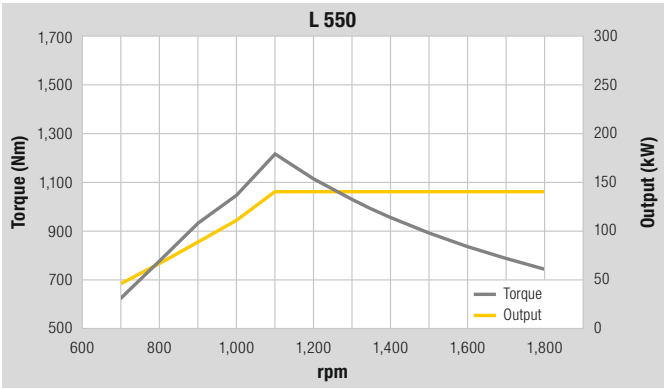
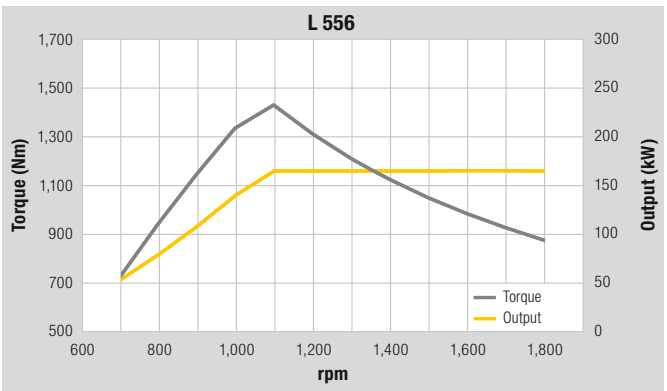
Technical Data

Engine

		L 550	L 556
Diesel engine		D934 A7	D944 A7
Design		Water-cooled in-series engine with charge-air cooling, exhaust after-treatment through Liebherr-SCR technology, closed diesel particle filter system optional	
Cylinder inline		4	4
Fuel injection process		Electronic Common Rail high-pressure injection	
Max. gross output			
to ISO 3046	kW/HP	143/194	168/228
and SAE J1995	at RPM	1,100 – 1,800	1,100 – 1,800
Max. net output			
to ISO 9249	kW/HP	140/190	165/224
and SAE J1349	at RPM	1,100 – 1,800	1,100 – 1,800
Rated output			
to ISO 14396	kW/HP	140/190	165/224
	at RPM	1,800	1,800
Max. net torque			
to ISO 9249	Nm	1,215	1,430
and SAE J1349	at RPM	1,100	1,100
Displacement	litres	7.014	7.964
Bore/Stroke	mm	122/150	130/150
Air cleaner system		Dry type filter with main and safety element, pre-cleaner, service indicator on the Liebherr display	
Electrical system			
Operating voltage	V	24	24
Capacity	Ah	2 x 180	2 x 180
Alternator	V/A	28/140	28/140
Starter	V/kW	24/7.8	24/7.8

The exhaust emissions are below the limits in stage IV/Tier 4f.





Driveline

Continuous power split XPower® driveline		
Design		Continuous, fully-automatic XPower® driveline. No traction interruptions across the entire speed range. Hydrostatic power split with two axial piston units. Identical driving performance – forwards and in reverse
Filtration		Filter system for driveline, depend on working hydraulics
Control		Driveline is controlled from travel pedal for tractive force and speed setting with integrated inch function. The Liebherr control lever is used to control forward and reverse travel
Travel speed range		0 – 40 km/h forward and reverse, fully-automatic Speed restriction available upon request. Speeds quoted apply with the tyres indicated as standard on loader model.

Axles

		L 550	L 556
Four-wheel drive			
Front axle		Fixed	
Rear axle		Centre pivot, with 13° oscillating angle to each side	
Height of obstacles which can be driven over	mm	460	442
		with all four wheels remaining in contact with the ground	
Differentials		Automatic limited-slip differentials	
Reduction gear		Planetary final drive in wheel hubs	
Track width		2,003 mm with all types of tyres	

Brakes

Wear-free service brake	Self-locking of the XPower® driveline (acting on all four wheels) and additional pump-accumulator brake system with wet multi-disc brakes (two separate brake circuits)
Parking brake	Electro-hydraulically actuated spring-loaded disc brake system on the transmission

The braking system meets the requirements of the EC guidelines 71/320.

