The Allround Wheel Loaders. L 524 - L 538

Tipping load, articulated: 7,005 kg – 9,000 kg

LIEBHERR

L 524

Liebherr Norm Test 2,9 l/100 t 8,3 l/h

Tipping load, articulated:	7,005 kg
Bucket capacity:	2.0 m³
Service weight:	10,100 kg
Engine output:	81 kW

L 534

Liebherr Norm Test 2,8 l/100 t 10,0 l/h

Tipping load, articulated:	8,625 kg
Bucket capacity:	2.4 m³
Service weight:	12,100 kg
Engine output:	100 kW

L 538

Liebherr Norm Test 2,8 l/100 t 10,0 l/h

Tipping load, articulated:	9,000 kg
Bucket capacity:	2.5 m³
Service weight:	12,300 kg
Engine output:	100 kW

Economy

The Liebherr driveline combined with low operating weight and high tipping load results in up to 40 % less fuel consumption compared with conventionally driven wheel loaders. Up to 5 litres of fuel per operating hour can be saved, which means lower operating costs and an active protection of the environment at the same time.

Performance

The Liebherr driveline enables the Liebherr diesel engine to be installed in the ideal position. For this class of wheel loader, it is transversely mounted at the rear. This greatly increases the tipping load and the handling capacity per operating hour at a lower operating weight than conventional wheel loaders.

Reliability

All the materials used in these wheel loaders have passed long term tests to ensure that they match up to Liebherr's exacting standards even in the toughest conditions. The Liebherr driveline with no manual-shift gearbox has fewer components and this leads to greater reliability.

Comfort

The ultra-modern cabin design with advanced ergonomics, reduced cab tilt, continuously variable Liebherr driveline without the need to shift gears as well as the compact design of the loaders and the excellent access to maintenance based on the transversely mounted Liebherr diesel engine lead to unequalled overall comfort.

Lower fuel consumption

- Fuel saving can be up to 40 % or 5 litres per operating hour. A major selling point in view of today's high fuel prices!

Liebherr's Normtest

- Liebherr wheel loaders demonstrate their fuel economy in the Liebherr standard Normtest.

Economy

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Low operating costs

Minimum costs, high handling capacity

Liebherr wheel loaders are unbeatable for economy, mainly due to the following factors:

– Low fuel consumption, thanks to higher efficiency and a low operating weight. With this overall concept, the Liebherr wheel loader's fuel consumption can be as much as 5 litres per operating hour lower than a conventional wheel loader at the same working conditions.

– More or less no brake wear, thanks to the hydraulic braking action of the driveline. This means no brake repair costs based on wear and tear.

– Reduced tyre wear, thanks to continuous traction control. Depending on the working conditions, tyre wear can be up to 25 % lower than on conventional wheel loaders.

Efficient environmental protection

Economical use of resources

Liebherr wheel loaders use less fuel. This means less produced exhaust emissions and an economical use of resources.

1 litre of fuel produces up to 3 kg of carbon dioxide (CO_2). By saving as much as 5 litres of fuel per working hour the CO_2 emissions will be reduced by up to 15 kilograms.

Low noise emissions

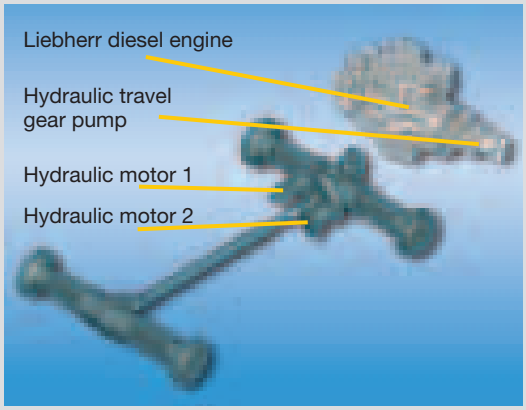
The innovative driveline concept also cuts noise emissions considerably: Liebherr wheel loaders are significantly quieter in operation.

Reduced brake wear

• Even in the toughest working conditions, the Liebherr travel drive is always braked hydraulically. The mechanical service brake is used only as a secondary braking function – as such – the brakes are virtually wear-free.

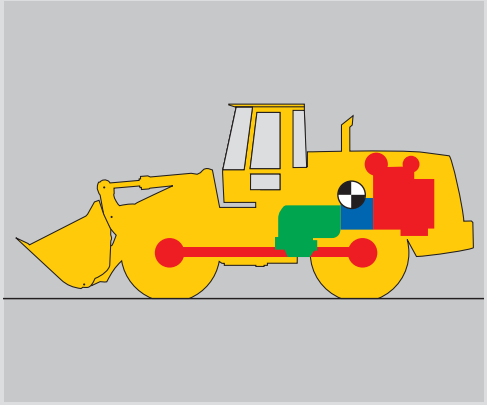
Reduced tyre wear

• The tractive force can be adjusted continuously. This leads to no wheel spins and therefore to reduced tyre wear - up to 25 % less than on a conventional wheel loader.



Liebherr driveline

- Optimum weight distribution thanks to transverse installation of the Liebherr diesel engine
- The Liebherr diesel engine is used as a counterweight - so high tipping load at low operating weight
- Compact design improves visibility in all directions



Performance

The Liebherr driveline enables the Liebherr diesel engine to be installed in the ideal position. For this class of wheel loader, it is transversely mounted at the rear. This greatly increases the tipping load and the handling capacity per operating hour at a lower operating weight than conventional wheel loaders.

Higher performance, lower weight

Higher productivity, lower operating weight

Liebherr's driveline enables the Liebherr diesel engine to be installed transversely at the rear of the wheel loader. This increases the tipping load while keeping the operating weight low. Productivity is greatly increased because no unnecessary counterweight has to be carried on the machine.

Ultra-modern Liebherr driveline

Innovative technology

Liebherr Allround wheel loaders do not need a manual-shift gearbox. Tractive force and speed are automatically varied to suit demand, without selecting a different gear ratio. Even the change from forward to reverse travel is controlled hydraulically, so that no mechanical reverse gear is needed.

Flexibility puts them ahead

An all-purpose loader

The Allround wheel loader models can be supplied with either a parallel or a Z-pattern linkage. This gives them the ideal equipment for tackling a variety of tasks. Their compact design allows these wheel loaders to manoeuvre quickly and efficiently – an ideal basis for high handling capacity.

