The world's biggest Porsche magazine

911 GT3 RS EXPLORED!

HRKISOV

# **Objective States of Control S**



MAY 2015



GTPOR

Issue 162

£4.50

**BIBLBVY** 

### PERFORMANCE AND SERVICE THAT DOESN'T COST THE EARTH!

- Boxster / Cayman / Cayenne / all 911
   Models (1984 present)
- 944 Turbo / 944 S2 Specialists
- Fixed Price Servicing
- Main Dealer Equivalent Diagnostics
- Courtesy Cars Available
- Very Competitive Labour Rates, Exceptional Service, fast Turnaround
- Large Spares Inventory
- Comprehensive 3D Alignment and Geometry Facilities
- Bilstein and KW Suspension Kits
- 15 minutes from Milton Keynes



ProMAX Motorsport Ltd, The Warehouse, Sunnyhill Farm, Little Horwood Road, Great Horwood, Bucks. MK17 0NZ. Tel: 01296 714856 service@promaxmotorsport.com • parts@promaxmotorsport.com

www.promaxmotorsport.com

# Ignition



Simon Jackson Editor **y**@retro\_jackson

ollowing the exciting announcement of the Cayman GT4 last month comes news of the 911 GT3 RS – unveiled at the recent Geneva Motor Show. Early reports suggest that the GT4 is an absolute riot to drive, see regular *GT Porsche* contributor Andrew Frankel's opinion on page 72, but judging by its raw ingredients, the GT3 RS should be even more electrifying.

At Geneva, footfall to the Porsche stand said it all, the first sighting of the GT4 was probably enough to entice the crowds, but with the covers whipped off the GT3 RS too? Well, the booth was heaving. 'Mr GT3' Andreas Preuninger was on hand for the duration of the show's press days, watching over the attention his latest creation was garnering like a proud parent. Preuninger was happy to talk about the car with the sort of passion and knowledge that is what makes the Porsche brand so special. Ultimately the RS is far more than just a tweaked GT3, far, far more – see page 16 for more.

Not only is 2015 already shaping up to be a great year for Porsche GT cars, it's also looking like another year which will play witness to the ever-rising popularity of the enduring 911. Whether you agree with the idea of a 911 as a financial investment or not, asking prices are now playing an important part in

lssue 162 May 2015

the world of Porsche ownership, and getting on that ladder at the lower end of the market has never been trickier. As such, we've looked into a few of the most sensible classic 911 purchases for 2015, models which we think still have some head room to grow in popularity, and, therefore, value – page 30.

With all this in mind we've also picked the brains of some of the most respected Porsche specialists this month to get their views on the current state of classic 911 prices, page 27. Their mixed opinions make for interesting reading, and if you can draw any blanket conclusion from them as a whole it's that the subject remains a divisive and contentious one! Where do you stand? We'd love to hear your opinion through the usual channels.

Lastly I wanted to mention our summer track evening at Brands Hatch in Kent on 22 June. As usual it's an open pit lane affair, and a Porscheonly event that we hope will attract a great mix of cars. Even if you're not taking to the circuit, entry to the event is free for spectators so we'd love to see you there in your Porsche, so come and grab a coffee and enjoy the action under (hopefully) some summer evening sunshine.





# Regulars

800	News The latest news from the fast-paced Porsche world.	114	Market Place Depending on its age, a 911 Cabriolet could be a lot cheaper or a lot more expensive than a coupé of the same age and type.
012	Motorsport Month We look at the year ahead for a bolstered Carrera Cup GB grid, and review the opening rounds of the Pirelli Challenge series in Texas.	120	All You Need To Know Hybrid technology can be confusing, but it's here to stay, so as a Porsche buff you'd better know what you're talking about
024	JUST LOOKING Peter Morgan considers the high end of Porsche classic car investment.	122	Tech Guide Detailing part two: deep cleaning your car in the right way can make a
081	Second Thoughts Simon Jackson looks at Porsche's battle to win in modern motorsport.	124	big difference. Porsche Shop
082	Automobilia Automotive paraphernalia, Porsche or otherwise. This month 'auto art'.		The latest new products from the automotive world and specialist Porsche retailers – don't forget your credit card.
098	GT Porsche Retrospective A look back at what we were up to one, five and ten years ago.	159	Specialist Focus This month the spotlight falls on Jasmine PorschaLink UK.
101	Long Termer Fleet The latest running reports from our long term fleet of Porsches.	162	Porsche Moments Colin Goodwin recalls his previous Continental blasts having recently driven to the Geneva Motor Show.



EDITOR Simon Jackson SUB EDITORS Christian Shelton, Rachael Willson SENIOR DESIGNER Aaron Batson DESIGNERS Kelly Rodgers, Dave Powney, Tom Jackson SENIOR RETOUCHER Laurence Green CONTRIBUTORS Matt Biggs, Jesse Crosse, Jamie Fretwell, Andrew Frankel, Colin Goodwin, Peter Morgan, Philip Raby, Martin Spain, Louise Woodhams, Neill Watson PHOTOGRAPHY Anthony Fraser, Gus Gregory, James Lipman, Matthew Berenz, Rob Richardson, Neill Watson THANKS THIS ISSUE Mike Orford, Nick Peny, Rob Punshon, Hannah Palmer, Porsche Archive, Racing Models, Ben White, 4 Star Classics ADVERTISEMENT MANAGER John Swanton PRODUCTION MANAGER John Swanton PRODUCTION ASSISTANT Karen White PRODUCTION ASSISTANT Karen White REPRO CONTROLLERS Marion Jenkins FINANCE Helen Lawson, Claire Brown EXECUTIVE PA Sandra Baldock CHAIRMAN Dennis Taylor

EDITORIAL & ADVERTISING ENOUIRIES GT Purely Porsche, Unity Media plc, Becket House, Vestry Road, Sevenoaks, Kent, TN14 5EJ Tel: 01732 748000 Fax: 01732 748001 Website: www.gtpurelyporsche.com

Follow us on...

### Email enquiries

Editorial: gtpurelyporsche@unity-media.com Advertising sales: jswanton@unity-media.com Advertising production: jclaydon-smith@unity-media.com Subscriptions: subs@unity-media.com

### INDEPENDENCE

INDEPENDENCE GT Purely Porsche is published monthly by Unity Media plc for owners, drivers and enthuisats of the Porsche marque. It is wholly independent of Dr Ing hc F Porsche AG, its subsidiaries, Official Porsche Centres and Porsche Club Great Britain. The word "PORSCHE", the "PORSCHE Cerest" and the "PORSCHE script" are registered trademarks of Dr Ing hc F Porsche AG.

### DISTRIBUTION:

@GTPorsche

If you have difficulty finding *GT Purely Porsche* in the shops, please contact: Seymour Tel: 020 7429 4000 PRINTED BY: William Gibbons & Sons Ltd

All rights reserved. No part of this publication may be reproduced or transmitted in any form or by any means, electronic or mechanical, including photocopying, recording or any storage or retrieval system without the written consent of the publisher. Registered at Stationers Hall Copyright. Direct input by Unity Media pic. While every effort is made in compiling *GT Purely Posche*, the publisher. Cannot be held responsible for any errors or omissions. Readers are advised to pay by Credit Card when ordering goods off the page, as they are regulated under the Consumer Credit Act 1974, unlike debit or charge cards, which are not.

GT Purely Porsche, established November 2001 (ISSN 1050 – 182X), is published on the second Thursday of every month (12 times per year) by Unity Media pic and in North America by Unity Media Communication Ltd c/o USACAN Media Dist. Srx. Corp. at 26 Power Dam Way Suite S1-S3, Plattsburgh, NY 12901. This issue is on sale 09 April 2015. The June 2015 issue will be on sale 14 May 2015

*GT Purely Porsche* is available for international licensing and syndication. **Email**: hlawson@unity-media.com

### SUBSCRIBE TODAY AND SAVE! T: +44 (0)1732 748084

E: subs@unity-media.com

W: www.gtpurelyporsche.com DOWNLOAD DIGITAL EDITIONS DIRECT FROM:









Facebook.com/GTPorsche SUBSCRIBE AND SAVE AT www.gtpurelyporsche.com

### 016 911 GT3 RS The new 911 GT3 RS stole the Geneva Motor Show, and with good reason. 'Mr GT3', Andreas Preuninger, talks us around his latest mind blowing RennSport creation... 032 911SCs Long the poor relation of the Carrera 3.2, the 911SC is now being appreciated for what it really is – a great 911. Values are rising accordingly so now could be the time to buy one – while you still can... 040 964 v 911T Got a little more cash to splash on a 911? Two decades apart, the E-Series and 964 proffer alternative prospects for around . £35k-50k... John Fitzpatrick Briton John 'Fitz' Fitzpatrick raced Porsches 051 at the highest echelons during the '60s, '70s and '80s, yet his name might not be all that familiar. It's time that was put to rights... Cayenne S Diesel road trip What better way to road test the immense 058 new Cayenne Ś Diesel V8 than a 500-mile day trip to Paris? 16-cylinder engine We have all heard of 6-, 8- and 12-cylinder racing engines, but a 16-cylinder motor? 064 072 Cayman GT4 Andrew Frankel drives the Cayman GT4 on road and track in Portugal, but the real question is, can it really live up to all the excitement? 084 356 B Cabriolet Segal Motorcar Company has restored this 1961 356 B Cabriolet with eye-watering attention to detail. 092 Macan Tuning Modern car remapping technology is more seamless than ever. We talk to the owner of a brand-new Porsche Macan as he



hands his car over to be remapped.





# the news



Revealed: the new 911 GT3 RS was certainly worth the wait - it is radically different from the 'standard' GT3



# GENEVA MOTOR Show 2015

### Porsche revealed the new 911 GT3 RS at Geneva but it wasn't the only Porsche-centric stand

### PORSCHE

Unless you've been hiding under a rock you will be well aware that Porsche unveiled the new 911 GT3 RS at the recent Geneva Motor Show in Switzerland.

As we predicted in our March issue, power comes from a new 4.0-litre sixcylinder engine producing 500hp and 353lb ft torque, making it the most powerful naturally aspirated 991 to date. A specially designed PDK gearbox helps the car achieve a 0-62mph time of 3.3 seconds. The GT3 RS is 10kg lighter than the standard GT3 model: the roof panel is made of magnesium and carbon fibre is used for the engine and boot compartment lids. Visually the RS is distinctive thanks to functional aerodynamic additions, a wide-body (like the 911 Turbo), and unique front wheel arch air vents.

As you would expect, the GT3 RS has been tuned for fantastic agility on road and track, rear-axle steering and Porsche Torque Vectoring Plus features with fully variable rear limited-slip differential. The new model also features a race-style neutral facility activated via its paddles and a 'pit speed' speed limiter function. Inside, the GT3 RS boasts sports seats based on the carbon fibre buckets in the 918 Spyder, and Porsche's Club Sport Package comprising a bolt-in roll-cage, the option for a six-point harness for the driver and a fire extinguisher with mounting bracket.

The GT3 RS has lapped the Nürburgring in 7 min 20 seconds – faster than a Carrera GT supercar. Available to order now, the GT3 RS is priced from £131,296. Expect to see the first cars on our roads in May, we'll be bringing you a full road test as soon as we get our hands on one.

Alongside the GT3 RS was our first proper sighting of the new Cayman GT4, Porsche's most extreme midengined two-seater sports car to date, and the first non-911 to pass through the hands of the Porsche Motorsport team at Weissach. And as the images had suggested the GT4 is quite the looker in the metal. At Geneva, Porsche displayed a bright yellow car, and getting up close and personal with it revealed some rather delicious details, such as the intricacies of the adjustable rear wing, and the tasty (optional) 918style seating.

All told we spent a large amount of time on the Porsche stand at Geneva and it drew consistent crowds, the GT4 and GT3 RS were certainly highlights of the show for many.



Our first look at the Cayman GT4 in the metal certainly didn't disappoint. Shortly after Geneva we got behind the wheel - see page 72

# the news



### RUF

Away from the official Porsche presence at Geneva, the most exciting stand was that of specialist RUF Automobile, which had a jaw-dropping display of Porsches.

Amongst them was its latest CTR 3, nicknamed the 'Hippie'. The car's design was influenced by the famous designer, and friend of RUF, Richard Soderberg, who sadly passed away in 2014. This individual design features the low and wide front end of the CTR 3 with the steeply rising wings that form its athletic appearance.

Underneath the car's carbon skin, various high performance components are combined. The turbocharged flatsix produces 777hp, while developing 723lb ft torque. This power is transferred to the rear wheels via a sixspeed manual or (optional) sevenspeed double clutch gearbox. This Clubsport version, the highest level of tune for the CTR 3, also features wheel arch extensions and a fixed carbon rear spoiler.

Alongside the CTR 3, RUF's display of 911s ranged from the classic Targa to a pair of stunning 991s, but for us the pick of the bunch had to be the 964, which boasted a simply magnetic draw. Confirmation, if it were at all needed, that RUF remains at the top of its game, unlike some of the established German tuning houses we could mention...

Visit www.ruf-automobile.de for a full picture of what RUF is all about.







### **DOVE HOUSE MOTOR COMPANY** "the difference is our commitment to exceptional service"

### **Porsche & Prestige Sports Specialists**



Porsche 911 (997) 3.8 Carrera S Coupe Gen II 2011/61, 37,600 miles, Manual, Dark Blue Metallic, Engine Size 3800, Black Leather, PCM 3 -Touchscreen Sat Nav, Bluetooth Phone Prep, BOSE Surround Sound System, Heated Seats Cruise Control, Park Distance Control £46.900



Porsche 911 (997) 3.8 Carrera S Coupe PDK Gen II 2011/61, 48,200 miles, Automatic, Basalt Black

Engine Size 3797, Black Leather, PCM 3 - Touch Screen Sat Nav, Bluetooth Phone Prep, Sport Chrono Pack Plus, Heated Seats, Electric Sunroof, Park Distance Control . £45.900



Porsche Panamera 3.0 D V6 Tiptronic 2012/12, 43,550 miles, Automatic, Carrara White, Engine Size 2967, Black Leather, PCM 3 - Touch Screen Sat Nav, Bluetooth Phone Prep, Sport Chrono Pack Plus, BOSE Surround Sound Sys tem, Electric Memory Seats, Powerlift Tailgate, Heated Seats £ 44 995



Porsche Panamera 3.0 D V6 Tiptronic 2012/12, 46,700 miles, Automatic, Platinum Silver, Engine Size 2967, Black Leather, PCM 3 -Touch Screen Sat Nav, Bluetooth Phone Prep. Sport Chrono Pack Plus, Reversing Camera, Servotronic, Electric Memory Seats, Automatic Adaptive Xenon Lights with Wash ...... £ 43,495



Porsche 911 (997) 3.8 Carrera S Coupe PDK Gen II

2009/59, 53,500 miles, Automatic, Basalt Black Engine Size 3797 Black Leather PCM 3 - Touch Screen Sat Nav, Bluetooth Phone Prep, Sport Chrono Pack Plus, BOSE Surround Sound System Heated Seats £ 39,900



Porsche 911 (997) 3.8 Carrera S Coupe PDK Gen II

2009/59, 59,850 miles, Automatic, Basalt Black Engine Size 3797, Black Leather, PCM 3 - Touch Screen Sat Nav, Bluetooth Phone Prep, Sport Chrono Pack Plus, PSE - Porsche Sports Exhaust, Cruise Control £ 39 900



Porsche Cayenne D 3.0 V6 Tiptronic 2011/61, 58,600 miles, Automatic, Dark Blue Metallic, Engine Size 2967, Black Leather, Servotronic, PCM 3 - Touch Screen Sat Nav, Bluetooth Phone Prep, Air Suspension, PASM, Electric Memory Seats, Heated Seats





Porsche Cayenne 4.8 Turbo Tiptronic 2007/07, 51,700 miles, Automatic, Basalt Black. Engine Size 4806, Black Leather, PCM - Sat Nav with Phone, Porsche Dynamic Chassis Control, BOSE Sound System, Electric Memory Seats, Heated Front and Rear Seats, Automatic Xenon Lights with Wash, Air Suspension ...... £ 24,995

## **DOVE HOUSE SERVICE CENTRE**





www.dovehousecars.com Crown Way, Rushden, Northants, NN10 6BS Telephone: 01933 354144 Fax: 01933 314402 Email: sales@dovehousecars.com



# motorsport month



The 2015 Porsche Carrera Cup GB boasts its biggest grid in the 12 year history of the championship.

By the time you read this the Carrera Cup will be underway with its first round taking place a matter of days after this magazine hits the shelves. That said, and in case you missed it, it's worth swatting up on the runners and riders for 2015, and the stops the championship will be making throughout the season ahead.

Since 2003, three teams have been the bedrock of Carrera Cup GB, and Team Parker Racing, Redline Racing and Parr Motorsport are returning for 2015, all with multiple car entries. Each can be counted upon to mount a serious title bid with their traditionally strong pack of 'Pro' drivers.

Reigning Carrera Cup GB champion, Josh Webster, returns to defend his title with Team Parker Racing, and is joined by Touring Car race winner and former Carrera Cup GB front-runner Stephen Jelley. Steven Liquorish also returns to Carrera Cup GB with Team Parker Racing, and is joined in the Pro-Am2 category by Rupert Martin.

Redline Racing lines up with former British Formula Ford champion Dan Cammish, who has already provided a foretaste of his Porsche pace by taking a win at the last Carrera Cup race weekend of 2014. He is joined by British GT graduate Jack Falla, and also Jordan Witt, who returns to the Carrera Cup looking to build on his impressive performances last season. Making up a fearsome foursome for the Cleveland-based team is John McCallagh, who will contest the Pro-Am2 category.

The distinctive colours of the Samsung UHD TV Racing team return with two-time Carrera Cup GB champion Michael Meadows alongside series newcomer Nicolas Latifi. Nineteen-year-old Latifi, from Canada, is dovetailing a Carrera Cup GB campaign with a season in Formula Renault 3.5, but will be a man to watch.

Further underlining the appeal to single-seater drivers of switching to racing the 460hp rear-engined 911 GT3 Cup is the signing of Dino Zamparelli by Parr Motorsport. Twenty-two-year old Zamparelli raced in GP3 last season and was a frequent visitor to the podium. Now, he is looking forward to the challenge of driving the Porsche, and continues to enjoy the backing of Bristol Sport.

Another driver sure to be on the pace again this year is seasoned Porsche racer Mark Cole who returns to the grid with Parr Motorsport, in partnership with Nicholls & Clarke ceramics. And lining up alongside Zamparelli and Cole at Parr Motorsport is proven Carrera Cup GB race winner Paul Rees, who finished third in the championship last year. Parr also field championship returnee Peter Kyle-Henney in Pro-Am2.

Heading the new teams is Essex-based Credit4Cars led by Iain Dockerill, which will field a multiple car line-up. Driving alongside Ian Dockerill are his son, Chris, and Peter Parsons. Another new entry is G-Cat Racing, which will be running former GP3 racer Ryan Cullen. The team will also run cars for Peter and Shamus Jennings.

The revised calendar this year sees Carrera Cup GB supporting the World Endurance Championship race at Spa in Belgium.

2015 Porsche Carrera Cup GB championship Rounds 1 & 2: 4/5 April – Brands Hatch (Indy), Kent Rounds 3 & 4: 1/2 May – Spa, Belgium (FIA WEC support race) Rounds 5 & 6: 6/7 June – Oulton Park, Cheshire Rounds 7 & 8: 27/28 June – Croft, North Yorkshire Rounds 9 & 10: 8/9 August – Snetterton, Norfolk Rounds 11 & 12: 22/23 August – Knockhill, Scotland Rounds 13 & 14: 26/27 September – Silverstone (National), Northamptonshire Rounds 15 & 16: 10/11 October – Brands Hatch (GP), Kent









# motorsport month

# PIRELLI WORLD CHALLENGE

### Porsche secured four wins and six podiums as the Pirelli World Challenge season got underway at the Circuit of the Americas in Texas.

The number 31 EFFORT Racing Porsche 911 GT3 R qualified fourth in the GT class in Texas at the first round of the Pirelli World Challenge. Moving to second from a standing start it began chasing the Lamborghini of Nicky Catsburg who would receive a drive-through penalty for crossing a white line, handing the GT3 R the lead, a lead it would retain for the next 20 laps, hotly pursued by Olivier Beretta's Ferrari 458 Italia. The Porsche held off ex-Formula One man Beretta until the penultimate lap, whereby the Ferrari snuck by having made better use of its tyres.

In the GTA class the number 41 EFFORT Racing 911 GT R, driven by Michael Lewis, also spent much of the race leading his class, securing a class win and finishing fifth overall. The scholarship driver was competing in his first season, his first World Challenge race and his first race in a 911 GT3 R.

In the first-ever GT Cup class as part of Saturday's GT event, a group of familiar names took the top spots in their Porsche 911 GT3 Cup race cars. Colin Thompson the reigning Porsche GT3 Cup Challenge USA champion, took his 2015 Bucks County Porsche prepared by Kelly-Moss Motorsport from flag-to-flag to win that class, while TruSpeed Autosport Porsche driver Sloan Urry came home in second. Both Thompson and Urry were participants in the Porsche Young Drivers Academy at Barber Motorsports Park in late 2014. Third was 19-year-old Alec Udell, now in his fourth year of Pirelli World Challenge racing, in the GMG Porsche 911 GT3 Cup.

Round two of the championship took place on Sunday and replicated Saturday's round one success for Porsche. As successful a day Saturday was for the Porsche entries, Sunday's race brought more of the same. The number 31 EFFORT Racing Porsche 911 GT3 R Porsche finished second some four seconds behind the leading AMG Mercedes, ahead of Catsburg in the Lamborghini.

In the GTA and GT Cup races, Michael Lewis and Colin Thompson repeated their Saturday victories, with both of them taking a commanding lead in their class point championship. In fact, in GT Cup, positions one, two and three were the same as Saturday's results.

The season continues with the Grand Prix Of St. Petersburg, which will have taken place by the time you read this, but for all the latest action visit www.world-challenge.com. Live event streaming is available at www.world-challengetv.com.



## PARAGON

### The Natural Choice for Porsche



**356B Roadster** Left Hand Drive • Jet Black • Red Leather Seats Black Hood • Fully Restored • Matching Number Certificate of Authenticity • 1960 £16.0 005



911 Carrera 2 S (997 GEN II, PDK) Platinum Silver • Black Leather Seats • Touchscreen Satellite Navigation • Sport Chrono Pack with Sport Plus • 18,841 miles • 2011 (11) +53 995



911 Carrera 4 S (997 GEN II, 6-Speed) Aqua Blue • Black Leather Seats • Touchscreen Satellite Navigation • 19" Turbo Wheels • 22,596 miles • 2009 (09) £46 995



911 Carrera 2 GTS (997 GEN II, PDK) Platinum Silver • Black Leather Seats • Touchscreen Satellite Navigation • Sport Chrono Pack with Sport Plus • 23,449 miles • 2011 (11) C61\_005



Cayman S (981, PDK) Basalt Black • Black Leather Sport Seats Plus Touchscreen Satellite Navigation • 20° Carrera III Wheels • 7,310 miles • 2013 (63) £49 995



Boxster 2.7 (981, PDK) Guards Red • Black Sports Seats with Alcantara Inserts • 18" Boxster 5 III Wheels • Front & Rear Park Assist • 4,090 miles • 2013 (62) £36,995



911 Carrera 2 GTS (997 GEN II, PDK) Basalt Black • Black Leather Sport Seats Touchscreen Satellite Navigation • Sport Chrono Pack with Sport Plus • 26,934 miles • 2011 (11) £59,995



911 Turbo (997, 6-Speed) Arctic Silver • Black Leather Sport Seats • Satellite Navigation • BOSE Sound System • 19" Turbo Wheels • 32,959 miles • 2008 (08) £40 005



Cayman S (6-Speed) Basalt Black • Black Leather Seats • Pioneer Touchscreen Satellite Navigation • 19" Carrera Sport Wheels • 40,975 miles • 2008 (58) £24,995



911 Carrera 2 S (997 GEN II, PDK) Basalt Black • Black Leather Seats • Touchscreen Satellite Navigation • Sport Chrono Pack with Sport Plus • 9,064 miles • 2011 (11) \$55 995



911 Carrera 4 S (997 GEN II, PDK) Guards Red • Black Leather Sports Seats • 19" Sport Design Wheels • Switchable Sports Exhaust 37,869 miles • 2010 (10) £4.8, 905



Boxster 2.9 (987 GEN II, 6-Speed) Meteor Grey • Black Leather Seats • Black Power Hood • 18" Boxster S II Wheels • Wind Deflector 38,698 miles • 2009 (09) £20,995

### The Natural Choice for Porsche Service, Repairs & Upgrades



Why Choose Paragon?

We've been offering expert Porsche Servicing since 1993 and our vastly experienced technicians provide real value without compromise.

With transparent fixed pricing, clear communication, free courtesy cars and free local collection and delivery, we are the natural choice for Porsche service.



Capabilities & Experience

With a full range of facilities onsite including MOT testing and a tyre bay, we have everything for your Porsche under one roof.

