

VOLVO COMPACT WHEEL LOADER

L35B



- Gross Power:
SAE J1995 57/77 kW/hp
Net Power:
SAE J1349 55/75 kW/hp
- Operating Weight:
5,9 - 6,0 t - Z-bar linkage
6,1 - 6,3 t - TP-linkage
- Bucket Capacities:
1,05 - 1,6 m³ - Z-bar linkage
1,0 - 1,6 m³ - TP-linkage
- High-performance, low environmental impact diesel engine: quiet, low emissions, economical fuel consumption.
- Hydrostatic drive with significant advantages:
 - Easy to operate due to automatic drive facility.
 - Maintains high drawbar pull even when working hydraulics are engaged.
 - Advantageous hydrostatic brakes, wear-free and safe.
- A choice of two powerful loader linkages, both with excellent capacity in pallet handling and bucket applications.
- Operator-selected 100% differential lock on both axles to give optimum traction.
- Standard hydraulic quick-change coupling:
Various tried-and-tested attachments for a wide range of applications.
- Purpose designed cab comfort:
 - Electronic Information System.
 - Multi-function lever.

VOLVO

A wheel loader of the compact class from Volvo

Compact wheel loader L35B



First-class operator comfort

Mount your new Volvo loader and start into a successful work day. Your compact machine from Volvo makes it easy for you. Its spacious, comfortable cabin is entirely designed for precise and fatigue free work: excellent air conditioning, adjustable operator's seat and individually adjustable steering column. Clearly arranged dash board with supporting electronics (Electronic Information System).

Innovative Design

The new Volvo wheel loaders are something to be proud of. Their unmistakable rounded silhouette is pointing the way for a completely new generation of construction equipment. The attractive appearance is combined with function: Rounded rear section and 3-D-panorama cabin with extremely narrow frame parts enable an all-round view which has never before been achieved - for additional safety at work. With their compact dimensions and the selectable 100% differential lock these machines can easily cope with difficult terrain.



Uncompromising performance

Well-proven technology, high quality components and a well thought-out design: engine and central maintenance points in a service-friendly transverse arrangement. Powerful Z-bar loader linkage with excellent lifting capacities and breakout forces. Durable hydrostatic travel drive for constant power. Strong diesel engines with high power reserves. Exemplary environmental features: excellent fuel economy, operation with low exhaust and reduced noise emissions.



1 Membrane key pad with symbols and integrated LEDs

- Entry and retrieval of basic operating data
- Functional keys for various operating functions
- Anti-theft function via numeric code

3 6-digit LED-display

- Indication of operating data

2 Colour-coded LED-illuminated symbols

- as controls
- as warning symbols combined with acoustic signal

4 Analog LED-information

- Fuel level
- Engine temperature
- Drive system oil temperature



Z-bar loader linkage with high lifting capacity and breakout force.

TP loader linkage with strong restraining forces even in high lifting positions.



Non stop operation

Don't forget your breaks. Otherwise it may easily happen that you are on the go around the clock. Because there is always something to do for a real Volvo allrounder: in the morning with a bucket, at noon with the loading fork, in the afternoon with the road sweeper. Or with another one of the more than 60 attachments, with which you can convert your compact Volvo to your individual needs. With hardly any loss of time, because the hydraulic quick change system is standard on all machines.





ENGINE

Engine: Volvo in-line 4-cylinder, 4 stroke, direct injection diesel engine with turbocharging, oil/air cooled.

Air cleaning:

1. Paper filter with indicator in cab
2. Safety filter

Engine	D3DCEE2
Gross power @	2600 r/min
SAE J1995	57 kW
SAE J1995	77 hp
Net power @	2600 r/min
SAE J1349 - DIN ISO 1585	55 kW
SAE J1349 - DIN ISO 1585	75 hp
Max. torque @	1600 r/min
SAE J1349 netto	241 Nm
DIN ISO 1585	241 Nm
Cubic capacity	3,11 l
Bore	94 mm
Stroke	112 mm



ELECTRICAL SYSTEM

Rated voltage	12 V
Battery voltage	12 V
Battery capacity	88 Ah
Alternator rating	1120/80 W/A
Starter motor output	2,2 kW



DRIVETRAIN

Transmission: hydrostatic transmission, full power shift under load, both when changing direction (forward and reverse) and between ranges. Maximum drawbar force can be achieved in all ranges. «Inch/brake pedal» for variable machine speed control and power transfer to bucket hydraulics at constant engine rpm. Multi-function lever for change of direction, differential lock and use of the servo-control.

