

ML 320



- **Model:** W 163 E 32
- **Description:** 163.154
- **Production:** 05.1997 / 07.1997 - 07.2001
- production start-up pre-production series / standard production - end of production

Specifications

Engine

Combustion principle:	four-stroke Otto (with manifold-injection and emission control device with 3-way catalyst)
Configuration:	front, longitudinal; vertical
Engine type:	M 112 E 32 / 112.942
Number of cylinders / arrangement:	6 / 90° V; light-alloy block
Bore x Stroke:	89.9 x 84.0 mm
Total displacement:	3199 cc
Compression ratio:	10.0
Crankshaft bearings:	4
Rated output:	160 kW / 218 hp at 5700 rpm
Rated torque:	310 Nm at 3000 - 5000 rpm
Number of valves / arrangement:	2 intake, 1 exhaust / V-shaped overhead
Valve operation:	1 overhead camshaft per cylinder bank
Camshaft drive:	double roller chain
Fuel system:	microprocessor controlled injection system with hot-film air mass sensor (Bosch ME engine management)
Cooling:	water cooling / pump; 12.0 l water
Lubrication:	pressure circulation lubrication / 7.0 l oil
Electric system:	12 V
Battery:	100 Ah / in the engine compartment
Generator:	three-phase AC / 1610 W
Starter:	electrical / 1.7 kW
Ignition:	map-controlled phased twin-spark ignition
Fuel tank: position / capacity:	in front of the rear axle / 70 l
Fuel supply:	electric delivery pump

Chassis and Drivetrain

Frame design:	box-section ladder-type frame / steel unit body
Front-wheel suspension:	double wishbone
Rear-wheel suspension:	double wishbone
Front springs:	torsion bar springs, torsion bar stabilizer
Rear springs:	coil springs, torsion bar stabilizer
Shock absorber front/rear:	twin-tube gas-pressure shock absorbers
Steering:	rack-and-pinion power steering
Steering ratio:	3.6 turns lock-to-lock
Brake system (foot brake):	hydraulic dual-circuit brake system with vacuum booster and antilock system, from 09.1998 with Brake Assist; disc brakes front (internally ventilated) and rear
Parking brake (hand brake):	mechanical (foot-operated), acting on rear wheels
Diameter of brake discs and/or brake drums:	brake discs front / rear: 301 / 285 mm
Wheels:	light-alloy wheels
Wheel rims:	6 1/2 J x 16 H 2
Tires:	225/75 R 16 104 T; from 02.1999: 225/75 R 16 104 H
Driven wheels:	permanent four-wheel drive on front and rear wheels, controlled via electronic traction system ETS
Drivetrain:	from power divider via single-piece cardan shafts on front-axle differential and rear-axle differential (power distribution 48% front, 52% rear)

Transmission and Performance

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Gearing:	5-speed automatic transmission (electronically controlled)
Availability:	as standard
Shifting:	central floor selector lever
Clutch:	hydraulic torque converter with slip-controlled lockup clutch
Transmission type:	planetary gear
Gear ratios:	I: 3.93; II: 2.41; III: 1.49; IV: 1.0; V: 0.83; R: 3.10
Final drive ratio:	front/rear: 3.69; transfer gear: road 1.0 / off-road 2.64
Maximum speed:	180 km/h (controlled); from 02.1999: 195 km/h
Acceleration 0-100 km/h:	9.5 s
Comments:	acceleration by shifting through from 0 - 100 km/h (2 occupants)
Fuel consumption:	18.2 / 11.2 / 13.8 l
by Guideline:	93/116/EC: figures apply to City / EUDC (extra-urban) / NEDC (New European Driving Cycle, average from 36,8% City and 63,2% EUDC)

Dimensions and Weights

Wheelbase:	2820 mm
Front / rear track:	1565 / 1565 mm
Length:	4587 mm
Width:	1833 mm
Height:	1807 mm
Turning circle diameter:	11.90 m
Kerb weight:	1990 kg; from 09.1998: 2010 kg; since .1999: 2120 kg
by Guideline:	EC 92/21 (including driver, 68 kg, and baggage, 7 kg; tank 90 % full)
Gross weight:	2650 kg; since .1999: 2750 kg
Gross axle weight; front:	1250 kg; since .1999: 1300 kg
Gross axle weight; rear:	1600 kg
Payload:	660 kg; from 09.1998: 640 kg; since .1999: 630 kg

Permissible trailer weight; braked: 2650 kg; since .1999: 3500 kg

Permissible trailer weight; 750 kg

unbraked:

General Data

Units produced: not documented separately

Prices: 09.1997: DM 75,900.00 04.1998: DM 76,560.00 09.1998: DM 77,836.00

02.1999: DM 78,880.00 09.1999: DM 79,576.00 01.2000: DM 80,852.00

01.2001: EUR 41,876.00 (DM 81,902.33)
