

Crawler Tractors

PR 766

Litronic®

Generation

8

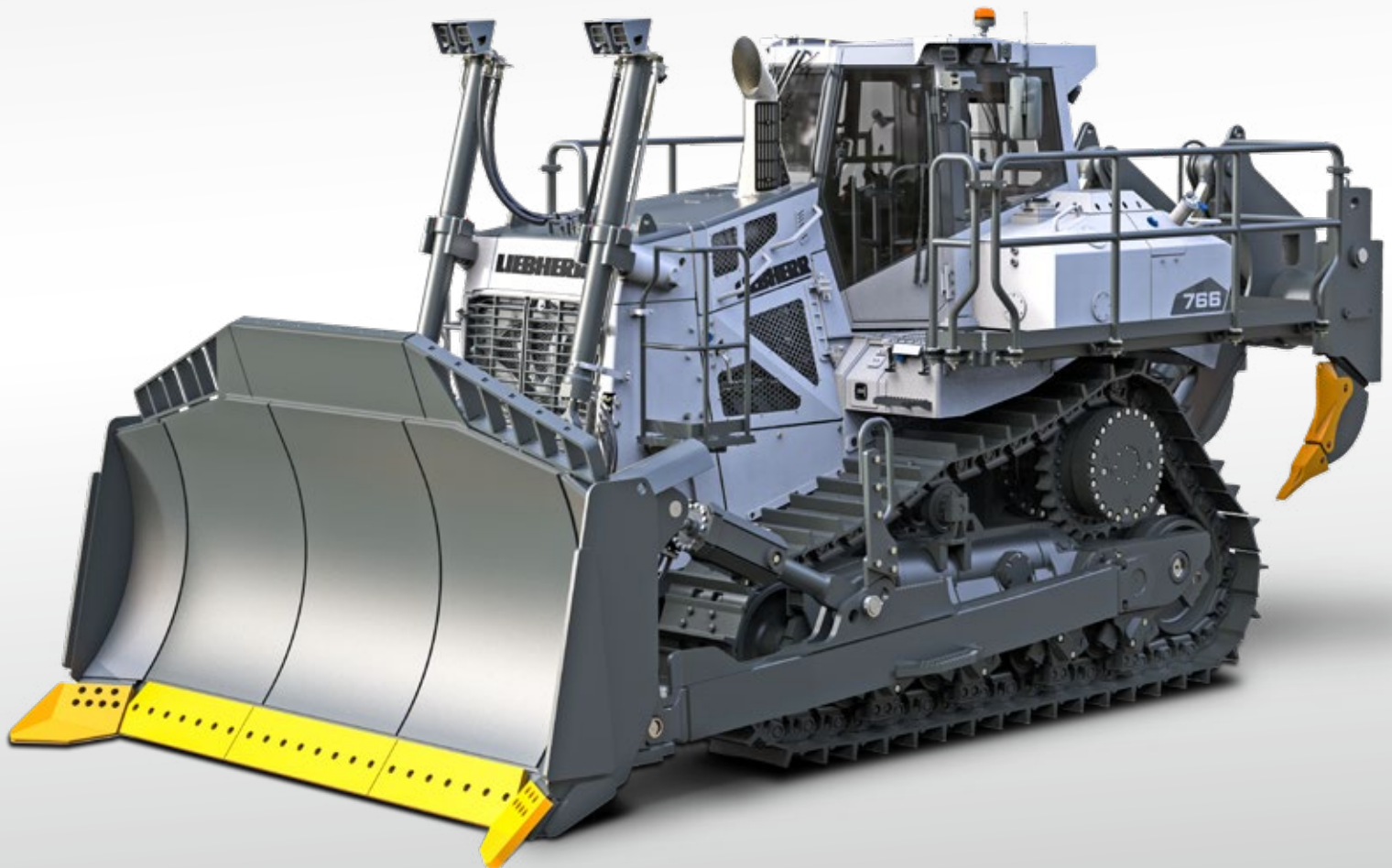
Operating Weight

53,460 – 54,333 kg

Engine Output

310 kW / 422 HP

Stage V / Tier 4f



LIEBHERR

Technical Data



Engine

Liebherr Diesel engine	D 9508 A7 Emission regulations according to 97/68/EC, 2004/26/EC Stage V, EPA/CARB Tier 4f
Rated power (net)	
ISO 9249	310 kW / 422 HP
SAE J1349	310 kW / 416 HP
Maximum power (net)	
ISO 9249	360 kW / 490 HP
SAE J1349	360 kW / 483 HP
Rated speed	1,600 rpm
Displacement	16.2 l / 988 in ³
Design	8 cylinder V-engine, water-cooled, turbocharged, air-to-air intercooler
Injection system	Direct fuel injection, Common Rail, electronic control
Lubrication	Pressurised lube system, engine lubrication guaranteed for inclinations up to 35° (lateral slope) and up to 45° (longitudinal slope)
Operating voltage	24 V
Alternator	140 A
Starter	7.8 kW / 11 HP
Batteries	4 x 95 Ah / 12 V
Air cleaner	Dry-type air cleaner with pre-cleaner, main and safety elements, control light in the operator's cab
Cooling system	Combi radiator, comprising radiators for water and charge air. Hydrostatic fan drive



Hydraulics

Hydraulic system	Load sensing (demand-controlled)
Pump type	Swash plate piston pump
Pump flow max.	352 l/min. / 92.9 gpm
Pressure limitation	280 bar / 4,061 psi
Control valve	2 segments, expandable to 4
Filter system	Return filter with magnetic rod in the hydraulic tank
Control	Single joystick for all blade functions



Travel Drive, Control

Transmission system	Infinitely variable hydrostatic travel drive, independent drive for each track
Travel speed*	Continuously variable
Speed range 1 (reverse):	0 – 4.0 km/h / 2.5 mph (4.5 km/h / 2.8 mph)
Speed range 2 (reverse):	0 – 6.0 km/h / 3.7 mph (8.0 km/h / 4.9 mph)
