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Audi TT RS Coupé and TT RS Roadster: the sporty vanguard of the model series

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The equipment, data and prices specified in this document refer to the model range offered in Germany. Subject to change without notice; errors and omissions excepted.

*The fuel consumption and emissions values of all models available on the German market and named in this text are listed on the last page of this basic information document.

Compact version

Dynamic duo: TT RS Coupé and TT RS Roadster

Audi is sending the most powerful TT ever into the competitive field. Its newly developed five-cylinder engine delivers 400 hp – accompanied by an unmistakable sound. Driving pleasure guaranteed!

Muscular front end, large air inlets, low-positioned spoiler, fixed rear wing – at first glance, the Audi TT RS* clearly hints at just how much power there is under its streamlined skin. Its new five-cylinder aluminum engine delivers 400 hp, which is 60 more than the power of the previous model. A full 480 Nm (*354.0 lb-ft*) of torque is applied to the front and rear wheels, and a traction control system manages its distribution for maximum acceleration with minimal slip. As a result, the Coupé takes 3.7 seconds to sprint from 0 to 100 km/h (*62.1 mph*), and the Roadster takes 3.9 seconds. No other TT has sprinted this fast. The brilliant torque is accompanied by typical five-cylinder sound – which is music to the ears of horsepower purists. This sound passes through the RS exhaust system and is projected to the surroundings via two large oval tailpipes. Other eye-catching features at the rear are the new Matrix OLED lights in 3D design, which are being implemented for the first time in a production Audi.

This much power requires a stiff chassis setup. At a height of just 1.34 meters (*4.4 ft*), the Audi TT RS is low to the asphalt, and it is both light-footed and under control as it conquers curves. The direct steering ratio gives the driver the feeling of being one with the road. No matter how intensively the driver turns the grippy sport steering wheel, the low-mounted sport seat with the strong contours of its side bolsters holds the driver in position. In the Roadster, a switch initiates open-air driving fun. It opens the car's soft top – even while driving at speeds up to around 50 km/h (*31.1 mph*).

Inside, the TT RS has an extremely sporty appearance – with aluminum or carbon trim elements and RS logos. As in the Audi R8, the driver starts the engine directly from the steering wheel – a feature inspired by motorsport. The dynamic handling system can also be operated from an extra set of satellite controls. If drivers wish, they can modify the character of the TT RS over four modes – from comfort-oriented to decidedly dynamic.

The instruments are focused entirely on the driver. The fully digital Audi virtual cockpit with its 12.3-inch screen bundles all key information – from driving speed to engine rpm and navigation. And that is not all. A special RS screen displays information on tire pressure, torque and g-forces. When a defined engine speed is reached, the colored background of the scale prompts the driver to upshift via the steering wheel paddle or selector lever.

To always stay up-to-date, the driver can call upon the extensive infotainment content. Audi connect brings a wide variety of services on-board that can deliver the right information – whether you are looking for parking, travel or traffic information, or inquiring about fuel prices, the weather or online news. Passengers can also tweet on the road, and upon request the system can read the messages aloud. They can connect their smartphone or tablet via the Wi-Fi hotspot and surf the world wide web. Select smartphone apps can be mirrored directly into the Audi virtual cockpit. With the new Audi Sport Performance app, drivers can compare track lap times with respect to speed, time difference, steering angle, g-forces, rpm, brake pressure and accelerator position. Wireless charging according to the Qi standard provides for a full battery. Then the smartphone is also coupled to the vehicle's antenna for optimal reception, and it connects the driver with the desired contact person when prompted. A practical feature is that the microphones of the hands-free system are integrated into the seat belts in the Roadster, which guarantees high speech quality.

Prices for the Coupé start at 66,400 euros, and the Roadster is listed at 69,200 euros.

Summary

More powerful than ever: new TT RS Coupé and new TT RS Roadster

The sound: inimitable five-cylinder The output: tremendous at 294 kW (400 hp). The traction: inexhaustible thanks to quattro drive. The new TT RS* is a powerhouse – in the closed and the open version.

“The heart of the second-generation TT RS is an all-new five-cylinder engine made of aluminum,” said Stephan Winkelmann, CEO of quattro GmbH. “With 400 hp, it puts out 60 hp more than the previous model. The new Matrix OLED rear lights also underscore the compact sports car’s position as a technology leader.”

Impressive performance: the new five-cylinder engine

A jury of international motor journalists has voted the 2.5 TFSI “Engine of the Year” seven times in a row. Now Audi has further developed the five-cylinder engine in all areas – with lightweight construction measures, reduced internal friction and increased power delivery. As a result, the turbo engine gains a good 17 percent increase in performance at an unchanged capacity of 2,480 cc. At 294 kW (400 hp), it is more powerful than ever before. The engine’s maximum torque of 480 Nm (*354.0 lb-ft*) is available between 1,700 and 5,850 rpm. It ensures fantastic pulling power, accompanied by an unmistakable sound. Because of the 1-2-4-5-3 ignition sequence, ignition alternates between adjacent cylinders and those far apart from one another. This brings with it a very special rhythm. The TT RS Coupé accelerates from 0 to 100 km/h (*62.1 mph*) in 3.7 seconds, the Roadster in 3.9 seconds – this corresponds to the level of a supercar. Audi can govern the top speed to 250 km/h (*155.3 mph*) or an optional 280 km/h (*174.0 mph*). Despite increased performance, the fuel consumption of the TT RS Coupé is just 8.2 liters per 100 kilometers (*28.7 US mpg*); the TT RS Roadster uses 8.3 liters (*28.3 US mpg*) on average.