Axles: all-wheel drive by two rigid portal axles.

Differential locks: hydraulically actuated 100% differential locks in both axles.

Frame: solid front and rear frame, robot-welded. Articulating oscillating joint for optimum manoeuvrability and traction.

Oscillation at wheel, max.	270 mm
Track	1532 mm
Angle of oscillation	±10°
Tires: Size	405/70 R20
Rim	13 x 20

Speed, max.:	Standard	High Speed
1st range forward/reverse	6,0 km/h	8,0 km/h
2nd range forward/reverse	20,0 km/h	30,0 km/h



SERVICE FILL CAPACITIES

Engine	10,5 l
Fuel tank	86,0 l
Front axle, total	11,0 l
Rear axle,	
incl. drop-box	12,0 l
Hydraulic tank, incl. hydraulic system	65,0 l



BRAKING SYSTEM

Service brake: reliable dual braking system, acting upon all four wheels.

1. Wear-free, hydrostatic inching brake
2. Central friction brake, actuated via «inch/brake pedal».
First stage of pedal application actuates the inching facility, the last third of pedal application applies the central friction brake.

Parking brake: central drum brake, acting upon all four wheels.



HYDRAULIC SYSTEM

Thermostatically controlled oil circuit with integrated cooling system.

Hydraulic control valve: Servo-controlled, double acting control valve three spool system, with primary and secondary pressure valves.

1. Lifting function
2. Tilting function
3. Additional function for hydraulic QC
Unlock, neutral, lock
Preparation for operating hydraulic attachments with this function is available as an option.

Hydraulic oil filter: Combined suction and return-filtration cartridge with a 10 µm filter.

The filter can be replaced without emptying the hydraulic oil tank.

Hydraulic pump: gear type-pump

Hydraulic pump	
Flow	73 l/min
@ engine rpm	2600 r/min
Relief valve pressure	23 MPa



STEERING

Hydrostatic steering. Central articulating-ocillating joint with damping effect.

Steering pump: gear-type pump

Steering cylinder: 1 double-acting steering cylinder

Steering	
Angle of articulation	±40°
Steering pump	
Flow	29 l/min
@ engine rpm	2600 r/min
Relief valve pressure	18,5 MPa