Speed range 3 (reverse):	0 – 10.5 km/h / 6.8 mph (10.5 km/h / 6.8 mph)
	* Travel speed ranges can be set on the travel joystick (memory function)
Electronic control	The electronic system automatically adjusts travel speed and drawbar pull to match changing load conditions
Steering	Hydrostatic
Service brake	Hydrostatic (self-locking), wear-free
Parking brake	Multi-disk brake, wear-free, automatically applied with neutral joystick position
Cooling system	Hydraulic oil cooler integrated in combi radiator, hydrostatic fan drive
Filter system	Micro cartridge filters in replenishing circuit
Final drive	Combination spur gear with planetary gear, double-sealed (duo cone seals), temperature controlled
Control	Proportional single joystick for all travel and steering functions. Optional: detented Joystick



Operator's Cab

Cab	Resiliently mounted cab with positive pressure ventilation, can be tilted with hand pump 40° to the rear. With integrated ROPS Rollover Protective Structure (EN ISO 3471) and FOPS Falling Objects Protective Structure (EN ISO 3449)
Operator's seat	Air-suspended comfort seat, fully adjustable
Monitoring	Touch screen: display of current machine information, automatic monitoring of operating conditions. Individual setting of machine parameters



Undercarriage

Design	Undercarriage with bogie suspension
Mounting	Via separate pivot shafts and equalizer bar
Track chains	Lubricated, single-grouser shoes, tensioning via a steel spring and grease tensioner
Links, each side	43
Track rollers, each side	8
Carrier rollers, each side	1
Sprocket segments, each side	5
Track shoes, standard	610 mm/24"
Track shoes, optional	710 mm/28" 762 mm/30"
Track shoe type	SESS (Super Extrem Service Shoes)