Conventional travel gear

- Longitudinally mounted diesel engine moves the centre of gravity to the further forward
- Much more additional counterweight is needed to maintain stability and to increase the tipping load
- This leads to high operating weight and bad visibility

An all-purpose loader

- The choice between parallel (P) and Z-pattern linkage means that the loader can always be configured to suit the customer's specific tasks: P for industrial use, Z for conventional material handling.

Liebherr driveline

- The Liebherr driveline consists of two hydraulic motors, which accelerate the loader continuously from a standstill to maximum speed, either forwards or in reverse – without a manual gear shift and a reversing gear unit.

Reliability

All the materials used in these wheel loaders have passed long term tests to ensure that they match up to Liebherr's exacting standards even in the toughest conditions. The Liebherr driveline with no manual-shift gearbox has fewer components and this leads to greater reliability.

Reliable Liebherr driveline

Fewer components

Liebherr's driveline includes a self-locking hydraulic brake, with the result that the additional wet brake discs are effectively wear-free – for the wheel loader's entire operating life.

There is no need for a manual gear shift as well as a reversing gear unit –components that are not needed are wear-free!

Controlled cooling

The intelligent answer

The cooling fan is not driven directly from the Liebherr diesel engine, and produces only the cooling air output that is needed at any given moment. Heat sensors control its operating speed, and if overheating should occur, the wheel loader shifts down automatically to the lowest travel speed range.

Since less power is then consumed, the Liebherr diesel engine is better protected against overheating. At the same time, the fan speed is increased to the maximum value, for the best possible protection of all components.

Components to the manufacturer's quality standards

Everything from a single source

Important components such as the engine, hydraulic rams and electronics are manufactured by Liebherr itself – which means co-ordinated quality from the manufacturer down to the smallest detail to ensure the highest possible performance and reliability.

Cooling system

- The radiator is installed on the rear section of the vehicle, between the diesel engine and the cabin. Cooling air is drawn in directly behind the cabin and blown out upwards at the rear. The fan speed is varied automatically by heat sensors that determine the amount of cooling needed.
- A reversible fan drive to expel dust from the radiator can be specified as an optional extra.

Liebherr's own components

- Liebherr has many years of experience in the design, development and construction of diesel engines, hydraulic rams and electronic components. They are all matched together down to the smallest detail for use on its wheel loaders.

Liebherr control lever

- The Liebherr control lever is used to manage all travel and working movements of the wheel loader, so that the driver's left hand can always remain on the steering wheel. There is no need to let go of the steering wheel to reach another control lever – a valuable safety feature.

– Raise and lower attachment
– Fill and dump the bucket
– Bucket return to dig
– Change of travel direction with simultaneous travel start
– Auxillary control buttons for additional hydraulic functions

Comfort

The ultra-modern cabin design with advanced ergonomics, reduced cab tilt, continuously variable Liebherr driveline without the need to shift gears as well as the compact design of the loaders and the excellent access to maintenance based on the transversely mounted Liebherr diesel engine lead to unequalled overall comfort.

Top-class cabin design

Comfort cabin

This ultra-modern, ergonomically planned cabin design is the basis for increased performance and productivity of the operator. The displays, controls and driver's seat are carefully co-ordinated to form a perfect ergonomic unit.

Liebherr control lever

All working and travel functions are operated precisely and sensitively from a single control lever. This means accurate and safe handling, and the left hand always remains on the steering wheel. This increases the safety at the job site.

Liebherr driveline

Continuously variable transmission

Liebherr's driveline enables the wheel loader to accelerate smoothly and continuously in all speed ranges, with no manual gear shifts and no interruptions to the power flow.

Unique oscillation system

The combination of centre pivot and rear swing axle reduces the cab tilt by 50 % and this again makes the working conditions much more pleasant for the operator.

Service accessibility

Easy maintenance

Based on the transversely installed Liebherr diesel engine all maintenance points can be reached easily and safely from ground level when a single engine hood is opened.

Hydrostatic fan drive

The cooling system directly behind the cabin reduces the accumulation of dust and therefore the need for cleaning and maintenance work – this saves time and money.

Service accessibility

- The transversely installed Liebherr diesel engine enables an easy accessibility for maintenance. Lifting a hinge up cover allows you a safe and convenient access to all maintenance points from ground level.

Unique oscillation system

- The combination of centre pivot and rear swing axle reduces the cab tilt by 50 %. This leads to greater operator comfort based on the reduction of the cab tilt.

– Initial position
– Lateral slope angle
– Liebherr wheel loader
– Conventional wheel loader

Technical Data

Engine

	L 524	L 534	L 538
Liebherr diesel engine	D 504 TI	D 504 TI	D 924 TI-E A1
Design	4-cylinder, inline engine, water-cooled, turbo charged, intercooled		
Rated output according to ISO 9249 kW	81	100	100
at RPM	2400	2400	2000
Max. torque Nm	424	498	645
at RPM	1400	1400	1150
Displacement Liter	4,5	4,5	6,64
Bore/Stroke mm	106/127	106/127	122/142
Air cleaner system	Dry air filter with main and safety element, pre-cleaner, service indicator on LCD display		
Electrical system			
Operating voltage V	24	24	24
Battery Ah/V	2 x 100/12	2 x 100/12	2 x 110/12
Alternator	Three-phase AC	Three-phase AC	Three-phase AC
V/A	24/55	24/55	24/55
Starter V/kW	24/7	24/7	24/5,4

The exhaust emissions are below the limits in EU directive 97/68/EC – stage II.

Travel Drive

Stepless hydrostatic travel drive

Design: Swash plate type variable flow pump and two variable axial piston motors in closed loop circuit. Direction of travel in reversed by changing the flow-direction of the variable-displacement pump

Filtering system: Suction filter for closed circuit

Control: By travel and inching pedal. The inching pedal makes it possible to control the tractive and thrust forces steplessly at full engine speed. The Liebherr joystick is used to control forward and reverse travel and select the travel stagesrange

Travel speed range	L 524	L 534	L 538
Speed range I	– 8,0 km/h	– 8,0 km/h	– 8,0 km/h
Speed range II	– 33,0 km/h	– 34,0 km/h	– 34,0 km/h

The quoted speeds apply with the tyres that are standard equipment on the loader

Axles

Four-wheel drive

Front axle: Fixed

Rear axle: Centre pivot, with 6° oscillating angle to each side. 470 mm in height can be driven over (with all four wheels remain in contact with the ground)

Differentials: Automatic limited-slip differentials with 45 % locking action in both axles

Reduction gear: Planetary final drive in wheel hubs

Track width: 1960 mm with all types of tyres (L 524)
1900 mm with all types of tyres (L 534 and L 538)