For the best traction and plenty of driving pleasure: the quattro drive

The power of the 2.5 TFSI engine flows via a seven-speed S tronic, which shifts at lightning speed, to the quattro permanent all-wheel drive. Its multi-plate clutch distributes power fully variably between the two axles. This ensures strong grip and plenty of driving pleasure. Wheel-selective torque control makes handling even more agile and safe. The driver can use the Audi drive select system to influence the quattro drive and other components such as the steering, S tronic, engine characteristic and exhaust flaps. The four modes available for this are comfort, auto, dynamic and individual.

Pure dynamics: the chassis

In addition to its light weight, the Audi TT RS has its sporty chassis to thank for its outstanding handling. The progressive steering with RS-specific tuning provides close contact with the road and makes it a pleasure to drive challenging winding stretches. At the front axle, ventilated and perforated steel discs are in action behind the 19-inch wheels – or 20-inch forged lightweight wheels as an option. Alternatively, lighter and particularly abrasion-resistant carbon-fiber ceramic discs are available. At the back, a steel monoblock disc is used. As an option, Audi supplies the RS sport suspension plus with adaptive dampers in magnetic ride technology. In this case, the damping characteristic can be influenced electronically. The control technology is integrated into the Audi drive select dynamic handling system.

New feature: Matrix OLED lights

For the first time in a series-production Audi, Matrix OLED technology (organic light emitting diode) is used in the rear lights as an option. These emit an extremely homogeneous, precise light. The light does not cast any harsh shadows and does not require any reflectors – this makes the OLEDs in 3D design efficient, lightweight and visually impressive. Each rear light contains four wafer-thin units that become smaller from the inside out. The biggest bears the TT logo and the four Audi rings. The TT RS has LED rear lights and LED headlights as standard. Alternatively, the latter are available as intelligently controlled Matrix LED units.

Athletically streamlined: the exterior design

Large air inlets, a Singleframe grille with a newly designed honeycomb grille and quattro logo, a fixed rear wing and two large, oval exhaust tailpipes – the new TT RS Coupé and the new TT RS Roadster exude concentrated power. Along the flanks, aerodynamically-shaped side sills emphasize the sporty design. Both models measure 4.19 meters (*13.7 ft*) in length, 1.83 meters (*6.0 ft*) in width and 1.34 meters (*4.4 ft*) in height.

Inspired by racing cars: the cockpit

Controls and display in the new TT RS are focused completely on the driver. All information is displayed as standard on the fully digital Audi virtual cockpit with 12.3-inch screen. The driver can choose from three views, including a special RS screen that highlights the tachometer and provides information on tire pressure, torque and g-force, among other things. The tachometer also serves as a shift indicator. If the seven-speed S tronic is in manual mode, green, orange and red segments are activated sequentially as revs increase. Just before the engine reaches the limit, the entire scale flashes red. For the first time in the RS portfolio, the RS sport leather steering wheel with shift paddles has two satellite controls for turning the engine on and off as well as the Audi drive select dynamic handling system, in addition to multifunction buttons. The driver can influence the exhaust flap control and thus the engine sound via the sound button on the center console.

Best entertainment: Infotainment and Audi connect

Audi also offers a huge amount of high-end infotainment technology. The options include MMI navigation plus with MMI touch including free text search and natural language voice control, as well as the Audi connect online module and the Wi-Fi hotspot. Using the Audi phone box, compatible cell phones can be charged inductively and paired with the onboard antenna for optimal reception. The Audi smartphone interface displays selected apps from the cell phone directly in the Audi virtual cockpit. The Audi Sport Performance app is used to compare lap times on the racetrack. It displays speed, time difference, steering angle, g-forces as well as rpm, brake pressure and accelerator position on the smartphone. It also indicates the current position of the TT RS on the racetrack. The Bang & Olufsen Sound System provides for an excellent sound experience on board.

