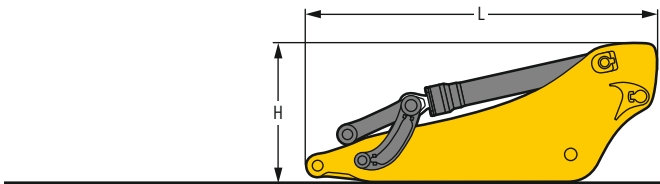
Hoist cylinders (two)

L Length	mm / ft in	2,920 / 9' 7"
H Height	mm / ft in	550 / 1'10"
Width	mm / ft in	400 / 1' 4"
Weight	kg / lb	2 x 1,050 / 2 x 2,320



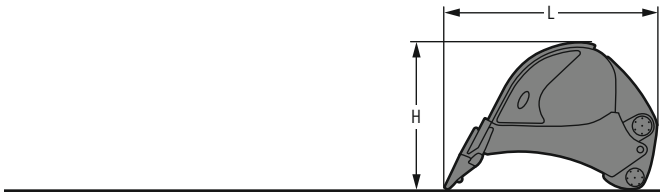
Mono boom with stick cylinder

Boom length	m / ft in	7.20 / 23' 7"
L Length	mm / ft in	7,550 / 24' 9"
H Height	mm / ft in	2,700 / 8'10"
Width	mm / ft in	1,460 / 4' 9"
Weight	kg / lb	10,300 / 22,710



Stick with bucket cylinder

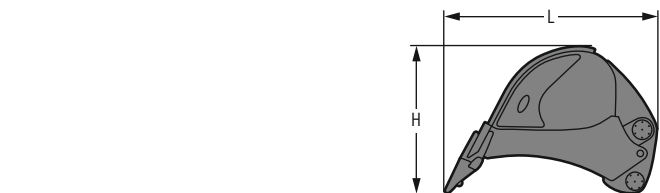
Stick length	m / ft in	2.90 / 9' 6"	3.30 / 10'10"
L Length	mm / ft in	4,050 / 13' 3"	4,450 / 14' 7"
H Height	mm / ft in	1,700 / 5' 7"	1,650 / 5' 5"
Width	mm / ft in	900 / 2'11"	900 / 2'11"
Weight	kg / lb	5,050 / 11,130	5,350 / 11,800



Backhoe buckets (semi-delta cutting edge, teeth Z 100)

HD

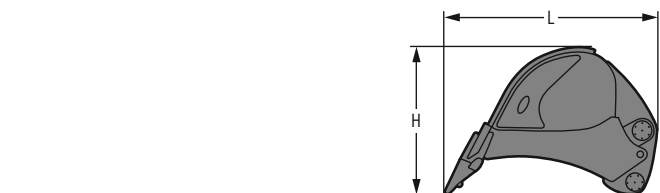
Cutting width	mm / ft in	2,350 / 7'9"	2,500 / 8'2"
Capacity	m ³ / yd ³	6.20 / 8.11	6.80 / 8.89
L Length	mm / ft in	3,050 / 10'	3,050 / 10'
H Height	mm / ft in	2,150 / 7' 1"	2,150 / 7' 1"
Width	mm / ft in	2,400 / 7'10"	2,550 / 8' 4"
Weight	kg / lb	6,500 / 14,330	6,800 / 14,990



Backhoe buckets (semi-delta cutting edge, teeth Z 90)

HD

Cutting width	mm / ft in	2,500 / 8'2"	2,550 / 8'4"
Capacity	m ³ / yd ³	6.80 / 8.89	7.20 / 9.42
L Length	mm / ft in	3,100 / 10' 2"	3,100 / 10' 2"
H Height	mm / ft in	2,200 / 7' 3"	2,200 / 7' 3"
Width	mm / ft in	2,600 / 8' 6"	2,600 / 8' 6"
Weight	kg / lb	6,500 / 14,330	7,000 / 15,430

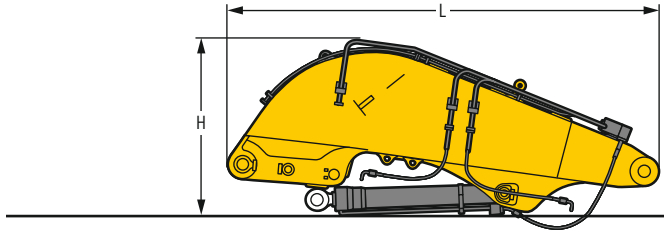


Backhoe buckets (semi-delta cutting edge, teeth Z 100)