Brakes

Wear-free service brake: Self-locking of the hydrostatic travel drive (acting on all four wheels) and additional pump-accumulator brake system with wet multi-disc brakes located in the differential housing (two seperate brake circuits)

Parking brake: Electro-hydraulically actuated spring-loaded disc brake system on the front axle

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

Steering

Design: Hydraulic servo power steering Central oscillating frame articulation with damper element

Articulation angle: 40° (to each side)

Oscillating angle: 6° (to each side)

Max. pressure: 210 bar

Emergency steering: Electro-hydraulic emergency steering system

Attachment Hydraulics

Design: "Load-Sensing" variable axial piston pump with output control and pressure cutoff

Cooling: Hydraulic oil cooling using thermostatically controlled fan and oil cooler

Filtration: Return line filter in the hydraulic reservoir

Control: "Liebherr joystick" with hydrostatic servo control

Lift circuit: Lifting, neutral, lowering and float position controlled by Liebherr joystick with detent; automatic lifting-limit circuit

Tilt circuit: Tilt back, neutral, dump automatic bucket positioning

	L 524	L 534	L 538
Max. flow l/min.	105	140	140
Max. pressure bar	300	300	300

Attachment

Geometry can be chosen: Powerful Z-bar linkage with one tilt cylinder, hydr. quick change coupler – optional equipment

Parallel linkage with two tilt cylinders, hydr. quick change coupler – standard equipment

Bearings: Sealed

Cycle time at nominal load	L 524		L 534		L 538	
	ZK	PK	ZK	PK	ZK	PK
Lifting	6,5 s	7,0 s	6,0 s	6,0 s	6,0 s	6,0 s
Dumping	2,0 s	4,0 s	1,6 s	3,0 s	1,6 s	3,0 s
Lowering (empty)	5,0 s	5,0 s	4,0 s	4,0 s	4,0 s	4,0 s

Operator's Cab

Design: The cab is resiliently mounted on the rear section, with built in ROPS/FOPS structure, tinted safety glass windows, 2 Doors open out, left door with a sliding window Adjustable steering column is standard equipment
ROPS roll over protection per DIN/ISO 3471/ EN 474-3
FOPS falling objects protection per DIN/ISO 3449/EN 474-1

Liebherr Operator's seat: 6-way adjustable seat with seat belt, adjustable for operator's weight

Cab heating and ventilation: With defrosting, fresh air filter, circulation system and heater supplied from engines cooling

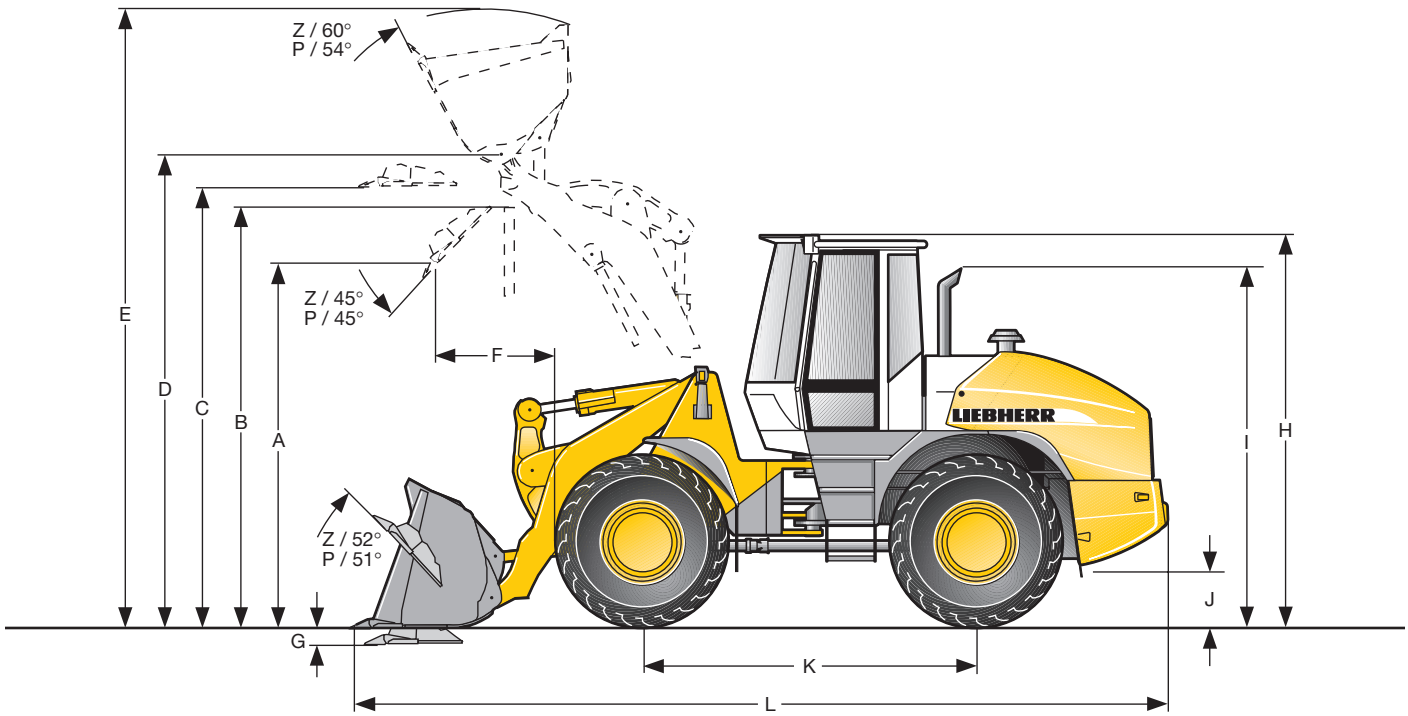
Noise emission

	L 524	L 534	L 538
ISO 6396			
L_{pA} (inside cab)	71 dB(A)	72 dB(A)	72 dB(A)
2000/14/EG			
L_{WA} (surround noise)	103 dB(A)	104 dB(A)	104 dB(A)

Capacities

	L 524	L 534	L 538
Fuel tank l	160	195	195
Engine oil (inclusive filter change) l	12	14	20,5
Pump distributor gears l	2,5	2,5	2,5
Front axle/wheel hubs l	12,2/4,8	15,5/5	15,5/5
Rear axle/wheel hubs l	12,7/5,0	15,5/5	15,5/5
Hydraulic tank l	80	100	100
Hydraulic system, total l	130	130	130

