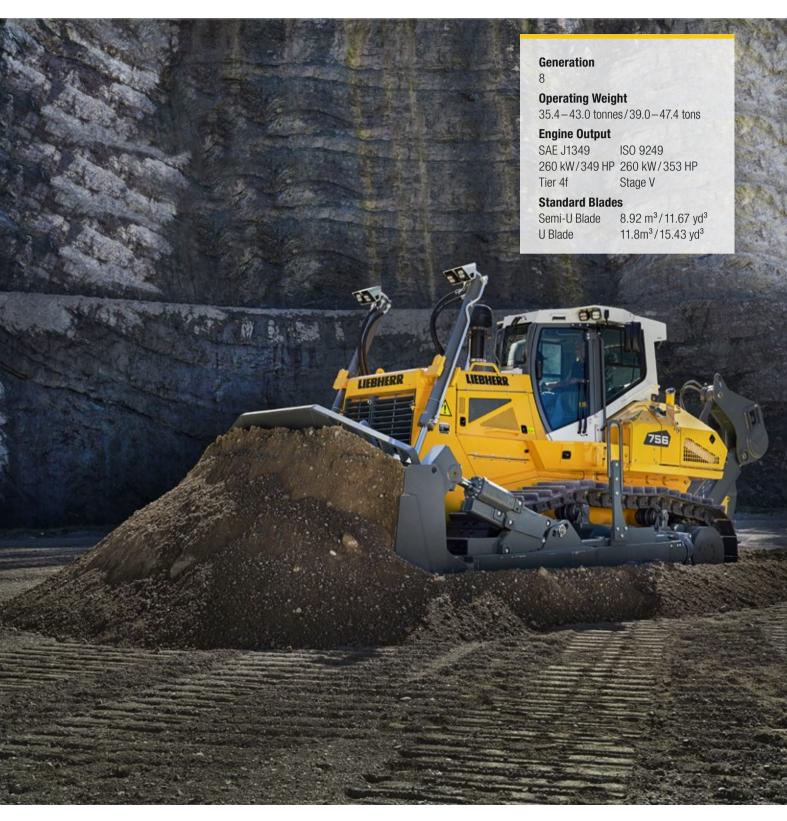
Crawler Tractors



Litronic





Technical Data

Engine	
Liebherr Diesel engine	D 946 A7
	Emission regulations according to
	97/68/EC, stage V, EPA/CARB Tier 4f
Rated power (net)	
ISO 9249	260 kW/353 HP
SAE J1349	260 kW/349 HP
Maximum power (net)	
ISO 9249	275 kW/374 HP
SAE J1349	275 kW/369 HP
Rated speed	1,600 rpm
Displacement	12 I/733 in ³
Design	6 cylinder in-line 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 45°, on all
	sides
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 filter with vacuum indicator and
	automatic dust ejector, main and safety element
Cooling system	Combi radiator, comprising radiators for water
	and charge air. Hydrostatic fan drive.
	and charge air. Hydrostatic fan drive.



Transmission system	Infinitely variable hydrostatic travel drive,
	independent drive for each track
Travel speed*	Continuously variable
Speed range 1:	0 – 4.0 km/h/2.5 mph (forward & reverse)
Speed range 2:	0 – 6.0 km/h/3.7 mph (forward & reverse)
Speed range 3:	0 – 11.0 km/h/6.8 mph (forward & reverse)
	*Travel speed ranges can be set on the travel
	joystick (memory function)
Electronic system	The electronic system automatically adjusts tra-
	vel speed and drawbar pull to match changing
	load conditions
Steering	Hydrostatic
Service brake	Hydrostatic (self-locking), wear-free
Parking brake	Multi-disc brake, wear-free, automatically applied with neutral joystick position
Cooling system	Separate oil cooler, hydraulic fan drive
Filter system	Micro cartridge filter in replenishing circuit
Final drive	Combination spur gear with planetary gear,
	double-sealed (duo cone seals) with temperature
	indicator
Control	Single proportional joystick for all travel and
	steering functions

Hydraulics

Hydraulic system	Load sensing (demand-controlled)			
Pump type	Swash plate piston pump			
Pump flow, max.	256 l/min./67.6 gpm/56.3 lmp.gpm			
Pressure limitation	260 bar/3,770 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			

P Operator's Cab

Cab	Hydro-elastic 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
Vibration emission	
Hand/arm vibrations	<2.5 m/s ² , according with ISO 5349-1:2001
Whole-body vibrations	0.24 - 1.31 m/s ² , complies with technical report
-	ISO/TR 25398:2006
Measuring inaccuracy	According with standard EN 12096:1997