At a glance

Audi TT RS Coupé and Audi TT RS Roadster

Engine and drivetrain

- Newly developed, aluminum 2.5 TFSI with dual injection system (direct and into the induction pipe), 294 kW (400 hp) – 60 hp more, yet 26 kilograms (*57.3 lb*) lighter than the previous engine
- 480 Nm (*354.0 lb-ft*) of torque between 1,700 and 5,850 rpm
- 0 to 100 km/h (*62.1 mph*): Coupé in 3.7 seconds, Roadster in 3.9 seconds
- Top speed: governed at 250 km/h (*155.3 mph*), optional at 280 km/h (*174.0 mph*)
- Reduced fuel consumption despite increased performance: Coupé 8.2 liters per 100 kilometers (*28.7 US mpg*), Roadster 8.3 liters pro 100 kilometers (*28.3 US mpg*)
- Unmistakable sound: ignition alternates between adjacent cylinders and those far apart from one another; sound button on the center console for control of the exhaust flaps
- Seven-speed S tronic with launch control

Chassis

- Permanent quattro all-wheel drive with electro-hydraulic multi-plate clutch
- Variable distribution of power between front and rear axles
- Audi drive select dynamic handling system with four modes standard
- Progressive steering with RS-specific tuning
- RS sport suspension with four-link rear axle, optional RS sport suspension plus with adaptive damper control
- Body lowered ten millimeters (*0.4 in*) compared with the Audi TT
- 19-inch wheels with 245/35 tires standard; optional 20-inch wheels with 255/30 tires
- Internally ventilated, perforated steel discs at the front, optional carbon-fiber ceramic discs; eight-piston calipers with RS logos; monoblock discs at the back
- Electronic Stabilization Control with wheel-selective torque control and RS-specific sport setting; can also be deactivated completely

Exterior design and body

- Athletic design 4.19 meters (*13.7 ft*) long, 1.83 meters (*6.0 ft*) wide, 1.34 meters (*4.4 ft*) high
- Low c_d value: 0.32 for the Coupé, 0.33 for the Roadster
- Singleframe with quattro logo and honeycomb grille, large air inlets, low-positioned spoiler, fixed rear wing, diffuser insert, RS exhaust system
- LED headlights standard; optional Matrix LED
- Matrix OLED rear lights – for the first time in a production Audi
- Up to 35 kilograms (*77.2 lb*) lighter than the previous model thanks to new Audi Space Frame: Curb weight (without driver): Coupé 1,440 kilograms (*3,174.7 lb*), Roadster 1,530 kilograms (*3,373.1 lb*)
- Roadster with power soft top and power wind deflector

Interior and controls

- RS sport seats with integrated head restraints; optional headroom heating on the Roadster
- Controls and displays focused on the driver
- Audi virtual cockpit with 12.3-inch monitor and three view modes, including a special RS screen, standard
- RS sport leather steering wheel including shift paddles with two satellite controls for turning the engine on and off as well as for Audi drive select
- Luggage capacity: 305 liters (*10.8 cu ft*) for the Coupé, 280 liters (*9.9 cu ft*) for the Roadster

Colors and equipment

- nine exterior colors, including two RS-specific paint finishes: Nardo gray and Catalunya red
- RS-specific seat upholstery with diamond stitching and two-color perforation
- Choice of three interior equipment trims plus an additional elegant equipment package from Audi exclusive
- RS design packages in red and gray plus various leather packages available as options
- Inlays in Aluminum Race and optionally in carbon.

Infotainment

- Second-generation modular infotainment platform
- MMI navigation plus with MMI touch including free text search, natural language voice control and Wi-Fi hotspot
- Audi connect with LTE module
- Audi MMI connect app free of charge
- Audi phone box with wireless charging
- Audi smartphone interface for Android and iOS – new in the TT RS
- New: Audi Sport Performance app for comparing lap times; display of vehicle data (incl. rpm, gear, steering angle, g-forces); Bang & Olufsen Sound System
- Seatbelt microphones in Roadster

Full version

TT RS Coupé and TT RS Roadster – driving pleasure at the highest level

400 hp power output, from 0 to 100 km/h (62.1 mph) in 3.7 seconds, top speed of up to 280 km/h (174.0 mph): With the new aluminum five-cylinder engine, the TT RS Coupé* and TT RS Roadster* deliver outstanding performance. Available for the first time in a series-production Audi: Matrix OLED rear lights. Like the Audi virtual cockpit and the comprehensive infotainment range, they once again stand for “Vorsprung durch Technik.”

“Audi enjoyed racing success in the 1980s with the combination of a five-cylinder engine and quattro drive,” said Stephan Winkelmann, CEO of quattro GmbH. “In the new TT RS, we are transferring this potent technology package to the present. Today this means: 400 hp, best traction under any road conditions and thus tremendous driving pleasure, yet reduced fuel consumption.”

Engine

The five-cylinder engine is a modern classic. A jury of international motor journalists has voted the 2.5 TFSI “Engine of the Year” seven times in a row. Now Audi has upped the ante with a completely newly developed turbo engine in the TT RS.

Lighter and more powerful than ever before: the 2.5 TFSI

The five-cylinder achieves a good 17 percent more output from the unchanged displacement of 2,480 cc – 294 kW (400 hp) means a specific value of 161.3 hp per liter. The maximum torque of 480 Nm (354.0 lb-ft) is available from 1,700 rpm and remains constant up to 5,850 rpm. The new Audi TT RS Coupé thus accelerates from 0 to 100 km/h (62.1 mph) in 3.7 seconds; the Roadster takes 3.9 seconds. Standard top speed is a governed 250 km/h (155.3 mph). Audi will raise the top speed to 280 km/h (174.0 mph) upon request.