Dimensions

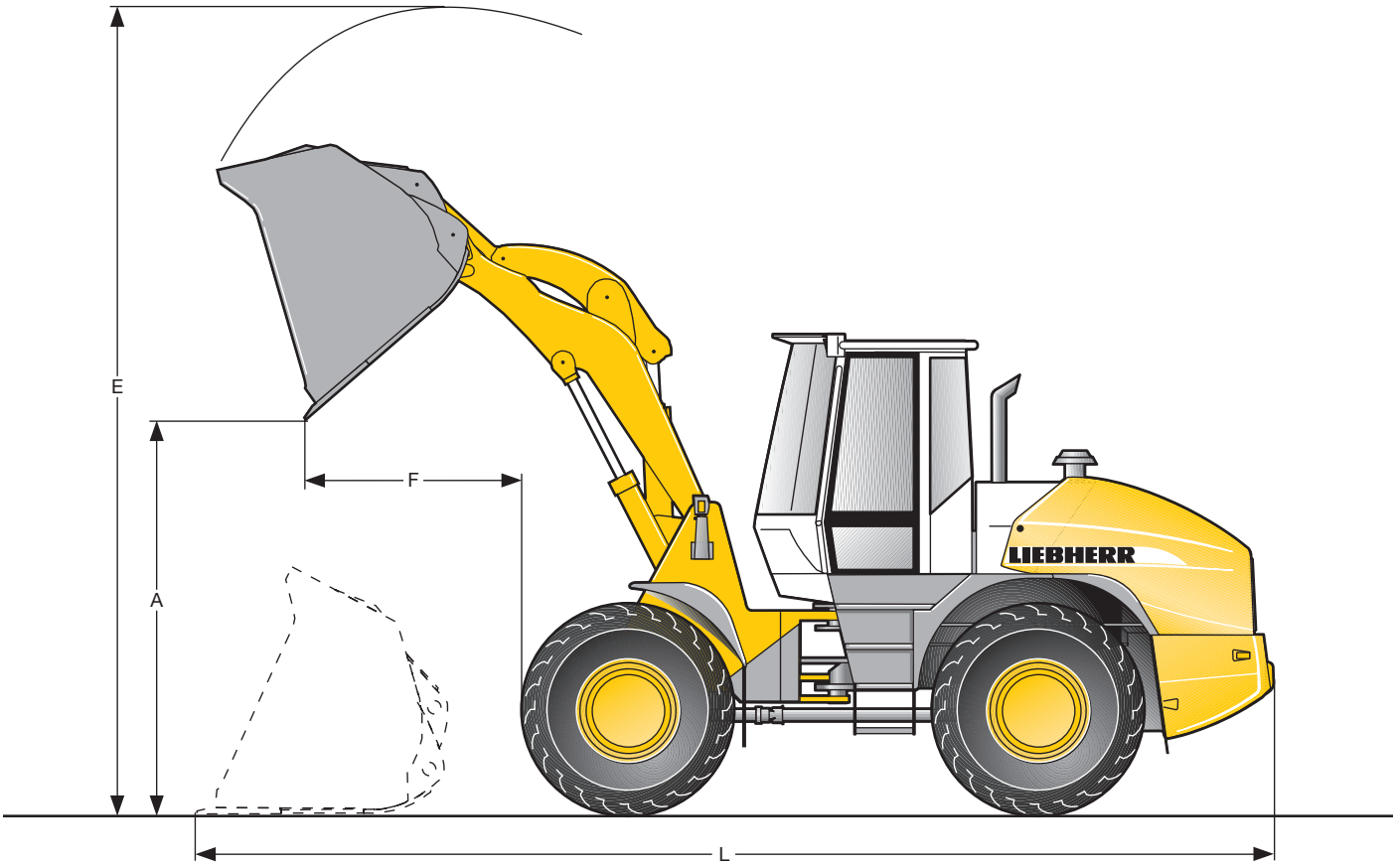


Loading Bucket			L 524		L 534		L 538	
	Geometry		ZK	PK	ZK	PK	ZK	PK
	Cutting tools		T	T	T	T	T	T
	Bucket capacity	m^3	2,0	1,7	2,4	2,0	2,5	2,1
	Bucket width	mm	2500	2500	2500	2500	2500	2500
	Specific material weight	t/m^3	1,8	1,8	1,8	1,8	1,8	1,8
A	Dumping height at max. lift height and 45° discharge	mm	2850	2815	2890	2930	2870	2910
B	Dump-over height	mm	3335	3380	3380	3470	3380	3470
C	Max. height of bucket bottom	mm	3510	3500	3650	3730	3650	3730
D	Max. height of bucket pivot point	mm	3760	3750	3900	3970	3900	3970
E	Max. operating height	mm	4840	4895	5150	5230	5150	5230
F	Reach at max. lift height and 45° discharge	mm	870	1030	945	1060	970	1075
G	Digging depth	mm	80	55	70	65	70	65
H	Height above cab	mm	3150	3150	3250	3250	3250	3250
I	Height above exhaust	mm	3090	3090	3150	3150	3150	3150
J	Ground clearance	mm	520	520	460	460	460	460
K	Wheelbase	mm	2700	2700	2900	2900	2900	2900
L	Overall length	mm	6835	6890	7235	7535	7135	7535
	Turning circle radius over outside bucket edge	mm	5500	5530	5825	5925	5795	5880
	Lifting force (SAE)	kN	98	89	135	95	135	95
	Breakout force (SAE)	kN	92	80	105	100	105	100
	Tipping load, straight*	kg	8030	7100	9745	8550	10160	8640
	Tipping load, articulated at 40°*	kg	7005	6250	8625	7570	9000	7650
	Operating weight*	kg	10100	10200	12100	12290	12300	12250
	Tyre sizes		17.5R25 Good Year GP-2B		20.5R25 Good Year GP-2B		20.5R25 Good Year GP-2B	

* The figures shown here are valid with tyres above, includes 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.
ZK = Z-bar linkage
PK = Parallel linkage with hydraulic quick coupler
T = Welded-on tooth holder with add-on teeth