Sound Levels

Operator sound exposure ISO 6396	
L _{pA} (in the cab)	79 dB(A)
Exterior sound pressure 2000/14/EC	
L _{WA} (to the environment)	114 dB(A)



Refill Capacities

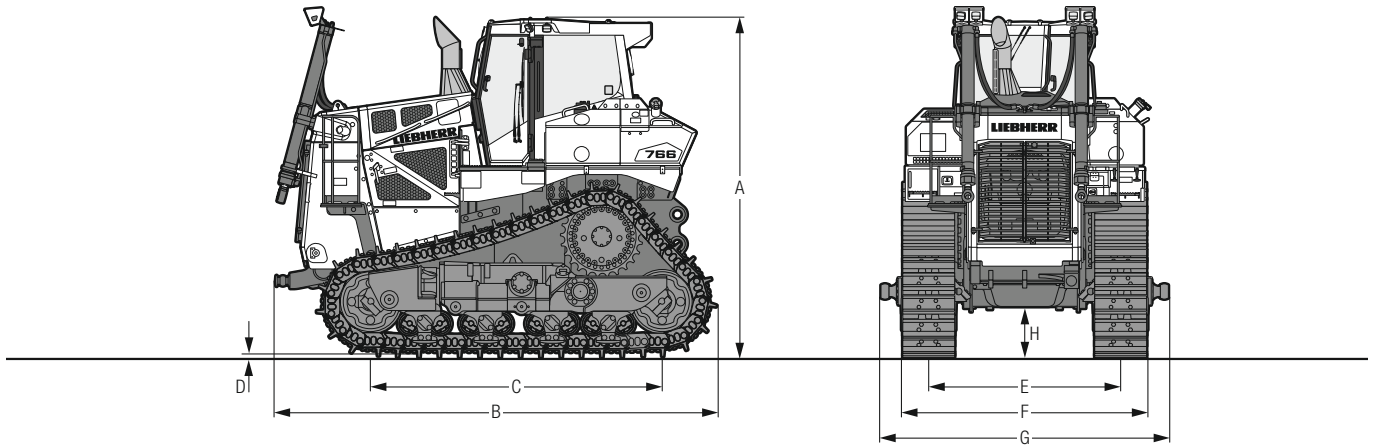
Fuel tank	800 l/253.8 gal
Diesel Exhaust Fluid (DEF) tank	96 l/30.38 gal
Cooling system	98 l/34.6 gal
Engine oil, with filter	65 l/20.7 gal
Hydraulic tank	270 l/85.6 gal
Final drive, each side	36 l/11.4 gal



Drawbar Pull

Max.	694 kN / 156,017 lbf
at 1.5 km/h / 0.9 mph	612 kN / 137,583 lbf
at 3.0 km/h / 1.9 mph	318 kN / 71,489 lbf
at 6.0 km/h / 3.7 mph	157 kN / 35,295 lbf
at 9.0 km/h / 5.6 mph	106 kN / 23,829 lbf

Dimensions

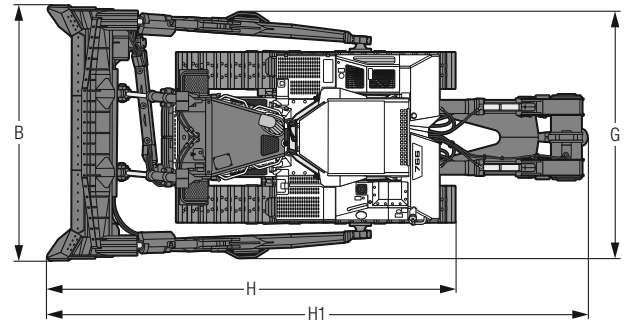
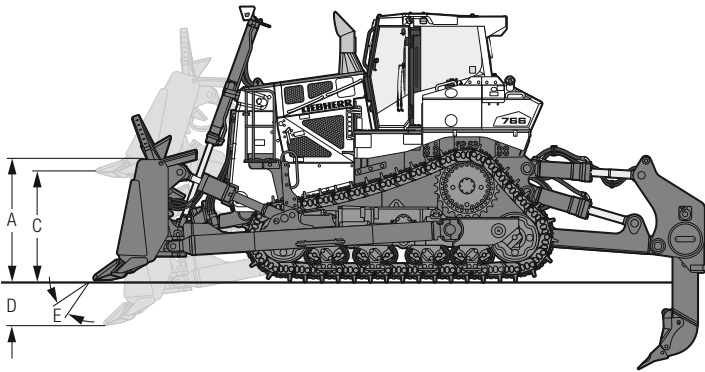