We have 'Dealer level' diagnostic equipment and special tools, and our Porsche trained technicians have vast experience across all models and ages of Porsche.



Beyond the Conventional

We offer a wide range of enhanced services ranging from engine and gearbox rebuilds, performance tuning, upgrades and modifications through to track day preparation and support - even race car building.

Our successful racing heritage means we are experts in laser four wheel alignment and corner weighting - offering settings from standard road to fast track.



The Natural Choice

We have thrived because of our focus on building long term relationships with our customers.

Our ability to offer independent advice and high quality parts choices sets us apart - as does our commitment to offering value and exemplary customer service.

The next time your Porsche needs attention, call us on 01825 830424 - we will be delighted to help you.

At Paragon, we have superb in-house service and preparation facilities, and each car is supplied with a new MOT, a 12-month/12,000-mile comprehensive parts and labour warranty, and we also include the next due service.

### See more of our current stock at www.paragongb.com 01825 830424

PARAGON GB LTD FIVE ASHES EAST SUSSEX TN20 6HY





### The new 911 GT3 RS stole the Geneva Motor Show, and with good reason. 'Mr GT3', Andreas Preuninger, talks us around his latest mindblowing RennSport creation...

### Story: Simon Jackson Photography: Porsche

f there's one certainty in the constantly evolving automotive sphere it's that any Porsche wearing an RS badge will cause a riot at its unveiling. At this year's Geneva Motor Show that's exactly what the 991 GT3 RS did. And as I stood amongst row upon row of excited journos gathered from around the world prior to the covers being whipped off Andreas Preuninger's latest road-going track car, that stir was tangible. In fact, I think the guy stood in front of me might have been in need of urgent medical attention. The car did not disappoint.

By now you'll have all seen the stats: a 4.0-litre version of Porsche's latest DFI engine producing 500hp; 460Nm of torque (around 339lb ft); 0-62 in 3.3 seconds; a top speed of 192mph; a body constructed from aluminium, carbon fibre and magnesium weighing ten kilograms less than the GT3 (at 1420kg); a staggeringly quick (borderline insane) Nordschleife lap time of 7mins, 20secs (faster than a Carrera GT); and a devastatingly aggressive aero-led aesthetic that will turn your mother-in-law to stone at ten paces. It's all yours for £131,296, if there are any of the first UK allocation still available that is...

But as with any RennSport model to emerge through the doors at Weissach, the facts and figures don't tell the 991 GT3 RS's full story. Someone who does summerise the passion and importance of this car, though, is its creator – Andreas Preuninger. Fortunately he was on hand in Switzerland to talk us around it...

### PREUNINGER ON ENGINES:

Despite the speculation that the new GT3 RS might be a turbocharged affair, the car is actually powered by an all-new NA engine based upon the DFI found in the GT3, just as we had predicted in the run-up to its full reveal. As you might expect this retuned direct fuel injection 4.0-litre mill boasts the biggest displacement found in any naturally-aspirated 991.

Preuninger is passionate about the powerplant: "We knew the GT3 engine could be hopped-up by displacement from 3.8-litres to 4.0 and we had already introduced this capacity with the [997] RS 4.0 so we couldn't really go back on that. This was not a limited model, this car is the successor to the 3.8 RS, but still we wanted a 4.0-litre engine or one as great as the 4.0-litre engine."

But if you're thinking that a simple rebore is the extent of the changes made here, think again, as Preuninger is only too happy to explain: "There are a lot of differences to the GT3, it's not like the [old] Metzger engine. We have a different crankshaft made out of a material that is only used on the 919 LMP car called V361. It's a highly, highly clean steel that is melted and solidified several times. It's a very pure, durable and special metal, a *Star Trek*-era material that should belong on the Starship Enterprise. It's a horrendously expensive part, I cannot believe how much it costs, but it works!"

Porsche is typically modest about power outputs. Preuninger is modest, too, when discussing the power of the GT3 RS: "We've got different con rods, pistons, camshafts, cam springs and oil system – we touched a lot of parts in the engine internals. We wanted extra power. We wanted the RS to give more track performance. On paper it's 500hp but in real life it's a good deal more than that. We have to homologate GT cars way before the start of production and we always find something else during the development process. I like to be humble about these things."

When pushed a little Preuninger explains that the engine is producing around 5% more than the 500hp headline figure, making it somewhere closer to around 510hp. This increase should be comparable with the reality of engine power outputs of the past versus the numbers stated by Porsche, given Porsche's track record of underselling itself with things like this. The compression ratio of the 4.0-litre engine is identical to the GT3 at 12:9.1 but the increased stroke (taking the engine capacity from 3.8 to 4.0) means top-end revs are down by 200rpm over the GT3 to 8800rpm – final drive in a subtlety tweaked PDK gearbox increases from 3.97 (GT3) to 4.19 in this new RS car.

"It's not that it cannot do the 9000rpms of the GT3," Preuninger explains. "It just makes no sense. With a longer stroke the power curve drops off, then it feels like a diesel. It should explode up to the redline, then you have to shift. If you closed your eyes you'd have a hard time telling the difference between 8800 and 9000rpm. It's still exciting at the top end."

Using the larger 911 Turbo body in many ways created issues to work around for Preuninger and his team but it also had its benefits, too. Was there ever any chance this car might have been force-induced? "We just use the rear ducts [of the Turbo body] to cool the intercooler, and to fool everybody looking at spy shots into thinking it was going to have a turbo engine!" Preuninger chuckles. "We made use of the superwide Turbo body: it was a slick, cool solution for us otherwise we would've had to make new sides without intakes which would have been expensive [to homologate]. An effect of this is that the car has a specific sound; you hear the induction noise quite a lot more than on a GT3. I like that. It adds to the special nature of the driving sensation."





### PREUNINGER ON AERO:

One of the most striking features on the new GT3 RS is its aerodynamic package. Vents and wings seemingly protrude from every angle but perhaps the biggest talking point has been the beautiful slats on the front wings. "The slats in the front wings don't just help downforce, they absolutely double downforce," Preuninger claims with passion. "This is such a unique and important feature on the car. By opening up the front wheel fenders and allowing air to get vented we have massively contributed to the overall downforce of the car."

Naturally, all of these new aero additions are functional rather than just cosmetic but it would be easier to dismiss their significance without understanding the reason for their existence. Preuninger is more than happy to explain:

"The problem with 911s is that if you want to create overall downforce you still have to carry balance. Making downforce at the back is easy, you just need a big wing in the air but you need a countermeasure at the front to have a stable car. If you have too much at the back the car pivots around the rear axle and you get loose steering.

Preuninger's logic is flawless but it isn't until he draws a numeric comparison with the GT3 RS' forebears that these latest additions are highlighted: "To give you a comparison, the 997 RS 4.0-litre was the number one for downforce. It recorded 107 kilos of downforce at 300kph. We used winglets and vanes to achieve that. This car [GT3 RS] has more than double that downforce: 350 kilos at 300kph. This is the same, if not a tad more, than the 918 Spyder! But, and this is a big point, the GT3 RS maintains the same drag coefficient as the GT3. The GT3 has 170 kilos, so less than a third. This is unheard of. You feel it, it kicks in early because downforce is a linear function – a curve."

What that means is this dramatic increase in downforce is felt throughout the driving experience, even at speeds far lower than 300kph (186mph). As Preuninger points out, the linear nature of downforce means that even at half the speed the car will create half the downforce, so it's a noticeable aid even when you're not flat out on the race track. When combined with the mechanical grip the car is already creating, its wide 9.5-inch front wheels with huge contact patches, joined by Pilot Sport Cup 2s from the 918 Spyder (of which Preuninger is gushingly complimentary), is what combines to create this "quantum leap" in downforce between the GT3 and GT3 RS.

"Aero is a huge step over the GT3," Preuninger says. "If I had to put a number on it I'd say 300% [better]. Then the tyres are the next factor. They're 20% more sticky than on the GT3. I don't want to bash the GT3, it's a different animal but the GT3 RS was developed for the race track. The mission criteria for this car was different – it's more track-focused, less day-today driveable – it's built for a purpose, it's a sporting tool. This is what the RS has always been about. We simply went a step further with that interpretation this time."



### PREUNINGER ON CHASSIS:

"The suspension components are roughly the same as the GT3, they share nothing with the Turbos," Preuninger explains. "We have a 50millimetre wider rear track which calls for different parts, and it's the same for the front axle. Everything is forged aluminium – all race bred. They're a little bit more beefy than they would need to be solely for street use with upside down aluminium tubing dampers [Bilstein shocks] with increased spring rates [up ten percent over the GT3] and ball bearings are used all-round, like usual."

This increased track means the GT3 RS has a greater stability and is generally more visually aggressive. But adding parts has not added to weight. In fact, Preuninger is obsessed with weight loss, as you might expect. "The front fenders we used are a lot wider [than the Turbo] to maximise the track from the front to the back," he explains. "The fenders are carbon fibre rather than aluminium, which weighs just half that of the GT3's fenders. We did a lot of bodywork on the car, too. The front lid is carbon fibre. It's 1.5-kilos lighter. A real highlight of the car, though, is the roof. It's made of magnesium sheet metal."

The magnesium roof is a real masterstroke, and it's an innovation that isn't available on your average street machine. It's not even something you'll find on a high-end race car. Preuninger describes this all-new process with passion: "Three layers of sheet metal are welded together, shaped to form the curves of the 991's roofline, then bonded in situ. The magnesium roof is one-kilo lighter than a carbon equivalent would be."

Naturally this reduces overall weight but it also lowers the car's centre of gravity. Innovative and highly advanced engineering – everything you've come to expect of the RennSport department. The process of lightening didn't end there, either. "The rear end is made with a new pure material, too, which is 1.5 kilos lighter," Preuninger says. "This was a new approach, we lost a lot of sound insulation material, too. There were a lot of places we could save weight on the car. The big 21-inch wheels with huge tyres weigh more, so we had to compensate."

Increased wheel width and circumference and the 991's sizeable body (in comparison with its forebears) are the reason this GT3 RS has the smallest weight difference to its GT3 equivalent to date. Preuninger assures us that this doesn't affect the driving experience and that the 991 GT3 RS feels incredibly light and agile to drive. The 9.5x20-inch front wheels are shod with 265/30 tyres, the 12.5x21-inch rears are wrapped with 325/30 Michelins. The brake discs are 380mm with six-piston caliper items up front and four-pistons versions out back. PCCB carbon ceramics are available as an option.

"With this car we want to be in pole position. We want to be the best on the track – that's what RS has always stood for," he says. "That's why it has PDK, that's why it has the rear axle steering function – it's well worth having these systems. There are endless discussions about PDK versus manual, there is no right or wrong, there are only differences. Differences in mission criteria. We put a manual in the Cayman GT4 to show we listened to the debate. For the future we don't want to discuss this, we just want to offer both to our customers – if you don't like PDK then fine."

Of course, the PDK system fitted as mandatory in the GT3 RS has been tweaked but not as extensively as with other areas of the car. "We didn't really touch the PDK system. The internals were beefed-up and the software is one generation ahead. That's all we did to it."

For circuit use there is a 'paddle neutral' facility and a 'pit speed' button which acts as a pit lane speed limiter such as that found on fullblown race cars. Rear axle steering features on GT3 RS alongside Porsche's arsenal of modern electronic driving aids. It won't surprise you to learn that PTV with rear limited-slip differential, PASM active dampers and PSM appear. The direct democratisation of parts from the 918 down to 911 is epitomised in the GT3 RS's interior The interior follow trends established in the GT3, but the carbon fibre bucket seats are based upon those found in the 918 Spyder. The Club Sport Package comes complete with the obligatory colour-coded bolt-in roll-cage, with the option of a six-point harness for the driver, battery master switch preparation and a fire extinguisher setup supplied separately. Sport Chrono is optional.





GT3 RS IN NUMBERS:





### PREUNINGER ON THE FUTURE OF RS:

What might the future hold for Porsche's RS models and how do they compete with rival offerings from the likes of AMG or Nismo?

"I'm not a believer in this horsepower race, I don't think that's a clever thing to do. In my personal opinion 500hp makes sense at the moment. We've reached a certain point where 500 horses is enough," Preuninger rationalises. "Because 700-800hp calls for bigger brakes, more sturdy suspension – it [the car] gets heavier and heavier. It's not my overall engineering target to get 50hp more for each new generation of GT car. I'd rather turn it around and make the car lighter, working on the specific horsepower per kilo. I think that makes more sense."

At the same time, he's realistic about future power figures, which couldn't arguably return to lower digits: "We wouldn't turn back [on power outputs] but we have to concentrate on the overall package. This is not a dragster, it's a track car – there's a big difference. I hate to say it but this car is more comfortable than the GT3 on some roads because of the tyres; they're big tyres with wide shoulders, so the residual comfort is high,"

And Preuninger is pragmatic about whether or not we will see an RS model with drastically more than 500hp in future: "When we introduced the 996 GT3 Mk1 in 1998/9 it barely had 350hp; if someone had told us that in ten years there would be a 4.0-litre version of this with 500hp we'd have said 'yeah, come on'. The same thing goes for today, technology moves on. We have some clever ideas about what to do with this engine in the future so it has got a lot of potential.

"It's the same as this Nordschleife 'rat race' we are at 7mins, 20secs with this car [GT3 RS] come on guys, everybody is talking about this with a pint of beer in his hand, mostly without being able to personally drive faster than 8mins, 30secs," Preuninger says. "Anyone who has riden in a car with a professional driver doing 7mins, 20secs at the 'Ring knows what I'm talking about - this is really, really fast. For me it's more important that everybody has fun with the car and can drive very fast to their own abilities. They can grow with it because more often than not the tool, the car, is more capable than they are. We are looking to make the car more confidenceinspiring when we tune the systems. Maybe we could make a 7min, 15sec car but then it would be a dog to drive on the street - I don't want that, everything is about compromise."

Whichever Porsche this man touches next, you can be sure it'll cause a riot. The new 991 GT3 RS hits UK roads in May priced at £131,296. It may be £30,000 more expensive than the 991 GT3 but judging by what Andreas Preuninger has to say, it's worth every penny  $\circ$ 

### 2015 911 GT3 RS

ENGINE: 3996cc flat-six direct injection TRANSMISSION: Seven-speed PDK BRAKES: 380mm ventilated discs with six-piston (front) and four-piston (rear) callipers, PSM CHASSIS: MacPherson struts (front), multi-link rear suspension. Electromechanical power steering, PASM WEIGHT: 1420kg PERFORMANCE: Top Speed: 193mph (claimed) 0-62mph: 3.3 seconds (claimed) Fuel Consumption: 22.2mpg (combined, claimed) CO<sub>2</sub>: 296g/km ON THE ROAD PRICE: £131,296



# Suspension Science, Made Easy.

www.ElephantRacing.com

- High tech suspension systems and parts
- · Elephant Racing engineered, in Silicon Valley
- · Restoration to full-race
- · Easy to configure packages at ElephantRacing.com

The science of suspension is daunting. So many options and complex interactions. Choose complementing parts balanced as a system and your suspension will sing. Choose the wrong mix and the song falls flat.

We are performance-obsessed Silicon Valley engineers who live for this challenge. We've done the hard work so you don't have to.

Using sophisticated development tools, modern materials, and innovation we've re-engineered every component of the suspension. We make it work as a balanced system. Better, faster, smarter.

### Best of all, we make it easy.

We have packages to meet your objective - from restoration to full-race. Online tools let you choose and customize your suspension at www.ElephantRacing.com or call and we'll customize a solution for you.

### How easy is that?

+1 408.297.2789 www.ElephantRacing.com Santa Clara, California

Fast Worldwide Shipping, Low Rates.







# Peter Morgan considers the high end of Porsche classic car investment and what's available at present.

ne of the fascinating aspects of being so closely involved with the used Porsche marketplace, and particularly the classic Porsche marketplace, is that I see a whole range of cars that are hyped up to be unique, collectible and not to be missed by collectors

Classic Porsches (those built before 1998) are now an accepted part of the premium classic car market. As these

Some sellers rush their prospects to close the sale without too much due diligence

Porsches all came from a time when numbers manufactured were in low thousands rather than tens or hundreds of thousands, the supply is limited. Combine that with a demand driven by an economic scenario that has left many wondering what to do with cash and you have the conditions for a boom. Over the past ten years, classic car return on investment has been better than the FTSE100 – and in some cases significantly so.

Oddly perhaps, when virtually every other kind of financial investment you read about in the money press is marketed through funds of one sort or another, there hasn't been any collective method for investors to take advantage of classic car growth. The only option for the serious investor has been to buy a car, tuck it away in a garage somewhere and nervously wait.

The only problem with that is that you really need to be an expert to separate the good cars from the froth and not buy at the top of the car's medium term value potential. In the general financial market, investors choose between various specialist fund managers who buy lots of diversified stocks to spread the risk (a little!). But despite the spectacular rise in classic car values, I know of only one venture that allows individuals to invest collectively in classic cars with relatively modest sums.

Chillingham Classics is first into a market that so far has had few similar choices. Investors can take a stake in the diversified classic car venture and on paper at least, it's a good idea and the projected returns look extremely attractive. However, proper advice would be essential to weigh up the not-insignificant risks, and the media pundits have so far been cautious. The success of the enterprise also depends on the classic car market continuing to grow at its present, very strong, rate. That could be a big ask.

It could come down to the fact that most of us just want to see our own classic sitting in our own garage behind closed doors – the keys of which we hold securely. And most of us really do want to drive it when the sun shines!

There is no shortage of potential stock, but so much care is required. Virtually every classic I see today has been 'restored', so that it has showroom sparkle. The inexperienced restorers often obliterate the patina and key identification details that define an extra special model. I often ask myself why is it that we all want 'new' old cars today? The answer is that many sellers think this is what is required to get the market making prices.

Some sellers love to rush their prospects in the hope that they will close the sale without too much due diligence. I am unimpressed when I see these high pressure tactics in action on cars that are ticketed at ten thousand, let alone two hundred and fifty thousand plus. I was contacted a few weeks back by a finance company that was being asked to provide some 50 percent of the finance to buy a car coming up at auction with an estimate of one million Euros. They wanted me to check the car out and establish its full authenticity within just 24 hours. And all this on a 40-year-old car that in period never looked as shiny and over restored as it appeared to be today.

That kind of rushing in the pursuit of an alleged special car is what can plunge some investors into very deep and very cold water. In many cases, just pausing a day to learn more about a specific car can reveal that there isn't a legion of other buyers chasing it and allegedly outbidding you. Yes, you run the risk of losing it to somebody else but the gain of being the only punter in the game can save you thousands.

There are a lot of Japanese imports available in the UK at present and some offer great possibilities. I've seen a few of these recently and on the whole I've been impressed. In terms of Porsches, I'm thinking of 2.7 Carreras, 911SCs and 993s in all their forms. The downsides are that many of them are left-hand drive and have little history with them. I call them orphans, because they clearly look and sound like the real thing, but often have no ties to their roots. These cars are often asking maximum market values, but a good UK or European sourced example with history will often leave them for dead at around the same price.

As always, the advice is do your homework first  $\odot$ 



# EVERY PARTFOR every PORSCHE

Call our Sales Team on +44 (0) 20 8500 8811 or Visit our Online Catalogue at www.design911.com

### PARTS FOR: 356, 944, 928, 968, 964, 993, 912 & 911's from 1965 to 2012

### NOT ONLY PARTS, BUT ALSO:

- BODY SHOP & FITTING FACILITIES
- SERVICE & FITTING CENTRE
- BODY STYLING & CONVERSIONS
- WHEEL & TYRE FITTING
- DAMAGE REPAIR & RESTORATION
- ENGINE & GEARBOX REBUILDS
- SUSPENSION & EXHAUST UPGRADES
- PARTS DEPARTMENT
- WORLDWIDE DELIVERIES
- PERFORMANCE UPGRADES













<image><text>

UNIT 5 = BRACKEN INDUSTRIAL ESTATE 185 FOREST ROAD = HAINAULT = ESSEX IG6 3HX

### DESIGN 911 Centre for Porsche

# clusive schemes availa 1 @Mayfair\_INS

# ORSCHE motorInsurance





Driver Age: 42 £565.00<sup>°</sup> Value: £70K No Claims Bonus - 5+

xs£700

### 911 Boxster

Driver Age: 40 £425.00<sup>\*</sup> Value: £40K

No Claims Bonus - 5+ xs£500

### 911 Cayenne Turbo

Driver Age: 43 £605.00<sup>°</sup>

Value: £75K

No Claims Bonus - 5+ xs£750

### Panamera

Driver Age: 50 £505.00<sup>°</sup> No Claims Bonus - 5+

Value: £70K

xs£700

Macan Driver Age: 40 £450.00\* Value: £50K

No Claims Bonus - 5+

xs£500



mayfaironline

### 911 Turbo Driver Age: 45

£890.00<sup>\*</sup> Value: £100K No Claims Bonus - 5+

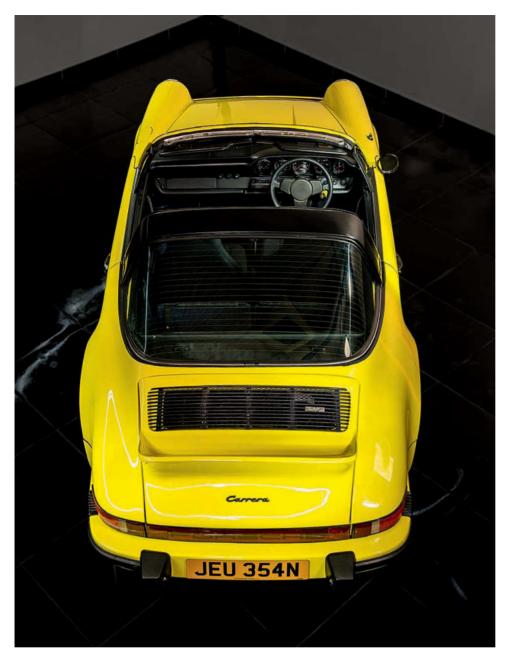
xs£1,000

COVER INCLUDED: May be subject to charge & terms. Up to Four Named Drivers | Porsche Approved Repairer Genuine Porsche Parts | Track Days (Available) Agreed Value (Available) Please call for more details!

### faironline.co.uk Tel: 08444 935 715 Performance **INSURANCE**

\* Subject to Terms & Conditions. Calls may be monitored for training purposes. Mon-Thurs: 9am-7.30pm / Fri: 9am-5.30pm / Sat: 9am-4pm

2 MayfairPerformanceInsurance



# Market Value

As asking prices for early 911s continue to soar, we ask some leading Porsche experts their opinion on the current lay of the land...

t's no secret that classic 911 prices have been rising at an incredible rate recently, and as a result many Porsche enthusiasts have a view on whether or not that's a good thing. Getting a foot on the 911 ownership ladder is certainly becoming increasingly difficult as the collectability of Porsche products experience exponential growth and a noticeable spike in cultural popularity. Some say that genuine enthusiasts are being swept aside as the vast numbers Stuttgart metal now commands prices

them out of the market, others will explain that these rare classics are finally finding their true value in the automotive marketplace.

We asked several leading Porsche industry experts for their take on the current Porsche scene, and asked them to predict which 911 models, outside of the usual suspects (read RS models) might be a good bet for someone looking to either purchase and use, or buy as an investment, in 2015. Their informed opinions make for some interesting reading... O



"I always urge people to buy a 911 because they want to use it and enjoy it and, if it goes up in value, then that's a bonus. It's sad to see Porsches being bought and stored away, rather than driven as they are meant to be. That's the only downside to the increases in value - people are getting too scared to take their Porsches out on the road and track."

Philip Raby, Philip Raby Porsche

"There has been much attention given to the rapid acceleration of the prices of early 911. In our opinion, they were undervalued for many years. Ultimately when the Porsche world woke up, rapid acceleration to proper levels for 'correct' and 'special cars' was realised."

Jeffrey Seigel, Segal Motor Car Company Inc

"The very best cars, either correctly restored or unrestored originals, are commanding top money and justifiably so as these will always have an appeal to the serious collector. Unfortunately, below this top drawer there are many other inferior cars that are attempting to hang on to the coat tails of premium examples with over inflated values and this is the area where you can really get your fingers burnt if you don't know what to look for."

Paul Stephens, Paul Stephens

"Early 911s had been undervalued for many years, however now in most cases they are valued higher than the cost of buying a new 911. Ownership of early cars has been shifting from the enthusiasts who have for many years, lovingly self-maintained them, to the now more established collectors, who are actively seeking the finest original/best restored or the very rarest of examples." Lee Maxted-Page, Maxted-Page





### **GT:** IN YOUR EXPERIENCE WHICH EARLY 911 MODEL/S WOULD MAKE WISE INVESTMENTS IN 2015?

"Any air-cooled 911. The 911SC is still undervalued – it's rarer than the 3.2 that followed, more fun to drive, and there are less on the road. The Carrera 3.0 is even rarer and remains unappreciated so that's another good one. Going back further, we've seen the pre-impact bumper 911S, in all guises, going for silly money and that's been dragging up prices of the lesser T, E and L models, so they're worth considering. Increasingly, people are no longer buying a classic 911 for its performance, so there's nothing to be lost by opting for a less powerful variant."