Attachment

Light Material Bucket

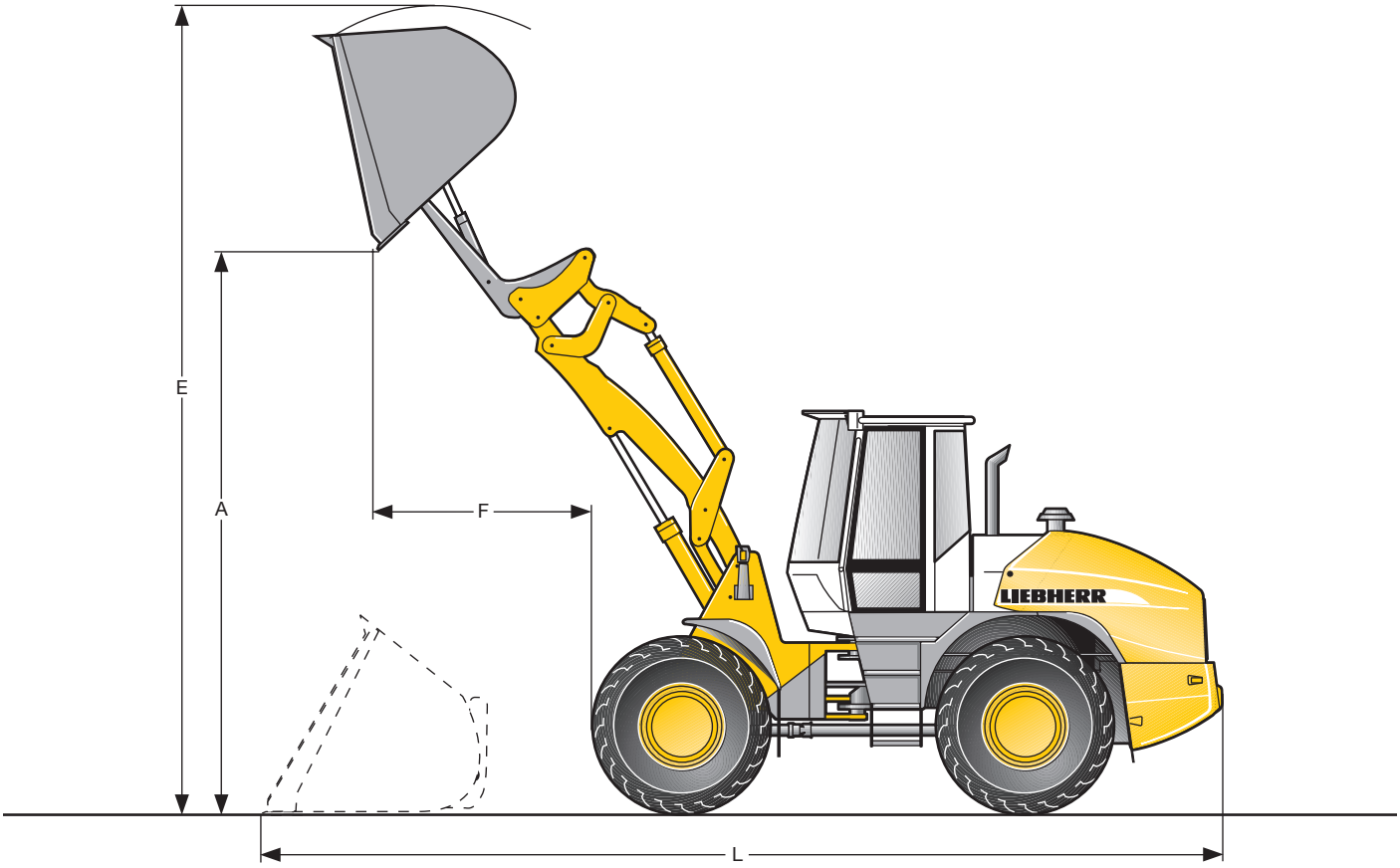


Light Material Bucket with Bolt-On Cutting Edge			L 524		L 534		L 538	
	Geometry		ZK	PK	ZK	PK	ZK	PK
	Bucket capacity	m^3	3,0	3,0	4,0	4,0	4,0	4,0
	Bucket width	mm	2700	2700	2700	2700	2700	2700
	Specific material weight	t/m^3	1,0	0,9	0,9	0,8	1,0	0,9
A	Dumping height at max. lift height	mm	2485	2570	2450	2580	2450	2580
E	Max. operating height	mm	5215	5200	5550	5670	5550	5670
F	Reach at maximum lift height	mm	1150	1290	1270	1410	1270	1410
L	Overall length	mm	7155	7150	7600	7820	7600	7820
	Tipping load, straight*	kg	7000	6600	8530	8020	9000	8350
	Tipping load, articulated at 40°*	kg	6150	5800	7545	7100	7980	7400
	Operating weight*	kg	10800	10510	12545	12555	12750	12700
	Tyre sizes		17.5R25 Good Year GP-2B		20.5R25 Good Year GP-2B		20.5R25 Good Year GP-2B	

* The figures shown here are valid with tyres above, includes 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.
ZK = Z-bar linkage with hydraulic quick coupler
PK = Parallel linkage with hydraulic quick coupler

