



# **Focus** Valve cover

Under the hood, the engine is protected by a cover that ensures its waterproofing. This is the valve cover, or rocker cover, an essential component for the proper functioning of the engine.

#### What is it?

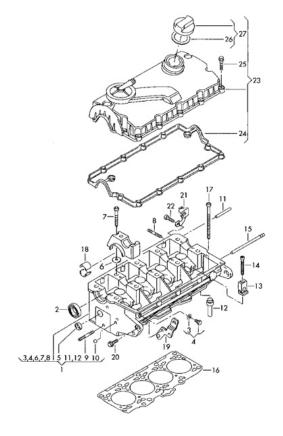
The valve cover is the element that covers the top of the engine and **protects all the distribution components of the vehicle** (timing belt, tensioner, shock absorber pulley, crankshaft, etc.).

#### Composition

It can be made of **aluminum alloy or heat-resistant plastic** depending on the model and engine specifications of the car.

## What is its purpose?

It ensures the sealing of the engine and prevents engine oil leaks. To guarantee this function, there may be a gasket that needs to be regularly checked and replaced if worn out.







- In addition to preserving the engine's seal, the valve cover also has a lubrication function. It retains and ensures the flow of engine oil to the cylinder head to lubricate all engine components. It may be equipped with bearing surfaces to hold the camshaft and an oil vapor filtering system that allows recycling them into the combustion chamber.
- It allows for **filling the engine oil** when it's changed, thanks to the cap located on the top.

- It helps **cool the engine** by cooling the oil sprayed against the rocker arm.
- It has an **aesthetic function**: it is produced by various car manufacturers to conceal the cylinder head and its components (wires, valves, nuts, bolts, etc.), giving order to the engine compartment.
- It dampens the engine noise, reducing acoustic pollution.

# Possible anomaly diagnosis

Engine oil leak.

Engine oil **light** on.

Excessive **consumption** and low engine oil level.

Cracked or fractured rocker **cover**: visible to the naked eye, requires prompt replacement.

### Causes of breakage

The worst consequence of a malfunctioning valve cover is **engine oil loss**. When this happens, the engine components are at risk of breaking because they are no longer adequately lubricated. To avoid this problem, visual inspection under the hood is necessary. Typically, **traces of black oil remain visible** if there is an engine oil leak.

This component is subjected to constant engine **vibrations** and **deformations** due to the operating temperatures of the engine.

Therefore, it is advisable to immediately check the conformity status of the valve

cover, identifying:

Any **cracks or fissures** on the body

Material wear

Presence of **impacts** from external objects

Possible bolt tightening defect due to **incorrect installation**, resulting in lubrication loss

#### Related products

Valve cover gaskets