Steering

Design	"Load-sensing" swash plate type variable flow pump with pressure cut-off and flow control. Central pivot with two double-acting, damped steering cylinders
Angle of articulation	40° to each side
Emergency steering	Electro-hydraulic emergency steering system

Attachment Hydraulics

		L 550	L 556
Design		"Load-sensing" swash plate type variable flow pump with output and flow control, and pressure cut-off in the control block	
Cooling		Hydraulic oil cooling using thermostatically controlled fan and oil cooler	
Filtration		Return line filter in the hydraulic reservoir	
Control		Liebherr control lever, electro-hydraulically operated	
Lift circuit		Lifting, neutral, lowering Automatic hoisting and lowering by Liebherr control lever Float position controlled by Liebherr control lever	
Tilt circuit		Tilt back, neutral, dump Automatic bucket return for tilting back and dumping controlled by Liebherr control lever	
Max. flow	l/min.	234	234
Max. pressure			
Z-bar linkage	bar	330	360
Industrial lift arm	bar	350	380

Attachment

		L 550		L 556	
Geometry variants					
Optional		Powerful Z-bar linkage with tilt cylinder and cast steel cross-tube			
		Industrial lift arm with tilt cylinder, hydraulic quick hitch as standard			
Bearings		Sealed			
Cycle time at nominal load		ZK	IND	ZK	IND
Lifting	s	5.5	5.5	5.5	5.5
Dumping	s	2.3	3.5	2.3	3.5
Lowering (empty)	s	2.7	2.7	2.7	2.7

Operator's Cab

Design	Hydraulically mounted, noise-proof cab ROPS roll over protection per EN ISO 3471 / EN 474-1 FOPS falling objects protection per EN ISO 3449 / EN 474-1, Cat. II Operator's door with sliding side window, sliding side window on right, front windscreen made of compound safety glass, side panels with single-pane safety glass ESG, heated rear window ESG, all windows are tinted. 3 way continuous adjustable steering column
Liebherr operator's seat	6 way adjustable, vibration-damped operator's seat "Comfort" with seat, depth and incline adjustment as standard (air-cushioned with seat heating adjustable to operator's weight), Liebherr control lever mounted into the operator's seat as standard
Cab heating and ventilation	4-zone air conditioning with new improved cooling output as standard, all filters are easy to access and replaceable

Sound Level

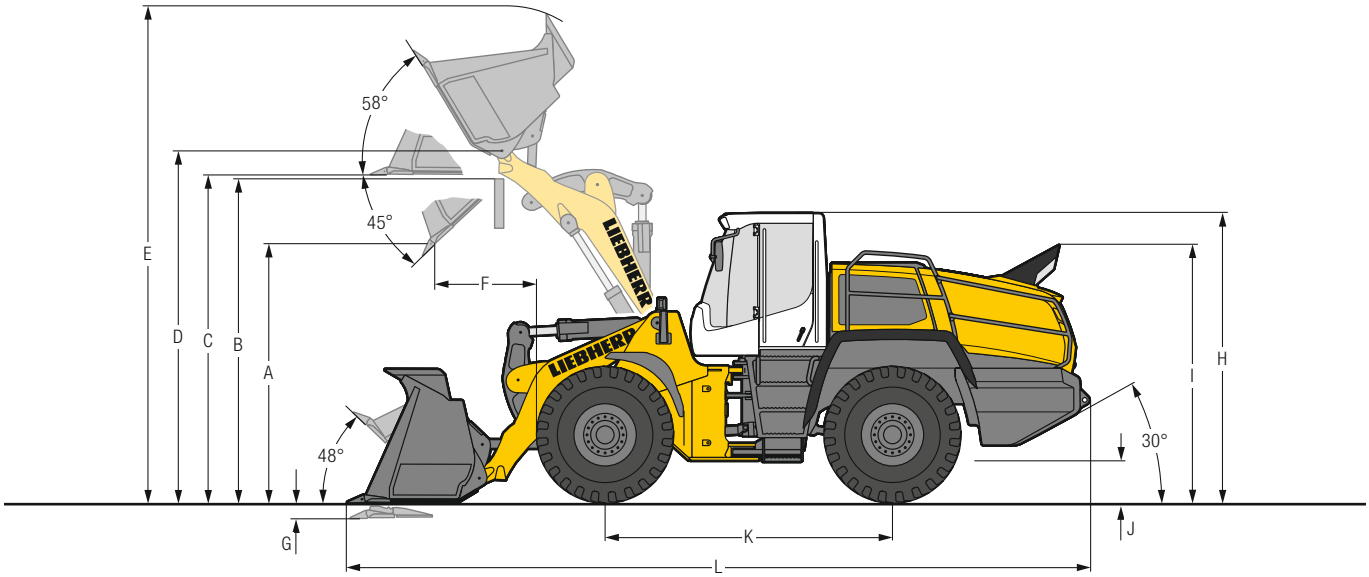
		L 550	L 556
Sound pressure level to ISO 6396			
L_{pA} (inside cab)	dB(A)	68	68
Sound power level to 2000/14/EC			
L_{WA} (surround noise)	dB(A)	104	104