HDV

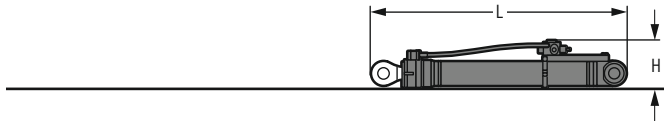
Cutting width	mm / ft in	2,200 / 7'3"	2,350 / 7'9"	2,350 / 7'9"
Capacity	m ³ / yd ³	5.20 / 6.80	5.70 / 7.45	6.30 / 8.24
L Length	mm / ft in	2,950 / 9'8"	2,950 / 9' 8"	3,050 / 10'
H Height	mm / ft in	2,150 / 7'1"	2,150 / 7' 1"	2,200 / 7' 3"
Width	mm / ft in	2,250 / 7'5"	2,400 / 7'10"	2,400 / 7'10"
Weight	kg / lb	7,200 / 15,870	7,300 / 16,090	7,600 / 16,760

Dimensions and weights



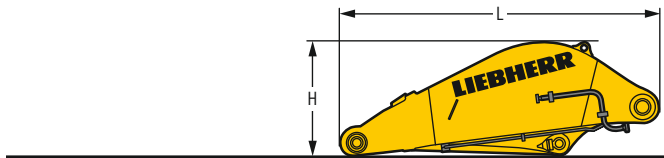
Shovel boom

L	Length	mm / ft in	4,950 / 16'3"
H	Height	mm / ft in	2,050 / 6'9"
	Width	mm / ft in	1,650 / 5'5"
	Weight without crowd cylinder	kg / lb	7,300 / 16,090
	Weight crowd cylinder	kg / lb	2 x 450 / 2 x 990



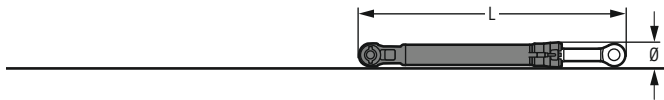
Shovel hoist cylinders (two)

L	Length	mm / ft in	2,920 / 9' 7"
H	Height	mm / ft in	550 / 1'10"
	Width	mm / ft in	450 / 1' 6"
	Weight	kg / lb	2 x 1,100 / 2 x 2,430



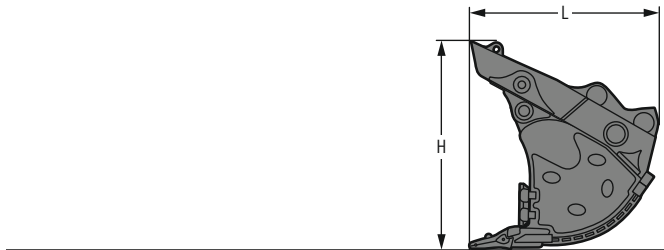
Shovel stick

L	Length	mm / ft in	3,660 / 12'
H	Height	mm / ft in	1,300 / 4' 3"
	Width	mm / ft in	1,800 / 5'11"
	Weight	kg / lb	4,650 / 10,250



Shovel bucket cylinders (two)

L	Length	mm / ft in	3,050 / 10'
Ø	Height	mm / ft in	450 / 1'6"
	Width	mm / ft in	450 / 1'6"
	Weight	kg / lb	2 x 625 / 2 x 1,380



Front shovels

		2,700 / 8'10"	2,700 / 8'10"	2,700 / 8'10"	3,150 / 10'4"
Cutting width	mm / ft in	2,700 / 8'10"	2,700 / 8'10"	2,700 / 8'10"	3,150 / 10'4"
Capacity	m ³ / yd ³	5.10 / 6.67	5.60 / 7.32	6.00 / 7.85	6.50 / 8.50
L	Length	2,600 / 8' 6"	2,800 / 9' 2"	2,800 / 9' 2"	2,800 / 9' 2"
H	Height	2,700 / 8'10"	2,700 / 8'10"	2,700 / 8'10"	2,700 / 8'10"
	Width	2,700 / 8'10"	2,700 / 8'10"	2,700 / 8'10"	3,150 / 10' 4"
	Weight				
Level I	kg / lb	8,450 / 18,630	8,750 / 19,290	9,000 / 19,840	10,300 / 22,710
Level II	kg / lb	9,100 / 20,060	9,500 / 20,940	10,000 / 22,050	11,000 / 24,250
Level III	kg / lb	10,150 / 22,380	11,000 / 24,250	11,300 / 24,910	12,900 / 28,440

Serial equipment

Undercarriage

- Lashing eyes
- Sprocket with dirt ejector
- Track and carrier rollers, sealed and lifetime-lubricated
- Travel motor housing protection
- Undercarriage S-HD

