

## **New setup improves driving dynamics**

The Macan is the sporty role model in the compact SUV segment. It owes this position above all to a chassis that is typical for sports cars. This provides unique lateral dynamics without neglecting everyday comfort. The chassis engineers examined every chassis component for further optimisation potential for the facelift. With detailed improvements and a completely new setup, the Macan again raises the bar for sporty driving.

On the front axle, spring forks made of aluminium replace the previous steel components. The spring forks are spread over the drive shafts and connect the springs and dampers with the front-axle carrier. The new light alloy design is more rigid and reduces the unsprung masses by around 1.5 kilograms. As a result, the Macan steers even more precisely and the suspension is even more comfortable. The spring characteristics of the optional air suspension have also been improved thanks to optimised rolling pistons and new shock absorber hydraulics.

Newly tuned anti-roll bars are based on the improved spring characteristics. The directional control is now designed for more neutral handling – and the Macan feels more like a sports car than ever before. The further-developed chassis concept also includes 19- and 21-inch wheels with a rim width reduced by half an inch on the front axle. This means that the tyres are guided more precisely and turn-in ability is improved. All tyres are from a new generation that is specially tailored to the driving characteristics of the Macan. The wheel diameters range from 18 inches to 21 inches. The mixed tyre sizes are between 235/60 R 18 and 265/40 R 21 on the front axle and between 255/55 R 18 and 295/35 R 21 on the rear axle.

As before, the active damper control system PASM, height-adjustable air suspension and Porsche Torque Vectoring Plus (PTV Plus) are optionally available.

### **Enhanced brakes with more precise pressure point**

A lot of detailed work has also gone into the brakes of the new Macan. The driver notices this above all through the changed pedal feeling. The driver presses a so-called organic sheet pedal made of moulded, glass fibre-reinforced thermoplastic sheet material with back-injected plastic rib structure. This pedal weighs around 300 g less than the previous steel part and acts on the brake master cylinder via a shortened lever arm. As a result, the brake response is more immediate and the driver also feels a very precise pressure point through the very rigid connection. Sporty drivers in particular will value this optimised feedback. The even sportier orientation of the new Macan is reflected in the larger front brake discs on the S model. The disc diameter has been increased by 10 mm to 360 mm, and the disc thickness has grown by 2 mm to 36 mm. All new brake linings are copper-free. The Macan S can be optionally equipped with the PCCB ceramic brake system.

The new engine mount with a so-called driving dynamics support ensures an even better connection between the engine and chassis. Engine roll on the engine mounts is thus suppressed more effectively under load. This also influences handling when cornering. The turn-in behaviour is more direct and agile. If the driver accelerates when driving out of the bend, the movement of the engine has a significantly reduced effect on handling. The tracking of the Macan is improved as a result, and the cornering forces of the outer tyres can be used in a more controlled manner.