Dimensions

A	Height over cab	mm	3,990
		ft in	13'1"
B	Overall length without attachments	mm	5,215
		ft in	17'1"
C	Length of track on ground	mm	3,448
		ft in	11'3"
D	Height of grousers	mm	84
		ft in	0'3"
H	Ground clearance	mm	604
		ft in	2'
E	Track gauge	mm	2,270
		ft in	7'45"
G	Width over trunnions	mm	3,395
		ft in	11'14"
F	Track shoes 610 mm / 24"		
	Width over tracks	mm/ft in	2,880 / 9'45"
	Tractor shipping weight ¹⁾	kg/lb	40,271 / 88,782
F	Track shoes 710 mm / 28"		
	Width over tracks	mm/ft in	2,980 / 9'78"
	Tractor shipping weight ¹⁾	kg/lb	40,790 / 89,926
F	Track shoes 762 mm / 30"		
	Width over tracks	mm/ft in	3,032 / 9'95"
	Tractor shipping weight ¹⁾	kg/lb	41,078 / 90,561

¹⁾ Including coolant and lubricants, 20 % fuel, ROPS/FOPS cab.

Front Attachments

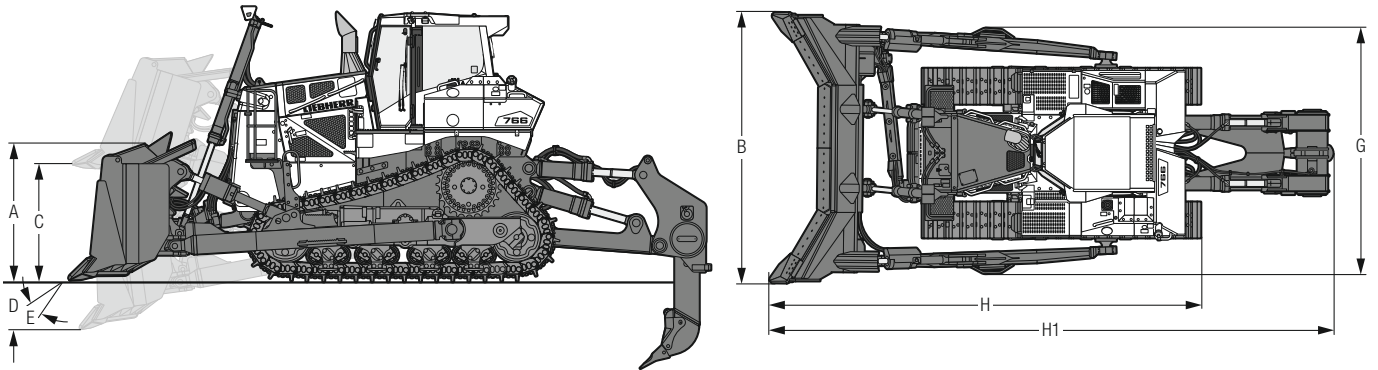


Semi-U-Blade

	Blade capacity, ISO 9246	m³	13,6
		yd³	17,8
A	Height of blade	mm	1,949
		ft in	6'4"
B	Width of blade	mm	4,324
		ft in	14'2"
C	Lifting height	mm	1,473
		ft in	4'8"
D	Digging depth	mm	628
		ft in	2'
E	Blade pitch adjustment		10°
	Max. blade tilt	mm	1,150
		ft in	3'8"
G	Width over push frame	mm	4,165
		ft in	13'7"
H	Overall length, blade straight	mm	6,916
		ft in	22'7"
H1	Overall length, with rear ripper in max. extended position	mm	8,734
		ft in	28'7"
	Track shoes 610 mm / 24"		
	Operating weight ¹⁾	kg / lb	53,460 / 117,859
	Ground pressure ¹⁾	kg/cm² / psi	1.27 / 18,1