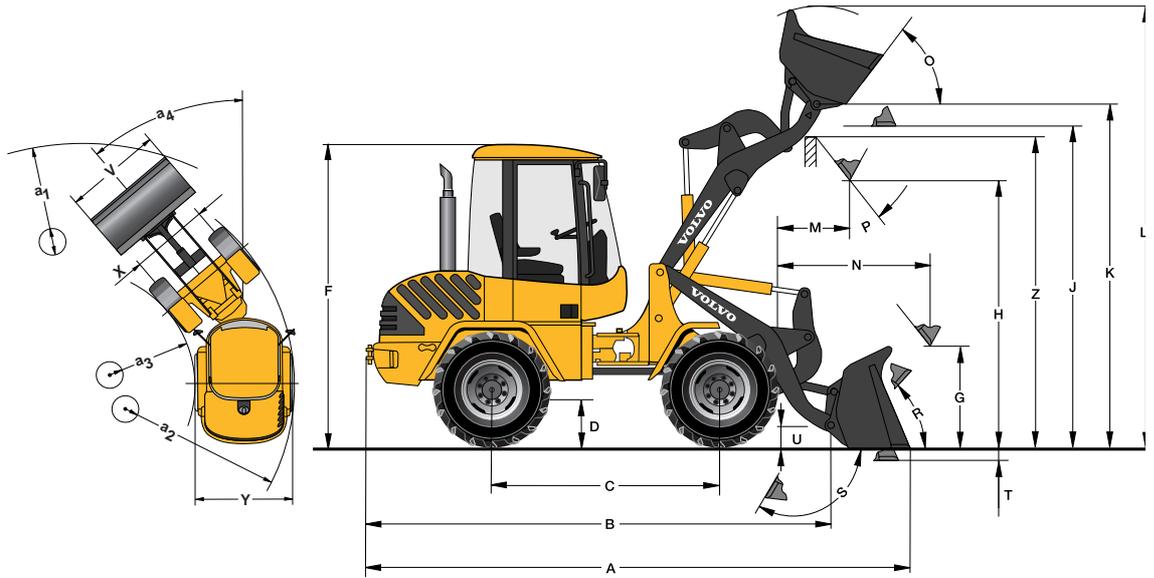
LINKAGE

Linkage system:	Z	TP
Lift cylinders	2	2
Tilt cylinders	1	1

Lift time (loaded)	5,5 s	6,5 s
Lowering time (empty)	3,5 s	4,0 s
Dump time	1,2 s	2,0 s
Crowd time	1,5 s	2,5 s

DIMENSIONS • Z-BAR LINKAGE

L35B with Z-bar linkage, Z-attachment carrier and 405/70 R20 tires		
B	4505	mm
C	2150	mm
D	445	mm
F	2715	mm
G	900	mm
J	3115	mm
K	3315	mm
O	66	°
P	45	°
R	50	°
S	135	°
U	200	mm
X	1532	mm
Y	1932	mm
Z	3020	mm
a ₂	3960	mm
a ₃	1980	mm
a ₄	±40	°