Philip Raby, Philip Raby Porsche

### "1973 Porsche 911 'C.I.S.' injected correctly. Also T model Coupés."

Jeffrey Seigel, Segal Motor Car Company Inc

"Any car that might be referred to as 'best of breed'. We are in a world market and the finest examples will always find a buyer. In short, buy the best example you can afford even if that means looking at the best 2.4E rather than a very average 2.4S. But buyer beware! Air-cooled 911s are hot property at the moment and they are



popping up everywhere for sale often described with 'excellent investment potential'. Wherever you buy the car from, get the car independently inspected by someone who understands these cars, it will be the best few hundred pounds you can spend."

Paul Stephens, Paul Stephens

"I'd plum for the 2.2S. The 2.4S has already sky rocketed. I'd also consider unusual spec cars that were produced in low numbers. It's worth another look at that car with the rare colour trim/combination!"

Mikey Wastie, Autofarm

"Most of them make wise investments on both a personal and financial level, but those models which we think have good growth potential in the short-medium term in 2015 are the 2.2 and 2.4S still, also 1964 and '65 2.0 SWB cars and looking slightly further ahead – early 911 Turbos."

Lee Maxted-Page, Maxted-Page

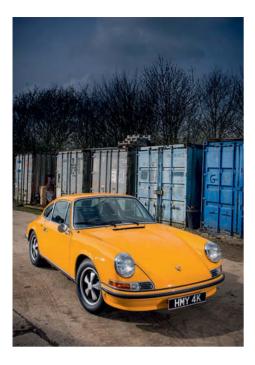
"Short wheelbase cars with original trim in original colours are good investments. Also, the

'68 model year seem undervalued at the minute and they are most refined. Buy while people are still focused on '65s."

Dominic Delaney, SVP Porsche

"Historically, early 911 values have roughly reflected the performance hierarchy and as such the 'RS', 'S' and to a lesser extent the 'E' were the first to see significant increases in value and they were also the first models to justify the cost of restoration. The low value of the 'T' and its predecessor the 912 (which has to be included here) meant that restoration wasn't economically viable, so for a long time, poor examples were used as donor vehicles for the restoration of high-value models. However, the world is now waking up to the fact that the less frenetic nature of these lower powered but still very sweet Porsches make them perfect for classic car ownership. Prices have started to rise, but they have some way to go before they peak. Restoration is now a viable proposition and their days of being sacrificed for an 'S' are surely numbered."

Dominique Drayson, Canford Classics



### **GT:** WHERE DO YOU SEE 911 PRICES HEADING IN THE NEAR FUTURE?

"I think prices will steady off in 2015 but certainly won't drop. At the very top of the market, though, there may be a slight correction of prices for the simple reason some people have been greedy and really pushing up values of mega-rare Porsches."

Philip Raby, Philip Raby Porsche

"We believe 911 prices have just about plateau'd, and stability will remain for special vehicles. Beware of people trying to capitalise on 'poor vehicles' in a strong market. This will hurt enjoyment, and ultimately your pocket." Jeffrey Seigel, Segal Motor Car Company Inc

"I can't see a big bubble that will pop, but Porsche classic prices in general are too far apart so there needs to be an element of levelling out. There's too big a gap on certain models. Some cars are real good value for money."

Mikey Wastie, Autofarm



"We feel that 911 values have been driven recently to a large extent by rising 2.7 RS prices, but RS values will stop rising at the growth rate they have been over the last year and instead will now stabilise at the current levels. In relation to this, some equally rare models from this period are arguably still currently very undervalued by comparison to where they have traditionally sat in terms of value alongside the 2.7 RS, particularly the 3.0 RS and 3.0 RSR models, but also 911 2.2 and 2.4S."

Lee Maxted-Page, Maxted-Page

"RS prices are bordering on insane for cars with history gaps and who-knows-what provenance, so the best examples of the rest will rise. This is where the biggest percentage growth will happen – original Targas and Coupés will benefit most."

Dominic Delaney, SVP Porsche

"An investment analyst would warn against relying on values of classic cars increasing and additionally, due diligence means investors should prepare for a softening of the market and in the near future, this is likely to be the case. However, unlike a Ferrari Dino (for example) early 911 values have followed a similar path to less exotic marques, with a steady fall in value from new, followed by an awakening of the market leading to a slow but steady rise in prices.

"As there are many more people able to afford a £200,000 classic Porsche in 2015 than could afford a £1,000,000 Ferrari in 1990, there is no reason to expect prices to do anything other than follow a general upward curve over time. Remember, though, as values increase, so do customer expectations and the highest prices will only be realised by original cars or the best quality restorations with the finest attention to detail."

Dominique Drayson, Canford Classics

### GT: ANY FINAL COMMENT?

"Classic car ownership should not be solely based on investment perspective. I feel passionately that it's about owning a car that has smell, feel and character. You get a sense of engagement with it that you just don't get from your everyday car. Sometimes doing the things you love costs money. I don't think you should be afraid to enjoy the ownership because you are worried that the values are increasing. These cars are practical and very reliable so take advantage of being able to drive a Porsche that you can genuinely enjoy."

Mikey Wastie, Autofarm

"Buyers are becoming more selective again, meaning that the best examples are still selling for top prices but that lesser cars are being valued quite rightly for less. There is, however, a global appetite in these uncertain times to hold highquality assets as opposed to cash and so for those fortunate enough, the best cars certainly remain tightly held and are not often for sale." Lee Maxted-Page, Maxted-Page

"The biggest issue with early cars is the lack of miles going on so many examples. Buying a car as an investment is all well and good, but locking it away makes no sense at all. Machines need to be used."

Dominic Delaney, SVP Porsche

# The BEST BUYS OF 2015?

With prices continually rising, getting on the 911 ownership ladder has never been trickier. We consider an underrated air-cooled classic: the 911SC, plus the 911T and 964 – all should make for appreciating classic investments in 2015...









£20-35k: 911 SCs



£35-50k: 911T v 964









id you know that Mozart had an older sister who, at the age of 12, was considered to be one of the best pianists in Europe? And then her pesky kid brother got in on the act and overshadowed her, to the extent that Maria Anna has been all but forgotten while little Wolfgang Amadeus went on to become a legend. It's not uncommon, being eclipsed by a young brother

or sister – psychologists call it younger sibling syndrome and it can lead to all sorts of conflicts, as you may well know if you have children of your own.

It's happened with the Porsche 911, too. For instance, the 996 today lives in the shadow of the arguably better-looking 997, while the 964 was long usurped by the curvaceous and supposedly more reliable 993. And then there's the 911SC which always struggled to play catchup with its golden child replacement, the Carrera 3.2. The 3.2 has long been portrayed as the perfect air-cooled 911, for first-time buyers and enthusiasts alike, while the poor old 911SC has been seen as second-best, the car you'd buy if you couldn't afford a Carrera 3.2. I've always thought this was rather unfair, so now is the time to set the record straight once and for all.

### 911 SCs





The 911SC arrived in 1978 and was significant as it streamlined the previous somewhat confusing range of 911s – which comprised the base 2.7-litre 911, the sportier (but also 2.7-litre) 911S and the top of the range Carrera 3.0 – into one single model. If you wanted to buy a normally aspirated 911 in the late 1970s or early 1980s, your choice was made for you: an SC, take it or leave it. To create this one new model, Porsche took the bare bones of the previously range-topping Carrera 3.0, rejigged the 2994cc engine with reduced power (180hp) and a cheaper aluminium rather than magnesium crankcase, while the impact-bumper bodyshell and interior remained largely unchanged.

The moniker, meanwhile, was never explained by Porsche. Some have said that SC stands for 'Super Carrera', 'Sports Carrera' or even 'Special Carrera', while others have argued that it signified the S version of the C-programme of 911 development. I once even heard someone suggest that it meant 'Single Carburettor'! Personally, I like Super Carrera but am happy to accept the name SC for whatever it may stand for. Incidentally, the SC was a landmark Porsche in that it was the last 911 for many years to actually carry a '911' badge – later cars all had a

### A GOOD SPORT

A popular option for the SC was the Sport package which comprised a whaletail rear spoiler, rubber front lip spoiler, driving lamps, 16-inch Fuchs alloy wheels (up from the standard 15-inch) with Pirelli P7 tyres, firmer Bilstein (instead of Boge) dampers, Sports seats and an improved stereo. Ironically, though, tastes have changed and few people now want the big rear spoiler, preferring the pure lines of a standard engine cover. If the whaletail is removed, though, you should really also take off the deeper front lip spoiler to ensure balanced high-speed aerodynamics, although not many owners bother.



# The SC retains that wonderful lightness of feel which is such a classic 911 trademark





'Carrera' label slapped on their rumps.

It wasn't, then, the most auspicious start to a new 911. There was nothing at all wrong with the SC - far from it - it just, well, didn't offer anything particularly new. The engine was a peach, though, even in its original 180hp guise, as it produced more power and torque at lower revs than the rather peaky Carrera 3.0's unit, while remaining remarkably free-revving and eager. Power on non-US cars was increased to 188hp in 1980, thanks to revised timing and a higher compression ratio. Then, the following year, the output was raised to 204hp by hiking the compression ratio further, which demanded 98 octane petrol. US-market cars, incidentally, were stuck with 180hp throughout the SC's life and Yank owners were incessantly reminded of this unfortunate fact thanks to a speedometer that read to just 85mph!

For the rest of us, though, the 911SC, especially in 204hp guise, remains a lot of fun to drive. Its low-end torque makes the car a relaxed and easy cruiser when you want it to be but drop it down a gear or two and the engine really comes alive as it eagerly revs to the redline. Indeed, drive an SC back to back with a later Carrera 3.2 and it's the older car's engine that shines, while the 3.2 feels just a little bit reluctant (a trait not helped by higher gearing) and its extra power (the 3.2 produced 231hp) can be hard to notice next to the enthusiastic SC engine. Porsche quoted a 0-60mph time of 5.7 seconds together with a top speed of 148mph for the SC and, even today, that seems quite achievable.

It's not just the engine that stands out, either. The SC retains that wonderful lightness of feel which is such a classic 911 trademark. Sure, the non-assisted steering is heavy at parking speeds (by the late Seventies the tyres were much fatter than when the 911 was conceived in 1963) but once on the move you can pilot the SC with your fingertips. The rack is quick and the feedback through the wheel is remarkable. It's a car that encourages finesse as it dances delicately through the corners. Yet it's also surprisingly forgiving, thanks in part to the relatively supple torsion bar suspension, so long as you don't try anything silly, in which case that rear-engined bias can bite back. Get it right, and an SC can be so much more rewarding to pilot than a modern 911 with its extra refinement and driver aids which get in the way of the experience. It may sound pretentious (and it probably is) but drive an SC hard and you really do feel at one with the car, as its compact dimensions shrink around you.

Yet despite its directness, the SC is also surprisingly refined and it makes a superb touring car. Those high-profile tyres are forgiving and don't transmit the road noise which is a bane of modern sports cars, while the seats are supremely comfortable and the whole interior remains solid and rattle-free. It's a car you can cruise in all day and get out of feeling refreshed – and there aren't many Seventies sports cars you can say that about.

It's a tough old unit, the SC engine, too. Sure, you hear stories of broken head studs (although that's not exclusive to the SC) but, on the whole, there's no reason for a well-maintained example not to cover 200,000 miles without any major work needed. The slightly more stressed 3.2 powerplant, on the other hand, while also strong, is more likely to require at least a partial rebuild by around 140,000 miles (which, to be fair, is in itself good going).

The SC is mechanically reliable in other ways, too. When new, the model gained a bit of a bad reputation for transmission problems because it was originally fitted with a rubber-centred clutch. This was meant to reduce gear chatter at low speeds but, in reality, it had a habit of breaking up so Porsche dropped it in 1981 while most earlier cars were quickly updated by conventional – and trouble-free – clutch assemblies. The five-speed 915 gearbox was carried over from previous 911s and was criticised in some quarters for its agricultural feel, plus many suffered from poor synchromeshes. However, start with a good 915, treat it gently (especially while the transmission oil is still cold) and, once you've mastered the changes, the 'box is a real joy to use and part of the appeal of an older 911.

The big killer with SCs, as with all 911s from the Sixties and Seventies, is rust. The SC had a fully galvanised bodyshell when new but don't let that lull you into a false sense of security. Galvanising will slow down the rust process but won't stop it, while there's a fair chance that most SCs out there will have had at least some bodywork damage at some point in their lives, which can break the galvanised coating and give corrosion a foothold. Indeed, it's rare to find an unrestored 911SC that doesn't suffer from at least some rust. And once you find some rot, there's a fair chance that there will be more lurking under the surface, ready to hit you with expensive bills when it's uncovered. The 911 has a complex bodyshell and proper repairs aren't cheap – you have been warned!

Get a good one, though, and an SC is an appreciating asset. We've seen prices rocket in recent years. Just six years ago, I wrote that £13,000 was top money for a 911SC and, for that money, you'd expect to get a lowish mileage example with an impeccable history, with less good but still acceptable cars costing under £10,000, which made the SC the perfect 'first 911' for those with a tight budget. How things have changed! Today you wouldn't even buy a rough example for £13,000, with most starting at around £23,000 upwards. Increasingly, though, good cars are selling for in excess of £30,000 with a few exceptional ones going for over £40,000. In fact, SC prices are now generally slightly higher than those for the previously more sought-after Carrera 3.2.

Despite these increases, I still believe that the SC is undervalued and we shall see further price rises. Although over 60,000 were built during its production run, which isn't much less than the Carrera 3.2 that followed, the SC is today the



# OPEN AND SHUT CASES

The SC was the first ever 911 to be offered in three body styles. First there was the evergreen Coupé, which today remains the most sought-after choice, for its classic looks and rigidity. Then, as with previous 911s, there's the Targa with its distinctive roll-hoop and clever lift-out roof panel which folds up and stores in the boot. Finally, you have the Cabriolet, which was a first for the 911 and wasn't introduced until 1982; in fact, just 4096 SC Cabriolets were built before the model was replaced by the Carrera 3.2.

rarer car. That's because, during the many years it was unloved, many were neglected and ended up being scrapped, crashed or modified in some way. Which means that good, original 911SCs are now few and far between. That rarity, combined with people's realisation as to what a great 911 an SC is, and the fact that earlier (and later) aircooled 911s are still going up in price, means that they're in great demand, in the UK and overseas.

However, I think it's wrong to buy a 911 as an investment. It's far better to buy a Porsche that you can use and enjoy and, if it happens to go up in value during your ownership, then that's a happy bonus. And an SC is certainly a 911 that you can both use and enjoy, while remaining affordable to buy and to run, refreshingly rare, and more than likely to appreciate in value. What more could you ask for from a car?

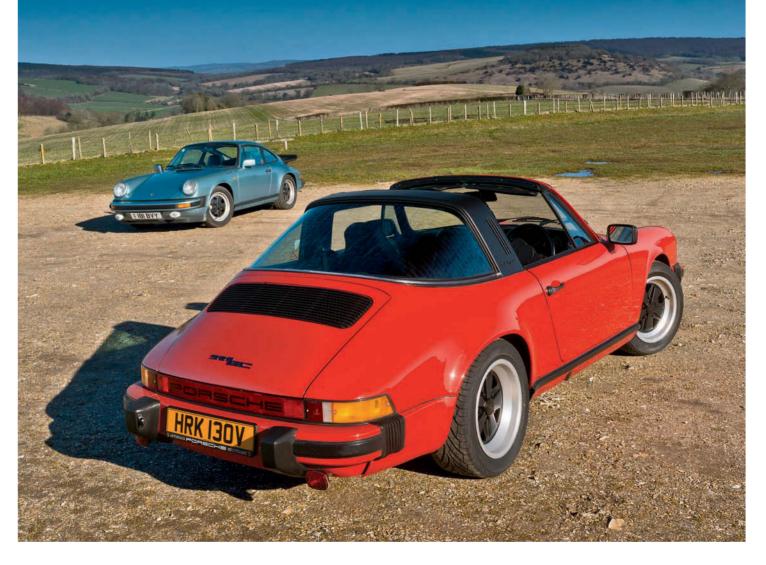
And if all that isn't enough to convince you of the SC's worth, here's something else to chew on. It could just well have been the car that saved the 911 from extinction. You see, back in the 1970s, Porsche's then boss, Ernst Fuhrmann, thought that the 911's days were numbered – it was just too old fashioned and not advanced enough to lead the company into the 1980s, so he commissioned the 928 – a larger, more sophisticated front-engined car – which would eventually take over from the 911. The 928 made good inroads but the SC was always the better seller (in 1983 it sold in double the numbers of the 928), a fact that wasn't lost on new chairman Peter Schutz, who also realised that the 911 was the only model Porsche was actually making any money on, so he made the sensible decision to keep it in production. For which we should be forever thankful.

So there you have it. The 911SC has at last been dragged out from the shadow of its little brother, the equally talented in its own way Carrera 3.2. Now it's time to let it flourish and thrive as the great Porsche that it should always have been  $\circ$ 





Despite its directness, the SC is also surprisingly refined and it makes a superb touring car



Got a little more cash to splash on a 911? Although two decades apart, both the E-Series 911T and the 964 offer alternative prospects for around £45,000... Story: Simon Jackson Photography: Gus Gregory

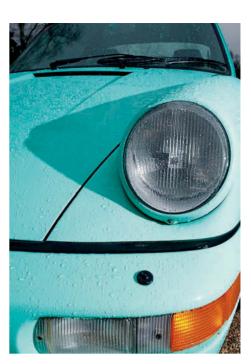
4

=











here's a simple and realistic question everyone should ask themselves prior to purchasing a vehicle of any kind. This question cuts through all the hype, drastically reduces any hastily pencilled

list of pros and cons, and immediately delivers a sense of serene clarity, and that question is: 'What am I going to use it for?'. It seems indisputably obvious but it's not always the first thing a passionate petrolhead considers before embarking on an excitable, sometimes emotional, car shopping journey.

When it comes to Porsches, in particular over 50 years worth of 911 variants, asking yourself this question is absolutely imperative. This argument is clarified here with two 911s available for around the same price, both of which are fantastic in their own right, yet which on paper offer very divergent ownership prospects. Indeed, choosing between them could well be a case of deciding exactly what you plan to use them for...

## 964 C2

The 964's transformation in fortunes is almost entirely complete now. Today it's virtually impossible to purchase one of these post-1989 911s for under £20k, with the exception of the odd rogue convertible or Targa version perhaps. Once the abhorrent black sheep of the 911 family, today the 964 stands tall as a cherished 911 with a strong following – and rightly so. But despite this reversal in favour the 964 still has some headroom to grow, and prices reflect this steadily rising as the cars become older and good examples become more sought-after. As such, anyone looking above the SC and 3.2 Carrera for a classic yet useable 911 could do far worse than considering a 964 as their Porsche of choice.

This 1991 Carrera 2, finished in Mint green, is



for sale at 4 Star Classics in Hampshire. The lefthand-drive model has been imported from Japan at some point during its lifetime, has covered just 46,000 miles and features the 'love it or loathe it' controversial Tiptronic gearbox. As you might imagine given the mileage it's in exceptional condition, and is offered for sale at £39,995.

Stepping inside the 964, one is reminded of how this model really does bridge the gap between what you might interpret as a true 'classic' 911s and more modern versions such as the 993 or 996. The driving position and dashboard layout owe more to Porsches of old than we might have first realised when the car was new back in the Nineties, and this projects a familiar and tangible 'modern classic' environment.

With the weather doing its utmost to hamper progress and dampen the day during our photoshoot, the 964 presents a delightful safe haven – it feels old enough to be special, yet current enough to offer the touches of modernity a day like today may require. Heating to effectively and quickly clear the screen, door rubbers capable of keeping copious amounts of rain water at bay, plus a reliable and tractable drivetrain. It all feels wholly useable.

Out on the road that persona remains as the driving experience is exceptionally friendly. This isn't a Porsche that fights you at every step, rather one that wishes to make life as smooth as possible. In combination with the four-speed Tiptronic gearbox, the engine offers relatively sedate progress, belying the book figures of 250hp produced by the 3600cc flat-six. But when pushed a touch harder the C2 will pick up pace accordingly. For all intents and purposes this is a 911 you could happily use 365 days of the year.

Steering is light yet offers progressive turn-in

bite and a depth of feel often missing in more modern machinery, so perhaps the only real flaw here is that often-loathed Tiptronic gearbox, which certainly doesn't deliver as urgent or progressive a driving experience as a contemporary PDK system. However, despite how our first choice would undoubtedly be a manual 'box in this generation of 911, the Tiptronic cog-swapper is perhaps not the malevolent piece of devil engineering it is depicted as by some. Worse things happen at sea.

In many regards, for me, the 964 is of a period just prior to the over-indulgence of technology in cars, when form followed function to just the right degree, cars were more lithe and simplistic offering the perfect balance of driveability, comfort and convenience, and straight-talking sex appeal not electronic dominance. For me, the 964's legacy will be that it was the last truly classically-styled 911, offering a driving experience that looked ahead to the future, while taking a leaf from the book of the past. Personally I can't think of another 911 I would rather use everyday, but perhaps the 964 has now become too precious for that kind of thing?

### 911T

As you'll no doubt be all too aware, early 911s of all variants are incredibly sought after today, so it's little wonder that even the more basic models which used to offer plausible entry-level 911 ownership not so many years ago, are now becoming pretty expensive investments. The 1970s 911T is one such model that is going through a rapid acceleration in asking prices, and as such it makes a very plausible case for purchase to anyone in the market for a £40,000 (and upwards) classic 911.

The car you see here is an E-Series, available in

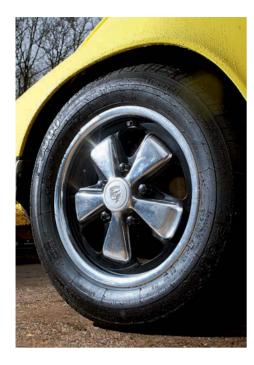
1971-'72, with it came a new 2341cc engine which resulted in these cars being commonly referred to as the '2.4-litre' 911. The E-Series boasted Bosch mechanical fuel injection over the carburettor alternative, and is noted for its oil tank (and subsequent filler flap) located between the right-hand door and rear-wheel arch – a feature dropped in the summer of 1972 to avoid owners filling their oil tanks with fuel.

This Light yellow car, offered for sale by 4 Star Classics for £49,995, is a 1972 911T and has covered 81,000 miles from new. It might seem a world apart from the aforementioned 964, but with its five-speed manual gearbox, ventilated disc brakes and mechanical fuel injection system, it is effectively just as useable as its 1990s equivalent – if a touch more precious.

Firing the 911T into action is a smile-inducing experience, as the sound of that traditional aircooled flat-six greets one's ears. There's just something so infectious about that tuneful clamour. Moving from the 964 into this 911, two decades its senior, you'd quite rightly expect a level of shock at your basic surroundings to befall you, but thanks to the 911's gentle evolutionary nature this car doesn't feel as 'night and day' compared with the 964 as you might first expect. Typically period pliant seating offers levels of comfort a few modern machines could learn a thing or two from, and the steering wheel and gear knob provide chunky tactile points of contact for the driver. Pure Seventies. Engaging drive is a characteristically air-cooled procedure, matching revs for take-off doesn't take one too long to master and there's a reassuringly consistent disposition to all the vital controls unlike some classic cars of the era which can provide a temperamental driving experience to say the least. Once in motion, as with all classic 911s, the gearbox can take some getting used to,

Firing the 911T into action is a smile-inducing experience, as the sound of that air-cooled flat-six greets one's ears

# 911T v 964







but once mastered and when handled with the correct level of aptitude and care, the change between gears is a satisfying process. Turn-in is a weightier affair than with the 964, but it is direct and confidence-inspiring, allowing the driver to get back on the throttle at his or her earliest convenience. It really is an enjoyable drive.

In pursuit of the 964, the 911T provides perhaps its biggest shock – its level of performance. It feels brisk, in relative terms, fooling the brain into believing that the (over) 100hp deficit to the penultimate aircooled 911 ahead must be some kind of misprint. Unlike the cosseting more modern 964, this car encouragingly feels like a true classic sports car, one you could enjoy on the back routes or on your local track in equal measure. My only complaint is that I wish I was driving this car on a beautiful summer's day – hardly the fault of the car! The 911T feels like just the right mix of classic Porsche, not too precious that you won't want to push it from time-to-time, but not too quick that you'd feel the need to rinse it for every tenth of a second just to invoke a thrill through the controls. In many respects it seems to currently occupy a 911 sweet spot...

# CONCLUSION

Of course it goes without saying that these two 911s are very different. The 19 years that separate them may visually represent a typically mild Porsche evolution, but psychically under the skin it's more of a revolution. So you might be expecting me to tell you that the comparative result is that today they do entirely different jobs, but I'm not going to – because I'm not sure they do...