Undercarriage

	Standard	LGP		
Design	Undercarriage with rigid bottom rollers or bogie			
	suspension or osc	illating idler		
Mounting	Via separate pivot	shafts and equalizer bar		
Track chains	Lubricated, single	grouser shoes, tensioning via		
	steel spring and gr	ease tensioner		
Links, each side				
-	44	44		
Track rollers,				
each side	7	7		
Carrier rollers,				
each side	2	2		
Sprocket segments,				
each side	5	5		
Track shoes, standard	610 mm/24"	914 mm/3"		
Track shoes, optional	560 mm/22",	965 mm/3'2"		
	711 mm/28"			

\mathfrak{P} Sound Levels

Operator sound expose ISO 6396	ıre
L _{pA} (in the cab)	75 dB(A)
Exterior sound pressur 2000/14/EC	e
L _{WA} (to the environment)	113 dB(A)

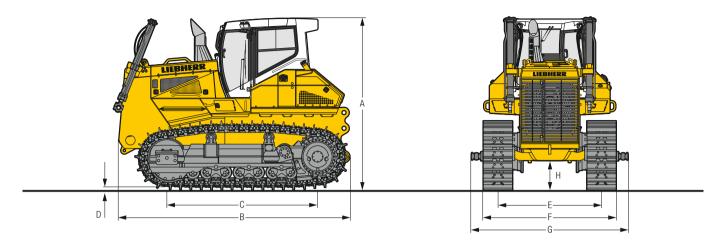
Refill Capacities

Cooling system	55 I/14.5 gal/12.1 Imp.gal
Diesel Exhaust Fluid	
(DEF) tank	80 I/21.1 gal/17.6 Imp.gal
Engine oil, with filters	43 l/11.4 gal/9.5 lmp.gal
Final drive LGP,	
each side	26 l/6.9 gal/5.7 lmp.gal
Final drive Standard,	
each side	20 I/5.3 gal/4.4 Imp.gal
Fuel tank	660 I/174.2 gal/145.2 Imp.gal
Hydraulic tank	129 I/34.1 gal/28.4 Imp.gal
Splitter box	8.5 l/2.2 gal/1.9 lmp.gal

Drawbar Pull

Max.	592 kN
at 1.5 km/h/0.9 mph	522 kN
at 3.0 km/h/1.9 mph	261 kN
at 6.0 km/h/3.7 mph	133 kN
at 9.0 km/h/5.6 mph	89 kN

Dimensions

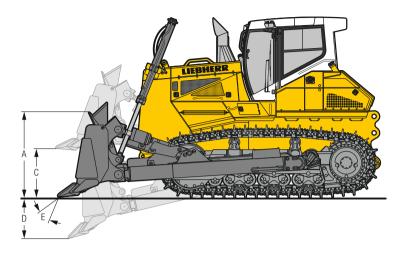


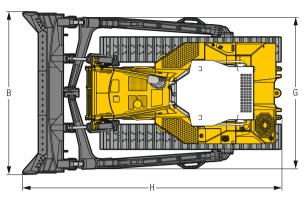
Dimensions

	Undercarriage		Standard rigid bottom rollers	Standard bogie suspension	Standard oscillating idler double bogie suspension	LGP rigid bottom rollers
Α	Height over cab	mm		610	3,610	3,610
	-	ft in	11	'10"	11'10"	11'10"
В	Overall length without attachments	mm	4,	885	4,885	4,885
		ft in	10	5'0"	16'0"	16'0"
C	Length of track on ground	mm	3,	174	3,249	3,174
		ft in	10)'5"	10'8"	10'5"
D	Height of grousers	mm		83	83	83
		in		27"	3.27"	0'3"
Н	Ground clearance	mm		35	644	635
		ft in		11	2'1"	2'1"
Е	Track gauge	mm		180	2,180	2,430
-		ft in		'2"	7'2"	8'
G	Width over trunnions	mm		145	3,145	3,575
_		ft in	11)'4"	10'4"	11'9"
F	Track shoes 560 mm/22"		0 740 (0)	0.740.(0)	0.740/01	
	Width over tracks	mm/ft in	2,740/9'	2,740/9'	2,740/9'	-
_	Tractor shipping weight 1)	kg/lb	29,106/64,168	30,033/66,211	31,067/68,491	
F	Track shoes 610 mm/24"		0 700 /010	0.700 (0)0"	0 700 (010)	
	Width over tracks	mm/ft in	2,790/9'2"	2,790/9'2"	2,790/9'2"	-
-	Tractor shipping weight 1)	kg/lb	29,346/64,697	30,273/66,740	31,307/69,020	
F	Track shoes 711 mm/28"			0.001 /0101	0.001 (0101	
	Width over tracks Tractor shipping weight ¹⁾	mm/ft in	2,891/9'6" 29,823/65,748	2,891/9'6" 30,750/67,792	2,891/9'6" 31,784/70,072	-
F	Track shoes 914 mm/3"	kg/lb	29,023/03,740	30,730767,792	31,784770,072	
г	Width over tracks	mm/ft in				3.344/11'
	Tractor shipping weight ¹⁾	mm/ntin kg/lb	_	_	_	3,344711 30,866768,048
F	Track shoes 965 mm/3'2"	Ky / ID				30,000700,048
r	Width over tracks	mm/ft in	_	_		3,395/11'2"
	Tractor shipping weight ¹⁾	kg/lb	-	_	_	31,343/69,099
) Ie	cluding coolant and lubricants 20% fuel ROPS/FOR	v				51,545709,099

