

# JOHN COOPER WORKS TUNING MINI COOPER S

**SWORKS** 



#### Racing in the blood

Coopers are in Britain's blood. All over the world 'Cooper' means not just British automotive excellence, but personal passion and demand for the very best. The name says far more than 'Turbo' or 'GTI' ever can, standing as it does for the expertise and passion of three generations of one family. A MINI Cooper S is that rare thing, a uniquely affordable fast, fun car with a heritage to be proud of.

Fit a John Cooper Works tuning kit to your MINI Cooper S!

#### A history of winning

Formed in 1946 to design and produce the Cooper 500 Formula 3 racing car, the Cooper Car Company was an affordable way for amateurs to get into motor racing.

The Cooper Car Company became the world's first and largest post-war, specialist racing car manufacturer culminating in winning the Formula 1 Drivers' and Constructors' World Championships in 1959 and 1960 with Jack Brabham at the wheel. Soon after, Coopers went to Indianapolis



▲ John Cooper – legendary F1 constructor and Mini Cooper originator.

in America and the rear engine concept soon became the norm. Then, in the late 50s, a new car caught John Cooper's eye. The Mini.

#### From Mini Cooper to MINI Cooper S

In 1959 the British public was introduced to the amazing Mini with the first Mini Cooper launched in 1961. The injection of John Cooper's racing know-how created a world-beating fun, fast car that had few rivals.

In 1970 Mini Cooper production came to an end. Years were to pass before demand and enthusiastic interest led to the Mini Cooper revival.



▲ John (Smoking) Rhodes racing one of the famous 'Works' Mini Coopers.



## STARTER'S ORDERS MINI COOPER S



▲ Mike Cooper continuing the family tradition.

John Cooper engine-tuning kits and performance parts were shipped all over the world to enable new Mini Cooper owners to satisfy their dreams.

In the late 1990s the MINI project asked John Cooper and his son Mike to contribute their expertise. Given unprecedented access to the initial designs, Mike Cooper was personally invited to give his unique insight into what a MINI Cooper S should drive like, sound like and feel like. The result – the new MINI Cooper S – is a car worthy of its famous name.

#### John Cooper Works for your MINI Cooper S

The Works Team was the name given to Cooper's own drivers racing in the 50s and 60s. Today, John Cooper Works produces the perfect fitting tuning kit for the MINI Cooper S.

Almost three years in development, the John Cooper Works tuning kit is the definitive addition to your MINI Cooper S. Fifty years of racing heritage and experience, coupled with the latest computer design and testing, have resulted in a tuning kit that takes the already quick and nimble MINI Cooper S to new levels of driver appreciation.

#### Tried and tested

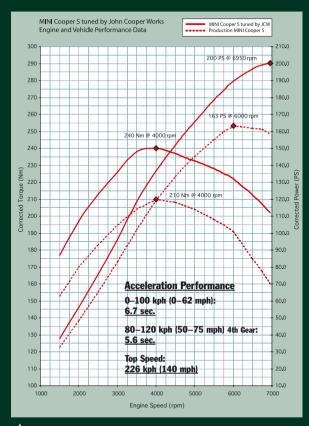
From 35 degree heat in Southern France to minus 20 degrees in Scandinavia, from 20,000 miles of high-speed testing to 150,000 road miles of durability testing, the John Cooper Works tuning kit has been meticulously put through its paces.

Development testing was conducted at world-class engineering facilities throughout the world including Spa, Goodwood and Miramas (the BMW Williams test track) was used extensively. The development was carried out using the latest test techniques, processes, tools and facilities as used by vehicle manufacturers and racing teams.

Badged for performance excellence.







Performance figures.

### THE VITALS MINI COOPER S

#### **Full warranty**

When you have a John Cooper Works tuning kit fitted to your MINI Cooper S, either at our facility or at authorised MINI dealers worldwide, your MINI warranty is unaffected. In addition to the individual component tests, the John Cooper Works tuning kit has been functionally checked and validated using extensive test cycles and sign-off procedures.

A John Cooper Works tuning kit gives you additional power and performance plus peace of mind.

#### What makes the John Cooper Works

Each JCW component is an integral part of the whole. Matched and balanced, together they combine to deliver the breathtaking performance and handling that discerning MINI Cooper S drivers require, together with responsible fuel consumption, emissions and noise levels

#### JCW cylinder head

Two years of cylinder head development, using full 3D computeraided design (CAD) were initially needed to get the performance John Cooper Works demanded. Using this CAD data, the heads are fully CNC machined. This ensures the highest standards of accuracy, repeatability and performance.

Statistical data taken from the production of many cylinder heads and blocks enabled the compression ratio to be optimised within the limits of performance, engine calibration and production tolerances.

#### JCW exhaust system

Developed using CAE and Finite Element Analysis (FEA) tools, this system has been optimised for exterior and interior sound level and quality.

The exhaust system has taken years of intensive development. The result is a parallel-flow low backpressure system, with superb interior and exterior noise quality.

#### **JCW** engine calibration

Using real-time data from the engine and thousands of maps and constants, all engine control functions including combustion airflow, fuelling and spark advance have been optimised. The result is lively throttle response and increased acceleration when overtaking in the all-important mid-range torque band.

#### **JCW** supercharger

The supercharger incorporates the latest development step from Eaton in North America, geared to give optimum performance with improvements in cylinder head and exhaust efficiency.

#### Advertise your tuning kit

Naturally, the MINI Cooper S tuned by John Cooper Works stands out on the road, but the John Cooper Works front and rear chrome enamel badging and the engine bay plate with unique car number also ensure that it stands out equally well when







Supercharger belt.

Spark plugs.

John Cooper Works engine bay and engine plate.

5. New sports twin exhaust.





#### **JCW** sports seat

The power and handling of your MINI Cooper S tuned by John Cooper Works need your full control to deliver their best. To really get to grips you need a John Cooper Works sports seat. Increased side-hold keeps you firmly at the wheel while tougher shoulder areas and adjustable thigh support mean greater comfort. This seat comes in most of the normal colours and fabrics with the option of heating and lumbar support, and Easy Entry as standard.

## ADDED STYLE MINI COOPER S



#### **JCW** alloy wheels

Deliver more power to the road with a set of John Cooper Works alloy wheels. Distinctively good-looking with star spokes, prominent sporty styling with big breakouts and the all-important JCW logo, these 18 inch wheels take 205/40 R 18 tyres on 7Jx18EH2 rims that support the Runflat System. So even with a total flat, you can drive a few kilometres without damaging your great new alloys.

### John Cooper Works tuning – fast forward into the future

Your MINI Cooper S tuned by John Cooper Works is a unique road machine. The latest incarnation of a name that is known around the world as a stylish comfortable four-seater car that is fast, fun driving in a world of boring, wind-tunnel carved sameness.

When you drive a MINI tuned by JCW, you follow in the tracks of those brilliant racing legends that drove Coopers over the years.

John Cooper Works has the experience and expertise to make your MINI Cooper S even better, delivering greater performance and handling without affecting your MINI warranty.



# YOUR MASTERPIECE MINI COOPER S