Given the sought-after nature (and not forgetting their asking prices) of these two

variants of 911, both the 911T and 964 have morphed, seemingly in parallel, into Porsche 911s which you probably wouldn't want to use on a day-to-day basis, and in a way that defines this duo. Deciding which one to buy really does come back to that question we discussed earlier: 'What am I going to use it for?'.

If you're looking for a financial investment opportunity that will only appreciate in value, then based on historical evidence either of these cars offer value for money and should be almost bulletproof in terms of depreciation. If you buy the right example you probably can't go wrong there. If you want a Porsche for high days and holidays, a car to roll out of the garage a few times a year when the sun is shining or for the annual pilgrimage to something like the Goodwood Revival, again, the world's your oyster with this pairing – just take your pick. Want to drive your 911 to work once a week or







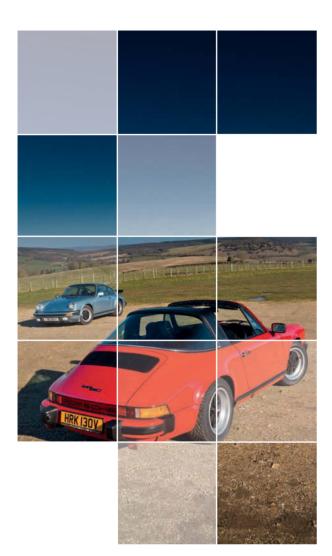




enjoy it strictly during your leisure at weekends? Guess what – a 911T or a 964 would make for the perfect partner too. And, if you're a strictly dedicated enthusiast there's certainly an argument that either could be used on a day-to-day level.

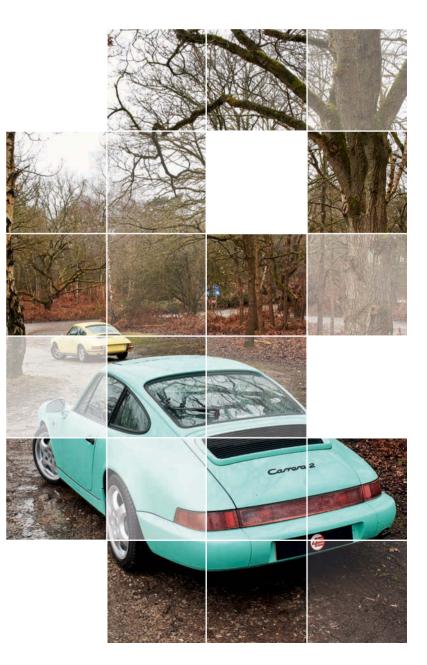
Of course you might be thinking that there are other Porsches, other 911s perhaps which display this all-round ability, and you might be right. But as the star of both these cars rise up the classified listings in harmony, it's clear that choosing a 911 in this price bracket has never presented a tougher decision  $\circ$ 





Naturally there are many other variants of 911 which could sit alongside our selections here, most notably the 3.2 Carrera, and undoubtedly you'll have your own ideas. But the message is clear; whichever path you choose you're sure to end up with a 911 you can cherish and use in equal measure, and which, in theory, should not lose value. Of course, that's not why the majority of enthusiasts purchase Porsche cars in the first instance, but it's certainly a nice silver lining to owning one of the world's most iconic sports cars, right?  $\odot$ 

Comparing 911s from different eras, which in essence offer completely different ownership concepts, is no easy task. In reality there's nothing wrong with any of the prospects we have examined here; the 911SC would make the perfect starter air-cooled 911, and those with a little more cash to splash might consider a 911T or a 964 – two already popular versions of Stuttgart's icon, but cars which can still be acquired for a reasonable outlay... well, reasonable in Porsche terms anyway.







# DOMINATE THE TRACK. RULE THE STREET.

# Performance for Motorsport and Street.

With our race experience and proven technology, Eibach are proud to announce, for the discerning Porsche owner, our new range of anti-roll bars for the Marque. Each of these kits features our hollow steel technology, for ultra-light weight, along with multiple levels of adjustability.

Designed to work in perfect harmony with our existing range of Pro Kit and Pro Spacers, you will only find these unique anti-roll bar kits at our Exclusive Official Dealerships.

For peerless chassis solutions for your Porsche, simply contact your nearest Eibach Specialist Dealer.

### MIDLANDS RPM Technik Ltd 01296 663 824 workshop@rpmtechnik.co.uk www.rpmtechnik.co.uk

NORTH WEST Ninemeister 01925 242342 ask@ninemeister.com www.ninemeister.com SOUTH WEST Regal Autosport 023 80558636 sales@regal-auto.co.uk www.regal-auto.co.uk

SOUTH EAST Design 911 0208 500 6699 sales@design911.com www.design911.co.uk

Springs | Anti Roll Bars | Wheel Spacers | Suspension Systems | Coilovers | Alignment Kits

Eibach UK | Phone: 01455 285 851 | e-Mail: sales@eibach.co.uk

MULTI-PRO-R1



**PRO-STREET-S** 



**PRO-ALIGNMENT** 



eibach.com

# Choose the right fit for YOUR car.





# Restoration Design. Parts tailored for your Porsche<sup>®</sup> Automobile.

24 Hayes Avenue, Guelph ON TEL: 519-836-3555 • FAX: 519-836-3577 www.restoration-design.com

# John Fitzpatrick

ECKENSICHERUNI

# High Achiever

(Pog)

Ville

2996

DER NÜRBERGRINS

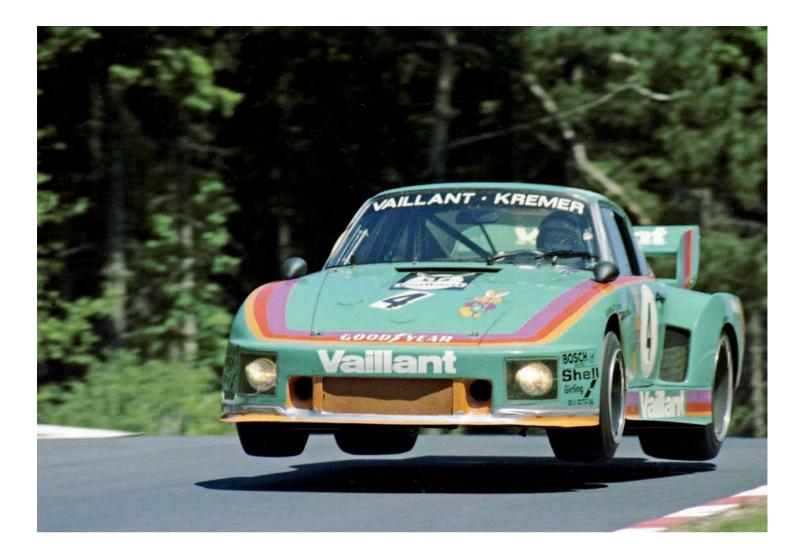
400 YEAR

OUD ...

Briton John 'Fitz' Fitzpatrick raced Porsches at the highest echelons during the '60s, '70s and '80s, yet his name might not be all that familiar. It's time that was put to rights...

Story: Andrew Frankel

Photography: Porsche



hen your mind turns to those drivers who have raced Porsches at the highest level, you might be surprised at just how many Brits there are on the list. There's Derek Bell and Richard Attwood of course, and also Jackie Oliver, Brian Redman, Mike Hailwood, Vic Elford and David Hobbs, not to mention Allan McNish. But besides Porsche, there is one other thing all these superstars have in common: all of them were also regulars in Formula One.

Which is the only reason I can think of that their names spring to mind so readily relative to that of another British driver whose achievements in general – and in Porsches in particular – unquestionably merit inclusion in the list of the greatest drivers of any nationality ever to race the Stuttgart machines. While they grew up in the single-seater formulae, he cut his teeth in a succession of Minis, Anglias and Escorts. Less glamorous perhaps, but no less effective. In Porsches alone he won the European GT Championship twice and the IMSA Championship and as both a driver and a constructor pulling off the near-impossible feat of beating the factory Group C 956s with his own private entry. His name is John Fitzpatrick, known to everyone in the industry simply as Fitz.

Today Fitz is a fit 71 year old, living in retirement in Spain though he only hung up his helmet for good four years ago, disgusted that at the age of 67 he was not quite as quick in an historic Mercury Cyclone as its semi-professional owner. He offers delightful company to those who can talk and understand racing and refreshingly robust views on how organisations all the way from the Motor Sports Association to the government should be run. Most importantly to a hack with a voice recorder in his hand, Fitz has total recall, seemingly of everything he ever did in a racing car.

Although his career started when he was still a teenager in 1963, he was exposed to Porsches only sporadically during the early part of his career. His first serious foray was in the Barcelona Six Hours in 1968, sharing a 910 with Allan Rollinson. They came second, not a bad result in a 2.0-litre car, especially when the only car ahead at the flag was a mighty Ford GT40 toting a 5.0-litre V8 motor.

"The 910 was a lovely car to drive," recalls Fitz. "It was quick through the corners where you could make up a load of time on the more powerful cars. But there was nothing to them at all. All there was ahead of your feet was a thin layer of fibreglass. It must have been the flimsiest racing car I ever sat in. Did I worry about the safety? I was 24 years old and racing a Porsche prototype. What do you think? I never even considered what might happen if something went wrong."



Fitz, by then an in-demand driver, then spent the next four years as a Ford works driver before finding himself at the Daytona 24 hours in 1972 in the next pit to the Kremer brothers. "I spoke a bit of German because I'd been racing for Ford in Germany, and I can remember sitting down with Erwin Kremer - who looked after the business side while his brother Manfred was the technical genius – in the middle of the night and being offered a drive for that season." His first race was at the scary old Nürburgring but that didn't stop him putting Kremer's green and yellow 2.5-litre 911S on pole, then running away to win the race. He had started as he meant to go on. Fitz won both the Porsche Cup (his first of three) and the European GT championship that year. "That's what started me on Porsches, almost full time."

Fitz stayed with Kremer for a couple of seasons before going to race for George Loos' Gelo Racing team. "George was a curious fellow and could be unbelievably difficult at times. He didn't even have a mechanic. Then again he didn't really need one. Porsche's people would transport the cars to the track, Porsche people would look after them while they were there and then they'd take them away at the end, while George pretended to be the team manager..."

In that period Fitz started racing 911 RSRs, and progressed through the 934s all the way to the mighty twin-turbo 935s. "The RSR was probably the nicest production Porsche I ever raced. They got rid of the torsion bar suspension, put proper springs on it, a bit of wing and it was just delightful to drive. That beautiful normally aspirated engine may not have given huge power, but it was one of the most driveable cars you could ever wish to race. I shared one with [former Le Mans winner] Gijs van Lennep at Le Mans in 1975 and we came home fifth." Fitz is too modest to mention he was beaten only by four pure prototypes and won the GT category by such a huge margin that the next car, another RSR, was four laps adrift at the finish.

"By contrast the 934 was not such a good car, in fact it wasn't that much more than a production 911 Turbo with some bits added to it to enable it to race. With single turbos, the cars had massive lag, so you had to hit the accelerator long before you needed the power and hope that it would eventually arrive approximately when you needed it. If it arrived too late you were slow, too early and you were either in trouble or you had to back off immediately, lose all the boost all over again and go slower still..."

But then in 1977 Fitz got his hands on the 935: "It really was a massive step up from the 934. A proper racing car – unlike the 934 we had huge wings, huge boost, huge wheels, everything was huge, especially the power."

However, while most imagined the 935 fairly



"Did I worry about safety? I was 24. I never considered what might happen if something went wrong"

unimprovable within the confines of the prevailing regulations at the time, the Kremer Brothers begged to differ and in 1979 produced their K3. "It looked very impressive with its pumped-up bodywork and additional tubular structure, but its real advantage was its air-to-air intercoolers. Porsche's were water-cooled and were nothing like as efficient. As soon as I saw it and saw the likes of Klaus Ludwig winning absolutely everything in it, I knew that was the car I needed.

"At the end of 1979 two things happened. First Dick Barbour put me on a five-year contract to race in the US and then the Kremers decided to build a batch of K3s for sale. The rest is history. We were quite successful with that car."

As it happens "quite successful" doesn't really cover it. Fitz did ten races in that car that season, failing to finish one and coming second in another. The other eight he and his K3 won, including the Sebring 12 Hours that anyone who's raced there will tell you is a tougher test of car and driver than Le Mans. What the history books don't show is that Barbour drove just two one-hour stints, and Fitz did the rest himself. And it's not as if he only managed it because he had a K3 – everywhere he went it was to race among fields bristling with K3s and 935s. He won the IMSA title, then the American equivalent to the World Sports Car Championship, by miles.

But the deal with Barbour lasted not the five years originally suggested by just one, so in 1981 Fitz found himself setting up on his own as John Fitzpatrick Racing. He bought a K3 from the Kremers but without the funds to run at the top level and only by the standards of the previous season, he struggled, managing to win only at Riverside and Road Atlanta.

Then the colourful character of Jerry Dominelli entered Fitz's life, offering to bankroll his racing on a whatever-it-takes basis. A new K4 was ordered from the Kremers and while it was not quite so competitive in 1982 as had been the K3 two years earlier, he notched up multiple wins in IMSA that year. But for Le Mans Fitz knew he needed a more slippery 935 and now had the means to ask the Kremers to simply build him a replica of Porsche's ultimate Moby Dick racer. That year was, of course, the first of the new Group C regulations and it is well remembered that Porsche's own brand-new 956 prototypes annihilated the field, as well they might with their performance advantage. What is less well remembered is that the next car home was Fitz's 935, ahead of every other prototype and Porsche in the field.

Fitz's last season as a full time professional racing driver was 1983 and it bore all the hallmarks of triumph and tragedy that sometimes dogged racing in those still dangerous times over



"I saw how much longer my contemporaries stayed successful in the sport and I realised I should have gone on"

30 years ago. It should have been the season of all seasons because now Fitz was armed with a Dominelli-financed 956, a weapon surely the match for even his prodigious talents. But that's not how he remembers it.

"That's the season we lost Rolf," he says quietly. He's referring to Rolf Stommelen, a German racing driver of astonishing talent. Among his claims to fame were winning the Daytona 24 Hours four times (all in Porsches, while Fitz's win came in 1976 in a BMW), scoring pole at Le Mans in the evil handling 1969-specification Porsche 917 and in 1976 bringing the 936 prototype home in second place in its first ever race despite its throttle being stuck wide open. This would be a scarcely believable feat at any track because the only way the engine could be controlled was via the kill switch, but he actually did it at the Nürburgring and in the wet too...

"I drove with lot of quick drivers in my time,

but Rolf was in a league of his own. He was racing my 935 at Riverside when a slower car chopped across him. He spun the car, apparently harmlessly but the back did just touch the wall, not hard but enough to loosen the rear wing. He then set off down the straight, the wing came off at 200mph and threw him into the wall. He was unconscious when they got to him and had a heart attack in the ambulance and died on the way to hospital. He didn't have a single broken bone."

Fitz's wife, Sandra, was understandably extremely unhappy but, for now at least, he raced on. Thanks to Dominelli's patronage, Fitz had two 956s for Le Mans and, being Fitz, drove both, and while one retired the other was shared with Guy Edwards and Rupert Keegan came home in fifth place overall.

But his finest hour of his entire racing career came at the Brands Hatch 1000km race that year,

a race featuring a full works entry of Rothmans Porsches, featuring dream team driver pairings of Jacky Ickx and Jochen Mass in one and Derek Bell and Stefan Bellof in the other. Fitz was teamed with Formula One hot shot Derek Warwick and they beat the factory fair and square, an almost mythically rare achievement in the early days of Group C racing.

"I have to say I was proud of myself that day. We won partly because Derek did such a superlative job early in the race and in terrible weather, but I was proud of the fact that, aged 40, I was within a hair's breadth of being as fast as a Formula One driver in his twenties. The other reason was everyone knew the 956 had far more downforce with the tunnels underneath it closed, but that made the engine overheat so everyone had to run with the tunnels open. Everyone but us: we found a way around it."

If that victory in September 1983 might have



buoyed Fitz to carry on racing, a fortnight later his mind was made up for good. "We were at Fuji where there is a flat-out right corner leading on to the straight. I was approaching it in practice with Derek Bell following me in the Rothmans car. As I turned in, the front left tyre blew. The car smashed into the barriers and took off into the air upside down. Derek passed right beneath me. Somehow it landed on its wheels and apart from some bruises from the seat belts I was unhurt. But it was enough. I'd done over 20 seasons of racing, never been badly hurt despite all those miles and I realised that for my sake and my family's it was time to stop."

He decided to continue running the team. Dominelli wanted to do the Indianapolis 500 and so started buying March Indy racing cars. "Then it turned out all his money had come from this mini Ponzi-scheme he'd been running." The whole thing was a fraud and Dominelli was sentenced to 20 years.

John Fitzpatrick Racing continued until the end of 1986 but without the budget to run at the front he sold out and went to live in Spain.

Despite thereafter becoming known as a highly competitive driver in historic racing, Fitz came to regret his decision to stop driving professionally. "At the time the reasons – losing Rolf, the Fuji accident and how lucky I'd been to drive for so long without serious injury – were good, and I didn't miss it at all. I just walked away and it was fine. But then I saw how much longer my contemporaries stayed successful in the sport – Derek Bell stood on the Le Mans podium as recently as 1995 – and I realised I could and should have gone on."

But hindsight is a wonderful thing and who knows if the racing chapter of the John Fitzpatrick story would have ended so happily had he continued. We look at a 956 or 962 today and it still seems quite modern, but in fact it was just made from bent metal and claimed the lives of Stefan Bellof, Manfred Winkelhock and Jo Gartner.

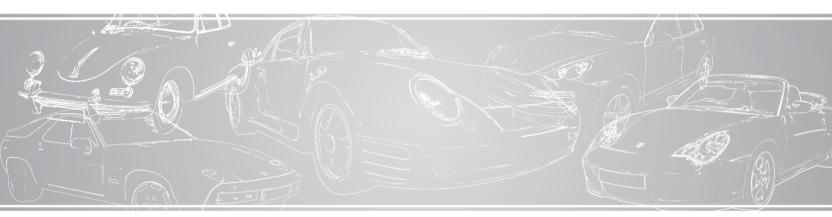
Instead Fitz still comes over from Spain and is not at all averse to hopping into a 956 and punting it up the Goodwood Hill when required. If he's there this year, go and say hello and tell him you at least understand the scale of his achievements. After all he has done over such a vast period of time, it is the least he deserves o



# MANNINGUK

Tailor made Insurance for

# Porsche owners



# **Motor Insurance**

Specialist brokers ManningUK, have tailor made a scheme specifically to suit the needs of Porsche owners.

### This bespoke scheme offers:

- Instant quotations and cover
- Non-standard risks accepted, including:
  - High risk areas
  - Unusual occupations
  - Convictions
  - Disabilities
- Cover whilst on official Association of Track Day Organisers and Federation of Automotive Event organised Track Days

- Family Fleet cover available (more cars than drivers)
- Laid up/Transit/In construction cover
- Agreed value terms
- Maximum introductory no claims bonus
- Discounts are available for the following:
  - Security
  - Low mileage
  - Restricted driving
- Optional European Breakdown cover

# **Quote Hotline**

# 01491 578759 www.manninguk.com









# Eurostar

What better way to road test the immense new Cayenne S Diesel V8 than a 500-mile day trip to Paris?

Story: Simon Jackson Photography: Rob Richardson

t seemed like a good idea at the time: Paris and back again in a day. We'd need a vehicle, a Porsche, naturally. And what is better at munching motorway miles during the winter months than a diesel Cayenne? Not much. During our recent UK First Drive there was one particular diesel Cayenne model within the allnew line-up that shone... the S Diesel is a V8powered masterpiece that manages to sound and perform like a petrol. The perfect partner for a Parisian adventure? We'd soon find out.

Out of bed and on the road halfway through the night before, the S Diesel immediately acquitted itself admirably, accommodating three media types and related clobber in extreme comfort. Within no time the bonnet was pointing towards France and we dispatched south-east England's slow roads for the quicker ones with all the smoothness of fresh double cream. The early morning's light traffic and the S Diesel's unrelenting torque (627lb ft) made driving a pure pleasure; it felt like we'd arrived in Folkstone almost before we'd even left. Upon check-in at the Eurotunnel it was still dark out, but bacon butties and strong coffee woke the gang, and once safely parked-up inside our train carriage on the lower deck (yes, we lowered the car first via its adjustable air-suspension just to be on the safe side of head clearance) there was time to assess this SUV's inners.

Cosseting bodies in premium luxury is, of course, something Cayenne has done well since day one and this all-new version takes things further still. Comfort and convenience features have been polished and perfected by Porsche to provide a cabin that is most definitely ergonomically distinguished. Everything falls easily to hand and boasts that reassuring and robust Porsche build quality. Drivers are now treated to a new multi-function sports steering wheel with gearshift paddles fitted as standard, much akin to the design of the 918 Spyder's wheel. A redesigned rear bench means passengers in the back are comfortable too, and our test car had electronically (count them) 18-way adjustable front seats. Pure opulence. If you can't get comfortable in this car then I'm afraid there is something medically erroneous going on. Stylish design and unrivalled quality feature in here now, so it's more than a match for that of the Macan.

Thirty-five minutes after setting off from Kent we arrived in France and were thankfully no longer reliant on train tracks to make progress. In Coquelles it was still dark, but there was an added unwelcome element of excitement waiting - snow. A lot of snow. Unlike in the UK, it seems the French don't always feel the need to spread grit on their motorways, and within minutes of leaving the terminal we were faced with supremely icy slip roads and autoroutes reduced to single lanes of crawling traffic. Not a good start. Sure, the Cayenne's all-wheel drive capabilities were enormously reassuring, but over two-tonnes of Porsche on ice can easily become a pendulum of peril no matter how proficient it may be during a cold snap. We passed the scene

of a nasty collision that brought it all home, before making happier advancements on fully treated roads. We were back on track.

As the sun came up the Cavenne marched on. tracing France's featureless northern coastline, and stretching its legs up to eighth gear and full speed without so much as a grumble. Charging the uncharismatic 'L'Européenne' (read A16 autoroute), we cleared the town of Abbeville on the River Somme and joined the A16's 'Autoroute des estuaries'. It may sound lavish but this part of the world is devoid of many topographical undulations to excite any intrepid voyager. Despite looking like a road with its genesis hailing back to World War II, built simply to move German heavy artillery from Paris to the Channel (and onwards), this road was only carved-out in the 1990s. They could've put some bends in, perhaps...

Early February's golden morning sunlight ricocheted off the Cayenne's new svelte (tucked and tweaked) stature when we had to make a

quick pit stop - required by us, not the car. When an older generation Cayenne pulled up nearby in the service area, the winter glow really highlighted those subtle tweaks Porsche has made, despite our car already being caked in a layer of salt, and sporting a stylish snow moustache. Porsche says the new Cayenne is shapelier than before, with sharper front bodylines and pronounced protruding arch work, and we'd agree. Out back a new rear spoiler and curvaceous light clusters are the big giveaway that you're looking at the new model over the old one, unless you're a skilled and passionate Porsche spotter. Noticeably, new veins in the front bumper turn to direct air to the intercoolers as required. Four-point LED davtime running lights and headlamps are strikingly contemporary additions to the new model too.

Miles of A16 autoroute flowed under the Cayenne's front bumper before we saw Paris on the horizon at our 12 o'clock. Happily it wasn't far off 12 o'clock, which meant it was almost









time for lunch in one of the most hyped culinary cities on the planet. There was just the small matter of central Paris traffic to contend with first. Whether it was the Cayenne's satellitenavigation system (unlikely) or our terrible sense of direction (more likely), getting into the city centre from the external ring roads proved stressful. The Cayenne's mass had moved from being an autoroute ally to a Parisian pain and we had to pull the 'Brits abroad' card and muscle our way through aggressively a few times. Luckily the Cayenne has presence - plenty of it. Fitting through the entrance to our Paris car park with around five-millimetres of room each side of the vehicle was probably the least enjoyable moment of the trip. While the V8 cooled off, we partook in a delicious steak lunch served within a few blocks of the Eifel tower. It was most agreeable, and with business attended to it was soon time to squeeze back out on to the roads.