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

Front Attachments



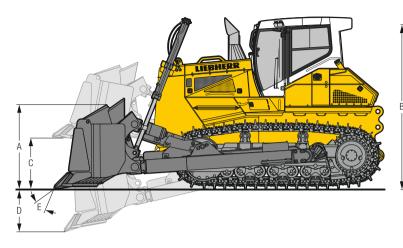


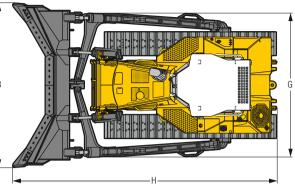
Semi-U Blade

	Undercarriage		Standard rigid bottom rollers	Standard bogie suspension	Standard oscillating idler double bogie suspension	LGP rigid bottom rollers
	Blade capacity, ISO 9246	m ³		92	8.92	9.46
		yd ³	11	.67	11.67	12.37
A	Height of blade	mm	1,6	650	1,650	1,600
		ft in	5	5"	5'5"	5'3"
В	Width of blade	mm	4,0)44	4,044	4,465
		ft in	13	'3"	13'3"	14'8"
C	Lifting height ³⁾	mm	1,3	372	1,381	1,403
		ft in	4	6"	4'6"	4'7"
D	Digging depth ³⁾	mm		70	561	563
		ft in	1'	10"	1'10"	1'10"
Ε	Blade pitch adjustment		1	Э°	10°	2)
	Max. blade tilt	mm		93	993	481
		ft in	3'	3"	1'10"	1'7"
3	Width over push frame	mm	3,7	'67	3,767	4,193
		ft in	12	'4"	12'5"	13'9"
ł	Overall length	mm	6,4	149	6,449	6,452
		ft in	21	'2"	21'2"	21'2"
	Track shoes 560 mm/22"					
	Operating weight 1)	kg/lb	35,388/78,017	36,315/80,061	37,349/81,679	-
	Ground pressure 1)	kg/cm²/psi	0.99/14.08	1.02/14.36	1.05/14.5	
	Track shoes 610 mm/24"					
	Operating weight 1)	kg/lb	35,628/78,546	36,555/79,928	37,589/78,385	-
	Ground pressure 1)	kg/cm²/ psi	0.92/13.08	0.94/13.37	0.97/13.37	
	Track shoes 711 mm/28"					
	Operating weight 1)	kg/lb	36,105/79,598	37,032/80,980	38,066/81,641	-
	Ground pressure 1)	kg/cm²/psi	0.80/11.38	0.82/11.52	0.84/11.66	
	Track shoes 914 mm/3"					07 170 / 01 040
	Operating weight 1)	kg/lb	-	-	_	37,170/81,946
	Ground pressure 1)	kg/cm²/psi				0.64/9.1
	Track shoes 965 mm/3'2"					07 410 /00 475
	Operating weight 1)	kg/lb	-	-	_	37,410/82,475
	Ground pressure 1)	kg/cm ² /psi				0.61/8.67

¹ Including coolant and lubricants, 100% fuel, ROPS/FOPS cab, semi-U blade, operator.
² Mechanical blade pitch adjustment.
³ The indicated dimensions include the height of the grouser shoe.