	Track shoes 710 mm / 28"		
	Operating weight ¹⁾	kg / lb	53,979 / 119,003
	Ground pressure ¹⁾	kg/cm² / psi	1.10 / 15,7
	Track shoes 762 mm / 30"		
	Operating weight ¹⁾	kg / lb	54,267 / 119,638
	Ground pressure ¹⁾	kg/cm² / psi	1.03 / 14,65

¹⁾ Including coolant and lubricants, 100% fuel, ROPS/FOPS cab, operator, Semi-U-blade.
Specified values refer to machine excluding grouser height.

Front Attachments



U-Blade

	Blade capacity, ISO 9246	m³	17.0
		yd³	22.2
A	Height of blade	mm	1,950
		ft in	6'4"
B	Width of blade	mm	4,590
		ft in	15'1"
C	Lifting height	mm	1,473
		ft in	4'8"
D	Digging depth	mm	628
		ft in	2'1"
E	Blade pitch adjustment		11°
	Max. blade tilt	mm	1,221
		ft in	4'
G	Width over push frame	mm	4,165
		ft in	13'7"
H	Overall length, blade straight	mm	7,301
		ft in	23'9"
H1	Overall length, with rear ripper in max. extended position	mm	9,119
		ft in	29'9"
	Track shoes 610 mm / 24"		
	Operating weight ¹⁾	kg / lb	53,814 / 118,639
	Ground pressure ¹⁾	kg/cm² / psi	1.28 / 18.2
	Track shoes 710 mm / 28"		
	Operating weight ¹⁾	kg / lb	54,333 / 119,783
	Ground pressure ¹⁾	kg/cm² / psi	1.11 / 15.8
	Track shoes 762 mm / 30"		
	Operating weight ¹⁾	kg / lb	54,621 / 120,418
	Ground pressure ¹⁾	kg/cm² / psi	1.04 / 14.78

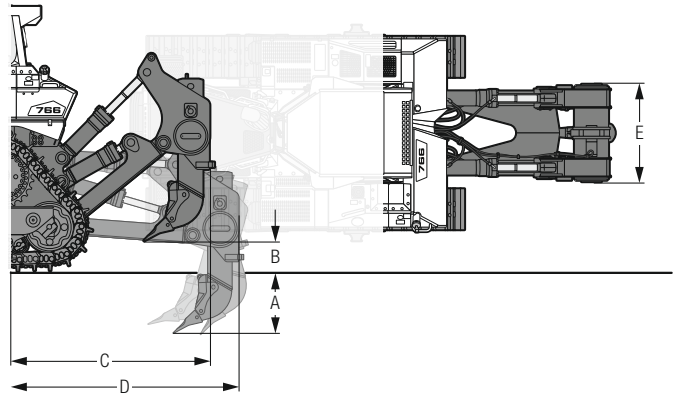
¹⁾ Including coolant and lubricants, 100% fuel, ROPS/FOPS cab, operator, U-blade.
Specified values refer to machine excluding grouser height.