At less than 50 centimeters (*19.7 in*) in length, the 2.5 TFSI engine is extremely compact and is 26 kg (*57.3 lb*) lighter than the previous model. Its crankcase is made of aluminum, which alone saves 18 kg (*39.7 lb*). The overall weight of the new TT RS and its axle load distribution benefit significantly from this. Elaborate measures reduce internal friction while at the same time increasing power output. The cylinder barrels are plasma-coated; the crankshaft main bearings are six millimeters (*0.2 in*) smaller in diameter. The crankshaft is hollow bored and is therefore 1 kg (*2.2 lb*) lighter; the aluminum pistons integrate channels for the oil cooling. In the short warm-up phase after a cold start, the switchable water pump does not circulate the coolant in the cylinder head – the 2.5 TFSI engine reaches its operating temperature more quickly. This lowers the coefficient of friction and reduces fuel consumption.

The gas exchange of the five-cylinder engine is designed for high throughput. The large turbocharger forces the intake air into the combustion chambers at up to 1.35 bar. The intercooler with its efficiency level of 80 percent reduces the temperature for the highest possible oxygen percentage. Intake and exhaust camshafts can be adjusted as required. On the exhaust side, the Audi valvelift system (AVS) changes the duration of valve opening depending on the throttle and engine speed at two levels – for moderate fuel consumption at low and partial load as well as more spontaneous throttle response and high pulling power at full load. For better mixture preparation, the new 2.5 TFSI engine works with a dual injection system. It provides the option of injecting fuel into the intake manifold as well as directly into the combustion chamber. The duration and type of injection can be variably optimized for each engine operating point.

Inimitable five-cylinder: the sound

The 2.5 TFSI has a firing interval of 144 degrees. Because of the 1-2-4-5-3 ignition sequence, ignition alternates between adjacent cylinders and those far apart from one another. This delivers a very special rhythm and character. The uneven number of cylinders results in harmonic frequencies that accompany the basic tone. The engine control unit also contributes to the unmistakable sound. At higher throttle, the flaps in the exhaust system open for an even fuller sound. The driver can influence control of the exhaust flaps for both the standard RS exhaust system and the optional RS sport exhaust system with black tailpipe trims by pressing the sound button on the center console.

Optimized: higher output, lower consumption

Despite 60 hp more output, the Audi TT RS consumes 0.3 liters less fuel in the NEDC than its predecessor. This is attributable to not just engine-side optimizations, but also to a start-stop system and a recuperation system. The Coupé uses just 8.2 liters per 100 kilometers (*28.7 US mpg*) – this corresponds to CO₂ emissions of 187 g/km (*300.9 g/mi*). The Roadster consumes on average 8.3 liters (*28.3 US mpg*) and emits 189 g/km (*304.2 g/mi*) of CO₂.

Drivetrain

The seven-speed S tronic with lightning-fast shifting is standard in the new Audi TT RS models. The dual-clutch transmission impresses with high efficiency and a large spread – its lower gears are short, and the seventh gear has a long transmission ratio to reduce consumption. A plate heat exchanger regulates the temperature of the transmission oil; a new angle drive to the propeller shaft reduces the weight by about two kilograms (*4.4 lb*). The driver controls the seven-speed S tronic with the selector lever and the standard shift paddles on the sport leather steering wheel. The launch control manages starts with optimal traction, allowing the new TT RS to accelerate to its full potential.

Chassis

The new TT RS uses quattro permanent all-wheel drive. The electro-hydraulic multi-plate clutch is compact and lightweight – its position at the end of the propeller shaft benefits the axle load distribution. The new quattro driving dynamics software continually computes the torque that is distributed to the rear wheels. Compared with the previous model, this is done even more precisely, because the control system is able to take into account the driving state more precisely. The TT RS is more agile as a result. The software records the rear axle torque and, based on this, calculates the electricity that controls the electronically controlled oil pump. The resulting hydraulic pressure pushes together the plates with up to 40 bar of pressure and thereby transfers the torque to the rear axle.

If the new TT RS is cornering at high speed, the clutch can redirect some of the propulsive power to the rear axle when turning into the corner. During load changes, the distribution of torque ensures that the TT RS turns precisely into the corner.

At the limit, the quattro drive operates in close tandem with wheel-selective torque control, an intelligent software feature of the Electronic Stabilization Control (ESC). This brakes the inside wheels ever so slightly, enabling them to transfer more lateral force. Handling is more fluid and stable as a result.

The developers have applied RS-specific tuning to the Electronic Stabilization Control (ESC) and the anti-slip control. In addition to the full mode, there is also a sport setting where the ESC intervenes later. This mode provides greater driving pleasure, and also enables controlled drifts on low-friction road surfaces. If the driver pushes the button for longer than three seconds, the ESC switches off completely to allow particularly sporty handling.