Front Attachments





U-Blade

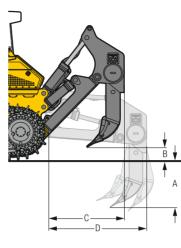
Undercarriage		Standard rigid bottom rollers	Standard bogie suspension	Standard oscillating idler double bogie suspension
Blade capacity, ISO 9246	m ³	11	1.8	11.8
	yd ³	15	.43	15.43
A Height of blade	mm		700	1,700
	ft in	5'	7"	5'7"
B Width of blade	mm	4,2	281	4,281
	ft in	14	·1"	14'1"
C Lifting height ²⁾	mm	1,3		1,370
	ft in	4'	6"	4'6"
D Digging depth ²⁾	mm	50	65	556
	ft in	1''	10"	1'10"
E Blade pitch adjustment		10	0°	10°
Max. blade tilt	mm)52	1,052
	ft in	3'	5"	3'5"
G Width over push frame	mm	3,7	767	3,767
	ft in		"4"	12'4"
H Overall length	mm		372	6,872
	ft in	22	7"	22'7"
Track shoes 560 mm/22"				
Operating weight 1)	kg/lb	35,358/77,951	36,285/79,995	37,319/82,274
Ground pressure 1)	kg/cm²/psi	0.99/14.08	1.02/14.5	1.05/14.93
Track shoes 610 mm/24"				
Operating weight 1)	kg/lb	35,598/78,480	36,525/80,524	37,559/82,803
Ground pressure 1)	kg/cm²/psi	0.92/13.08	0.94/13.37	0.97/13.79
Track shoes 711 mm/28"				
Operating weight 1)	kg/lb	36,075/79,532	37,002/81,575	38,036/83,855
Ground pressure 1)	kg/cm²/psi	0.80/11.38	0.82/11.66	0.84/11.94

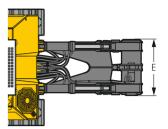
Including coolant and lubricants, 100% fuel, ROPS/FOPS cab, U-Blade, operator.
The indicated dimensions include the height of the grouser shoe.

Rear Attachments

🔰 1-Shank Ripper

	Parallelogram		hydraulic pitch adjustment
A	Ripping depth (max./min.)	mm ft in	1,203/423 3'11"/1'5"
В	Lifting height (max./min.)	mm ft in	1,040/260 3'5"/0'10"
C	Additional length, attachment raised	mm ft in	1,820 6'
D	Additional length, attachment lowered	mm ft in	2,373 7'9"
E	Overall beam width	mm ft in	1,370 4'6"
F	Distance between shanks	mm ft in	_
	Max. pitch adjustment		31°
	Max. penetration force	kN Ibf	123.9 27,854
	Max. pryout force	kN Ibf	208.8 46,940
	Weight	kg Ib	3,638 8,020

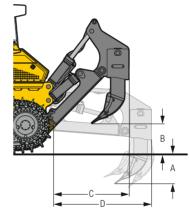


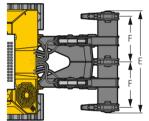


The indicated dimensions include the height of the grouser shoe.

3-Shank Ripper

	Parallelogram		hydraulic pitch adjustment
Α	Ripping depth (max./min.)	mm	796/481
		ft in	2'7"/1'7"
В	Lifting height (max./min.)	mm	982/667
		ft in	3'3"/2'2"
C	Additional length, attachment raised	mm	1,820
		ft in	6'
D	Additional length, attachment lowered	mm	2,373
		ft in	7'9"
Е	Overall beam width	mm	2,434
		ft in	8'
F	Distance between shanks	mm	1,100
		ft in	3'7"
	Max. pitch adjustment		31°
	Max. penetration force	kN	131.8
		lbf	29,630
	Max. pryout force	kN	208.8
		lbf	46,940
	Weight	kg	4,821
		lb	10,628

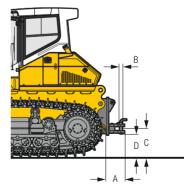


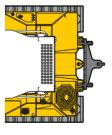


The indicated dimensions include the height of the grouser shoe.

	Drawbar		
		rigid	
Α	Additional length	mm 463	
		ft in 1'6"	
В	Socket pin diameter	mm 60	
		ft in 2.36"	
C	Height of jaw	mm 629	
		ft in 2'1"	
D	Ground clearance	mm 506	
		ft in 1'8"	
	Jaw opening	mm 105	
		ft in 4.13"	
	Weight	kg 576	
	-	Ib 1,270	

The indicated dimensions include the height of the grouser shoe.