Uppercarriage

- Access platforms without protruding parts
- Anti-skid surfaces
- Automatic swing brake lock
- Centralized lubrication system (automatic)
- DEF tank lockable access hatch
- Engine hood with gas spring opening
- Extended tool set including tool box
- Handrails
- Liebherr Power Efficiency – Engine Control
- Lockable fuel tank cap with padlock
- Lockable service doors
- Lockable storage box
- Main switch, accessible from ground level
- Pre-heating system for fuel
- Protection grid on radiator fan
- Sound insulation
- Swing-out radiators
- Windshield washer fluid tank

Hydraulic system

- Dedicated swing circuit
- Filter with integrated fine filters
- Hydraulic pressure measuring ports
- Hydraulic tank shut-off valve
- Magnetic rod
- Pressure accumulator for controlled lowering of equipment with engine turned off

Engine

- Air filter with automatic dust ejector
- Automatic engine idling / speed increase, controlled via joystick sensors
- Common-Rail injection system
- Exhaust gas after-treatment system – SCR
- Fixed geometry turbocharger
- Fuel fine filter
- Fuel pre-filter and water separator
- Fuel priming pump
- Intercooler
- Power Pack US EPA Tier 4 Final
- Stepless adjustable engine speed

Cab

- 9" multifunction color touchscreen
- Air conditioning, automatic, tri-zone, controlled via display
- Armrests adjustable in length, height and inclination
- Bottle holder
- Cab door sliding windows
- Cigarette lighter
- Coat hook
- DEF consumption on touchscreen
- DEF level on touchscreen
- Electric socket in cabin (12V)
- Electric socket in cabin (24V)
- Emergency hammer
- Engine oil level on touchscreen
- Footrest
- Fuel consumption on touchscreen
- Fuel level on touchscreen
- Impact resistant roof window
- Impact resistant two-piece windscreen
- Interior lighting
- Laminated right hand side window
- LiDAT Plus (Liebherr data transfer system)*
- Mobile phone storage net
- Modetronic
- Movement priority between swing and boom, adjustable via touchscreen
- Rain hood over front window opening
- Rearview mirror
- Rear view monitoring camera
- Rear view monitoring camera distance gauge
- Rear window emergency exit
- Right hand side view monitoring camera
- Roll-down sun blinds for windscreen and roof window
- Rubber floor mat, fixed on floor and removable
- Storage box
- Storage nets
- Storage spaces
- Tilttable console left
- Tinted windows
- Visco-elastic damping
- Windscreen wiper and washer
- Work mode selector

Equipment

- Anti-drift system boom cylinders
- Anti-drift system stick cylinder
- Boom bottom protection
- Boom cylinders regeneration
- Pipe fracture safety valve for stick cylinder
- Pipe fracture safety valves for boom cylinders
- Pivot points made of cast steel
- SAE split flanges on high pressure lines
- Stick bottom protection
- Stick cylinder regeneration

* optionally extendable after one year

Equipment standard / option

Undercarriage

Chain guide 3 pieces	●
Chain guide full length	+
Reinforced cover and base plate for undercarriage center section	+
Special painting	+
Steps	●
Track pads double grouser 500 mm / 20", chamfered	+
Track pads double grouser 600 mm / 24", chamfered	●
Track pads double grouser 750 mm / 30", chamfered	+
Travel drive gearbox protection	+
Undercarriage protection plate for drop-ball application	+

Uppercarriage

Air pre-filter with cyclonical dust trap	+
Boxing ring	+
Catwalks left and right	●
Catwalk wide with railing	+
Counterweight heavy 16.0t / 35,270lb	●
Counterweight super heavy 18.0t / 39,680lb	+
Electric socket on uppercarriage (24V)	+
Filter for hydraulic hammer return flow	+
Fixed cab riser 800 mm / 2'7"	+
Headlight on uppercarriage, lateral right, LED+, 1 piece	+ ¹⁾
Headlights on uppercarriage, front, LED, 2 pieces, protections included	● ¹⁾
Headlights on uppercarriage, front, LED+, 2 pieces, protections included	+ ¹⁾
Headlights on uppercarriage, rear, LED+, 2 pieces	+ ¹⁾
Lighting for tank area	+ ¹⁾
Lighting for uppercarriage access	+ ¹⁾
Radiator fine mesh protection grid	+
Reversible fan drive	+
Skyview 360°	+
Special painting	+
Swing ring and lubrication hoses protection	+
Tank refilling pump fuel	+
Wiggins coupling for fuel	+