The quattro drive is integrated into the Audi drive select dynamic handling system for the first time in the TT RS. The modes available are comfort, auto, dynamic and individual. These also influence the function of the seven-speed S tronic, steering, engine characteristic and exhaust flaps. In dynamic mode, the multi-plate clutch sends the power to the rear axle earlier and to a greater degree. The characteristic of the aforementioned technical components can be freely configured in individual mode.

Top technology for high driving pleasure: the RS sport suspension

Targeted modifications make the suspension with the technically elaborate four-link rear axle even more precise. The progressive steering features sporty, RS-specific tuning. Its steering rack is designed so that the steering ratio becomes increasingly direct when turning. The new TT RS can thus be moved agilely with little steering effort and remains calm and collected when cornering. The progressive steering provides the driver precise road feedback the entire time.

The setup of springs and dampers is taut; the body is ten millimeters (*0.4 in*) lower than on the Audi TT. The same is true for the RS sport suspension plus with Audi magnetic ride.

It uses a special hydrocarbon fluid with microscopically small magnetic particles and a magnetic field to vary damping in the stages auto, comfort and dynamic via Audi drive select. In dynamic mode, this enables even more spontaneous handling. The wheels are precisely braced during cornering and body roll largely suppressed. Audi magnetic ride counters body pitch during braking.

Powerful combination: wheels and brakes

The TT RS Coupé and the TT RS Roadster come standard with 19-inch cast wheels in a five-arm polygon design with size 245/35 tires. As an option, Audi supplies 20-inch forged lightweight wheels in a 7-spoke rotor design and tires of size 255/30. Both wheel types are available in silver, matt titanium look or gloss anthracite black. The recessed hubs of the 20-inch wheels are inspired by motorsport.

The braking system in the new TT RS packs a real punch. The internally ventilated, perforated steel discs on the front axle are 370 millimeters (*14.6 in*) in diameter. Stainless steel pins join the friction ring to the aluminum brake disc chambers to dissipate heat quickly. The eight-piston brake calipers with the RS logos are painted black (or optionally red). Alternatively, the front brake discs are available in carbon-fiber ceramic. They are particularly abrasion-resistant and light. In this case, the brake calipers are painted gray. At the rear, monoblock discs with 310 mm (*12.2 in*) diagonals are used.

Body

With their composite construction concept, the bodies of both RS models represent a new evolutionary stage of the Audi Space Frame (ASF). The front end and the floor of the passenger compartment includes many hot-stamped steel components, which thanks to their extreme rigidity only require low wall thicknesses and are therefore very light. The structure of the passenger compartment, the outer skin and all add-on parts are made of aluminum in the classic semi-finished products cast nodes, extruded profile and sheet metal.

The new TT RS Coupé has a curb weight (excluding driver) of just 1,440 kg (*3,174 lb*) – 35 kg (*77.2 lb*) less than the already very light previous model. Each one of its 400 hp only has to move 3.6 kg (*7.9 lb*). The new TT RS Roadster has a curb weight of 1,530 kilograms (*3,373.1 lb*) and thus has a power-to-weight ratio of 3.8 kilograms (*8.4 lb*). Its body has been additionally reinforced compared with the Coupé. The aluminum A-pillars enclose a second pillar of steel, which in turn encloses an additional steel tube. Internal steel ribbing provides for the high strength of the aluminum sills. Diagonal struts designed specifically for the RS reinforce the rear end. A wall made of two steel box profiles separates the passenger compartment from the luggage compartment. This replaces the floor cross-member of the Coupé. The steel roll-over bars are integrated into the upper section of the wall.

Opens or closes in ten seconds: the cloth top

The convertible top of the TT RS Roadster is an automatic acoustic soft top made of cloth. With its substructure components of magnesium, aluminum, steel and polymer, it weighs just 39 kilograms (*86.0 lb*), three kilograms (*6.6 lb*) less than in the previous model.

The soft top sits low and flows smoothly over the body. The side windows are short. While opening, the top forms a Z shape as it folds together into a flat package. It is stored in an aluminum compartment that does not reduce the available volume of the luggage compartment. The electric drive opens or closes the soft top in just 10 seconds, even while driving at speeds up to 50 km/h (*31.1 mph*). Graphics in the Audi virtual cockpit illustrate the process as it is happening. If the convertible top loses tension, the two electric motors pull it tight again.

The thermal and acoustic insulation of the TT RS Roadster is outstanding. The fleece layer above the headlining plays an important role here. The five-layer structure has a total thickness of 15 millimeters (*0.6 in*) (plus headlining). The levels of road and wind noise picked up inside the car are thus much lower than in the previous model. Audi provides a power-extending wind deflector as standard. Headroom heating for the RS sport seats is available as an option.

Exterior design

The new TT RS Coupé and the new TT RS Roadster also display their inner strengths on the outside. Three figures summarize the proportions: 4.19 m (13.7 ft) long, 1.83 m (6 ft) wide, but only 1.34 m (4.4 ft) high. The Audi designers have kept the timeless, puristic lines of the original TT and at the same time have reinterpreted numerous elements.