Attachment

High-Dump Bucket

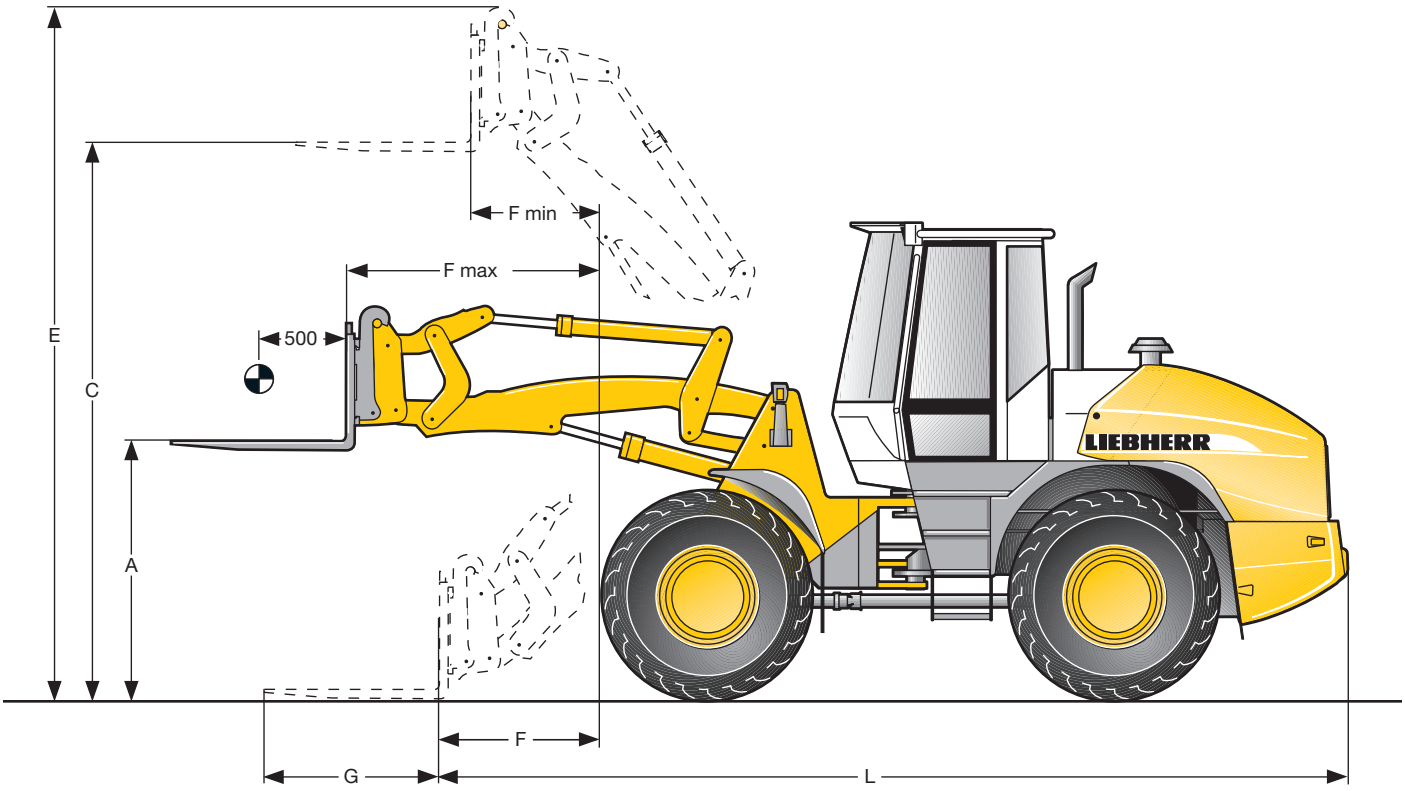


	High-Dump Bucket with Bolt-On Cutting Edge		L 524	L 534		L 538	
	Geometry		PK	PK	PK	PK	PK
	Bucket capacity	m^3	3,0	3,0	4,0	3,0	4,0
	Bucket width	mm	2700	2700	2720	2700	2720
	Specific material weight	t/m^3	0,8	1,0	0,7	1,1	0,8
A	Dumping height at max. lift height	mm	4260	4350	4200	4350	4200
E	Max. operating height	mm	5950	6255	6450	6255	6450
F	Reach at maximum lift height	mm	1510	1600	1940	1600	1940
L	Overall length	mm	7296	7790	8150	7790	8150
	Tipping load, straight *	kg	6200	8050	7080	8200	7080
	Tipping load, articulated at 40° *	kg	5450	7130	6265	7270	6290
	Operating weight *	kg	10850	12765	13265	12720	13220
	Tyre sizes		17.5R25 Good Year GP-2B	20.5R25 Good Year GP-2B		20.5R25 Good Year GP-2B	

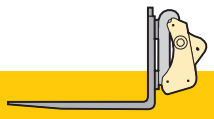
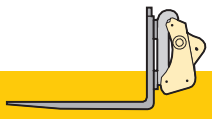
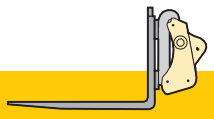
* The figures shown here are valid with tyres above, includes all lubricants, a full fuel tank, the ROPS/FOPS cab and the operator. Different tyres and optional equipment will change the operating weight and tipping load.
PK = Parallel linkage with hydraulic quick coupler

Attachment

Fork Carrier and Fork



FEM III Fork Carrier and Fork with Quick Change Device

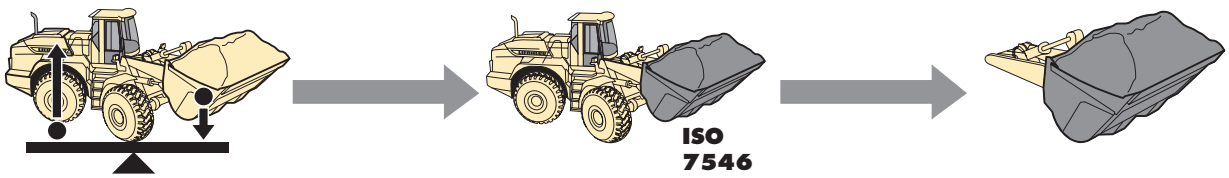
	Geometry		L 524 ZK	L 524 PK	L 534 ZK	L 534 PK	L 538 ZK	L 538 PK
A	Lifting height at max. reach	mm	1690	1690	1770	1770	1770	1770
C	Max. lifting height	mm	3570	3560	3700	3790	3700	3790
E	Max. operating height	mm	4490	4480	4640	4710	4640	4710
F	Reach at loading position	mm	990	990	960	1100	960	1100
F max.	Max. reach	mm	1635	1635	1640	1750	1640	1750
F min.	Reach at max. lifting height	mm	725	735	710	795	710	795
G	Fork length	mm	1200	1200	1200	1200	1200	1200
L	Length – basic machine without forks	mm	6040	6040	6325	6565	6325	6565
	Tipping load, straight *	kg	5735	5650	7260	7150	7340	7245
	Tipping load, articulated at 40° *	kg	5050	4970	6430	6350	6490	6412
	Recommended payload for uneven ground = 60 % of tipping load (articulated at 40°) ***	kg	3030	2985	3860	3800	3894	3850
	Recommended payload for smooth surfaces = 80 % of tipping load (articulated at 40°) ***	kg	3800 **	3975	5000 **	5000	5000 **	5000
	Operating weight *	kg	10040	9950	11940	12040	12107	12260
	Tyre sizes		17.5R25 Good Year GP-2B		20.5R25 Good Year GP-2B		20.5R25 Good Year GP-2B	

* The figures shown here are valid with tyres above, includes 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.

** Payload on forks is limited by tilt cylinder

*** According to EN 473-3 and ISO 8313

Tipping Load



What is tipping load?
Load at centre of gravity of working equipment, so that the wheel loader just begins to tip over the front axle.
This the most unfavourable static-load position for the wheel loader.
Liftings arms horizontal, wheel loader fully articulated at centre pivot.

Pay load.
The pay load must not exceed 50 % of the tipping load when articulated.
This is equivalent to a static stability-margin factor of 2,0.