# Cayenne to Paris





Left: Through darkness, snow, rain and sunshine, the Cayenne S Diesel made the perfect partner for our Continental jaunt





The winter glow really highlighted those subtle tweaks Porsche has made

If getting into Paris was something of a waking nightmare, getting out was worse. We probably didn't help ourselves by first steering the Cayenne towards the Arc de Triomphe at Place Charles de Gaulle, but it had to be done, right? Circling the Arc de Triomphe, as you're probably aware, is not for the faint-hearted - it's one of the world's most chaotic roundabouts. In fact it is seemingly reserved solely for partially restrained psychiatric patients and convicted murderers with a death wish. Traversing it in a large black SUV wearing British number plates is, relatively speaking, a Parisian hate crime. The famous monument sits in the middle of a dodecagonal arrangement of 12 avenues that run off from it in different directions. Ultimately it's the roundabout from hell. Navigating Place Charles de Gaulle required my two co-pilots to act as additional eyes and ears, and at times it felt like we were trying to float the RMS Queen



# 2015 CAYENNE S DIESEL

ENGINE: 4136cc twin-turbo V8
TRANSMISSION: Eight-speed Tiptronic, PTM AWD
BRAKES: Six-piston (front) and four-piston callipers (rear),
ventilated discs
CHASSIS: Multi-plate clutch, ABD, ASR
WEIGHT: 2215kg
PERFORMANCE:
Top Speed: 156mph (claimed)
0-62mph: 5.4 seconds (claimed)
Fuel Consumption: 35.3mpg (combined, claimed)
<b>Co<sub>2</sub>:</b> 209g/km
ON THE ROAD PRICE: £61,474
OPTIONS FITTED TO CAR:
Jet black metallic exterior paint: £2177
Black leather interior: £720
PTV+: £1012
Adaptive sports seats: £1287
Roof rails including black mouldings: £712
21-inch SportDesign wheels: £3039
LED headlights: £1485
Privacy glass: £320
TOTAL COST OF TEST CAR: £81,612





Mary 2 down the Norfolk Broads. I don't know how, but we managed to survive...

Darkness fell once more as we headed home up the A16, and as the two co-pilots, exhausted from sitting, eating and navigating, fell asleep, I was gifted time to ponder the Cayenne's outstanding capabilities. Make no mistake this car is an absolute weapon. Not only is it fast, with monstrous torque available whenever you need it, the S Diesel is also incredibly refined. Sadly this engine will be one of Porsche's last V8s, although the Cayenne and Panamera will receive an all-new V8 engine in future. Whether this will be the last diesel V8 we aren't sure, and the fact that this engine is the only one in the allnew Cayenne range which does not comply to Euro 6 legislation (rather this is a Euro 5 engine), suggests it may be the final fling for Porsche in this field. If that is the case it'll be a real shame. Every Cayenne model is supremely capable, but the S, with its big heart, is monumental. It's economical too; we travelled from London to Paris to London (approximately 500 miles) on a single tank of fuel. We achieved the stated mpg in the mid-30s, which for a machine that weighs this much, has 385hp on tap and can hit 62mph in 5.4-seconds – well, I think that's pretty damn impressive! At £61,474 the S Diesel also represents something of a bargain in Porsche terms, warranting consideration even from those in the market for a petrol model.

Safely back on UK soil, we pondered what we had just asked of the Cayenne and marvelled at how this sporty SUV simply takes everything you can throw at it in its stride. It gets up and goes. Put simply it's easy to forget that Porsche has only been producing SUVs for just over a decade, especially when its offerings are this well accomplished...  $\bigcirc$ 



# THE ULTIMATE IN PERFORMANCE UPGRADES.

AT DMS AUTOMOTIVE WE'VE BEEN UNLEASHING AUTOMOTIVE PERFORMANCE FOR OVER 18 YEARS.



DMS 1M (EVO MARCH '12) "THERE'S A REAL RIP TO THE WAY THE REVS PILE ON ABOVE 4000RPM"

**DMS SL65 BLACK SERIES (EVO** OCTOBER '10) "IT FEELS LIKE THE LOVE CHILD OF AN SL65 AND A PORSCHE GT2"

DMS 135I (BMW CAR MAY '09) "THE STANDARD CAR IS GREAT BUT DMS HAVE SOMEHOW MANAGED TO TAKE IT TO THE NEXT LEVEL"

DMS 997 TURBO 3.6 (EVO SEPTEMBER '08) "IT'S EPIC, HILARIOUS AND ADDICTIVE IN EVERY GEAR, YET DOCILE WHEN CRUISING"

DMS 997 TURBO 3.8 PDK (EVO JUNE '11) "DELIVERY IS ALMOST UNCOMFORTABLY FORCEFUL"



BELOW IS A SMALL SELECTION OF OUR MORE POPULAR MODELS TO UPGRADE. WE ARE ABLE TO UNLEASH PERFORMANCE FROM SMALL FOUR CYCLINDER DIESEL ENGINES UP TO V12 SUPERCARS:

### PORSCHE

997 TURBO/S 3.8 INC PDK >> 611 BHP 997 TURBO 3.6 » 625+ BHP 997 GT2 RS » 670+ BHP 996 TURBO/GT2 >> 600+ BHP 997 CARRERA S PDK » 400+ BHP 997 CARRERA S >> 376+ BHP 997 CARRERA PDK » 368 BHP 997 CARRERA GTS » 435 BHP 997 GT3 UP » 436 BHP BOXSTER 3.45 » 336+ BHP CAYMAN S » 342 BHP CAYENNE GTS » 440 BHP CAYENNE TURBO 4.5 » 565+ BHP CAYENNE TURBO 4.8 » 578+ BHP CAYENNE TURBO S 4.8 » 600+ BHP CAYENNE 4.2 DIESEL >> 450+ BHP CAYENNE DIESEL >> 300+ BHP PANAMERA TURBO >> 600+ BHF PANAMERA DIESEL » 305+ BHP

### MERCEDES-BENZ

'63' 5.5 Bi-TURBO ALL MODELS » 600+BHP '500' 4.7 Bi-TURBO ALL MODELS » 498+BHP SL65 BLACK >> 720+ BHP (+DELIMIT) SL65 AMG » 690 BHP (+DE-LIMIT) '55' AMG KOMPRESSOR » 580+BHP C63 AMG » 530+BHP (+DE-LIMIT) SL63 AMG » 560+BHP (+DE-LIMIT **RE-MAP & LOWER ABC SUSPENSION)** CL600 Bi-TURBO » 580+ BHP SLK55 AMG >> 389 BHP (+DELIMIT) SLK 350 >> 328 BHP 220 CDi ALL MODELS » 210+ BHP 250 CDi ALL MODELS » 259+ BHP 320 CDi V6 >> 274 BHP 350 CDi V6 » 312 BHP 420 /450 CDi V8 » 358 BHP

### BMW

M5/M6 F10 » 620+ BHP M5 V10 >> 548+ BHP (205 MPH) X5M / X6M » 618 BHP 1M » 411+ BHP M3 E90/92 » 445 BHP (+DE-LIMIT) M3 E46 >> 370 BHP (+DE-LIMIT) F10 520D » 221 BHP F10 530D » 296 BHP F10 535D >> 358 BHP 335i/135i/X6 >> 370+ BHP (+DE-LIMIT) 123D » 252 BHP 330D E90 » 296+ BHP 320D E90 » 215 BHP 730D » 290+ BHP X5 4.0D / 740D >> 370 BHP X5 3.0D >> 296 BHP X6 X50I 4.4 >> 500+BHP 535D / 335D / X5 SD » 355+ BHP M135i Please call for more info

### EXOTIC / MISC

FERRARI CALIFORNIA » 487 BHP FERRARI 599 » 647 BHP FERRARI 430 » 525 BHP GALLARDO » 546 BHP LP560 >> 600+BHP LP640 » 707 BHP MURCIELAGO LP640 » 707 BHP MASERATI GT/QPORT » 438 BHP MASERATI GT S / MC >> 479+ BHP ALL 2014 MASERATI'S Please call for more info AUDI RS6 4.0 T V8 Please call for more info AUDI RS6 V10 » 680+BHP +DE-LIMIT AUDI R8 V1 » 592+BHP AUDI RS4/R8 B7 » 439 BHP + DE-LIMIT AUDI RS3 » 420+ BHP AUDI Q7/A8 4.2 TDi » 400+ BHP AUDI 3.0TDi (ALL MODELS) » 300+ BHP AUDI S3 / GOLF R » 317+ BHP ALL 2014 RANGE ROVERS AVAILABLE RANGE ROVER 4.4 TDV8 >> 395 BHP R ROVER SPORT 3.0D » 305 BHP EVOQUE 2.2 DIESEL » 240 BHP BENTLEY 4.0 T V8 >> 600+ BHP BENTLEY CGT / F-SPUR (INC 2013) » 660 BHP GT SPEED / SUPERSPORT » 680+ BHP

# FOR ALL OTHER MAKES AND MODELS, PLEASE CALL US.

WORLDWIDE OFFICES AND INSTALLATION: UK » IRELAND » EUROPE USA » ASIA » AUSTRALIA » S.AFRICA



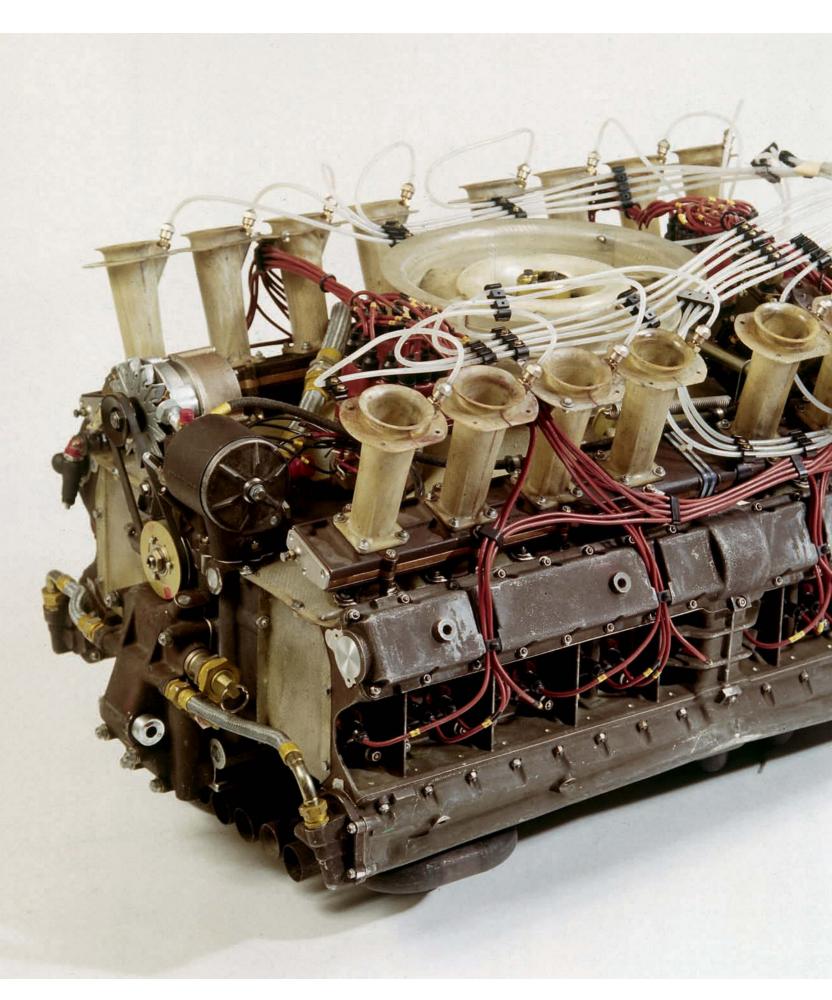
/DMSAUTOMOTIVE FOLLOW US FOR OUR LATEST NEWS!

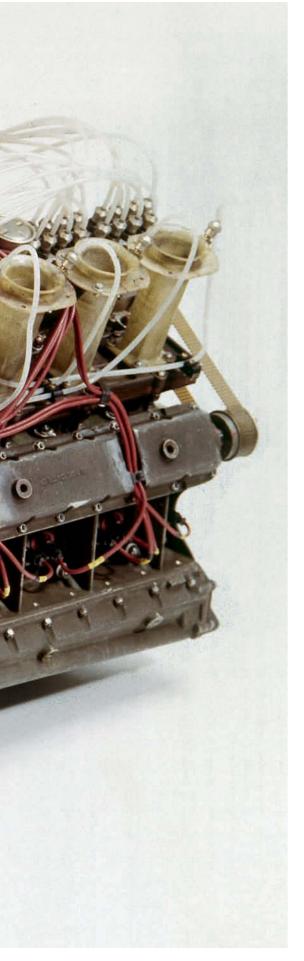
WWW.DMSAUTOMOTIVE.COM

UK: 0845 850 1845 INT: +44 845 850 1845

MORE EGUALS LESS REDALS REQUALS MORE MORE

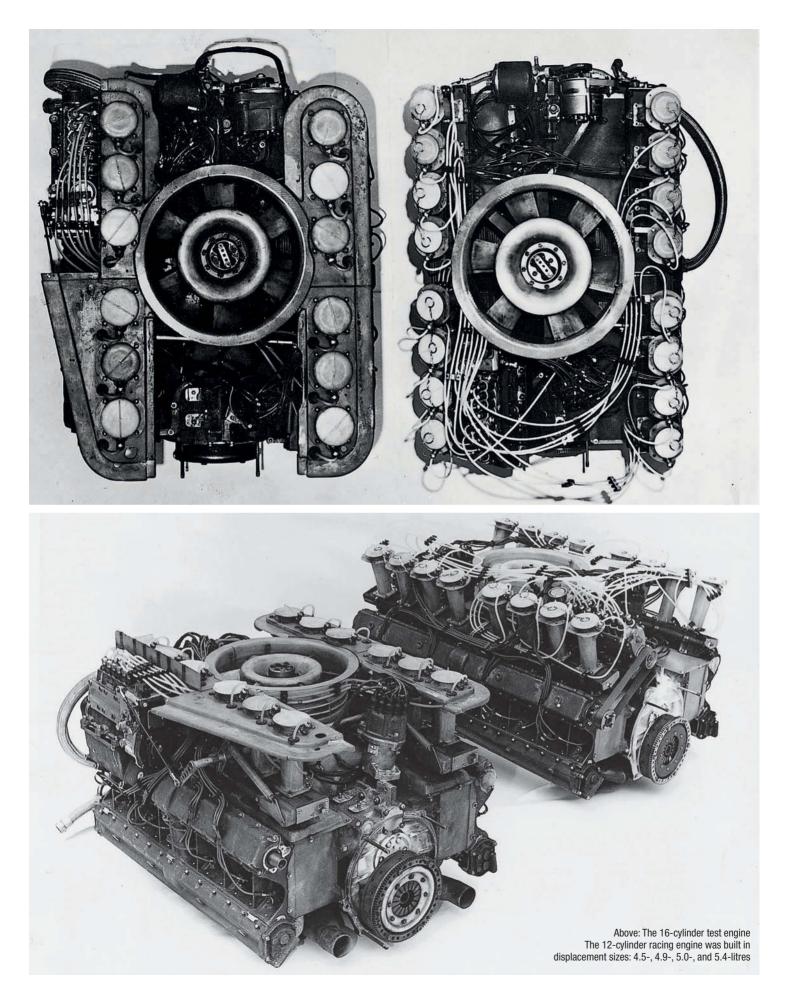






# Source of the second state of the second state

but a 16-cylinder motor? Why did Porsche decide to build such a radical monster?





ll engines are, in their most essential form, air pumps. The more air you can pump through them, the more fuel it can burn, the bigger the bang, the greater the power. It's as simple as that. But why does it matter how many cylinders a car has? In the 1960s, Porsche found itself with no fewer than three 2.0-litre racing engines, with four-, six- and eight-cylinders respectively and you'll not be surprised to learn that the eight was the most powerful and the four the least. But why? All three engines offered the same amount of space for combustion to take place, but just divvied it up in different ways.

The main reason is that the more cylinders you have, the lower the reciprocating mass of each cylinder and the faster the engine can therefore rev. And with this increase in engine speed comes a commensurate increase in combustion and therefore power output.

Nevertheless, since the dawn of automotive time, engineers have been wary of piling on the cylinders, for this extra power doesn't come for free. Fuel consumption can be hit because of the additional friction created by all those extra moving parts and mechanical complexity and therefore reliability will inevitably be compromised. Twice as many cylinders means twice as many pistons, con rods, valves, gudgeon pins and tappets to go wrong. The engines can be heavy and large too, not least because of the extension in block size needed to provide space between each bore. They can be tricky to cool too.

But that's not stopped race engineers upping the cylinder count in their quest for more power. V8s have been around since the turn of the last century, V12s since before the first world war. But few ever felt the need to build a racing engine with 16-cylinders. And when you read what follows, you will see why.

Although some had been built previously, the first successful V16 was produced by Cadillac in 1930, not so much for its power as for the smoothness it brought to its Series 452 luxury road car. But the most famous came four years later and was the supercharged V16 designed by none other than Professor Ferdinand Porsche for Auto Union. It alone possessed the power to take the fight to the omnipotent Mercedes team in Grand Prix racing and, in 1936, actually beat them to the European Championship. But it was a fiendishly complex engine, its rollerbearing crankshaft alone was reputed to contain over 1000 components.

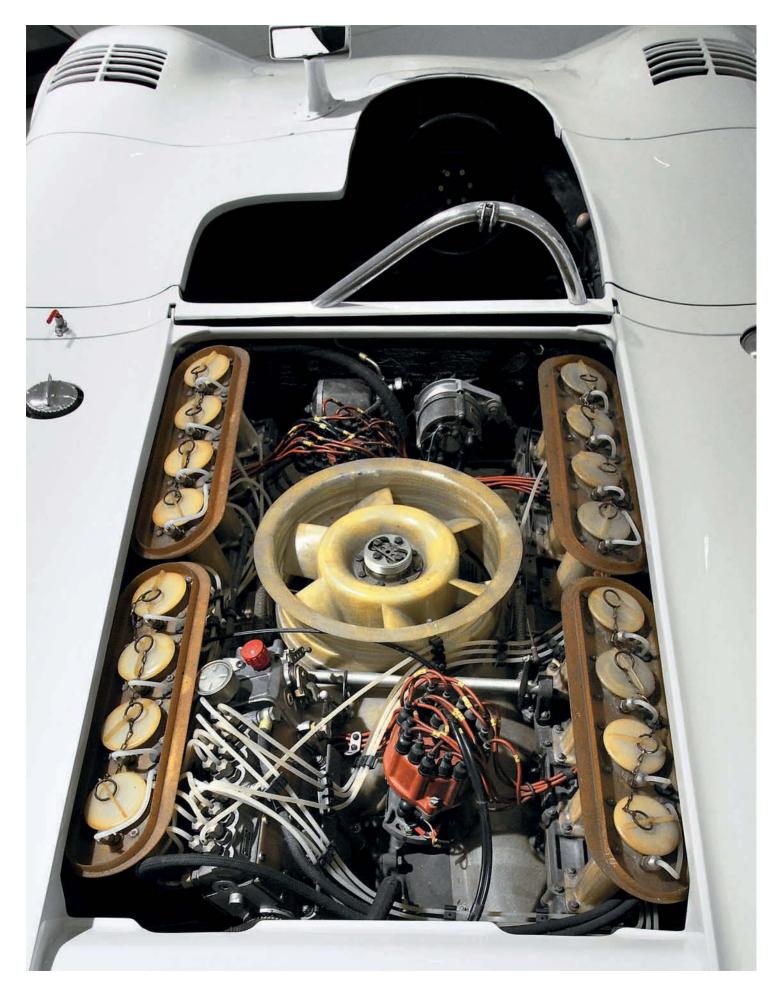
So who would think it a good idea to do another? The British, that's who. Except BRM's 1949 V16 engine made Porsche's pre-war effort look positively sensible. Logically, the bigger an engine, the greater the justification for more cylinders. So when BRM decided to build a 1.5litre engine to meet the regs for Grand Prix racing you might think it would have four- or sixcylinders. But no, BRM went for 16, displacing just 94cc each. It was in many ways an incredible design, revving to 12,000rpm and producing almost 500hp thanks to its supercharger. But its power delivery was so peaky, Stirling Moss described it as the worst car he'd ever driven. Which was when it was running, which wasn't often because the engine was so far ahead of its time, the metallurgy didn't actually exist to allow it to function properly. It took BRM four years to get it working properly, by which stage the car it was in was obsolete.

The V16 was such a disaster, you'd think BRM would never think of doing another. But it did. BRM's 3.0-litre 16-cylinder motor of 1966 was technically actually an H16 and was in fact far more sensible in concept because it was effectively two of its highly successful 1.5-litre V8 engines flattened out with one lying atop the other. But it was still heavy and unreliable and while it did win one race (the US Grand Prix), that said more about the Lotus chassis into which it was fitted and the fact that Jim Clark was driving it, than any inherent qualities of the engine itself. Only six cars finishing helped its prospects too.



Left: The 1969 PA 917 Spyder sits in the foreground at the Porsche Museum in Stuttgart Above: The Type 917/16-cylinder engine







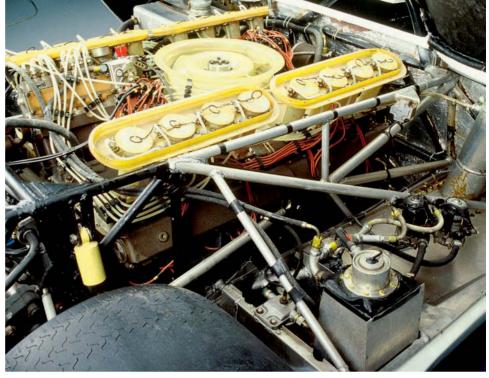
So there you might have thought the story of the racing 16-cylinder motor would be allowed to lie. Nice in theory, nightmarish in practise. But Porsche was about to write a new chapter.

We must now spool forward to 1970 and the tussle between Porsche and Ferrari for the World Sports Car Championship. As you will know, in the 917 Porsche had one of the greatest sports racing cars of its time while the Ferrari's response was the 512S. All season the Ferraris were on a hiding to nothing because the Porsche was both lighter and more powerful: the 512S was prepared in a rush when it became clear that Porsche had defied the rule makers and actually got the 917 homologated to race. But there was a fear at Porsche that were Ferrari actually able to design its successor at a speed of its choosing, it could end up with much more of a fight on its hands in 1971.

At the same time, Porsche also knew that come what may, sports car regulations would change for 1972 meaning only a car with a 3.0litre engine could run as a prototype and therefore win races. Looking at the impending obsolescence of the 917 as a sports car, Porsche started looking at ways of preparing it to race in the North American Can-Am series.

The problem was that Can-Am was dominated by McLaren whose vast 8.0-litre plus Chevrolet engines developed 750hp – approximately 130hp more than the best Porsche 5.0-litre 917 engine. The good news was that Can-Am had no engine rules of any note, so Porsche could enter a car with any motor it liked.

History tells us it ended up simply turbocharging the engine it already had and wiping the floor with everyone, but not before one last 16-cylinder flirtation...



The inspiration for the 16-cylinder 917 engine came from none other than Ferdinand Piech whose grandfather had designed the Auto Union motor all those years ago: "We did it because it was actually quite easy to do and Piech wanted it. As an engine it worked really well, but in the car there were issues...". The words belong to Porsche engine guru Hans Mezger, who led the development work of the new engine.

The idea was simple enough: you took the existing flat-12 motor and literally added a cylinder at each corner, so retaining the same pistons, rods and valves. From the 5.0-litre motor this gave a capacity of 6.6-litres and a nominal power output of around 800hp, which would put Porsche within fighting distance of McLaren even when taking into account the 917 which would be a little heavier than its British rival. But the 917 engine had also been built in 4.5-, 4.9- and 5.4-litre capacities, so the scope for an engine of as little as 6.0-litres or as large as 7.2-litres was possible using existing parts stock. According to Karl Ludvigsen's Excellence was *Expected*, a maximum power output from the largest engine could have been as high as 880hp, which really would have given McLaren something to think about.

It was certainly sufficiently promising to put in a car, and also to indulge in a little mischief, to which we shall shortly return. The car chosen was the 917 PA Spyder that Porsche had entered into Can-Am races in 1969 with a standard engine, just to dip its toes into the series and see how it worked. But the car first needed to be butchered, its spaceframe requiring a massive 270mm extension in its wheelbase to accommodate the vast new engine.

But an engine on a bench and an engine in a

Ferdinand Porsche designed a 16-cylinder motor for Auto Union in the 1930s, Ferdinand Piech later used his grandfather's work as inspiration for his own version

"As an engine it worked really well, but in the car there were issues..."



"It was a monster. The motor was so long you could hear one end start up before the other"

car are very different prospects. Because Porsche did not attempt to reinvent the wheel with its design but instead develop it using proven componentry, the engine was actually an extremely reliable, if costly, unit to run, so whatever its other issues might me, those that dogged BRM would not be among them. The problem was what it did to the car it was in.

Stretching a car's wheelbase so substantially will totally change the way a car handles, trading agility for stability. But so too will it compromise the torsional rigidity of a spaceframe structure. Add the extra weight of the engine (claimed to be as much as 70kg) and then the extra work that engine asks the chassis to do and perhaps it's not a surprise that the Spyder was unable to cope with an engine of which it had never been designed for. Jo Siffert tested it extensively but by the time the decision needed to be made to approve or shelve the design, Porsche had already realised it could find that much power or more, plus additional torque without changing the wheelbase at all, thanks to that newfangled contraption called the turbocharger.