Equipment

Additional handle on treadplate	•
Air filter with automatic dust ejector	+
Air filter, dry type, dual step, with pre-filter	•
Air pre-cleaner Sy-Klone	+
Air pre-cleaner Top Air	+
Auto Idle	+
Automatic blade stabilization + inclination control	•
Automatic engine shut-off	+
Battery compartment, lockable	•
Coal arrangement	+
Cold environment arrangement	+
Cooling fan front, hinged	+
Cooling fan, hydraulically driven	•
Cooling fan, reversible	+
DEF tank lockable	•
Engine compartment doors, lockable	•
Engine compartment lighting	•
Forestry arrangement	+
Fuel pre-filter with water separator	•
Fuel pre-filter with water separator heatable	+
Grade control ready kit	1)
LiDAT – Data transmission system	•
Liebherr diesel engine emission stage V/Tier 4f	•
Liebherr hydraulic oil, biologically degradable	+
Radiator, hinged	•
Radiator, wide-meshed	•
Refuelling pump, electric	+
Roof mounted grading system	+
Spade with mounting bracket	+
Special paint scheme	+
Tool kit, basic	•
Tool kit, extended	+
Towing hitch rear	•
Towing lug front	•
Towing lug rear	+
Wastehandling arrangement	+
Woodchip arrangement	1)

Hydraulics System

Automatic lifting of the ripper into the parking position	٠
Blade float function	•
Blade quick drop function	٠
Blade shake feature	•
Control block for 2 circuits	•
Electronic control of working hydraulics	•
Hydraulic kit for ripper	+
Hydraulic kit for winch	+
Hydraulic pitch angle adjustment	+
Oil filter in hydraulic tank	•
Variable flow pump, load-sensing	•

Base Machine

Travel Drive

_	Emergency stop	•
	Final drives planetary gear	٠
	Inching brake pedal	•
	Load limit control, electronic	٠
	Machine-release switch	•
	Parking brake, automatic	٠
	Seat contact switch	•
	Travel control, 3 speed ranges	•
	Travel drive joystick, detented	+
	Travel drive joystick, proportional	٠
	Travel drive, hydrostatic	•

Operator's Cab

Access and exit step lighting	٠
Armrests 3D adjustable	•
Automatic climate control	•
Coat hook	•
Dome light LED	٠
Dust filter system pressurised	+
Fire extinguisher	+
Footrest on the right side of the front console	+
Joysticks, longitudinally adjustable	•
Noise-absorbing cab mounts	•
Operator's seat Comfort, air-suspended with seat heating	٠
Operator's seat Premium, air-suspended with seat heating and cooling	+
Pressurised cab	•
Protective grid for rear window	+
Radio	+
Radio preparation kit	+
Rear-view camera	+
Rear-view mirror, inside	•
Rear-view mirrors, outside	+
ROPS/FOPS integrated	•
Safety glass	٠
Sliding window left	+
Sliding window right	+
Socket 12 V + 24 V	•
Storage nets	+
Stowage compartment, air-conditioned	•
Sun visor, front	+
Tiltable cab	•
Touch-controlled colour display	•
Windshield washer system	•
Windshield wipers front, rear, doors, with intermittent function	•

Equipment

Electric System

1 additional working light on each lift cylinder	+
1 additional working light on ripper	+
1 working light on each lift cylinder	•
2 additional working light on the cab, rear	+
2 batteries cold start	•
2 working lights on the cab, rear	•
4 working light on the cab, front	•
All working lights in LED version	+
Amber beacon	+
Back-up alarm with broadband signal	+
Back-up alarm with broadband singal and visual	+
Back-up alarm, acoustic	+
Back-up alarm, acoustic and visual	+
Battery main switch	•
Battery main switch, lockable	+
Horn	•
Immobiliser, electronic	+
On-board voltage 24 V	•

Undercarriage

	Master link, two-piece	•
	Sprocket segments with recesses	+
	Sprocket segments, bolted	٠
	Track frame, closed	٠
	Track guard, full length	+
	Track guide centre part	+
Ì	Track guide, front and rear	•
	Track pads with mud holes ²⁾	+
	Track shoes, heavy duty	٠
	Tracks, oil-lubricated	•
	Undercarriage LGP	+
	Undercarriage standard	+
	Undercarriage with bogie suspension	+
	Undercarriage with double bogie supension and oscillating idlers	+
	Undercarriage with rigid bottom rollers	٠

Front Attachments

Mechanical angle blade	+
Semi-U blade	+
Spill plate	+
Trash rack	+
U blade	+
Wear plates on push frame	+
Wear plates on semi-U blade	+

₿≓ _{Re}

Rear Attachments	
Counterweight, rear (4,000 kg/8,818 lb)	+
Drawbar rear, rigid	+
Mounting plate for third-party equipment	+
Ripper, 1 shank with pin puller	+
Ripper, 3 shank	+
Winch	+

• = Standard

+ = Option
²⁾ available track shoes on demand at your dealer

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

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

<u> WARNING</u>

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.



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.

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