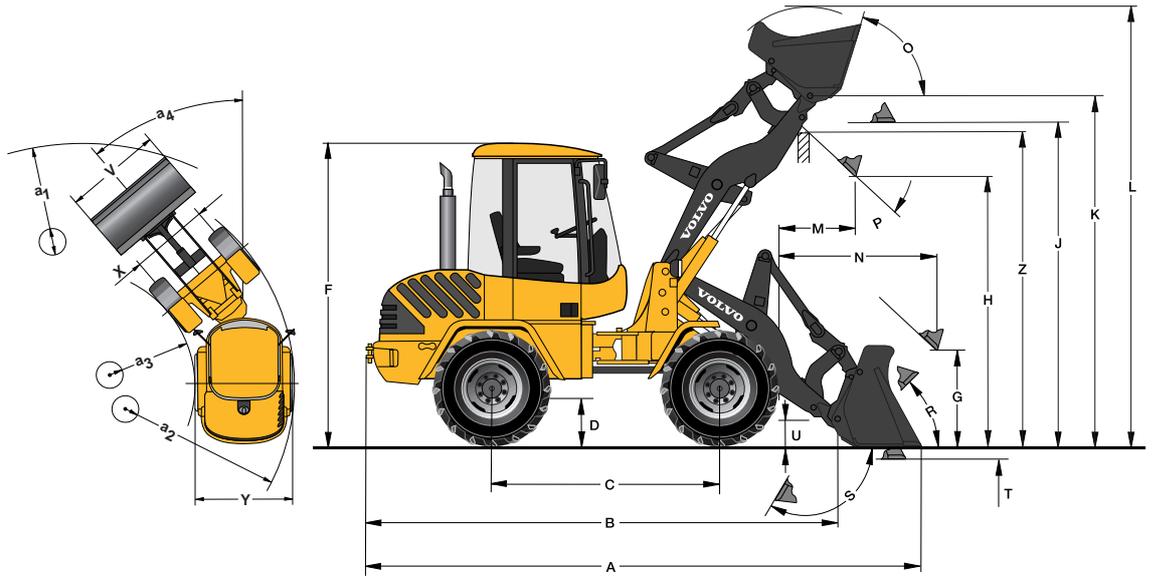
OPERATING DATA • Z-BAR LINKAGE

Data according to bucket type		General Purpose		Light Material		4-in-1	High-Tip
L35B with Z-bar linkage, Z-attachment carrier and 405/70 R20 tires							
Capacity heaped	m ³	1,05	1,2	1,4	1,6	1,0	1,5
Material density	kg/m ³	1800	1600	1300	1100	1800	1100
Static tipping load, straight (ISO / DIS)	kg	4450	4350	4300	4200	4100	3800
Static tipping load, full turn 40° (ISO / DIS)	kg	3950	3880	3800	3700	3650	3350
Hydraulic lifting capacity, max.	kN	55,0	53,5	52,5	51,5	51,0	46,5
Breakout force	kN	55,0	48,0	42,5	39,5	48,0	-
A Total length	mm	5300	5400	5510	5570	5400	5760
L Lift height, max.	mm	4270	4320	4400	4480	4240	5180
V Bucket width	mm	2000	2000	2000	2100	2000	2000
a ₁ Clearance circle	mm	8670	8750	8810	8950	8740	8970
T Digging depth	mm	125	125	125	125	130	125
H Dump height	mm	2640	2560	2480	2440	2540	3800
M Reach at max. height	mm	750	810	880	920	780	1040
N Reach, max.	mm	1570	1630	1700	1740	1600	2260
Operating weight	kg	5900	5930	5940	5980	6100	6240

Data with Loading Fork Centre of gravity 500 mm		L35B - Possible machine variations		
		Linkage/attach. carrier	Standard	High speed
Tipping load, full turn (ISO / DIS)	kg	3090	●	●
Payload according to EN 474-3, 60/80%	kg	1850/2450	—	●
Payload 80%, transport position, 40° full turn	kg	2500	—	●
		Z-bar / Z	●	●
		TP / Z	—	●
		TP / V	—	●

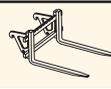
DIMENSIONS • TPZ-LINKAGE

L35B with TP-Linkage, Z-attachment carrier and 405/70 R20 tires		
B	4455	mm
C	2150	mm
D	445	mm
F	2715	mm
G	900	mm
J	3100	mm
K	3350	mm
O	63	°
P	45	°
R	50	°
S	58	°
U	250	mm
X	1532	mm
Y	1932	mm
Z	3020	mm
a ₂	3960	mm
a ₃	1980	mm
a ₄	±40	°