So the flat-16 was set aside, but not before it performed one more very useful function for Porsche; the mischief mentioned earlier. When news of the engine broke, Porsche released a photograph of it next to the standard 12-cylinder 917 engine, but craftily shrunk the 16 so it looked the same size. It can never be known, but it has been suggested that when Ferrari saw the image, it was believed to be an all 5.0-litre engine for the 1971 season to which Maranello would have no answer. In time Ferrari would announce it was ceasing development of the 512S and would instead concentrate on its 3.0-litre car for the 1972 season, giving Porsche a clean run at the 1971 title, which it grabbed with both hands. The irony is much of Ferrari's development work had already been done and the result, the 512M (for Modificato) won a non-championship

round at Kyalami in South Africa in November 1970, trouncing the 917 and becoming the only Ferrari ever to beat a 917 in a straight fight. Had Ferrari raced it in 1971, that season might have had a very different conclusion...

The only racing driver I'm aware of who drove the Spyder with the 16-cylinder engine was soonto-be Can-Am champ Mark Donohue who said: "It was a monster. The motor was so long you could hear one end start up before the other. Although it wasn't setup properly to try for any lap records, it was truly impressive in a straight line."

Porsche still has at least one complete flat-16 engine, and the last time I saw it, it was still in the back of the PA Spyder. And every time I go to the museum, or bump into museum staff around the world, I ask them when they're going to restore it and fire it up so we can hear what a 7.2litre, flat-16 racing Porsche engine sounds like. If they do it, there is barely a place on the planet to which I would not travel to hear it  $\odot$ 

# LANGLEY AUTOCRAFT Passionate about Porsches

# PETE BARTLEY

# Let us love your porsche as much as you do

# **Full Bodyshop Facilities**

Windscreen Scuttle Repairs from £332 + VAT

Bumpers Remove Repair & Paint from £321 + VAT

Wheel Re-Furbs from £73 + VAT

Check Strap Repair from £450 + VAT

Free Courtesy cars

We work with most major Insurance Companies



Happy Valley Industrial Estate, Primrose Hill, Kings Langley, Hertfordshire WD4 8HD



Ph 01923 269456
 Mob 07810 647911
 Fax 01923 269457
 Email pete.porschespecialist@live.co.uk





on road and track in Portugal, can it really live up to all the excitement?

Story: Andrew Frankel

Photos: Jamie Lipman

### First Drive: Cayman GT4

he circuit at Portimao might seem to exist purely as rebuttal to those who say all modern circuits are boring, sterile places offering an antiseptic diet of long straights and slow corners via a largely two dimensional media. Instead it reminded me strongly of Dijon, where you might remember Rene Arnoux and Gilles Villeneuve wheelbanging their way through the 1979 French Grand Prix. A lap of Portimao in something quick is a breathless affair of blind brows, mad elevation changes, fast flicks, crazy cambers and disc-destroying downhill braking areas. If you were launching a car of less than unimpeachable chassis credentials you'd simply not come here. or you'd emasculate the circuit using traffic cones to slow cars through or divert them away from the trickiest bits, as did BMW when it recently launched the M4 here.

By contrast for the Cayman GT4 launch, Porsche not only provided the entire track in unexpurgated form but instructors driving more powerful cars whose only purpose was to make you go not slower, but faster. As votes of confidence in its machinery go, it was singularly convincing. And after ten laps of that, it was very hard for those of us who had not been there before to think of a better car in which to learn such a relentless, mentally and physically taxing track.

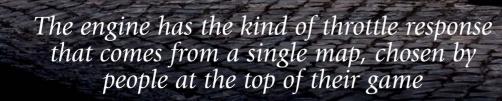
But the GT4 is not just the perfect training vehicle in which to discover the wild and wacky ways of slightly unhinged Iberian race circuits, it also provides the same flawless introduction to the no-less-crazy world of Porsche's Motorsport models.

As you will know, Porsche has never done a car like this before, indeed, once said it would never do a car like this. When the Cayman first broke cover in 2005, I was one of many people who suggested it might provide the perfect stepon point to Porsche GT series cars, and so too was I one of many who was told GT cars relate directly to what Porsche races, and Porsche races 911s, so all GT cars must, by definition, also be 911s. These were Motorsport cars and the clue was in the title. No longer.

The tune has changed somewhat today. Talk to Andreas Preuninger, the guru of all things Motorsport, and he'll tell you the reason he's taken a decade to get around to producing this car is simply that there are only so many people of sufficient calibre that Porsche can employ in Weissach. Furthermore, because of the way the timings of the various programmes have fallen in the past, it is only now that he's been able to get around to doing a Cayman.

But so too has the GT4 been a pragmatic project, and a mere 22 months in the creation from conception to job done, leaning heavily on the parts bin of both his own department and that of Porsche in general.

I'm not going to go into all the technical details because I think you'd rather I spent my



LOULE

WÀ(

19





# A MESSINES A SILVES

# First Drive: Cayman GT4

word allocation telling you what the GT4 is like to drive. Even so it's worth remembering that the engine is a factory standard 911 Carrera S motor. albeit it's been flipped 180 degrees so the gearbox is at the back and modified only to allow a mid- rather than a rear-engined installation. Its more complex and less efficient exhaust routing actually loses 14hp over the Carrera S. Bear in mind, too, that the gearbox is the same as a standard Cayman, right down to its ratios, modified only to have a slightly shorter throw and raise its torque-handling capabilities. The suspension borrows heavily from the GT3 - almost entirely at the front and while the rear axle is a new design, even that uses GT3 wishbones. The brakes, too, are GT3 carry-over items.

You get the feeling therefore that the bulk of the work was not sourcing the parts to create a GT4, but integrating them harmoniously under the Cayman's sharply sloping roof. There was, of course, the need for additional cooling, not just because the engine is internally larger and more powerful, but because mid-engined cars are more difficult to cool than rear-engined cars. And if you look at the gaping apertures in that front air dam, you'll not doubt where the bulk of that cooling comes from.

But there was that other aero consideration too: the need to stop the Cayman achieving escape velocity over steep brows and through quick turns, and rarely will you ever be more grateful even for just a little downforce than over the crests and into the curves of Portimao.

And if you felt the GT4 was merely a wannabe imposter among other more pukka GT cars, be advised that with nothing more than hand tools you can adjust the rake of the carbon fibre rear wing and balance the aero change that results by removing inserts in the front diffuser channels. And you can choose between three different roll bar settings front and rear, and choose your own front suspension geometry. Try that on a Cayman GTS and see how you get on.

The track awaits. My only sighting laps were from the passenger seat of a GT4 driven by Walter Rohrl. However, these were rather more about clinging on than learning the lines around this fascinating place.

The standard seat is excellent, the optional carbon bucket sourced from the 918, better still. The wheel is from the 918 and is fractionally smaller than a Cayman's and I'm less sure about that. I like big wheels with slim, firm rims but at least it's devoid of buttons.

I'm not sure the engine sounds special enough for a GT car. It's far louder than that of a Cayman GTS or a Carrera S but that's just because Andreas and his merry band of men have pulled out much of the sound deadening. You only need to look at the numbers (0-60mph in 4.2sec, top speed 183mph) to know it gets the job done, but this is the first engine to go into a GT Porsche without first being massively modified. What more can be expected for the money? Not much, but it is a key differentiator between the Cayman and all 911-based GT cars since the first 16 years ago.

Another, at least these days, is the retention of three pedals in the footwell. Preuninger refutes the suggestion that it's only got a manual transmission because PDK wouldn't fit alongside the larger engine in the cramped confines of the Cayman's engine bay, and I am rather happier about that. The GT4 has a 'Sport' button which will be familiar to many Porsche users. But it affects neither throttle mapping, the steering tune, nor the damper settings as Preuninger believes that if you get these right to begin with. there is no need to offer such variety. So all it does when activated is expertly blip the throttle to execute rev-perfect downshifts and make you look like a world class heel-and-toe jockey to anyone in the passenger seat unaware of the button's real role. Around the track and in conjunction with unimprovable shift quality, as a simple experience to savour, it dusts any paddle-shift system.

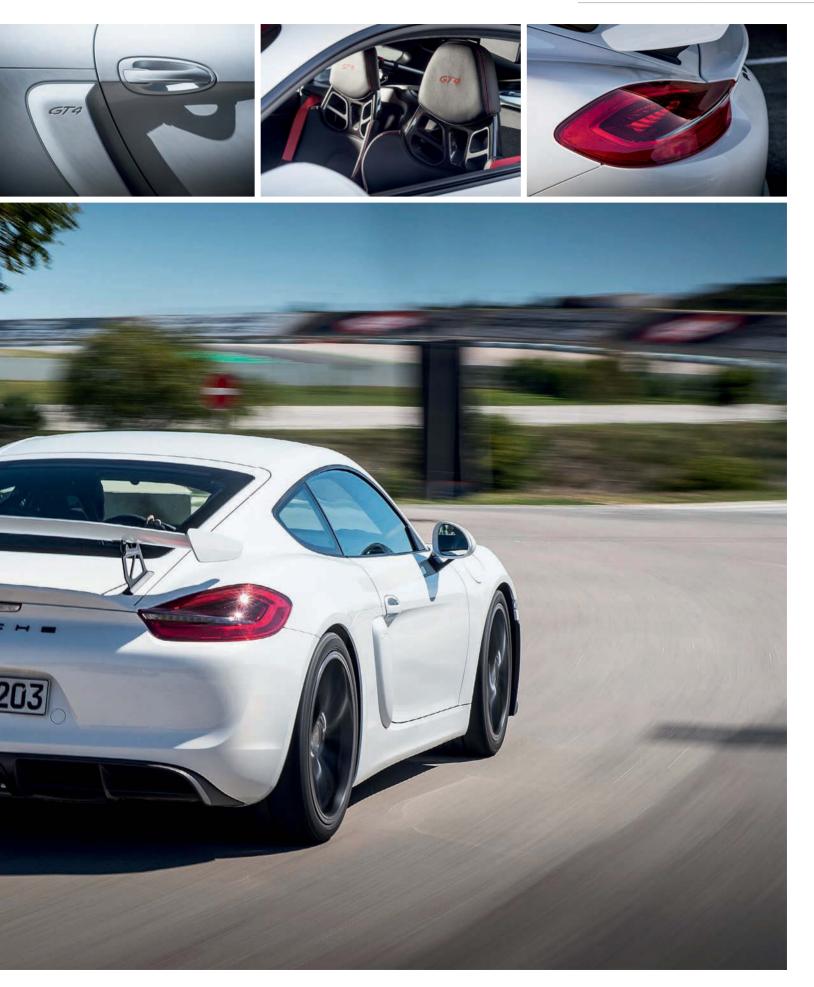
The first of many challenges presented by Portimao is the first corner, at which you arrive travelling at perhaps 135mph in fourth gear. So first you need to brake and I should advise buyers here to seriously consider saving the cost of the ceramic options: with discs designed to stop a GT3 with more weight and almost 100 additional horsepower, the standard items are gloriously over-engineered for the GT4.

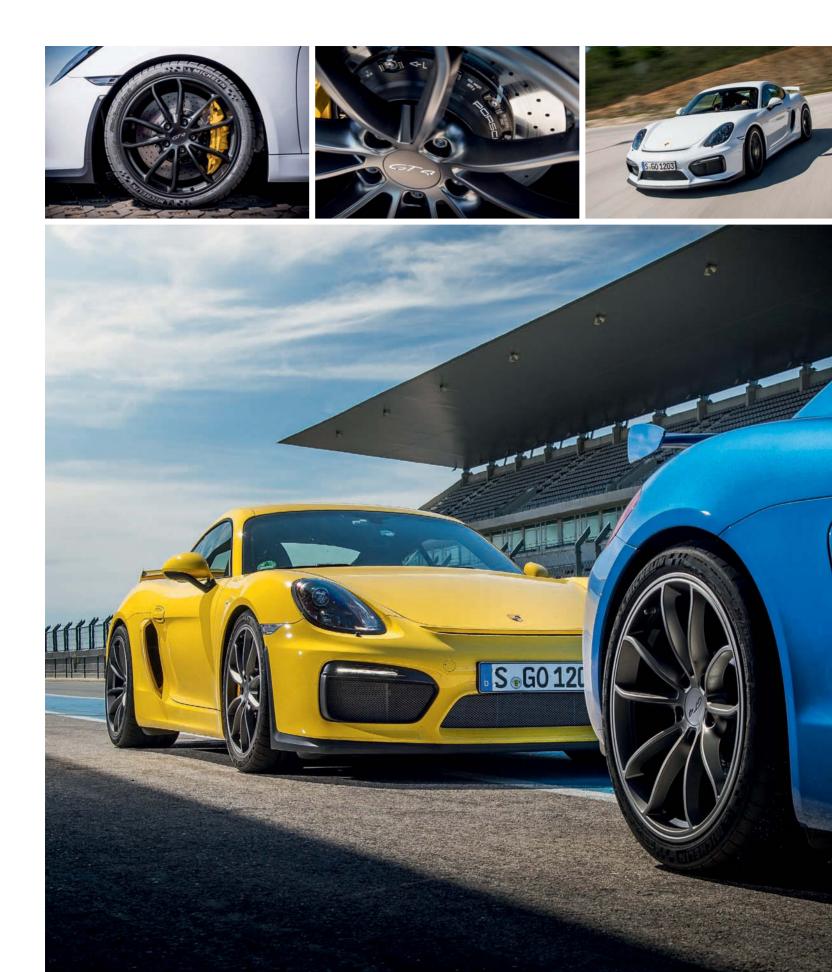
The car flicks into the first apex and then a second hoves immediately into view. Should you brake again? You should not, for the Cayman generates so much grip on its Michelin Sport Cup 2 Ultra High Performance tyres, it's actually an acceleration zone, taken on the limit of both longitudinal and lateral adhesion.

There's another slower turn before the first blind brow, arcing uphill and to the left. It looks flat but the crest seems so sharp you worry about wheelspin flicking the car into oversteer and you into the barrier. The car has no such concerns and deals with it under full throttle once more without a suggestion of slip at either end, while the little G-meter on the gauge in front of you bounces off its 1.5g stop.

The lap continues in this vein, becoming ever more tricky until the very last curve which loops over, surprise, another blind crest but this time diving downhill and to the right with the apex out of sight beyond the crest. You really must clip it or risk ending up in the grandstands. Halfway through, the Cayman seems to be gently drifting in and out of over and understeer when it hits its rev-limiter at 115mph in third. What do you do? Every sense in your body says sacrifice the speed until the car is straight: you're not in a race, it simply doesn't matter. But something you have learned in that lap tells you that even under such extreme forces when you should be doing nothing to destabilise the car, it













will somehow cope. So you dip the clutch, momentarily actually lose drive to the rear wheels for goodness sake, grab fourth and gently reapply the power. If the GT4 reacts at all, it is with the slightest shiver, a mild gesture of benevolent horror that you might even consider treating it this way, before soaking up the very worst you can throw at it.

In my pickiest moments and only on the track, I might even suggest it's too accommodating, that a GT Porsche shouldn't really make your life that easy, that it should issue more of a challenge by being even sharper on its way into a corner and a shade more exuberant at the exit. But that's maybe just me brought up on a diet of gloriously tail-happy 911 GT3s.

Out on the road I have no such qualms. Actually and in this environment, the GT4 feels decidedly like an old school car, which is a neat trick to play because if you bother to look at the rate at which the countryside is passing your window, you'll soon realise it is anything but. The illusion is created by three factors, easily the most obvious of which is that manual gearbox. I only used the Sport function for the track where perfectly matched downshifts are essential: on the road I enjoyed using all three perfectly positioned pedals at the same time at least to try and see if my human brain was as good as Porsche's computers. It's not, but I didn't care. But I'd still choose different internal ratios, and radically so at that.

Secondly, there is the engine, which may not have the credentials to live with ease behind the driver of a Porsche Motorsport car, but at least has mighty lowdown torque. It also has the kind of throttle response that comes from a single map, chosen by people at the top of their game.

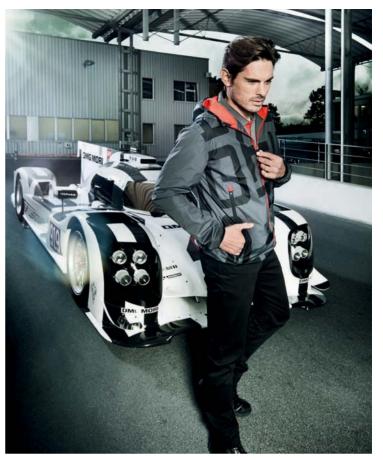
And finally there's the steering – yes the newfangled electric Porsche steering that everyone, myself included, has criticised since it first appeared in the 991 four years ago. Criticise no more: the Cayman GT4 steers much better than a GT3, let alone a standard Cayman or 991. The 'feel' may be synthesised these days, but it's there and now the Jaguar F-type has electric steering too and it's better than any comparable system out there.

So what I want to be able to say is that the Cayman GT4 is like a 911 GT3 in a more affordable packaging; but I can't, not quite at least. This is a car with shortcomings, most notably the first engine ever to go into a GT Porsche without first being extensively modified to suit the task ahead. I love the manual gearbox but a third gear that goes way past 110mph makes no sense at all and on the track I'd like it to ask a little more of its driver as does a GT3, because experience with such things shows that the more you put in, the more you take out.

But I need to give myself, and you, a reality check. This is a car that costs £64,451, which is less than you'd pay for a Cayman GTS with nav, PDK and ceramic brakes. By contrast, and if you could order one any more, a 911 GT3 would cost six figures or, put another way, half as much again, or put a third and final way, damn near the cost of a Cayman GT4 with a Boxster on the side. In that context we can perhaps forgive an engine that revs only to 8000 rather than 9000rpm, has lengthy lower ratios intended to make the fuel consumption figures less abysmal and has such supremely user-friendly manners on the track.

In fact, the acid test is not to compare it with other Porsches at other price points but anything that might remotely be considered a rival, and here the GT4 is as far ahead of its competitor as any GT Porsche I can recall. In such a context, my complaints shrink to mean minded quibbles. Indeed it makes the question for those looking to spend such money of any proper sports car not why they should choose a Cayman GT4 but why on earth they might possibly not  $\circ$ 





# Racing and Motorsport. The new collections from Porsche Driver's Selection.

Porsche and motorsport: the two are inseparable. With over 60 years of racing history and more than 30,000 victories, Porsche is the most successful marque in motorsport.

Now Porsche Driver's Selection is celebrating this heritage with two exciting new collections.

Marking our Le Mans 2015 bid and Carrera Cup GB Championship, both the Racing and Motorsport collections embody the spirit and success of Porsche on the racetrack as a stylistic element across every item including jackets, polo shirts and espresso cup sets.

The Racing and Motorsport collections are available from our Porsche Centres and online at **www.porsche.com/shop** 



Discover more about Porsche Driver's Selection





Simon has worked across several automotive publications over the past decade

## Porsche has long been in the business of winning at motorsport, but is it facing some of its toughest competition yet?

ne of the highlights of my month is reading contributor Andrew Frankel's historical motorsport features. Admittedly we don't run them every month in *GT Porsche*, but when we do I always find his retrospective look back on Porsche's motor racing exploits fascinating – I hope you do too?

second

by Simon Jackson

Digesting those features one constant quickly becomes apparent: Porsche's eternal desire to win in motorsport. Sure, every entity that goes motor racing does so to cross the finish line first, but with Porsche that passion for victory is bordering on the obsessive, and it isn't diluted today. Take a look at the 919 Hybrid project for example. Last year there was an obvious 'get out of jail free' card which the brand could play whenever things didn't quite go to plan: 2014 was its first season back in world endurance racing. This year though the stakes are higher, the car simply has to perform – it's clear that everyone

connected with Porsche Motorsport hopes the pace the 919 Hybrid showed towards the end of last season continues into 2015.

Lower down the racing echelons though things haven't looked so positive for Porsche. The 911 RSR has been coming under heavy opposition fire of late – mainly in the power stakes. At Geneva, Andreas Preuninger made no bones about this, saying: "This is something we need to address. But this is not something to do with the balance of performance, it's to do with the competition that uses big V8s against high rewing, high technology Boxer sixpresident Jean Todt was hanging around at the VW Group Night, a VAG preview gig prior to the Geneva motor show press day. Was Todt being groomed by the VAG suits with a view to massaging modern endurance racing rules? Or, as has been touted for years now, was the ex-Ferrari man still pushing VAG to enter his beloved Formula One to bolster a struggling grid lacking in manufacturers? Perhaps both sides had a political agenda...

It seems unlikely that Porsche or Audi would enter F1 in the near future, if there was any desire to make such a shift then it would've made more



FIA President Jean Todt was hanging around at the VW Group Night prior to Geneva... Perhaps both sides had a political agenda...

cylinder engines – and this is quite a challenge for us. If we compete on the race track we want to win. There are two ways to do that, either we influence the rule makers, or we make a new car that fits better with this field of competition."

The 911 RSR still uses a Metzger engine, Preuninger insists this will change in a year or two in order for Porsche to take advantage of its race car development by putting it to good use on its street cars. That direct link was the success of the Metzger years and Porsche plans to replicate this.

In the meantime perhaps the Stuttgart plan to beat the Ferraris and Astons is a little more intriguing. FIA sense to let one brand stay in WEC while the other pursued single seater glory. Might the VW brand be utilised instead? Again, it seems unlikely given VWs its involvement in WRC, wouldn't you say? Maybe we'll see a Bentley or Lamborghini entry instead.

Regardless, Porsche is well aware that it needs to beat an increasingly competitive bunch of rivals in every sporting discipline to maintain a reputation forged many, many years ago. Whether that will be born out through contemporary business politics, or hammered out on the race track the old fashioned way, only time will really tell – I know which way I'd prefer... O

The views of the author are not necessarily shared by the magazine.

# auto mobilia



# Auto Art

eriod automotive artwork is hot property in some circles these days, and when you see pieces displayed correctly, it's easy to see why. Old signage and posters are traditionally brightly coloured and often entertaining purely for their retrospective nature – it's easy to forget how liberal advertising was in the 1950s and 1960s. But it's also worth considering purchasing items such as postcards, calendars and flyers

which can make statement pieces on the wall of your home or office.

We spotted this period calendar during our recent jaunt to Paris for the Retromobile show. It drew our attention for its fantastic design, bright colours and perfect framing treatment. Respectfully framing a piece of popular culture art can turn any piece into a focal point. This particular item was being auctioned with a guide price of up to €1500, but the same affect can be achieved for much, much less. Keeping an eye on eBay for suitable items is one fruitful avenue, the traditional auction houses often include period works in their sale catalogues – Coys now runs a film and automotive poster sale. Alternatively local flea markets or antique fairs can also be worth a visit. Don't skimp on framing; a local specialist will be able to provide you with expert advice and its professional framing services at a reasonable cost o

# 911virgin.com 01895 255222

# Buying a car

Our stock of around 40 used cars including high quality photos of each vehicle. Updated several times daily. There are also tips on buying a Porsche which could save you money. Selling a car



Things to consider if you are thinking about selling a car, in particular, scams and potential pitfalls to avoid. Five minutes spent reading this could save you from disaster.



Useful contacts - if you are looking for somewhere to get your car serviced, repaired or insured. There is even a section where you can read about our racing antics and general news.

# Cars wanted for immediate outright purchase



Professional quality CCTV for self installation

www.cctv42.co.uk



EST 1997

Independent Porsche Specialist T: +44 (0) 1282 697171

Servicing Parts Wheels Specialist Repairs Centre Porsche Restoration Classic Parts Race & Track











# SERVICING | PARTS | MOT | REPAIR | RACE&TRACK

Jasmine PorschaLink UK The Porscha Centre 3A Pendleside Lomeshaye Industrial Estate NELSON Lancashire BB9 6RY T: 01 282 69 71 71 E: jasmine.motorsport@virgin.net

W: www.jasmine-porschalink.co.uk



# Perfection Personified

Segal Motorcar Company has restored this 1961 356 B Cabriolet with amazing attention to detail.

Story: Louise Woodhams Photography: Matthew Berenz



pecialising in selling luxury and classic European vehicles for over 30 years, Canadian firm Segal Motorcar Company has seen a lot of exquisite and rare machines pass through its doors. However, the company's founder, Jeffrey Seigel, admits that none have been as special as this 1961 356 B Cabriolet.

The story of how he came to acquire this Porsche is both extraordinary and compelling. The 27-month journey that Jeff embarked on from the purchase of the car through to the restoration and now the point where it has gone up for auction with Bonhams has been fraught with emotion.

The car used to belong to one of Jeffrey's regular clients, Rick Hallissey, and Rick's wife, Pamella. Rick was a Porsche enthusiast through and through. Tragically he passed away just over four years ago but the car and the memories that it held during the couple's 40 years with it meant so much to Pamella that she couldn't part with it for another two years.

