

Engine & Cooling

Fuel

Ignition

Electrical

Running gear

Torque settings

Capacities

Notes & Illustrations



Automotive Technical
DATA BOOK

Click on one of the buttons above to view data for this car. To return to this screen and make another choice, click anywhere on the data screen.

MENU

HELP

Engine and cooling system

309, 1.9 GTi CAT

1988 to 1993

Type		XU9JAZ (DKZ) (88kW)
Capacity (cm³) / number of cylinders		1905 / 4
Compression ratio / pressure	bar	9.2 / _
Oil pressure	bar	2.1 [4.1]
Oil temperature	°C	80
Valve clearance - inlet	mm	0.20
Valve clearance - exhaust	mm	0.40
Firing order		1-3-4-2
No 1 cylinder position		FE
Thermostat opening temperature	°C	82
Radiator cap pressure	bar	1.0

Fuel system

309, 1.9 GTi CAT

1988 to 1993

Idle speed - manual [auto]	rpm	900±50
Fast idle speed - manual [auto]	rpm	_
CO @ idle speed [3000 rpm] - see page VI	%	≤0.5
HC @ idle speed [3000 rpm] - see page VI	ppm	≤200
CO2 @ idle speed [3000 rpm] - see page VI	%	_
O2 @ idle speed [3000 rpm] - see page VI	%	_
Carburettor / fuel injection		Bosch
Type / ref		M1.3 Motronic
Main jet / needle		_
Injection pressure	bar	3.0
Pump pressure	bar	2.8 to 3.2
Octane rating	RON	95[U]

Ignition system

309, 1.9 GTi CAT

1988 to 1993

Type		DME Motronic
Ignition coil		Bosch
Primary resistance	ohms	0.85
Ballast resistor	ohms	_
Voltage - Tmnl 15(+) to earth	V	_
Distributor		Bosch/Ducellier
Points gap (air gap)	mm	_
Dwell angle	° (%)	_
Condenser capacity	µF	_
Rotation		Anticlockwise
Ignition timing - basic [static	° Crankshaft @ rpm	Computer control
V = Vacuum NV = No Vacuum		NV
Total ignition advance	° Crankshaft @ rpm	Computer control
	° Crankshaft @ rpm	_
	° Crankshaft @ rpm	_
Centrifugal check.	° Crankshaft @ rpm	Computer control
	° Crankshaft @ rpm	_
	° Crankshaft @ rpm	_
Vacuum range check	mbar	Computer control
Maximum vacuum advance	° Crankshaft	_
Spark plugs		Eyquem/Champion
Type		FC52LS / C9YCX
Electrode gap	mm	0.80

Electrical system

309, 1.9 GTi CAT

1988 to 1993

Battery	V / CC / RC	12 / 210 / 65
Alternator voltage / full load current / engine rpm		13.8 to 14.8 / _ / 3000
Starter motor current / voltage - cranking	A / V	_
- locked	A / V	_

Running gear

309, 1.9 GTi CAT

1988 to 1993

Brakes -		
Front (min. friction material thickness)	mm	1.0
Rear (min. friction material thickness)	mm	_

Tyres		
Saloon	Size	185/55x15
Estate / Van	Size	_
Pressure - front / rear - Saloon	bar	2.0 / 2.0
- Estate / Van	bar	_

Front suspension / wheel alignment		
Toe-in (+) / Toe-out (-)	mm [°]	+1.0±0.5 PW
Camber		-40'±30'
Castor		+2°10'±30'
King pin inclination		+10°40'±30'

Rear suspension / wheel alignment		
Toe-in (+) / Toe-out (-)	mm [°]	+1.9±0.8 PW ¹
Camber		-50'±30'. 90 ►: -1°15'±30'

Torque wrench settings

309, 1.9 GTi CAT

1988 to 1993

Cylinder head - stage 1	Nm	60
- stage 2	Nm	Slacken
Cylinder head - stage 3	Nm	20
- stage 4	Nm	+ 300°
Big-end bearings	Nm	40 ²
Main bearings	Nm	49
Clutch cover	Nm	25
Flywheel [driveplate]	Nm	49 LkC
Front hubs	Nm	265
Rear hubs	Nm	215
Wheel nuts / bolts	Nm	85
Spark plugs	Nm	25 to 30

Capacities

309, 1.9 GTi CAT

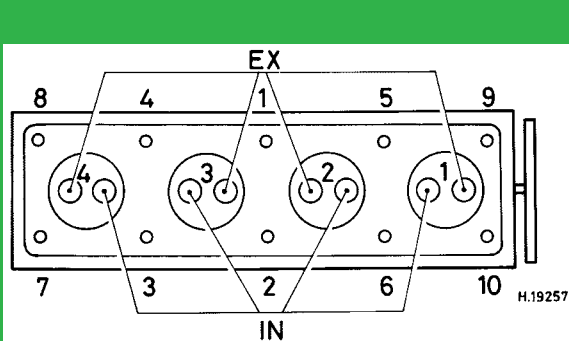
1988 to 1993

Engine oil & filter	litres	5.0. 93 MY: 4.5
Gearbox - 4-speed [5-speed]	litres	2.0
Automatic transmission - refill	litres	_
Final drive	litres	WT
Cooling system	litres	8.0
Fuel tank	litres	55

Notes and Illustrations

¹1990 ►: +2.5±1.3

²Slacken, then 20 + 70°



1905 cm³, 8V