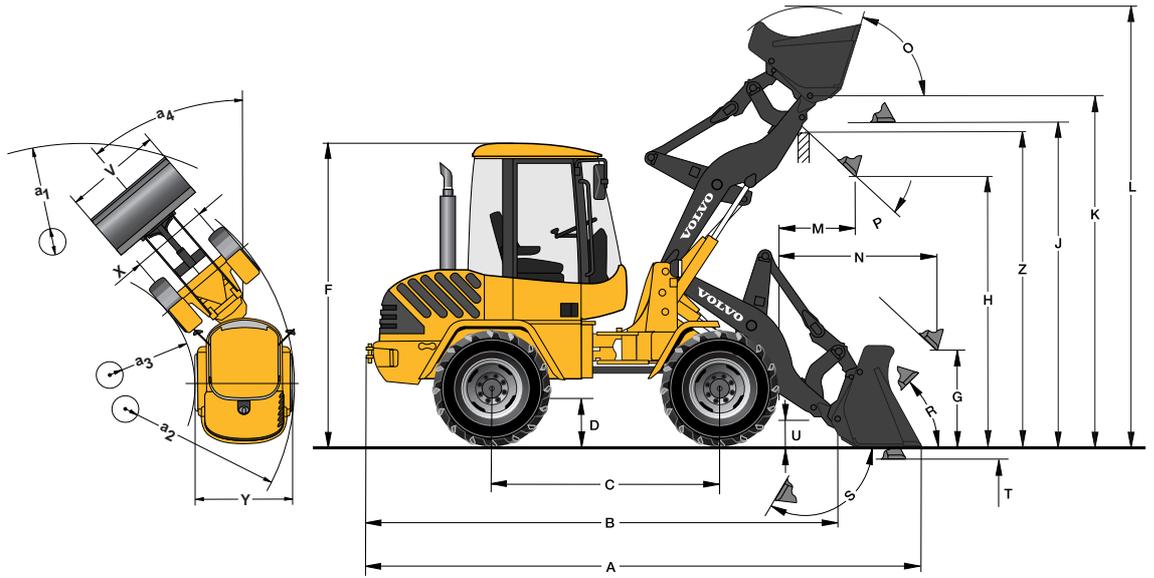
OPERATING DATA • TPZ-LINKAGE

Data according to bucket type		General Purpose		Light Material		4-in-1	High-Tip
L35B with TP-Linkage, Z-attachment carrier and 405/70 R20 tires							
Capacity heaped	m ³	1,0	1,2	1,4	1,6	0,9	1,5
Material density	kg/m ³	1800	1500	1200	1000	1900	1000
Static tipping load, straight (ISO / DIS)	kg	4200	4150	4050	3950	3900	3540
Static tipping load, full turn 40° (ISO / DIS)	kg	3700	3650	3600	3500	3450	3100
Hydraulic lifting capacity, max.	kN	52,0	51,0	49,5	48,5	49,0	43,5
Breakout force	kN	57,7	50,7	45,0	42,0	54,7	-
A Total length	mm	5280	5380	5485	5550	5320	5800
L Lift height, max.	mm	4290	4330	4440	4495	4200	5240
V Bucket width	mm	2000	2000	2000	2100	2000	2000
a ₁ Clearance circle	mm	8670	8730	8800	8930	8700	9000
T Digging depth	mm	90	90	90	90	90	90
H Dump height	mm	2610	2535	2460	2410	2560	3860
M Reach at max. height	mm	725	785	855	905	715	1135
N Reach, max.	mm	1545	1605	1675	1720	1535	2330
Operating weight	kg	6100	6120	6150	6185	6285	6435

Data with Loading Fork Centre of gravity 500 mm		L35B - Possible machine variations		
		Linkage/attach. carrier	Standard	High speed
Tipping load, full turn (ISO / DIS)	kg	2930	—	●
Payload according to EN 474-3, 60/80%	kg	1750/2300	—	●
Payload 80%, transport position, 40° full turn	kg	2500	●	●

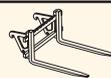
DIMENSIONS • TPV-LINKAGE

L35B with TP-Linkage, V-attachment carrier and 405/70 R20 tires		
B	4455	mm
C	2150	mm
D	445	mm
F	2715	mm
G	850	mm
J	3100	mm
K	3350	mm
O	63	°
P	45	°
R	50	°
S	58	°
U	250	mm
X	1532	mm
Y	1932	mm
Z	3100	mm
a ₂	3960	mm
a ₃	1980	mm
a ₄	±40	°



OPERATING DATA • TPV-LINKAGE

Data according to bucket type		General Purpose		Light Material		4-in-1	High-Tip
L35B with TP-Linkage, V-attachment carrier and 405/70 R20 tires							
Capacity heaped	m ³	1,0	1,2	1,4	1,6	0,9	1,5
Material density	kg/m ³	1800	1400	1200	1000	1800	900
Static tipping load, straight (ISO / DIS)	kg	4050	3900	3850	3800	3750	3350
Static tipping load, full turn 40° (ISO / DIS)	kg	3600	3450	3400	3350	3300	2950
Hydraulic lifting capacity, max.	kN	47,5	46,0	45,0	44,5	44,5	40,5
Breakout force	kN	50,5	45,0	40,4	38,2	48,0	-
A Total length	mm	5380	5480	5585	5650	5415	5890
L Lift height, max.	mm	4250	4390	4500	4560	4260	5340
V Bucket width	mm	2000	2000	2000	2100	2000	2000
a ₁ Clearance circle	mm	8730	8800	8860	9000	8760	9100
T Digging depth	mm	85	85	85	85	85	85
H Dump height	mm	2550	2470	2390	2350	2490	3950
M Reach at max. height	mm	800	855	925	970	785	1200
N Reach, max.	mm	1620	1675	1745	1790	1600	2435
Operating weight	kg	6200	6240	6250	6285	6390	6535

Data with Loading Fork Centre of gravity 500 mm		L35B - Possible machine variations		
		Linkage/attach. carrier	Standard	High speed
Tipping load, full turn (ISO / DIS)	kg	2750	—	●
Payload according to EN 474-3, 60/80%	kg	1650/2200	—	●
Payload 80%, transport position, 40° full turn	kg	2500	●	●

