

VOLVO

G 88 4x2



MAXIMUM GROSS VEHICLE WEIGHT
15,000 kg (15 tons)
MAXIMUM GROSS COMBINATION WEIGHT
32,000 kg (32 tons)

STANDARD EQUIPMENT

AXLE, FRONT

6,500 kg (14,330 lb.) capacity drop forged special steel.

AXLE, REAR

13,000 kg (28,660 lb.) capacity Volvo axle. Double reduction 4.9, 5.4:1 ratios. Diff. lock.

BRAKES, PARKING

Air operated spring brake operating directly on driving wheels.

BRAKES, SERVICE

Air operated with 3 separate circuits for the driving wheels, front wheels and trailer wheels. Separate hand control for trailer wheels.

Air compressor: 280 litres/min @ 7 kg/cm²
(10 cu. ft./min @ 100 lb./sq. in.)

Tank capacity: 110 litres (3.7 cu. ft.)

Working pressure: 7-8 kg/cm² (100-114 lb./sq. in.)

Brake lining area: 4685 cm² (727 sq. in.)

Foot switch operated exhaust brake.

CAB

All steel tilt cab, insulated with sleeper bunk (long cab), two piece laminated wind screen, two Bostrom sprung, adjustable seats. Thermostat-controlled heater/demister, opening quarter vents and roof vent. Variable speed wipers and washers.

Instruments: speedometer, odometer, tachometer, fuel, oil pressure, temperature and air pressure gauges.

Warning lamps for: beam, charge rate, indicators, oil pressure, temperature, air pressure, diff. lock, park brake, P.T.O. engagement.

Choice of four colours or primer.

Impact tested with non-burst doors.

Rear cab suspension is by rubber springs and hydraulic shock absorbers

CLUTCH

420 mm (16.5") single dry plate with torsion damping springs. Hydraulic control with air servo.

Lining area: 2010 cm² (312 sq. in.)

ELECTRICAL SYSTEM

12/24 Volt with alternator.

Four 107 amp/hr 6V batteries, total 214 AH.

4.5 kW (6hp) starter motor.

ENGINE

TD 100 A 6 cyl. turbo charged diesel 121 x 140 mm (4.75" x 5.51") bore x stroke 9.6 litre (586 cu. in.) capacity, 4 stroke.

Power: 190 kW (260 bhp) (DIN) @ 2,200 rpm.

Torque: 940 Nm (716 lb. ft.) (DIN) @ 1,300 rpm.

15:1 compression ratio. RAC rating: 53 hp.

Six individual, interchangeable heads.

Donaldson Cyclopac air cleaner and stackpipe.

FRAME

Pressed steel channel, 864 mm (34") wide, 241 x 86 mm (9.5" x 3.4") section.

9.5 mm (0.37") material thickness.

FUEL SYSTEM

Dual 320 litre (70 gall.) tanks. Mechanical fuel pump.

STEERING

Recirculating ball and nut type, with built-in servo unit.

Approx. 3.7 turns lock to lock.

Steering wheel diameter: 500 mm (20").

SUSPENSION, FRONT

Semi-elliptical leaf springs, 1,400 mm x 102 mm (54" x 4").

Double acting hydraulic shock absorbers and Aeon rubber springs.

SUSPENSION, REAR

Volvo 4 point chassis mounted combination main/helper semi-elliptic leaf springs with Aeon rubber springs.

TRANSMISSION

Volvo SR 61 fully synchromesh gearbox. Basic 8 speed range change unit with splitter section giving 16 forward speeds. High-low range change by toggle switch on gear lever. Splitter section controlled by switch on console.

Gear ratios:

1st	11.22/9.46:1
2nd	7.84/6.61:1
3rd	5.50/4.64:1
4th	3.93/3.31:1
5th	2.86/2.41:1
6th	2.00/1.68:1
7th	1.40/1.18:1
8th	1.00/0.84:1
Reverse	10.29/8.67:1

WHEELS AND TYRES

(11) American spoke, cast wheels: 7.5" x 20"

(11) Conventional tyres: 10.00" x 20" 12 ply.

OPTIONAL EQUIPMENT

Hydraulic cab tilt.
R61 gearbox (8 speed synchromesh)
Short cab (no sleeper bunk)
14" twin dry plate clutch
Aluminium fuel tanks