Jeff takes up the story: "When I went to see the car I couldn't believe my eyes. Sat

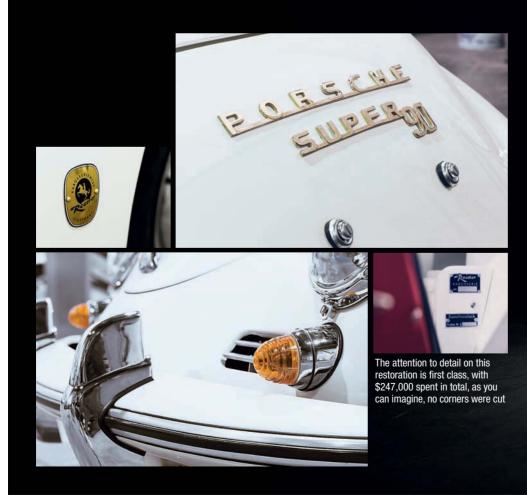
next to it was its twin. The Cabriolet belonged to Rick, and the Roadster D-lteren of the same year belonged to Pamella. Both vehicles had been bought within five days of one another. When I saw them together I wanted to buy the pair! Pamella is an amazing woman. At first she was reluctant to sell me the Roadster as well, so I offered her what I was going to pay for the Cabriolet plus another \$20,000 on top and she finally agreed."

After the deal was made both cars were picked up on a flatbed and taken straight to Engineered Automotive. The company is just a few minutes from Segal Motors, and has been restoring vehicles in Toronto and Nationwide for over 20 vears. Its work is second-to-none and it's reputed to be one of the best Porsche restoration specialists in Canada. Founding partner, Billy Smilovsky, started working on engines at the age of 14 and went on to work as crew chief for Ludwig Heimrath for 20 years. Ludwig enjoyed a victorious racing career in various different series, most notably American open-wheel PPG IndyCar competing at the Indianapolis 500. He was even an official works driver for Porsche from 1961 to 1977. After enjoying a longstanding career with Porsche Motorsport

Canada, Billy decided to set up his own business, and he's never looked back since. As well as earning a top reputation for being a master technician and champion restorer, Billy is also called upon by Porsche when it needs to troubleshoot software issues.

Before the restoration began, the 356 Cabriolet was completely stripped down and every calculable component pictured and catalogued, as was every new part, together with all of the invoices. "Billy and I had to a two choices: did we want to create a nice driver's car or turn it into a spectacular, functional piece of automotive art that was a testament to Engineered Automotive's level of craftsmanship?" reveals Jeff. "There wasn't much of a debate really, we had to go down the second route. Billy is humble, direct and honest – he genuinely cares about his customers but, more importantly, he is a start-tofinish kind of guy who tackles all projects with perfection. We were both passionate about doing this car justice," reveals Jeff.

Such is the case that every part on this car is OEM. "Although it essentially delayed the project by 13 months as Billy had to wait for a lot of parts, there's not one single aftermarket component on this car. He's a stickler for detail









# "Over my lifetime I must have sold 7500 Porsches but this is the best example of a 356 Cabriolet I've ever seen"

but it's worth it. Aftermarket screw fasteners, for example, may look exactly the same as the OEM ones to the naked eye but after a few years of being on the car, however, the aftermarket parts would have deteriorated. There's a difference of \$7.30 per screw fastener but it's worth it. It's also probably part of the reason why the estimated restoration of this project went from \$130,000 to \$247,000," explains Jeff. Obviously that doesn't include the cost of the car!

For that sort of money you can appreciate how this is a true body-off restoration. Over 1600 hours of labour went into the build of this car and it even has a Porsche certification of authenticity, together with an affidavit from Ludwig himself who oversaw the entire project and also acts as a consultant to Billy. Jeff even went to the effort of specially creating a custom coffee table book detailing the car's history, pedigree and provenance, featuring pictures taken throughout the entire restoration process. He's published four copies: one for Billy; one for the lucky new owner; one for himself; and one for Pamella - who contributed to the book with the adventures that her and Rick got up to in the car over the four decades they had it. During those years the car was used during the weekends of the summer season when the couple took it to their holiday home in Muskoka, Ontario. When the car came to Jeff, in October 2012, he knew it was a good driver, as he explains: "Rick used his cars but he was also very sympathetic in the way that he used them; it never missed an annual service. He knew what he was doing and I just loved that. Jeff and Pamella were only the second owners and it was what I would call an honest car."

Even so, a no holds barred restoration was always on the cards for this car. Exterior-wise the entire undercarriage, all welds and trunk areas were dipped into an acid bath before being resprayed in the original Ivory white hue and the black soft-top replaced. All-new chrome, brightwork, glass, rubber mouldings and tyres were also fitted and the chrome wheels refurbished. The 90hp Super 90 engine (which only had 68,822 original miles) and matching numbers four-speed transmission have been completely rebuilt to original specification together with the coachbuilder certification plates and labels which are all in the right place.

Inside the factory-ordered hand-stitched red leather trim, fittings, gauges and carpets were replaced or refreshed so that they were the same as they would have been when the car left the factory. You'll notice that the spare wheel is shod in a whitewall tyre but those on the car are black. We ask Jeff about it. "Billy and I stood for hours discussing whether we should have the spare wheel chromed to match the wheels on the car," he said. "That's when I phoned Jakob Greisen, Head of Bonhams US Motoring Department, and asked what he thought. He



said that we shouldn't do anything; Porsche deliberately used a black wheel shod in a whitewall tyre as the spare so you knew it was just that. It was the original spare wheel and tyre and so we should leave it as it was. It just shows you, even after working with a brand for 30 years, you can't know everything!"

In a nutshell, nothing has been overlooked – the car is flawless. In fact, Jeff is so confident about the standard of this car he's let the market set the price. In other words he's decided to sell it with no reserve when it goes under the hammer at Amelia Island.

"Over my lifetime I must have sold 7500 Porsches but this is the best example of a 356 Cabriolet I've ever seen," admits Jeff. Together with his experience in the job – having started at the age of 12 cleaning floors part time for his local dealership before going on to become general manager ten years later and then starting his own business (funded by the sale of his beloved 930 Turbo) – Jeff is also a huge fan of Porsche. From





Leaving the original spare whitewall wheel and tyre in situ was a tough decision, but it was the correct one...

his first, a 914, which to the envy of his friends he had when he was a student, to various 944s, 930s and 911s of every generation and type, he'll never fall out of love with the Stuttgart brand. "People in Toronto have such an admiration for Porsche cars; every time I drive one people I pass smile. It's also one of the most user-friendly cars ever built. Did you know that the number one modern car with the longest average life expectancy of 12 years is Honda? Only 10 per cent of Hondas ever made are still on the road, however. In the last 50 years, 92% of all Porsche 356 and 911 cars are still on the road. They're just wonderful machines."

So what was the most exciting part of this journey for Jeff? "Seeing the team at

Engineered Automotive assembling it all back together was unforgettable. The way the guys engaged with it, and the energy, was simply amazing. I'm happy I've had time with the car from completion to sale, so I can process everything that happened and speak to people about it. We had a terrific response to the print advert we put out, and the online video we put on our Facebook site got almost 2000 likes within 72 hours of it being live. It's been a long and often frustrating, journey. Visiting Billy at least five times a week for two years and three months was both exhausting and tested our relationship but we've come through the other side stronger. It's been a positive end for all involved, including Pamella who was blown away by the finished result."

This is the just the second car Jeff has ever had

restored to this level. The first was a 1970 Ferrari Dino 2.6 246 GT M Series Coupé which, although sold to a valued customer, an agreement was signed that means it will be returned to Jeff when he current owner wants to sell it. He's effectively a custodian of the car. We'll leave the last word to Jeff: "This is one of the best cars I've ever sold. For now, that is. In six months the 356 Roadster will be finished. It's one of only 472 in the world; now that is a special car." •

### THANKS TO:

The Hallissey family, particularly Pamella, and Billy Smilovsky and his team at Engineered Automotive (www.engineeredautomotive.com).

# PCGB Team Championship & Class 1 Winners 2013



# ENGINE REPAIR SPECIALISTS



# 986 987 996 997 Cayman

T: 01204 302809 E: auto@hartech.org www.hartech.org

# What you should expect from your classic car insurer

A business you can trust Independent and family owned since 1965

Speak to the same person everytime Your own personal client manager

# All the features & benefits

You would expect from a classic car policy



To speak to your personal client manager call now on 0121 248 9460

www.heritagecarinsurance.co.uk





'We believe that this is expert personal service at its best'

Mark Wilkinson Managing Partner Chris Wilkinson Senior Partner

# Plug BPlay

Modern car remapping technology is more seamless than ever. We talk to the owner of a brand-new Porsche Macan diesel as he hands his car over to be remapped.

Story and photography: Neill Watson

ar remapping and electronic tuning techniques have been around for decades now, but I'll admit that previous personal experience of remapping car services has led to me hold mixed views. It can be an industry filled with smoke and mirrors, with bold claims that are often hard to quantify and verify. We've all heard horror stories of laptop-wielding wizards who've plugged in, worked some magic and then left owners with a pile of molten alloy just a few weeks later. Or tuning companies offering shiny boxes with flashing LEDs but little else. And of course, there's that old chestnut of your car warranty. An unusual set of ECU readings is the perfect opportunity to sidestep an expensive engine claim. So would you really take an almost brand-new Porsche Macan with less than a few thousand miles behind it to a remapping company?

As I head across the wintery M62 towards the Lancashire headquarters of Tunit, I may not be exactly sceptical, but I'm possibly cautious. I have questions. Many of them. However, I'm probably directing them at a company better qualified to answer than most. Over a strong northern brew, MD of Tunit Ltd Michael Bromley gives me a fast rundown on the history of both the company and the remapping industry in general.

Established in 1998 with the purpose of offering the-then relatively new concept of turbo diesel remapping, Tunit's first product was a simple plug and play unit. "It was the size of one of those old Motorola brick phones, but it worked and proved that remapping could improve diesel power and driveability." At that time, there were a multitude of similar products on the marketplace, all using similar techniques of signal amplification for improving performance.

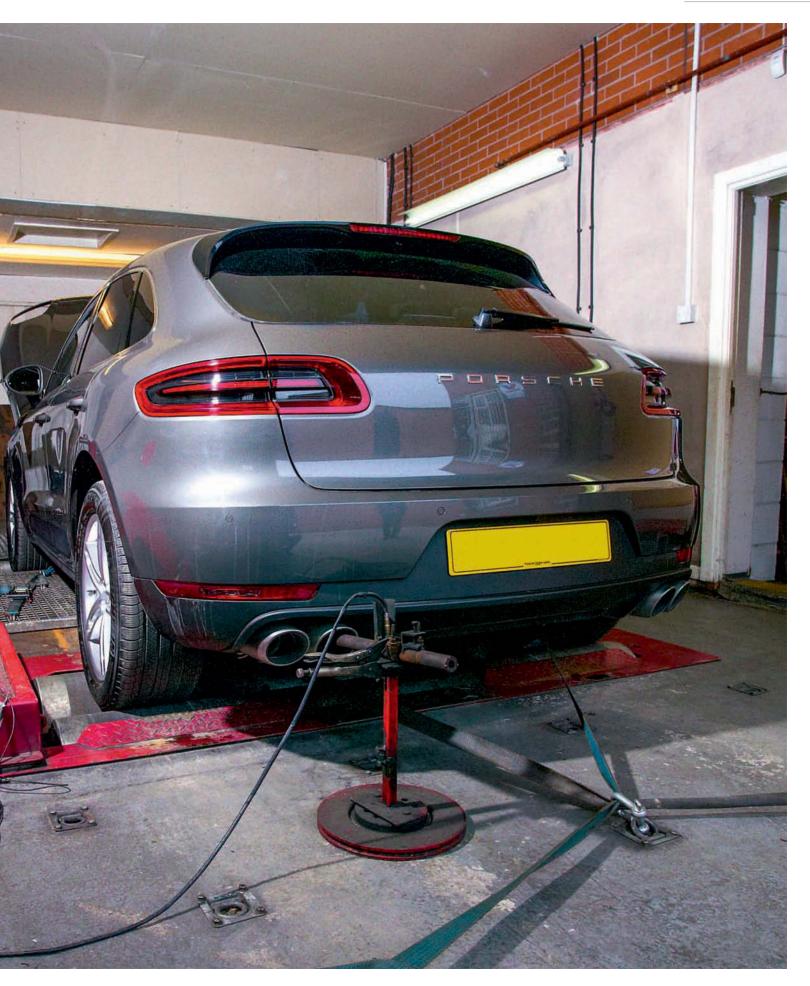
As the technologies developed, drive-by-wire throttles and other integrations and advancements created both hurdles and opportunities for the Tunit remapping technology and as the company continued to invest, the level of sophistication grew. Through a series of incremental improvements, the Tunit technology has evolved into today's tiny unit capable of handling the complex interrogation of a modern ECU safely, while offering a far more bespoke solution than the earliest models.

Today, the company sells worldwide through its dealer network and has blue chip clients that include the British Army. Its latest product is called Advantage. With more powerful processing hardware and adjustability across a range of parameters, the Advantage can be set to the owner's objectives: "We can set a unit for optimum economy, improved low end for towing or simply a general improvement in driveability," Michael tells us. "But the owner can also adjust the settings themselves to further tailor the power delivery."

"Development is an ongoing process," he continues. "As car manufacturers develop more complex systems, we have to keep pace. The big thing right now is the 'clock speed' of the latest engine management systems." Indeed, as



# Remapping



# "I've had my last five cars done by Tunit. The benefits are so obvious it's the first thing I do"

engines become more complex, the processors inside the ECU are more powerful than ever: "Plus, some have begun using clever techniques to develop barriers."

So, does this mean that the makers don't approve? "Actually, they're generally okay with it," he confirms, "they just want to stop casual fiddling. It tends to be individual dealers that have issues. But these days some of our biggest resellers are actually franchised dealers."

In fact, Tunit's range of warranty and guarantee options on the Advantage are testament to its confidence in the product. Your Tunit can be upgraded, reset to a new car or even part exchanged at any time. The unit itself has a five year warranty and the company stand behind a one year engine and drivetrain warranty as part of the package.

So, who would take an almost new Porsche Macan diesel straight to an ECU mapping company with less than a couple of thousand miles on the odometer? That question is easily answered when we meet its owner, as we shall refer to him. Holding our hot tea mugs, we chat about his new Porsche: "I love it. I had to wait what seemed like ages for delivery, but I'm really pleased with it so far." As well as a succession of fast German turbo diesels, he's also an ex-964 Carrera 4 owner. We swap iPhone camera rolls and reminisce about air-cooled 911s as we talk about the Macan.

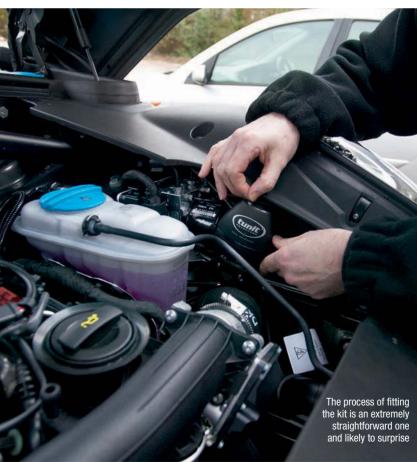
So why did he bring it here, so new and so soon after the 'new car' novelty period?"

"I've had my last five cars all done by Tunit. I used to wait a while, but the benefits to me are so obvious, it's now the first thing I do," he tells us. Well, that's a positive comment. Indeed this Macan still has that unique new car smell that I wish I could bottle and sell. We pop the bonnet release and lift that large, beautifully pressed clamshell to reveal the usual car manufacturer's plastic cover across the V6. A couple of quick release fasteners later, the Tunit guys are accessing the connections into the management system. "We use plugs and connectors that are the same as the original manufacturer's," explains Michael. "It ensures a much more secure fit and better durability."

In fact, watching the Tunit being fitted is, if anything, a bit of a none event. Moments later, some neatly sheathed and routed wires are in place, the tiny unit is secured to the engine bay and the plastic engine cover is back in place. The Tunit sits, little LEDs winking away. I'm not sure what I was expecting. Perhaps flames from the exhaust or something. We watch the guys secure the Macan to the dyno. This isn't normally part of the install process, but this Macan is the first to arrive with them and they're interested...

"Our calculations show that we should be getting around 300hp. We're basing this on the similar Volkswagen unit, but taking into account that the Porsche mapping is different, plus









"The driveability is transformed. It was already a good car, especially in Sport Chrono mode. Now, it goes like lightning"





the PDK gearbox software is another variable."

With the Macan's levels double checked, its first power run is undertaken. We pause as someone takes a screwdriver to the unit, then cross checks something on a laptop and lets it run is on the dyno once more. The result? 302hp. That's up from the 258hp standard output. Some more small adjustments based upon what the owner wished from his car and some more runs on the rollers show a nice, fat torque curve.

With such good results, I have to wonder why the car manufacturers don't do this from the factory... "That's probably our number one question too," says Michael. "Principally, it needs to set a map that will cater for many things, including third world fuel quality, differing climates and all sorts, so they are inevitably not the optimum. We supply different software for each country we sell to. Plus, of course, there's the argument that the manufacturer can subsequently offer the facelifted car with improved performance."

Perhaps one of the most interesting figures from Tunit's expertise is that it actually reduces emissions by as much as 27 percent. "Most tuning companies create improved fuel economy by mapping lots of torque into the bottom end," he informs us. "This gives better mpg because the gearbox shifts earlier or the driver will go up the gears quicker. However, they nearly all have significantly increased emissions. We use the same techniques, but we also use the engine load parameters to shut off fuel when it's not needed." Indeed an independent report by Harper Adams University that tested 14 units concluded that some actually doubled emissions, whereas Tunit's significantly cut all the nasties.

So enough of the theory. Out in the real world, what has happened to the Macan? Rather than ask for immediate feedback, I deliberately waited a few days before catching up. "The driveability is transformed," its owner tells us. "It was already a good car, especially in Sport Chrono mode, but now, it goes like lightning. Overtakes on Yorkshire B roads are a breeze now. A regular cross country journey that I know used to give me 32.6mpg, I now get 36.7. And I'm cracking on a bit across the Yorkshire Wolds at that too. I used to get 45mpg just cruising, so you never know, I might get around 50mpg in that mode."

The key phrase that keeps popping up here is 'driveability'. With a useful 50hp increase, spread across a very smooth torque curve, it's fair to say that this Macan is now capable of covering ground at a quite indecent pace but in a total drama-free way. While you may share my views that diesel is, in fact, the fuel of Satan, there's no denying the sheer pace at which modern common rail injected cars can cover ground. Add in the Sport Chrono Pack, the lightning quick PDK shift and the further improvements of Tunit's well-proven package that's simple to fit and even backed by its own drivetrain warranty, and you can imagine just how rapidly you're going to be arriving at that next corner ○

# BEST OF BRITISH 100% UK MADE BRAKES

EBC Brakes pads are now made using the Nucap Canada NRS hook retention backing plate system, guaranteed NEVER to debond



**BRAKE PADS** - Choose from grippy Greenstuff for spirited use on lighter hot hatches, Redstuff for fast street on medium weight cars, Yellowstuff for all out grip and track use on lighter cars or Bluestuff for the ultimate street and trackday pad that has set the Impreza and EVO community buzzing. Latest compound is the Orangestuff full race grade pads.

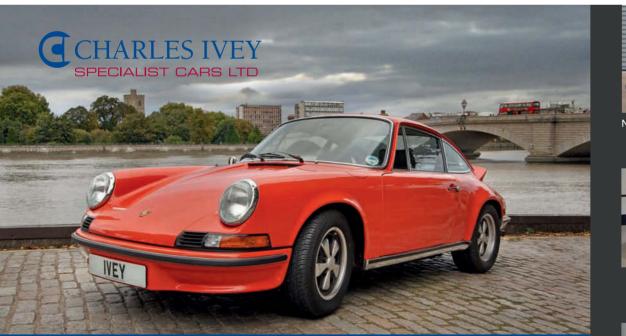


**WANT A QUALITY DAILY DRIVER PAD?** Try the new Ultimax 2 premium replacement pad.

- ✓ The world's first and only true ECO friendly pad
- ✓ Great brake feel for everyday driving and
- ✓ A new lower price point

### THREE SPORT DISC CHOICES

GD series slotted and dimpled (black) for fast street, USR fine slotted (black) or new high carbon BSD series BLADE discs (silver) for fastest street and track day use. For daily driver cars the EBC premium OE replacement discs are a great choice with a superb price point and great value for money.



For over 40 years, London's leading specialist for PORSCHE

Parts

### Sales Service

Storage

Fixed Price Servicing Air conditioning repairs Bodywork Fully computerised wheel alignment Free collection & delivery/loan car Total engine/gearbox rebuildsIn-house MOTsPrepurchase inspectionsLatest diagnostic equipment



BRAKES

www.ebcbrakes.com

New 991 Carrera S Cabriolet with PDK £104,000 Blue Year: New delivery miles



997 Carrera 4S Coupe Tiptronic £33,995 Atlas Grey 24,000 miles



996 Carrera 4 Cabriolet Tiptronic £17,995 Silver 2003 44,000 miles

160 Hurlingham Road, London SW6 3NG 020 7731 3612 info@charlesivey.com charlesivey.com

# gt porsche retrospective





e were busy gearing-up for Porsche's return to Le Mans this time last year, with a look at the 919 Hybrid, the technology and people behind it, and its official

launch. To celebrate we took the new Panamera S E-Hybrid to the French circuit, having started out at Silverstone. In fact motorsport was a big theme for our May 2014 issue. We also took an in-depth look at Porsche's history at Le Mans as part of a series of features building to the great race, and also sampled the delicious 550 Spyder – the original Porsche race car.

Elsewhere in the issue we examined the announcement of two new vehicles: the 981 Boxster and Cayman GTS.





ay hello to Porsche's new supercar, the 918 Spyder. Five years ago the 918 concept had us all hot under the collar as we got our first glimpse of this fantastic and futuristic new vehicle. We called the car a "blueprint for the future of the sports car" and read between the lines to understand that the company was very serious about producing the car. After all, it had printed the order forms at the Geneva Motor Show! Of course, we were correct...

Looking back, not forward, regular contributor Brett Fraser delved into Porsche's historical racing partnership with Martini, a brand long associated with some of the most iconic Porsche race cars.

TEN YEARS AGO MAY 2005



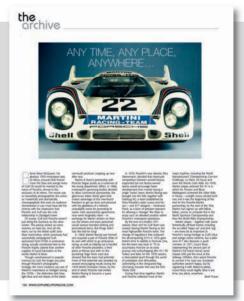
e attempted to see into the future ten years ago to determine which Porsches might become revered classics in the future. Naturally this was as difficult to predict in 2005

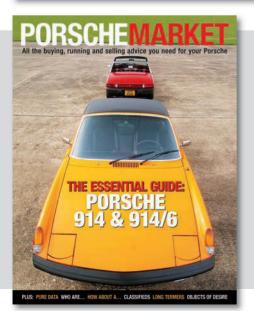
as it is today but we drew up a list that included the 993 Carrera 2, 996 GT3, and the original Boxster S. We also considered the 928, 924 Carrera GT and the 964, finding of the 964: "Affordable 911 motoring maybe, but it falls short of being a classic 911." How times (and opinion) change, hey?

Elsewhere in the issue we put the Cayenne through its paces off-road in Scotland and looked at what you needed to know if you were in the market for a 914 or 914-6.









### TOMORROW'S CLASSIC PORSCHES TODAY

Every Purche is a classic, right Not quite. While Stutigar's sports cars have delined generations and topped the table for greatest divers' can integ and again, this doewn't pipe a model a right to become a sure fracdement of selection the table of the selection of the selection of generation to generation. The classic Purchets is the one that enthrafts and centrating basics and have behavior on once in your lifetime or are all to show a diverse of the selection of the select





### **Technician Required**

### Experienced qualified technician required:

Service and maintain all air and water cooled Porsche

Self-motivated and able to communicate well in an established team

Experience of the marque not essential but would be an advantage

Please apply by calling Paul or Rebecca, or alternatively email us your CV along with a covering letter



**Porsche 1973 911 2.4S LHD** A stunning example, £215,000



**Porsche 1973 911 2.4S LHD** Fully restored, £189,000



Porsche 911 997 Carrera 2S Coupe Immaculate example - only 27,500 miles from new - £31,995

# f У V 🖓 🗖 🚥 🛗

PaulStephens911

Porsche wanted Porsche for sale Porsche servicing Porsche restoration PS Bespoke 911

Sudbury Road Little Maplestead Halstead Essex, CO9 2SE

01440 714884 email@paul-stephens.com **paul-stephens.com** 



PAUL STEPHENS EST 1994

# HP MOTORSPORT

### **SPECIALISTS IN EVERYTHING PORSCHE**

HP Motorsports are an Essex/East London based company specialising solely in Porsche cars. We have all diagnostics to cater for later models as well as early test equipment for 924, 944, 968 and 928's.