STANDARD EQUIPMENT

<p>Engine Diesel engine, direct fuel injection Extra fuel filter Cold start aid Dry-type air filter</p> <p>Electrical System Alternator 80 A</p> <p>Lighting: Main head lights (halogen) full/dipped/asymmetrical Working lights (2 front/1 rear) Parking lights Rear lights Brake lights Direction indicators Hazard warning lights Reversing lights Cab lighting</p> <p>Instrumentation & controls: Multi-function lever 12 Volt accessories socket Horn Hazard warning switch Safety start</p> <p>Electronic Information System: Analog LED-information for: Fuel level Engine temperature Drive system oil temperature LED-illuminated symbols (colour-coded) for: Direction (forward/reverse) Indicators (left/right) Pre-heater</p>	<p>Main beam Differential locks Boom arm suspension system (option) Loading fork operation (option) LED-illuminated symbols (red) with acoustic signal for: Parking brake Air filter restriction Drive system oil temperature Engine temperature Engine oil pressure Battery charging Return filter Touch pad with symbols and integrated LEDs for: Parking lights Working lights (front/rear) Windscreen wiper (rear) Rotating beacon (option) Boom arm suspension system on/off (option) Locking and activation of Volvo -attachment carrier (option) Activation of multi-function lever for directional change Digital LED display activated by dual function keys for: Entry and retrieval of opera- ting and service information Anti-theft function control</p> <p>Drivetrain Hydrostatic drive Operator-selected 100% differential locks</p> <p>Tires 405/70 R20</p>	<p>Hydraulic System Gear-type pump Control valve three-spool system 3rd hydraulic circuit</p> <p>Service and Maintenance Tool kit Wheel nut wrench</p> <p>Cab, Exterior ROPS/FOPS-cab with flexible mountings Walk-through cab Lockable doors All-round tinted safety glass Windscreen wiper (front/rear) Windscreen washer (front/rear) Sliding window in the left door Door stops External rear view mirrors (right/left)</p> <p>Cab, Interior 4-way adjustable operator's seat Adjustable steering column Seat belt Sunvisor Heater with air-filter and defroster (front/rear) Cab ventilation Preparation for an optional air- conditioner Storage box in the cab</p> <p>Working Equipment Bucket level indicator</p>	<p>Hydraulic quick-change attachment carrier</p> <p>Carriage Body Fenders and mudguards, (front/rear) Lockable engine hood Vertical exhaust Towing device Lifting eyes</p> <p>International Standards for Machines and Production Quality: DIN/ISO 9001 Safety: CE - Criterion Machine guide-lines 98/37/EC ROPS ISO 3471 FOPS ISO 3449 Operating weight ISO 7131 Tipping load / Payload: ISO/DIS 14397-1 EMV (Electromagnetic Compatibility) 89/336/EEC plus supplement Environment: DIN/ISO 14001 Sound insulation: 2000/14/EC</p>
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OPTIONAL EQUIPMENT

<p>Engine Pre-heater Pre cleaner air filter (Turbo II) Oil bath air filter Exhaust particle filter</p> <p>Hydraulics Hydraulic couplings for 3rd hydraulic circuit</p>	<p>4th hydraulic circuit Additional pump</p> <p>Cab Handthrottle Hand control inch valve Airconditioner Radio Working light (1 rear, left)</p>	<p>Air suspension operator's seat</p> <p>Working Equipment Boom arm suspension system</p> <p>Environment Biodegradable hydraulic oil Low-noise kit</p>	<p>Safety Anti-theft system Protective guards for: Main head lights Working lights Rear lights Rotating beacon Audible reverse alarm</p>
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ATTACHMENTS

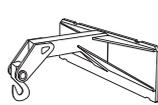
A small selection of the most popular attachments.
Further buckets and attachments available on request.



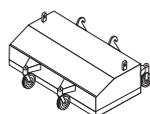
Loading
Fork



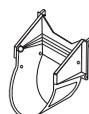
4-in-1
Bucket



Material Handling
Arm



Sweeper



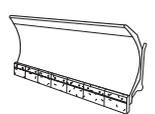
Tree Transplanting
Bucket



Side-Tip
Bucket



Hay/Manure
Fork



Snow
Plow

Under our policy of continuous product improvement, we reserve the right to change specifications and design without prior notice. The illustrations do not necessarily show the standard version of the machine.

VOLVO

Construction Equipment

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