Capacities

		L 550	L 556
Fuel tank	l	280	280
Engine oil (inclusive filter change)	l	26	26
DEF tank	l	67.5	67.5
Pump distribution gearbox	l	1.2	1.2
XPower® gearbox	l	53	53
Coolant	l	67	67
Front axle	l	35	42
Rear axle	l	35	35
Hydraulic tank	l	105	105
Hydraulic system, total	l	175	175
Air conditioning system R134a	g	1,250	1,250

Dimensions

Z-bar Linkage



Excavation Bucket

			L 550		L 556	
	Geometry		ZK	ZK	ZK	ZK
	Cutting tools		T	T	T	T
	Lift arm length	mm	2,600	2,600	2,600	2,600
	Bucket capacity according to ISO 7546**	m³	3.2	3.6	3.6	4.0
	Specific material density	t/m³	1.85	1.65	1.85	1.65
	Bucket width	mm	2,700	2,700	2,700	2,700
A	**Dumping height at max. lift height and 45° discharge**	mm	2,880	2,810	2,810	2,740
B	**Dump-over height**	mm	3,500	3,500	3,500	3,500
C	**Max. height of bucket bottom**	mm	3,645	3,645	3,645	3,645
D	**Max. height of bucket pivot point**	mm	3,915	3,915	3,915	3,915
E	**Max. operating height**	mm	5,585	5,695	5,695	5,775
F	**Reach at max. lift height and 45° discharge**	mm	1,095	1,170	1,170	1,250
G	**Digging depth**	mm	85	85	85	85
H	**Height above operator's cab**	mm	3,370	3,370	3,370	3,370
I	**Height above exhaust**	mm	3,020	3,020	3,020	3,020
J	**Ground clearance**	mm	490	490	490	490
K	**Wheelbase**	mm	3,395	3,395	3,395	3,395
L	**Overall length**	mm	8,380	8,480	8,480	8,580
	Turning circle radius over outside bucket edge	mm	6,585	6,610	6,610	6,635
	Breakout force (SAE)	kN	140	130	150	140
	Tipping load, straight*	kg	14,000	13,800	15,750	15,550
	Tipping load, fully articulated*	kg	12,200	12,000	13,700	13,500
	Operating weight*	kg	17,700	17,800	18,400	18,500
	Tyre size		23.5R25 L3		23.5R25 L3	

* The figures shown include the above tyres, all lubricants, a full fuel tank, the ROPS/FOPS cab and the operator. Different tyres and optional equipment will change the operating weight and tipping load. (Tipping load, fully articulated according to ISO 14397-1)

** Actual bucket capacity may be approx. 10 % larger than the calculation according to ISO 7546 standard. The degree to which the bucket can be filled depends on the material – see page 24.

ZK = Z-bar linkage
T = Welded-on tooth holder with add-on teeth