Hydraulic system

Bypass filter for hydraulic oil	+
Liebherr hydraulic oil	●
Liebherr hydraulic oil, adapted for extreme climate conditions	+
Liebherr hydraulic oil, biodegradable	+

Engine

Automatic engine shutdown after idling	+
Engine shut-down with overrun	+
Lighting for engine compartment	+ ¹⁾

Cab

3" seat belt with retractor, orange color	●
4-points seat belt	+
Acoustic travel alarm deactivatable	+
Auxiliary heater programmable	+
Bottom windscreen wiper	+
Coming / Leaving Home	+ ¹⁾
Cool box (12V)	+
Dark tinted windows	+
Electrically adjustable and heated outside rear-view mirrors	+
Electronic immobilizer	+
Emergency stop in cab	+
FGPS front guard tiltable	+
Fire extinguisher	+
First-aid box	+
FOPs top guard	+
Handrests elevated for joysticks	+
Headlights on cab, front, LED, 2 pieces	● ¹⁾
Headlights on cab, front, LED+, 2 pieces	+ ¹⁾
Headlights on cab roof, front, LED+, 2 pieces	+ ¹⁾
High pressure circuit switchable on pedals or mini-joystick	+
High pressure circuit with Tool Control (20 attachment adjustments on display)	+
Lighting for cabin access	+ ¹⁾
Luminosity control (LED+ headlights)	+ ¹⁾
Medium pressure circuit	+
Mini-joysticks proportional	+
Operator seat Comfort	●
Operator seat Premium	+
Overload warning system	+
Radio Comfort	+
Radio pre-installation	●
Roof sun shield	+
Roof window wiper	+
Rotating beacon on cabin, LED, 1 piece	+
Shortcut button on joystick configurable	●
Special painting	+
Sun visor	+

Equipment

Boom cylinder rods protection	+
Bucket cylinder rod protection	+
Bucket Fill Assist	+
Centralized lubrication extended for connecting link	+
Floating boom	+
Headlights on boom, LED, 2 pieces, protections included	● ¹⁾
Headlights on boom, LED+, 2 pieces, protections included	+ ¹⁾
Mono boom SME 7.20 m / 23'7"	+
Preparation for ripper tooth	+
Quick coupler SWA 105 hydraulic	+
Shovel boom 4.60 m / 15'1"	+
Shovel stick 3.30 m / 10'10"	+
Special painting	+
Stick SME 2.90 m / 9'6"	+
Stick SME 3.30 m / 10'10"	+

● = Standard, + = Option

¹⁾ Equipment not individually available, but only as predefined packages

Non-exhaustive list, please contact us for further information.

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

The Liebherr Group



Global and independent: more than 70 years of success

Liebherr was founded in 1949. With the development of the world's first mobile tower crane, Hans Liebherr laid the foundations of a successful family business which today comprises more than 140 companies on all continent and employs nearly 50,000 people. The parent company of the Group is Liebherr-International AG in Bulle (Switzerland), whose associates are exclusively members of the Liebherr family.

Technology leadership and pioneering spirit

Liebherr regards itself as a pioneer. This spirit has enabled the company to make a decisive contribution to the technological history of many industries. Today, employees around the world still share the courage of the company founder to take new paths. They are all united by a passion for technology and fascinating products and the determination to perform outstanding work for their customers.

Widely diversified product portfolio

Not only is Liebherr one of the biggest construction equipment manufacturers in the world, it also provides high-quality, user-oriented products and services in a wide range of other areas. The product portfolio includes the segments earthmoving, material handling technology, deep foundation machines, mining, mobile and crawler cranes, tower cranes, concrete technology, maritime cranes, aerospace and transportation systems, gear technology and automation systems, refrigeration and freezing, components and hotels.

Customized solutions and maximum customer benefit

Liebherr solutions are characterized by maximum precision, outstanding implementation and exceptional longevity. Its mastery of key technologies enables the company to offer its customers customized solutions. For Liebherr, customer focus does not end with the product; it also encompasses a wide range of services that make a real difference.

www.liebherr.us

WARNING

Breathing diesel engine exhaust exposes you to chemicals known to the State of California to cause cancer and birth defects or other reproductive harm.

- Always start and operate the engine in a well-ventilated area.
- If in an enclosed area, vent the exhaust to the outside.
- Do not modify or tamper with exhaust system.
- Do not idle the engine except as necessary.

For more information go to www.P65warnings.ca.gov/diesel.

WARNING

This product can expose you to chemicals including lead and lead compounds, which are known to the State of California to cause cancer and birth defects or other reproductive harm.

For more information go to www.P65warnings.ca.gov.

Liebherr USA, Co.

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