Bucket capacity.
The bucket volume is determined from the pay load.

$$\text{Pay load} = \frac{\text{Tipping load, articulated}}{2}$$

$$\text{Bucket capacity} = \frac{\text{Pay load (kg)}}{\text{Specific bulk weight of material (t/m}^3\text{)}}$$

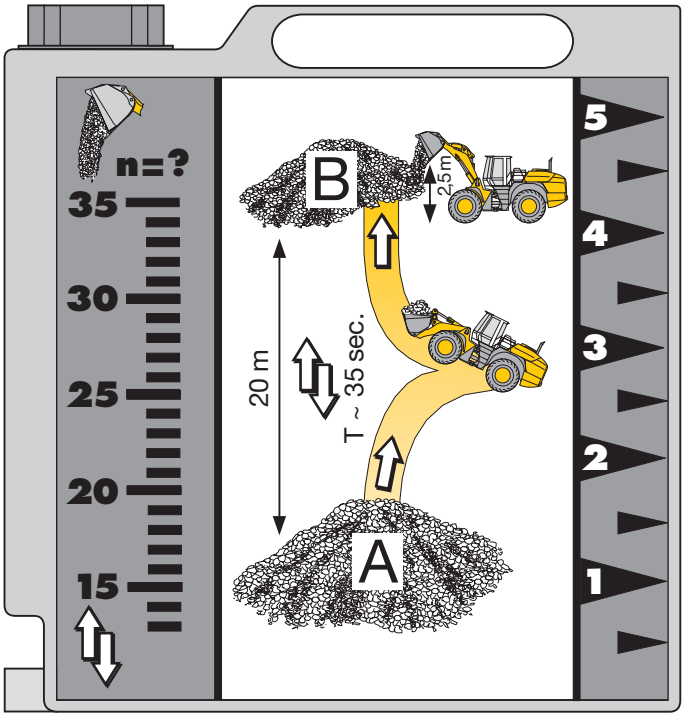
Bulk Material Densities and Bucket Filling Factors

	t/m³	%
Gravel, moist	1,9	105
dry	1,6	105
wet, 6–50 mm	2,0	105
dry, 6–50 mm	1,7	105
crushed stone	1,5	100
Sand, dry	1,5	110
moist	1,8	115
wet	1,9	110
Gravel and sand,		
dry	1,7	105
wet	2,0	100
Sand and clay	1,6	110

	t/m³	%
Clay, natural	1,6	110
dry	1,4	110
wet	1,65	105
Clay and gravel,		
dry	1,4	110
wet	1,6	100
Earth, dry	1,3	115
wet excavated	1,6	110
Topsoil	1,1	110
Weathered rock		
50 % rock, 50 % earth	1,7	100
Basalt	1,95	100

	t/m³	%
Granite	1,8	95
Limestone,		
hard	1,65	95
soft	1,55	100
Sandstone	1,6	100
Slate	1,75	100
Bauxite	1,4	100
Gypsum, broken	1,8	100
Coke	0,5	110
Slag, broken	1,8	100
Coal	1,1	110

Environmental protection can help you earn money!



The Liebherr Standard Consumption Test – easy to reproduce and practical.
Every Liebherr dealer will provide you with this measuring-tank kit free of charge or, on request, will carry out the standard fuel consumption test on your premises. It's so easy: you simply determine the number of loading cycles that can be carried out with 5 litres of diesel. The material is taken from pile A and carried over a distance of 20 metres to point B. The time needed for each working cycle should be 35 seconds. Discharge at point B should take place from a height of 2,5 m. The working cycles continue until the 5 litres of diesel in the external measuring tank have been used up. The loader's fuel consumption per operating hour is calculated as follows:

$$\frac{400}{\text{Number of loading cycles}} = \text{consumption per hour}$$

Values for the Liebherr Wheel Loaders

	Numbers of working cycles	Litres/ 100 tons	Litres/ hour
L 524: 2,0 m³	n = 48	2,9	8,3
L 534: 2,4 m³	n = 40	2,8	10,0
L 538: 2,5 m³	n = 40	2,8	10,0
L 544 2plus2: 3,0 m³	n = 35	2,6	11,4
L 554 2plus2: 3,5 m³	n = 33	2,4	12,1
L 564 2plus2: 4,0 m³	n = 24	2,9	16,7
L 574 2plus2: 4,5 m³	n = 23	2,7	17,4
L 580 2plus2: 5,0 m³	n = 22	2,7	18,2

Tyres

	Size and tread code		Change of operating weight kg	Width over tyres mm	Change in vertical dimensions mm	use
L 524						
Bridgestone	17.5R25 VMT	L3	+ 100	2450	+ 10	Gravel
Bridgestone	17.5R25 VSDL	L5	+ 657	2450	+ 40	Stone, Recycling
Good Year	17.5R25 RT-3B	L3	+ 184	2470	+ 10	Gravel
Good Year	17.5R25 GP-2B	L2	0	2460	0	Sand, Gravel
Michelin	17.5R25 XTLA	L2	– 52	2470	– 25	Gravel, Earthworks
Michelin	17.5R25 XHA	L3	+ 16	2460	– 15	Gravel
Michelin	17.5R25 XLD D2A	L5	+ 436	2480	+ 25	Stone, Recycling
Michelin	17.5R25 X-MINE D2	L5	+ 624	2480	+ 40	Stone, Recycling
L 534						
Bridgestone	20.5R25 VMT	L3	+ 222	2470	– 15	Gravel
Bridgestone	20.5R25 VSDL	L5	+ 707	2470	+ 30	Stone, Recycling
Good Year	20.5R25 GP-2B	L2	0	2480	0	Sand, Gravel
Good Year	20.5R25 RL-5K	L5	+ 660	2490	+ 40	Industry, Stone
Michelin	20.5R25 XHA	L3	+ 28	2480	– 10	Gravel
Michelin	20.5R25 XLD D2	L5	+ 464	2490	+ 25	Stone, Mining spoil, Recycling
Michelin	20.5R25 X-MINE D2	L5	+ 732	2480	+ 40	Stone, Recycling
L 538						
Bridgestone	20.5R25 VMT	L3	+ 222	2470	– 15	Gravel
Bridgestone	20.5R25 VSDL	L5	+ 707	2470	+ 30	Stone, Recycling
Good Year	20.5R25 GP-2B	L2	0	2480	0	Sand, Gravel
Good Year	20.5R25 RL-5K	L5	+ 660	2490	+ 40	Industry, Stone
Michelin	20.5R25 XHA	L3	+ 28	2480	– 10	Gravel
Michelin	20.5R25 XLD D2	L5	+ 464	2490	+ 25	Stone, Mining spoil, Recycling
Michelin	20.5R25 X-MINE D2	L5	+ 732	2480	+ 40	Stone, Recycling

Before operating the vehicle with tyre foam filling or tyre protection chains, please discuss this with Liebherr-Werk Bischofshofen.