The sporty vanguard has been honed significantly compared with the TTS. The three-dimensional Singleframe bears a quattro logo at the bottom and is made even more impressive by its honeycomb grille. The air inlets, behind which additional water coolers sit, share the same look. Bold profiles surround them; angled bars divide them. A blade finishes the middle air inlet towards the bottom. LED headlights are standard; Matrix LED units that control the high-beam lights intelligently and with a high level of flexibility are optionally available.

At the rear, the fixed RS wing sitting on two thin double struts is a real eye-catcher. This is part of the aerodynamic concept that promotes performance and efficiency. Audi can deliver the Coupé and the Roadster with an automatically extending spoiler upon request. Under the striking bumper, the TT RS flaunts a strongly profiled diffuser insert with four vertical fins, leading to the two elliptical tailpipes of the RS exhaust system at its sides. Along the flanks, the new TT RS models have aerodynamically shaped side sills. The result: a low c_d value of 0.32 for the Coupé and 0.33 for the Roadster.

For the first time in a series-production Audi: Matrix OLED rear lights

The TT RS is equipped with LED rear lights as standard. Upon request, Audi presents an innovation: Matrix OLED rear lights (organic light-emitting diode) in a 3D design. Their planar light is extremely homogeneous and precise. It does not cast any harsh shadows and does not require any reflectors or light guides. This makes the OLED units efficient and lightweight.

In each rear light there are four wafer-thin lighting elements that become smaller from inside to outside. The biggest one bears a TT logo and the four Audi rings. The light show when turning on the ignition is spectacular: The light runs in a fast loop over all four units. Lastly, an arrow-shaped, visually homogeneous LED light guide lights up, which complements the OLED rear light. The dynamic turn signals, which run in the direction the driver intends to turn, are located at the lower edge of the rear lights. Reflectors, reversing lights and rear fog lights are positioned in the upper zone.

Wide variety: paint finishes and appearance packages

Audi delivers both models in nine colors, including the RS-specific tones of Nardo gray and Catalunya red, metallic. In addition, numerous customized paint finishes are available through the Audi exclusive program. The optional matt aluminum and gloss black styling packages set accents on the Singleframe, on the blade, on the RS rear wing and on the diffuser insert.

Interior

The taut exterior design of the new TT RS models is continued into the interior. The cockpit with its slim instrument panel has clean lines and is clearly laid out. The wide center console is inclined toward the driver. Particularly striking are the round air vents, which occupy a central position in the instrument panel and house the controls for the deluxe automatic air conditioning. These include the controls for the heated seats, temperature, recirculation mode, air flow distribution and air flow strength. Small displays in the center of the air vents show the settings chosen.

The driver and front passenger sit in low-mounted RS sport seats. These are particularly lightweight, have integrated head restraints and strongly contoured seat side bolsters (with optional pneumatic adjustment). The Alcantara upholstery features a diamond pattern. Embossed RS logos decorate the backrests. The RS-specific seat upholstery in V-perforated fine Nappa leather, also in diamond pattern, is even more stylish. It is available in four color combinations: Black/gray, black/red, Murillo brown/gray, palomino brown/gray.

The surface of the instrument panel is softly backed with foam and features a honeycomb, slightly raised structure. It comes across as both technical and sporty. The recessed polygons are created by removing two-tenths of a millimeter of the surface with a laser in multiple steps. Each individual honeycomb is precisely aligned with the design edges of the dashboard to create a clear and linear pattern. Inlays are in Aluminum Race and optionally in carbon. RS design packages in red and gray set color accents in the interior, including on the air vents, seat belts and floor mats with the RS logo. Various leather packages that additionally upgrade elements of the interior complete the range.

The new Audi TT RS is a sports car with a high level of everyday usability. In the case of the 2+2 seater Coupé, the luggage compartment under the long rear hatch offers a basic capacity of 305 liters (*10.8 cu ft*), which can be increased to 712 liters (*25.1 cu ft*) by folding down the rear seat backs. The Roadster provides 280 liters (*9.9 cu ft*) of luggage capacity. A pass-through is integrated into its rear wall.

Controls and displays

The infotainment system in the new TT RS is state of the art. Its menu structures are oriented on those of the latest smartphones. Hierarchies are flat; frequently used services can be reached in just a few steps. Drivers can control all important functions without having to take their hands off the steering wheel – just like in a race car. In addition to the multifunction buttons for telephone, navigation, media and the voice control system, the standard RS sport leather steering wheel with shift paddles is also equipped with two large satellite controls. They are used to turn the engine on and off and to set the Audi drive select dynamic handling system.

The standard MMI radio is operated in the classic manner via the round rotary pushbutton on the center console. In combination with the connectivity package or the MMI navigation plus, its surface includes the touch-sensitive MMI touch.

