
Audi valvelift system

The Audi valvelift system, one of the major innovations of the brand with the four rings, regulates the lift of the valves in two stages depending on load and engine speed. The system thus increases torque while also reducing fuel consumption.

Two versions of the AVS system are available. In the V6 engines in which AVS is used, it acts on the intake valves, largely regulating the amount of intake air. The throttle can also remain wide open even at part load. This reduces throttle losses, allows the engine to breathe freely and improves efficiency.

In the latest-generation 2.0 TFSI, the AVS varies the lift of the exhaust valves. It reduces flushing losses in the combustion chamber and also ensures that the optimal flow of the exhaust gas is directed to the turbocharger. Both versions have a simple, compact and lightweight system design making use of so-called cam pieces – sliding electromagnetic sleeves on the camshaft.

Status: 2011