

# Engine

## The Crankcase Breather . . .

. . . consists of a distributor piece, a pressure limiting valve, a non-return valve and the associated hoses.

The oil vapors and "blow-by" gases from the cylinder heads and the crankcase converge in the distributor piece. The pressure limiting valve and the non-return valve control the return of these vapors and gases to the engine, depending on the intake manifold pressure.

### Vacuum in intake manifold

The oil vapors and "blow-by" gases return via the non-return valve in the intake manifold.

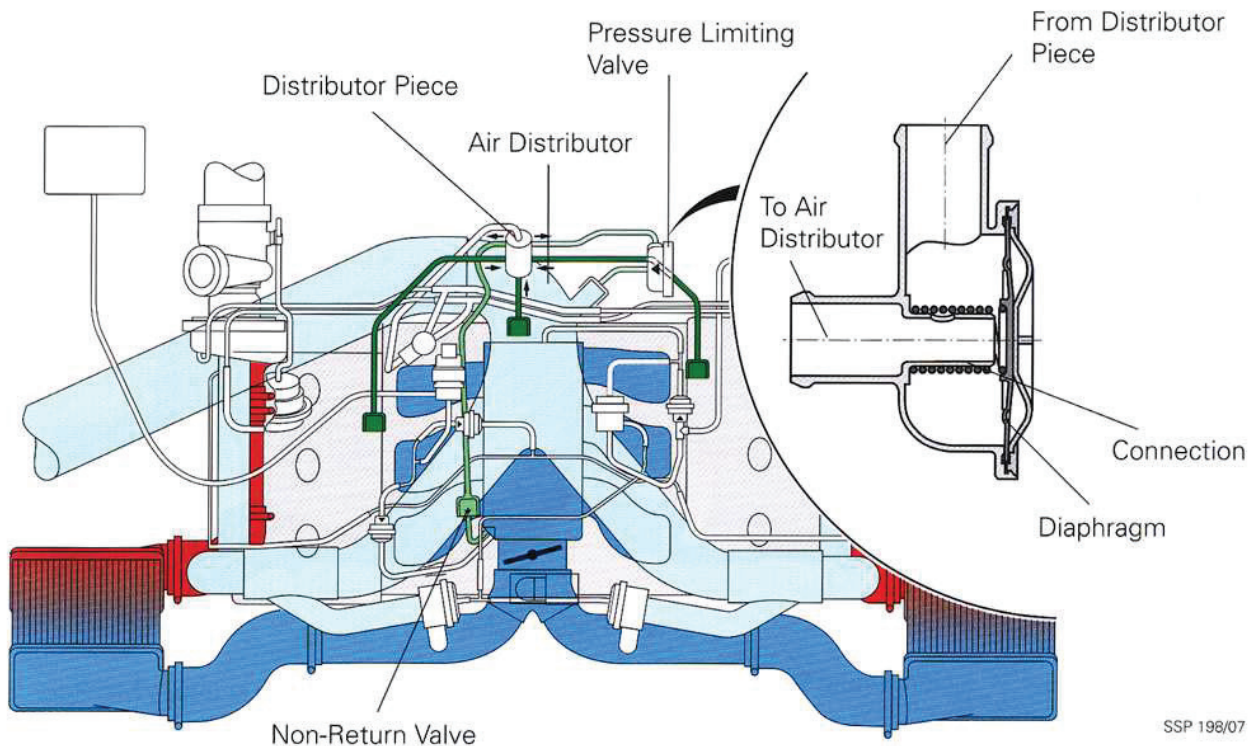
### Charge pressure in intake manifold

The oil vapors and "blow-by" gases return via the pressure limiting valve in the air distributor.

The **pressure limiting valve** limits the vacuum in the crankcase. If the vacuum in the crankcase exceeds a defined value, the diaphragm is drawn over the connection against the force of the spring and closes the connection. The valve is designed in such a way that it allows a small quantity to pass through when closed. This prevents the engine oil being drawn into the intake tract and has no adverse effects on engine breathing.



The term "blow-by" gases refers to the gases which escape from the combustion chamber past the piston rings.



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