The touchpad is used for entering characters and multifinger gestures. Drivers can scroll and zoom just like with their mobile phones. The toggle switches for the most important basic menus Navigation/Map, Phone, Radio and Media are located above the rotary pushbutton. The main menu button and back button are located centrally beneath the touchwheel. The buttons to the left and right of it open intelligently linked function and context menus.

Free text input: MMI search

MMI search suggests answers after just a few letters have been entered, taking into consideration the location of the car. When searching for a place to eat, for instance, the driver only has to enter the name of the restaurant and the first letters of the city and a list of hits appears – anywhere in Europe and with the addresses. Searching for songs, albums and radio stations works similarly.

“Where can I get gas?”: natural language voice control

This is augmented by a natural language voice control system that understands questions and commands in everyday language. Saying “I want to talk to Peter Mueller” or “Connect me with Peter Mueller” is now sufficient to call a contact. The navigation system responds to questions such as “Where can I get gas?” or “Where is the next rest stop?” Voice commands can even be used to play music files and select radio stations. In the Roadster, the microphones of the hands-free system are integrated into the seat belts. This ensures high audio quality, even with the top open.

Tack sharp: Audi virtual cockpit with RS-specific display

The Audi virtual cockpit is used for all displays in the TT RS. The 12.3-inch TFT monitor has a resolution of 1440 x 540 pixels and presents all information in detailed, elaborately rendered graphics. The virtual dial instruments, for example, are refreshed 60 times per second so that the motion of the needles is absolutely fluid, even under full acceleration.

Drivers can switch between three modes using the “View” button on the multifunction steering wheel. The classic view highlights the speedometer and tachometer. In Infotainment mode, the dial instruments are smaller. The focus is on the navigation map and lists from the Telephone, Radio and Media areas. On the RS screen, the tachometer with integrated speed display dominates. The other displays, such as torque, output, tire pressure and g-forces, can be configured around this. The tachometer also serves as shift indicator. If the seven-speed S tronic is in manual mode, green, orange and red segments are activated sequentially as revs increase. Just before the engine reaches the limit, the entire scale flashes red.

Infotainment and Audi connect

The top infotainment offering is MMI navigation plus with MMI touch. The high-end system is a versatile media center. It offers two card readers, the Audi Music Interface (AMI) for connecting portable media players, a DVD drive, an Aux-in connection and a Bluetooth interface for hands-free telephony and audio streaming. 10 GB of flash storage for music files, eight speakers and a speed limit display based on the navigation map round out the spectrum. The Wi-Fi hotspot allows passengers to surf the Internet from their mobile devices.

New: Audi smartphone interface and Audi Sport Performance app

The Audi smartphone interface is available for the TT RS for the first time. It brings Apple Car Play and Android Auto into the car. Selected apps, such as telephone, navigation, music and a series of third-party apps, can thus be mirrored from the smartphone to the Audi virtual cockpit via USB. Content is easily accessible via the multifunction steering wheel, voice command and the rotary pushbutton.

New in the program is the Audi Sport Performance app, which makes it possible to compare two lap times. The driver chooses a racetrack from the database, alternatively drives a route with the car or creates a route using Google Maps. The app displays the speed, time difference, steering angle, g-forces, as well as rpm, gear, brake pressure and accelerator pedal position on the smartphone.

Drivers also see their current position on the track in Google Maps using the GPS signal. The app draws its data from the on-board electronics; access is via Wi-Fi. The data can be exported from the smartphone at a later point. The app also allows the creation of multiple driver profiles. Their use is permitted only on closed racetracks, not on public roads. The app for Android and iOS can be downloaded from the respective stores.

Surfing the web with LTE: Online services and the Audi MMI connect app

The Audi connect module is the ideal complement to MMI navigation plus. It uses the fast LTE standard to deliver the brand's Internet services to the car, including navigation with Google Earth and Google Street View; traffic, travel and parking information and also access to Twitter.

The free Audi MMI connect app, which customers can download from the Google Play Store or the iOS App Store, offers even more possibilities. Drivers can look up where their TT RS is parked and display the appointment calendar from their smartphone in the Audi virtual cockpit. They can then use the meeting location as a navigation destination and save the telephone number of the person to be met as a contact. The app also enables online media streaming from web radio stations and access to the Aupeo! service and the music portal Napster. Data is transferred from the smartphone to the MMI via Wi-Fi. On top of all that, there is also traffic and travel information. A primary advantage of the Audi MMI connect app is that – just like with Audi connect – drivers can control all functions via the MMI system, as the content is displayed in the Audi virtual cockpit. They can therefore continue to devote their full attention to what is happening on the road.

Inductive charging: the Audi phone box.

The Audi phone box in the center console wirelessly connects the cell phone to the car antenna per near-field coupling. This guarantees the best possible reception. Wireless charging according to the Qi standard provides for a full battery. With this system, the current flows inductively from a coil in the base of the box to the receiver coil in the smartphone.