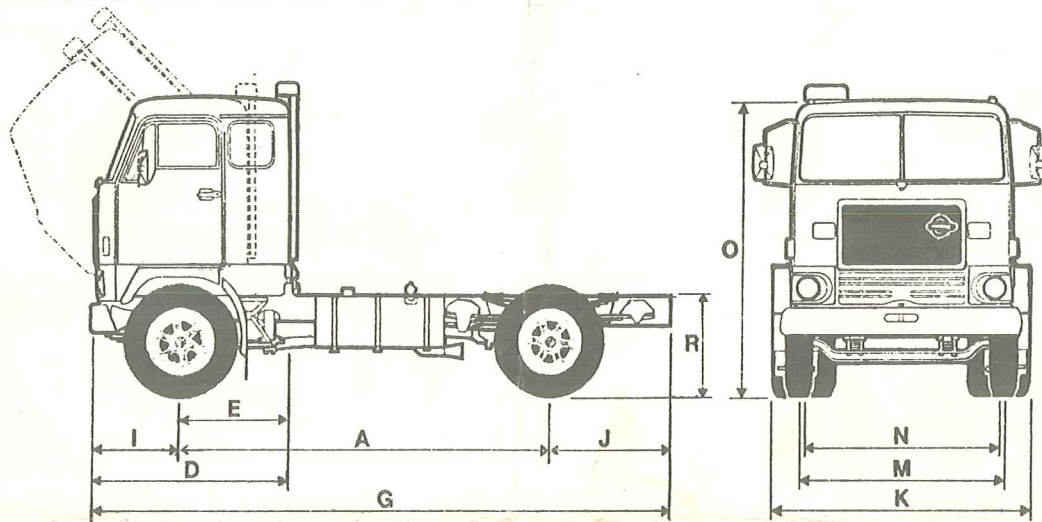
Power take-off, rear (high speed)
Speed, R 61 — 0.93 x engine speed
Speed, SR 61 — 0.88/1.05 x engine speed
Torque — 250 Nm (25 kgf m = 180 lbft.)
(Max. 15 min. 350 Nm (35 kgf m = 250 lbft.)
Direction of rotation — Same as that of the engine

Power take-off, rear
Speed, R 61 — 0.59 x engine speed
Speed, SR 61 — 0.56/0.66 x engine speed
Torque — 590 Nm (60 kgf m = 434 lbft.)
(Max. 15 min. 980 Nm (100 kgf m = 720 lbft.)
Direction of rotation — Opposite

Power take-off, side
Speed, R 61 — 0.77 x engine speed
Speed, SR 61 — 0.73/0.87 x engine speed
Torque — 350 Nm (35 kgf m = 250 lbft)
Direction of rotation — Same as that of the engine

The power take-off units are compressed-air operated from the cab.
Covers for power take-off on right-hand side and rear end.

DIMENSIONS AND WEIGHTS



Length measurements, mm (in.)	G 88-35		Length measurements, mm (in.)	G 88-35	
A Wheelbase	3,500	(138)	I Front overhang	855	(33.5)
D Front bumper — rear edge of cab, rest cab	1,915	(75)	J Rear overhang, rest cab	1,102	(43.5)
short cab	1,515	(59.5)	short cab	1,802	(71)
E Centre of front axle — rear edge of cab, rest cab	1,060	(41.5)	Platform length, rest cab, approx.	3,220	(126)
short cab	660	(26)	short cab, approx.	4,020	(158)
G Overall chassis length, rest cab	5,457	(215)	Turning circle diameter*	13,200	(43 ft)
short cab	6,157	(242)			

* Applies for stated running equipment

The platform length concerns a fixed platform on a standard chassis at the stated chassis weight. Calculated with 150 mm (6") between the cab and the inner edge of the headboard. Other equipment can result in different values.

Width measurements, mm (in.)	Wheels Tyres	Spoke wheels	
		7.5-20" 10.00-20"	8.0-20" 11.00-20"
Overall width front		2,417 (95)	2,417 (95)
K Overall width rear		2,464 (96.3)	2,480 (97.6)
M Track, front		2,032 (80)	2,031 (80)
N Track, rear		1,839 (72.4)	1,848 (72.8)

Height measurements, mm (in.)	Tyres	10.00-20"	11.00-20"
O Cab roof — ground (unladen)		2,915 (115)	2,930 (115)
R Frame — ground (loaded)		930 (36.6)	945 (37.2)

(The R-measurement applies above the driving axle)

Weights, kg (lb.)	G 88-35		Weights, kg (lb.)	G 88-35	
Chassis weight, front axle	3,620	(7,980)	Max. rear axle pressure	13,000	(28,700)
Chassis weight, rear axle	2,070	(4,563)	GVW	15,000	(33,000)
Chassis weight, total	5,690	(12,544)	Payload including superstructure approx.	9,310	(13,360)
Max. front axle pressure	6,500	(14,350)			

Max. axle pressure and GVW apply on condition that they are approved by the transport authorities concerned.

Chassis weights include: TD 100 A engine, six spoke wheels 7.5" x 20" with 10.00-20" tyres, double reduction 320 litre fuel tanks (70 Imp. galls.) as well as water, oil, fuel but not spare wheel and spare wheel holder

Weight modifications, kg (lb.)	Front	Rear	Total
Spare wheel holder	—	—	+ 15 (35)
Spare wheel with tyre 10.00-20"	—	—	+ 120 (265)
Rear pto.	+ 10 (25)	—	+ 10 (25)
Side pto.	+ 10 (25)	+ 5 (10)	+ 15 (35)
Hollow rubber springs (DMG)	—	+ 30 (70)	+ 30 (70)
Rear springs (EMG)	—	-100 (220)	-100 (220)
Short cab	-70 (155)	—	- 70 (155)