Rear Attachments



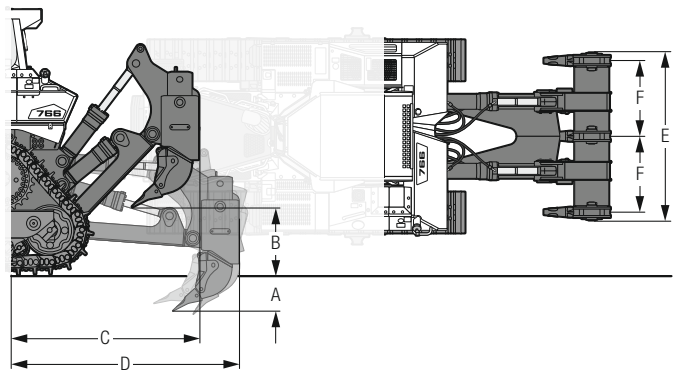
1-Shank Ripper

Parallelogram		hydraulic pitch adjustment	
A Ripping depth (max./min.)	mm	1,375 / 635	
	ft in	4'5" / 2'1"	
B Lifting height (max./min.)	mm	922 / 182	
	ft in	3'0"6"	
C Additional length, attachment raised	mm	1,550	
	ft in	5'1"	
D Additional length, attachment lowered	mm	2,249	
	ft in	7'4"	
E Overall beam width	mm	1,450	
	ft in	4'8"	
F Distance between shanks	mm	-	
	ft in	-	
Max. pitch adjustment		31°	
Maximum penetration force	kN	173	
	lbf	38,891	
Max. pryout force	kN	292	
	lbf	65,644	
Weight	kg	4,823	
	lb	10,632	



3-Shank Ripper

Parallelogram		hydraulic pitch adjustment	
A Ripping depth (max./min.)	mm	975 / 635	
	ft in	3'2" / 2'1"	
B Lifting height (max./min.)	mm	923 / 583	
	ft in	3' / 1'9"	
C Additional length, attachment raised	mm	1,581	
	ft in	5'2"	
D Additional length, attachment lowered	mm	2,180	
	ft in	7'2"	
E Overall beam width	mm	2,494	
	ft in	8'2"	
F Distance between shanks	mm	1,130	
	ft in	3'7"	
Max. pitch adjustment		31°	
Maximum penetration force	kN	186	
	lbf	41,814	
Max. pryout force	kN	292	
	lbf	65,644	
Weight	kg	6,514	
	lb	14,361	



Equipment



Base Machine

Additional hour meter, external	+
Air pre-cleaner Top Air	+
Auto Idle	+
Automatic engine shut-off	+
Battery compartment, lockable	•
Catwalk with hand rail	+
Coal equipment	+
Cold environment equipment	+
Diesel Exhaust Fluid (DEF) tank, lockable	+
Dry type air filter dual step, with pre-filter and automatic dust ejector	•
Engine compartment doors, lockable	•
Fan hinged, front	+
Fan rigid, rear	•
Fan, hydraulically driven	•
Fan, reversible	+
Fire protection wall	+
Fuel pre-filter, with electric heater and water separator	•
Grade control ready kit	1)
Hydraulic oil level control	+
Landfill equipment	+
LiDAT – Data transmission system	•
Liebherr diesel engine emission stage V/Tier 4f	•
Liebherr hydraulic oil, biologically degradable	+
Lugs for crane lifting, front	1)
Lugs for crane lifting, rear	1)
Machine painting Liebherr yellow	•
Quick refuelling	+
Radiator guard, hinged	•
Radiator, heavy duty	•
Radiator, wide-meshed	•
Refuelling pump, electric	+
Special paint scheme	+
Tool equipment basic scope	•
Tool equipment extended scope	+
Towing hitch rear	•
Towing lug front + rear	•
Woodchip equipment	+



Hydraulic System

Blade float function	•
Blade quick drop function	•
Control block for 2 circuits	•
Hydraulic kit for ripper	+
Hydraulic kit for winch	+
Oil filter in hydraulic tank	•
Variable flow pump, load-sensing	•