680 watts, 12 loudspeakers: the Bang & Olufsen Sound System

In the factory-fitted configuration, eight loudspeakers flood the interior with sound. With the optional Audi sound system, this number increases to nine. The Bang & Olufsen Sound System drives 12 loudspeakers, including two bass boxes in the doors, with 680 watts of power for fascinating surround sound. Rather than small holes, their bezels feature fine grooves. The woofers have anodized aluminum elements bearing the logo of the Danish hi-fi specialists. At night, narrow LED light guides emit white light.

Equipment

The new TT RS models will be marketed under the label Audi Sport. Prices for the Coupé start at 66,400 euros, and the Roadster is listed at 69,200 euros. Both models offer a generous list of standard equipment, from LED headlights and heated exterior mirrors to RS sport seats with integrated head restraints, RS sport leather steering wheel with multifunction and deluxe automatic air conditioning. Highlights include progressive steering, quattro drive, the Audi drive select dynamic handling system and the Audi virtual cockpit.

The standard parking system plus provides for safe and easy parking. The system informs the driver visually and acoustically and with the aid of guide lines. The list of standard equipment also includes the multicollision brake assist system, which is activated following an accident and prevents the uncontrolled rolling of the TT RS.

Audi active lane assist – another standard feature – activates at approximately 65 km/h (*40.4 mph*). The system identifies the lane markings on the road surface by means of video camera in the interior mirror. If the car approaches a marking line without indicating, the system uses a gentle nudge of the steering to help the driver steer back into the lane.

The TT RS also offers numerous options: carbon-fiber ceramic brake discs for extremely heavy use, Matrix OLED rear lights, Matrix LED headlights, RS sport suspension plus with adaptive dampers and a wide range of infotainment. Audi can offer the TT RS with optional traffic sign recognition. It compares data with the navigation system to indicate speed limits, auxiliary signs and no-passing zones. The optional Audi side assist helps when changing lanes. Its radar sensors warn drivers via a bright LED light on the respective exterior mirror if a car is in the blind spot or is approaching rapidly from the rear.

History of five-cylinder engines

The 2.5 liter TFSI engine in the new TT RS is continuing a great tradition: Audi used five-cylinder engines with great success in rally racing back in the 1980s. Today they provide for an emotional driving experience in production vehicles. The powerful and versatile engines have honed the new, sporty profile and made a key contribution to *Vorsprung durch Technik*.

The five-cylinder gasoline engine premiered in 1977 in the Audi 100 5E. A modern injection system contributed to efficiency and strong power delivery: 100 kW (136 hp) from 2.1 liters of displacement. In 1978, a naturally aspirated diesel engine with a displacement of two liters and 51 kW (70 hp) followed. One year later, the first five-cylinder gasoline engine with turbocharging made its debut – another pioneering achievement from Audi. It powered the new top model, the Audi 200 5T, with an output of 125 kW (170 hp) and 265 Nm (*195.5 lb-ft*) torque.

One year later, the new engine proved to be even more impressive – in the Audi quattro from 1980. With turbocharging, intercooling and permanent all-wheel drive, it formed a strong technology package for road use and racing. At the start of sales it produced 147 kW (200 hp). The 1984 Sport quattro, which was the basis for a new Group B rally car, was powered by a newly developed four-valve light-alloy engine with 225 kW (306 hp).

In the competition cars for the World Rally Championship, the five-cylinder demonstrated its immense potential, delivering up to 350 kW (476 hp). Even after Audi left rally racing, additional highlights followed: The Audi Sport quattro S1 E2, in which Walter Röhrl won the Pikes Peak Hill Climb (USA) in 1987, produced 440 kW (598 hp). And the IMSA-GTO dominated the American touring car scene in 1989 with a substantial 530 kW (720 hp) – and still from a displacement of little more than two liters.

In series production, Audi used an increasingly differentiated range of five-cylinder engines. The Audi RS2 with 232 kW (315 hp) was launched in 1994. As the Avant with sports car power, it advanced to become the founder of a new class of car.

The engine concept also achieved great success in the diesel sector: The 1989 Audi 100 TDI, a 2.5-liter diesel with direct injecting and 88 kW (120 hp), is a milestone in automotive history.

In the mid-1990s, the new V6 engines gradually replaced the five-cylinders. The comeback followed in 2009 – with turbo charging and direct injection in the Audi TT RS. The transverse engine produced 250 kW (340 hp) from a displacement of 2.5 liters. The TT RS plus that followed in 2013 even achieved 265 kW (360 hp).

Fuel consumption of the models named above

Audi TT RS Coupé:

Combined fuel consumption in l/100 km: 8.4 – 8.2** (*28.0 – 28.7 US mpg*);

Combined CO₂ emissions in g/km: 192 – 187** (*309.9 – 300.9 g/mi*)

Audi TT RS Roadster:

Combined fuel consumption in l/100 km: 8.5 – 8.3** (*27.7 – 28.3 US mpg*);

Combined CO₂ emissions in g/km: 194 – 189** (*312.2 – 304.2 g/mi*)

**Figures given in ranges depend on the tires/wheels used