The Liebherr Wheel Loaders

Stereoloader






		L 506 Stereo	L 507 Stereo	L 508 Stereo	L 509 Stereo	L 510 Stereo	L 514
Tipping load	kg	3231	3501	3824	4225	4581	5305
Bucket capacity	m³	0,8	0,9	1,0	1,1	1,2	1,5
Operating weight	kg	5120	5240	5480	6080	6250	7700
Engine output	kW/HP	42/58	46/63	46/63	54/74	58/79	72/98

Wheel Loader




		L 524	L 534	L 538	L 544 2plus2
Tipping load	kg	7005	8625	9000	10600
Bucket capacity	m³	2,0	2,4	2,5	3,0
Operating weight	kg	10100	12100	12380	15300
Engine output	kW/HP	81/110	100/136	100/136	121/165

Wheel Loader




		L 554 2plus2	L 564 2plus2	L 574 2plus2	L 580 2plus2
Tipping load	kg	12270	15285	16690	17850
Bucket capacity	m³	3,5	4,0	4,5	5,0
Operating weight	kg	17300	22450	24220	24740
Engine output	kW/HP	145/198	183/249	195/265	195/265

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Equipment

Basic Machine

	524	534	538
Liebherr travel gear	•	•	•
Ride control	+	+	+
Liebherr shock absorbing element	•	•	•
Automatic travel mode	•	•	•
20 km/h speed limiting	+	+	+
Electronical theft protection	+	+	+
Combined inching-braking system	•	•	•
Multi-disc limited slip differentials in both axles	•	•	•
Air cleaner system with pre-filter	•	•	•
Particle protection for radiator	+	+	+
Reversible fan drive	+	+	+
Emergency steering system	•	•	•
Bio degredable hydraulic oil	+	+	+
Headlights	•	•	•
Tail lights	•	•	•
Working area lights at front	•	•	•
Working area lights at rear	+	+	+
Battery master switch	•	•	•
Pre-heat system for cold starting	•	•	•
Towing hitch	•	•	•
Lockable doors, service flap an engine hood	•	•	•
Toolbox with toolkit	•	•	•
Dust filter system	+	+	+
Protective ventilation system	+	+	+
Amber beacon	+	+	+
Warning device for travel in reverse	+	+	+
Exhaust pipe – special steel	+	+	+
Automatic central lubrication system	+	+	+

Operator's Cab

	524	534	538
Cab with reduced height – 90 mm	+	+	+
Noise-damped ROPS/FOPS cab with tinted safety glass	•	•	•
Joystick steering	+	+	+
Hot-water heater with defroster and recirculated-air system	•	•	•
Adjustable steering column	•	•	•
Liebherr-joystick control	•	•	•
Air conditioning system	+	+	+
Liebherr operator's seat – adjustable in 6 ways	•	•	•
Air sprung operator's seat with seat belt	+	+	+
Sliding window	•	•	•
Emergency exit	•	•	•
Floor mat	•	•	•
Wash/wipe system for windscreen and rear window	•	•	•
Interior rear-view mirror	•	•	•
Sun visor	•	•	•
Bottle holder	•	•	•
Clothes hook	•	•	•
Storage box	•	•	•
Storage compartment	•	•	•
Plug	•	•	•
Ashtray	•	•	•
Horn	•	•	•
Provision for radio including loudspeaker	+	+	+
Radio set	+	+	+
Tool kit	•	•	•
Operator's package	•	•	•

Instruments for:

	524	534	538
Diesel engine pre-heat	•	•	•
Engine oil temperature	•	•	•
Fuel reserve	•	•	•
Timer for hours of operation	•	•	•
Travel speed ranges and gear selected	•	•	•
Forward – reverse travel	•	•	•
Forward travel	•	•	•
Reverse travel	•	•	•
Speedometer	•	•	•
Clock	•	•	•
Safety belt	•	•	•
Flashing turn indicators	•	•	•
High-beam headlights	•	•	•

Warning Lights for:

	524	534	538
Engine oil pressure	•	•	•
Engine overheat	•	•	•
Parking brake	•	•	•
Hydraulic oil temperature	•	•	•
Air cleaner blockage	•	•	•
Battery charge	•	•	•
Flow through emergency steering system	•	•	•
Road travel	•	•	•

Audible Warnings for:

	524	534	538
Engine oil pressure	•	•	•
Engine overheat	•	•	•
Overheat of hydraulic fluid	•	•	•
Emergency steering system	•	•	•

Function Keys for:

	524	534	538
Air conditioning	+	+	+
Hazard warning flashers	•	•	•
Parking brake	•	•	•
Ride control	+	+	+
Automatic bucket positioner	•	•	•
Hoist kick-out	•	•	•
Additional hydraulics	•	•	•
Float position	•	•	•
Headlights	•	•	•
Working lights front	•	•	•
Working lights rear	•	•	•
Road travel	•	•	•
Wash/wipe system for rear window	•	•	•
Amber beacon	•	•	•
Mode switch	•	•	•

Rotary Switches for:

	524	534	538
Blower	•	•	•
Heater	•	•	•
Fresh air or recirculated air	•	•	•

Equipment

	524	534	538
Z-bar linkage	•	•	•
Parallel linkage	•	•	•
Hydraulic servo control of working hydraulics	•	•	•
Automatic bucket positioner – adjustable	•	•	•
Automatic hoist kick out – adjustable	•	•	•
Float position	•	•	•
Loading buckets with and without teeth, or bolt-on cutting edge	+	+	+
High-dump bucket	+	+	+
Light material bucket	+	+	+
Fork carrier and lift forks	+	+	+
Hydraulic quick-change device – Parallel linkage	•	•	•
Hydraulic quick-change device – Z-bar linkage	+	+	+
3rd hydraulic control circuit	+	+	+
3rd and 4th hydraulic control circuits	+	+	+
Comfort control	+	+	+
Country-specific versions	+	+	+

• = Standard, + = Option

All illustrations and data may differ from standard equipment. Subject to change without notice.

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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, too. 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 its 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 100 companies with over 22,000 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

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