Travel Drive

Final drives planetary gear	•
Inch brake pedal	•
Load limit control, electronic	•
Parking brake, automatic	•
Travel control, 3 speed ranges	•
Travel drive joystick, detented	+
Travel drive joystick, proportional	•
Travel drive, hydrostatic	•



Operator's Cab

Air-conditioner	•
Armrests 3D adjustable	•
Cab heating	•
Coat hook	•
Dome light	•
Fire extinguisher in the cab	+
Footrest on the right side of the front console	•
Joysticks, longitudinally adjustable	•
Operator's seat Comfort, air-suspended and heated	•
Operator's seat Premium, air-suspended, heated and ventilated	+
Polycarbonate rear-screen	1)
Pressurised cab	•
Radio	+
Radio preparation kit	+
Rear-view camera	•
Rear-view mirror, inside	•
Rear-view mirrors, external	+
ROPS/FOPS integrated	•
Safety glass tinted	•
Seat contact switch	•
Sliding window left	+
Sliding window rear	+
Sliding window right	+
Socket 12 V	+
Stowage compartment, air-conditioned	•
Sunblind all around	•
Touch-controlled colour display	•
Windshield washer system	•
Windshield wipers front, rear, doors, with intermittent function	•

• = Standard

+ = Option

1) on demand at your dealer

Electrical System

4 cold start batteries	•
Access lighting	•
Amber beacon	+
Back-up alarm, acoustic and visual	+
Back-up alarm, acoustic	•
Battery main switch, lockable	•
Emergency stop, in the cab	+
Emergency stop, on ripper	+
Horn	•
Immobiliser, electronic	+
LED working lights	•
LED working lights "High Density" (4.200 lm)	+
Light engine compartment	•
On-board voltage 24 V	•
One additional LED working light on the ripper	+
Two additional LED working lights on the rear of the cab	+

Undercarriage

Additional carrier roller	+
Heavy duty track shoes	•
Oil lubricated idlers and rollers	•
Rollers and idlers, lifetime lubricated	•
Sprocket segments with recesses	+
Sprocket segments, bolted	•
Track guide	•
Track pads with mud holes	+
Tracks, oil-lubricated	•
Two-piece master link	•
Undercarriage with oscillating idlers and rollers (bogie suspension)	•

Attachments Front

Coal-U-blade	+
Hydraulic pitch adjustment	+
Protection for blade pitch cylinder	+
Protection for blade tilt cylinder	+
Rock guard with overflow panel on Semi-U-blade	+
Rock guard with overflow panel on U-blade	+
Semi-U-blade	+
Trash rack on Semi-U and U-blade	+
U-blade	+
Wear plates on push frame	+
Wear plates on Semi-U-blade	+
Wear plates on U-blade	+
Woodchip-U-Blade	1)

Attachments Rear

Counterweight, rear (5,000 kg / 11,023 lb)	+
Drawbar rear, rigid	+
Mounting plate for external equipment	1)
Ripper, 1 shank with hydraulic pin puller	+
Ripper, 3 shanks	+
Winch	1)

• = Standard

+ = Option

1) on demand at your dealer

Standard equipment may vary. Please consult your Liebherr dealer for details.

The Liebherr Group of Companies



Diverse Product Range

The Liebherr Group is one of the largest construction equipment manufacturers in the world. Liebherr's quality products and services hold a high reputation in many industries. 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 superior quality, Liebherr products offer customers the highest benefits in practical applications.

State-of-the-art Technology

Liebherr attributes great importance to the product areas of core technology and components, in order to achieve its consistent, top-quality products. Important modules and components are developed and manufactured in-house, for instance, the entire drive and control technology for the construction equipment and mining trucks.

Worldwide and Family-Owned

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 more than 48,000 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.us

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.

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.

Liebherr USA, Co.

Construction Equipment Division
4800 Chestnut Avenue, Newport News, VA 23607
☎ +1 (757) 240 4250
www.liebherr.us, E-Mail: Construction.USA@liebherr.com
www.facebook.com/LiebherrConstruction