We offer full engine/gearbox rebuilds for all model's from air cooled (our favourite) up to 997 as well as servicing and routine maintenance. Having worked on all sorts of Porsche's since 1983 we bring many years experience to our customers





Full Engine Rebuilds Gearbox Rebuilds Porsche Servicing Routine Maintenance Fixed Price Servicing Brake Replacement Clutch Replacement All Electrical Repairs Air Conditioning Repairs

Air Conditioning Repairs Pre MoT Checks

HP Motorsports, Unit 1, Forest House, 185 Forest Road, Essex IG6 3HX Tel: 08435 962 093 www.hpmotorsport.co.uk

### NORTHWAY PORSCHE LIMITED Independent Porsche Specialists



Repairing and servicing of Porsches for over 20 years

USED PORSCHES IN STOCK AND WANTED FOR OUTRIGHT PURCHASE

Telephone: 0118 9714333 Mobile: 07831 424911 Email: info@northway.co.uk www.northway.co.uk

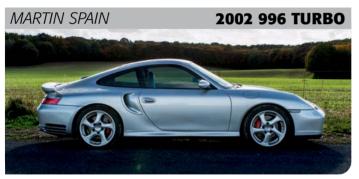
# long-term fleet

Our Long-Term team explain the trials and tribulations of running a Porsche in the real world ...



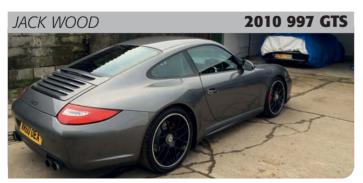
The SC is tatty but it was exceedingly cheap for an air-cooled 911 so Matt couldn't resist. Still learning the ways of the 911, Matt's still not sure how to drive the car properly but it looks and sounds fantastic and was great fun on its first track outing – he's looking forward to more.

**twitter** @PawnSacrifice



After an extensive search for the perfect 997 Carrera 2S, Martin was "seduced by the boost" and ended up with a 996 Turbo. Purchased in April 2014 as a weekend and occasional track day car. Other than the outrageous performance, it is the famous Turbo script on the rear that keeps him coming back for more.

twitter @MartinSpain



Purchased in November 2014 the GTS was something of an impulse buy. The Meteor grey Carrera 2 started life as a demonstrator at Swindon Porsche and is fully-loaded with extras. So far it is living up to the hype and has been a pleasure to use.





Bought in April 2012 from a highly reputable Porsche specialist, it was pressed into immediate service as a combined daily driver and track car. Now a third car, the GT3 has been completely resprayed with the latest self-healing paint protection film by PaintShield and mechanically overhauled. It's in pristine condition.

twitter>> @Jackkwood



A project bought unseen for £400 as a non-runner. Replacement engine, SPAX coilovers and 968 ARBs, a home-made quicker steering conversion and race seats already fitted. Plenty of track days, a rally in France and trip to Le Mans to see Porsche's return all under its belt.

twitter @PawnSacrifice



Rob's an old hand when it comes to tinkering with classic cars, and has even owned and modified a 924 in his time. Having hankered after a classic 911 he's finally tracked down his perfect project. Expect to see this '78 911 SC being given the 'Richardson touch' over the coming months...



# long-term fleet





### 1978 911 SC

ith the SC home and on axle stands I decided the first thing to do would be to give it a going over and to

create a list of everything I needed to buy and do. Well, the list became an Excel spread sheet which ballooned into a personal technical resource where I could save links to parts, specs and technical guides as well as track the projects progress; can you tell my day job is in engineering...?

As a newcomer to 911 ownership I've been soaking up as much advice and information as I could from the web and I'd recommend both Pelican Parts (http://forums.pelicanparts.com/ porsche-911-technical-forum/) and the Impact Bumper forum



(www.impactbumpers.com) - both great resources full off like-minded hands-on enthusiasts.

When it came to insuring the 911 I wanted to make sure I had the right cover. This car has been a sizable investment for me so should the worst happen I wanted to make sure I wasn't heart broken and out of pocket. So I got in touch with John Glynn from ImpactBumpers.com who was able to appraise the car and provide me with a written valuation for a mere £35 which was accepted by my insurers.

Anyway, paperwork and internet procrastinating out the way it was time to get stuck in. The car had seen little use with the previous owner having only covered 600 miles in the last year, so things were generally stiff and dry. I

started with replacing all the cables in the car and cleaned and greased all the runs. Basic but necessary and less embarrassing than arriving at a weekend hotel destination only to have the luggage compartment release snap and spending the trip with only what I'm stood up in. It was all straight forward with the exception of the fuel filler release; the spring that secures the lid closed had dislodged itself. Sounds simple, but no. To remove the catch you need to remove the wing. To remove the wing you have to disturb all the body seals around it and I'm confident the door would have had to come off too. I wanted to avoid this so made a 'special tool': a 6mm spanner with an allen bit pressed in. With this, some choice language and the loss of

most of the skin on my knuckles I was able to remove it. Phew! With all-new cables fitted I spent some time aligning all the panels and latches. It may have been detail work but it makes a difference to the looks and functionality of these key touch points on the car.

The next area of attack was the damper tops. The factory underseal was cracked and signs of surface rust were starting to show. On removing the topmounts it became clear they were past their best and snapping a stud sealed the deal for a replacement. I contacted Design 911 (www.design911.co.uk) and ordered everything I needed, from the mounts themselves to the spreader plates, bolts and washers. The company have everything you need and it's all selectable from parts diagrams and

filtered by your vehicle spec. This is great as I'm used to owning cars that are impossible to get bits for, so to have what I need, OEM or OEM quality, delivered to my door next day was a luxury. With the old paint removed I ground back and treated the surface rust, zinc primed and painted the tops before reassembling the whole affair with correct torgues and lashings of underseal in the turrets.

I'll have to revisit once the car is back on its wheels to check and adjust the geometry, but I'm planning on adjusting the ride heights and playing with settings at a later date anyway. For now I'll just enjoy the fresh paint and shiny bits and the warm sense of this project starting to gain momentum!

Rob Richardson







Matt's 924 flew through its MoT this month, but could it be time to part with it?

### 1986 924 S

find it odd how some things stick in my mind. A couple of years ago, I had planned on taking the engine out of the 924 and changing the oil seals over the Christmas break. I booked my days off and got everything teed up. Infuriatingly the day after Boxing Day I put my back out and for 24 hours I could barely move from the floor, let alone anything else. So the job was on hold. In January of that year I got back on it and a while later the car was fixed, a few upgrades done, and was MoT'd. So it's about early February that I start to get the sense that I need to sort the 924 for its MoT. Only this year, I was a little late. One day I arrive at work and I am convinced the MoT must be due imminently, so I go on to the web and look up the expiry date using the reg number - it was due that day! At least it wasn't late...

As soon as the commuter traffic had died down I drove to the local test centre and was told to return in a couple of hours. I was a little concerned about the emissions, what with the new exhaust not having been run in properly, but this would at least buy me some time to get the car sorted properly, and not be illegal. When I went back to the test centre to collect my car I was told it had passed! Again, I underestimate the 924 S and again it comes through. This is by far the oldest, tattiest car I have ever owned and yet it is also the most reliable. There were a few advisories, but nothing that wasn't on there before - corrosion to non-structural parts that I am tempted to replace with lighter alternatives.

It may have got a straight pass with

none of the usual prep and testing (not even the once-round to check all of the lights!) but I had actually done a little work on the car in the weeks prior. Firstly I had another look at the rear light cluster, and the near side brake light was becoming a little intermittent again. The problem with the light turned out to be the connector. I cut and routed the wire for the brake light separately with a little bullet connector so it can be removed if needs be, along with the rest of the light cluster.

I had also fitted the new exhaust. I didn't believe the old one was MoT worthy (well, the centre section at least) and so it seemed like a good time to replace the back box while I was at it. I am happy to report that the exhaust has now guietened down a little. It seems to be getting quieter at the lower end of the rev range, which is better for pootling about, especially first thing in the morning as I leave for work - I can't imagine I would endear myself too much with the new neighbours were I screaming by at daybreak. The weird thing about it, for a standard exhaust, is how loud it still gets as the revs climb. At about 3000rpm it still goes a bit nuts. I really need to bring it to work and get it sound-checked to make sure I will still be able to get on to some race tracks this year! I am itching to get out, but the house and other distractions have stopped me so far.

How much track time I get will also depend on how long I keep the car. Its future is in the balance, and that actually makes me a little sad. This is the part in the article where I play a gentle melody in the background and get more serious. You see, I have now reached a point with the 924 where a good deal of time and money has been spent getting the car up to standard. I am pleased to report it's a lot better than I originally suspected it ever would be, and it has proven its worth on track. But I think that I would now want to spend yet more on it. I would love to replace the wings and rear screen with plastic of some sort to drop some weight. The way the car looks in profile on the SPAX coilovers would look fantastic with a few of the dings hidden and a fresh coat of paint applied. From what I have read and been told about the difference one would make, I would also love to fit a lightweight flywheel. These updates are all going to cost and the improvements will be incremental compared to the money involved, but it would be fantastic to see the job through and finish the 924.

So I am at a bit of a crossroad and need to make a decision, not that I won't continue to enjoy the car as it is at the moment. If I do decide to let it go I hope it will be quick and painless. I mooted the idea on Twitter the other day and almost immediately had a message from someone I know from track days asking about it. I'm proud that I've rebuilt a scrapyard-bound nonrunner into something others actually see as a job well done.

I have poured so much time and effort into the little Porsche that my view is arguably rose tinted but it has been a great starter car for both the garage and the track. It has taught me a lot. If only I had more space... and money... and time...

Matt Biggs

# long-term Fleet



### 1981 911 SC

ith winter seemingly having passed only moments after it arrived, in the south at least, I was enjoying the decision to use the 911 more regularly, for the sake of the battery. The warmer weather meant that starting and getting going was easier than it had been for a while. It is nice to sit for a moment and listen to it chuntering away, warming up ready for the off. Even with the standard exhaust the SC is a little noisey so I prefer not to wait too long if it's an early start.

I am sure that some of you are wondering where the joy is in commuting and why use the SC for that. Well, the old 911 is an event, a joy to drive on any occasion and not one I feel I need to limit to weekends or special outings, and perhaps that is one of the joys of the car not being low mileage or in mint condition. In the crazy world of 911 prices, at the moment having one that is not worth a great deal means it is not too precious to use whenever I want. Besides, I live in the countryside a reasonable distance from work so the road is interesting and the hours I keep mean that I am rarely stuck in traffic. There are occasions when I am caught behind someone driving just that bit slower than I would like, but then that gives me the chance to open the

throttle, make some noise and ease past. In some ways the odd slow driver actually makes the drive more interesting. About the only thing to spoil my commute is the driver behind the slow one who is reluctant to overtake and leaves all behind them dawdling along. I'm getting a lot better at just pootling and enjoying the car. All else aside, the 3.0 air-cooled engine is a great antidote to a hard day.

That is not to say that I have been having it all my own way, one rarely does with classic cars, although the payoff is worth it. Not too long ago, at work, I finished up a long call, took some lunch orders and hopped in the car. The engine fired on demand and I

sat for a moment as the idle settled. I departed the car park with ease; people always seem happy to let the SC out at junctions. Anyway, a few hundred yards later I reach the traffic lights and wouldn't you know it, the car stalls just as the traffic stops from the other direction and I'm seeking out first getting ready to move off. The engine cutting out when the car's cold isn't unheard of but it normally happens when the car's just started and I've done something stupid. At the same time, there isn't a lot of 'normal' with the SC - every time I think I have part of it sussed it does something different.

I tried to start the engine again, but it died. This is nothing new if the car



Matt is enjoying using his 911 on a daily basis but it hasn't been without some technical hitches

has stalled, it likes a moment to gather its thoughts before being set for the off. The traffic lights turned green and I calmly waved the other cars round me knowing I'd catch the next set. Each time I tried the engine it would fire momentarily and then stop. That was something new. I checked the battery contacts, despite the fact that the starter was working okay, all in order there. Looking at the engine all seemed well, but obviously was not. Once I'd determined I was going nowhere I put a call in to the office for someone to walk down and give me a push. A couple minutes later I took my head out from under the bonnet to see my colleagues approaching... well

the ones that didn't pretend to be on the phone the moment they realised there was a car in need of pushing.

Despite being light, compared to a modern car, the chaps seemed to make hard work of pushing the little 911 the short distance back to the office. I got out to help at one point, which, while the car is moving, is far harder than Hollywood would have you believe! I had to give up the driver's seat to Simon to park the last bit, he's advancing in years and I was concerned he might have a coronary. Paul appeared to have put in a good effort, although showed some signs of fatigue. Chido, on the other hand, was far too sprightly – he claimed fitness, but we suspected a lack of effort and a whole bunch of pretending to push. They did leave hand prints on the back of the car, though, something I really must address before the next time.

I set to looking for the starting problem and not too long after I began I found it: the fuse for the fuel pump. I had checked it before and it wasn't broken, or so it appeared. When I removed the fuse I noticed that it had corroded at the top. Just a guess, but I think when the engine was off, the fuse contact was enough; the pump running giving enough fuel to the engine to start. Once it fired I think the vibrations broke the contact enough to cut the pump and starve the engine of fuel. A new fuse fixed it and that evening I monstered it home, to charge the battery, naturally.

The following day I didn't even make it out of the car park. The fuse was my first stop, but it was in good order. I then noticed that the wires into the fuse had also corroded. Removing them I stripped it back and taped it directly to the fuse; the terminal was jammed and I was unable to remove the screw to get the cable itself out. It seemed to do the trick, enough at least to see me home. As the wiring issue was a potential fire hazard I had to confine the 911 to the garage until further investigation; an ignominious end. *Matt Bigqs* 

# long-term Fleet

## 2002 996 TURBO

y the time you read these words I'll have had the Turbo for just about a year, and around this sort of time into car ownership I tend to get itchy feet and start browsing the classifieds for potential replacements. In the last few years I've had a BMW M3, a Porsche Boxster S, a Mercedes Benz C55 AMG and a RenaultSport Clio 197, a lovely list of good cars, none of which made it far beyond 12 months of ownership. It might seem flighty to change cars so frequently, and my friend and fellow contributor Jack Wood has chastised me in the past for being too fickle to really learn a car, foibles and all, but I've never quite 'clicked' with any of my recent purchases and so I've not felt any regret in selling them and moving on.

There was always a niggle or two that spoiled my enjoyment of the car; the awful brakes on the M3, a sluggish automatic gearbox on the C55 and so on. Over time, these issues would begin to dominate the driving experience – in my mind, at least – and at that point I'd usually start looking for a replacement. However, I think this trend may change with the Turbo. I have no intention of selling it at the moment because I'm still very much enjoying driving it, learning how to use the prodigious performance and how to improve my own driving skills to get the best out of the car.

Besides, there's very little out there that offers the same blend of performance and everyday usability at a similar price point. 996 Turbos are remarkable value at the moment, and I'm not just saying that because I bought one! Of course, I'd swap it in a heartbeat for a GT3 – any GT3 – but the recent and remarkable rise in GT3 values shows no signs of slowing, so I think they're going to be out of my reach for the foreseeable future.

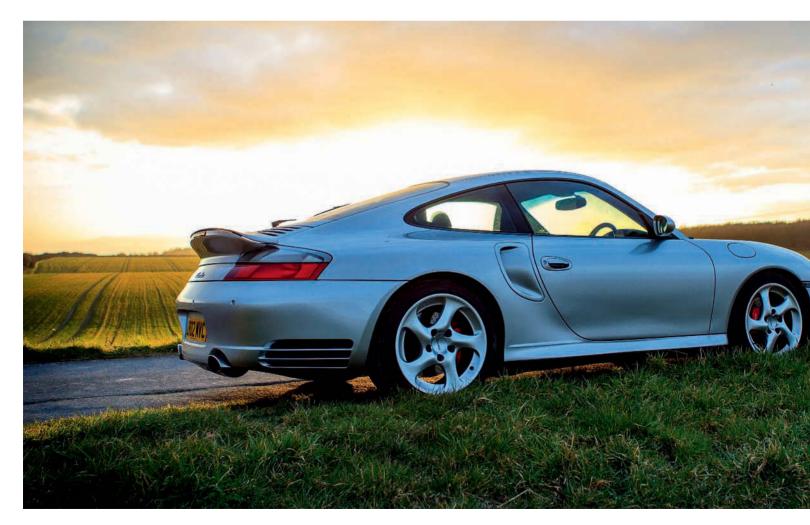
With that in mind, I have noticed a slow rise in the prices of 996 Turbos at well-known independent specialists in the past few months. As ever, low mileage manual examples seem to be the most sought-after cars but a car not dissimilar to mine was advertised for £40k at JZM, which seems like a huge jump up from the £25-30k price point that most 996 Turbos have been selling for in the past year.

I don't want this report to devolve into a discussion about future prices and I didn't buy the car as an asset whose value should be protected at all costs, but this gradual appreciation in value prays on my mind a little. I'm wondering if I should get the car revalued when my insurance renewal comes through, and if I should get those two little dents on the rear wheel-arch sorted out, and maybe keeping the car parked outside isn't such a good idea after all...

If I'm not careful, these sorts of things could begin to colour the ownership experience just as much as the niggles did with my previous cars. Instead, I'm just going to focus on driving the Turbo as much as possible and ignoring the speculative threads on internet forums wondering if the 996 Turbo will be the 'next big thing' in appreciating Porsches. Spoiler alert: it won't.

This month's improved weather has meant I've had far more opportunity to use the Porsche rather than the family car, and there's been a week or two where MVC has been my daily driver. My fuel consumption has taken a bit of a hit as a result – 18mpg instead of 21mpg – but with the recent drop in fuel prices, a tank of V-Power costs slightly less so it's made virtually no difference to the running costs.

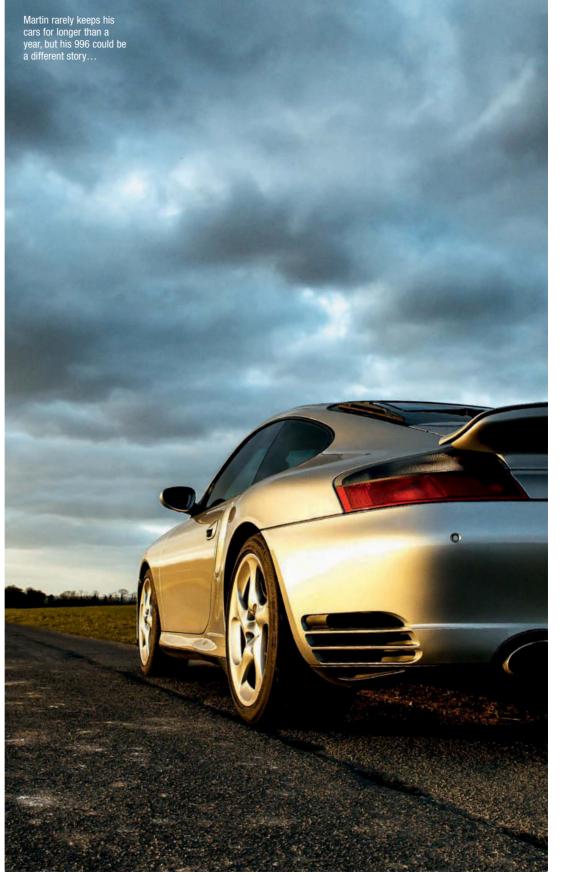
As I mentioned last month, the



wheels are the next item on my 'to do' list for the car, and they're going to Exel Wheels this month for a full refurb to strip the old bubbling paint and refinish them in the factory silver colour. I did briefly consider getting them painted in a darker smoked chrome finish having seen a very lovely 996 GT2 with dark wheels at a recent track day, but ultimately I decided to stick with the original colour. Those thoughts about originality and future values are creeping in again! I chose Exel because not only are they very wellregarded but they are the only company that collect your wheels and supply you with a set of appropriate loan wheels while yours are away being refurbished. That's a huge timesaver for me, and I can't wait to see how the wheels look when they come back...

Martin Spain







CAR INSTRUCTION:

6.00 til 20:00

HELMET HIRE:

PLEASE NOTE - THIS IS A PORSCHE ONLY

GT	PORSC	CH	E
	Evening		

#### GT Porsche magazine is holding a track evening at the Brands Hatch circuit in Kent. Participate or spectate with your Porsche!

rands Hatch Indy Circuit is one of the finest circuits in the UK, and a firm favourite amongst track drivers. Technical and surprisingly difficult to perfect, with double apexes and undulations adding to the excitement, it should be on the list of mustdos for every track driver in the country.

All this makes it the perfect venue for our track

evening. Our open pit lane policy gives you the flexibility to go on and off circuit as you please throughout the evening, allowing you to enjoy all the circuit time you can handle to push you and vour Pors

We wil documen so your ca

EVENT. PLEASE CALL 0843 453 3000 IF YOU REQUIRE FURTHER CLARIFICATION							
NOISE Static: 102 dB(A) LIMITS Drive-by: 92 dB (A)							
ADDITIONAL DRIVER: £25 ADDITIONAL PASSENGER: £10							

£25

£10

sche to the limit.	
ll be on-hand throughout the evening to	
nt the event for a forthcoming feature -	de la
ar could appear in these very pages.	A
	S S
ek even if you're not taking part.	
and watch all the action with	X

#### Paddock spectators: Free

We'd love to see you and your Porsche in the paddoo Come and enjoy the summer sunshine, grab a drink unparalleled access to roam the pit and paddock.

## UK readers subscribe to GTPORSCHE AND SAVE OVER £30\*!

#### **CHOOSE THE SUBSCRIPTION THAT'S BEST FOR YOU...**

### **PAY JUST £3.15 PER ISSUE** WHEN YOU SUBSCRIBE BY DIRECT DEBIT

- 3 month subscription £9.45 SAVE £4.05!
- 6 month subscription £18.90 SAVE £8.10!
- 12 month subscription £37.80 SAVE £16.20!
- 24 month subscription **£75.60 SAVE £32.40**!
- NEVER MISS AN ISSUE FREE FIRST CLASS DELIVERY •

#### THREE EASY WAYS TO SUBSCRIBE

- 1. Online @ www.gtpurelyporsche.com/subscribe.asp
- 2. Telephone 01732 748084
- 3. Post: GT Porsche, Freepost RTGU-UETS-EERS, Unity Media plc,
- Becket House, Vestry Road, Sevenoaks, Kent TN14 5EJ

#### PAYING BY CHEQUE OR CREDIT CARD?

12 month subscription only £43.20 - SAVE 20% 24 month subscription only £77.76 - SAVE 28%

CALL TODAY 01732 748084



\* Saving applicable when you subscribe for 24 months paying by direct debit

SUBSCRIBE TODAY



### FREE FIRST CLASS DELIVERY SAVE OVER £30\* WHEN YOU SUBSCRIBE AND PAY BY DIRECT DEBIT PAY JUST £3.15

### PAY JUST 13.13 PER ISSUE!

## SUBSCRIPTION FORM

Yes, I would like to subscribe to *GT Purely Porsche* for 3 months for £9.45
 Yes, I would like to subscribe to *GT Purely Porsche* for 6 months for £18.90
 Yes, I would like to subscribe to *GT Purely Porsche* for 12 months for £37.80
 Yes, I would like to subscribe to *GT Purely Porsche* for 24 months for £75.60

PAYING BY CHEQUE OR CREDIT CARD?

Yes, I would like to subscribe to *GT Purely Porsche* for 12 months for £43.20 Yes, I would like to subscribe to *GT Purely Porsche* for 24 months for £77.76

I enclose a cheque made payable to Unity Media Plc for: £									
Please debit my credit card: £									
Card number									
Name on Card									
Security number	Expiry date								
-									
YOUR DETAILS									
Title First name	Surname								
Address									
	Postcode								
Email									
Contact telephone number	Date of birth								
1									

#### Is this a gift subscription?

-	-		
RECIPIENT'S	5 DETAILS	(FOR GIFT SUBSCRIBERS ONLY)	
Title	First name	Surname	
Address			

#### County

Your details will be processed by Unity Media Plc (publishers of *GT Purely Porsche*) and our suppliers in full accordance with the UK data protection legislation. Unity Media Plc and *GT Purely Porsche* may contact you with information about our other products and services. Plcase tick if you prefer NOT to receive such information by post, email, phone, mobile phone messaging [] Unity Media Plc and *GT Purely. Porsche* occasionally share data, on a secure basis, with other reputable companies who wish to contact you with information about their products and services. Please tick if you prefer NOT to receive such information by post or phone. ]] Please tick if you prefer NOT to receive such information by email and mobile phone messaging. ]] Please here if the recipient of this subscription is under 18. ]] Unity Media plc reserves the right to limit offers of this kind to one per household and withdraw the offer at any time.

\_ Postcode



#### RETURN YOUR COMPLETED FORM TO: *GT PORSCHE*, FREEPOST RTGU-UETS-EERS, UNITY MEDIA PLC, BECKET HOUSE, VESTRY ROAD, SEVENOAKS, KENT, TN14 5EJ

**GTPORSCHE** is also available to buy in digital format, visit www.gtpurelyporsche.com to find out more

## CALL: 01732 748084 VISIT: www.gtpurelyporsche.com

#### PAY BY DIRECT DEBIT

Instruction to your bank or building society to pay by direct debit OPENET Please complete and send to: GT Purely Porsche Subscriptions, Freepost RTGU-UETS-EERS,

Unity would plo, beeket nouse, vesti y noud, sevenouk	3, 1011, 1114 525								
To the manager: Bank name			inator		_	cati 1	on N	umt	)er 2
Address			erence	_	· _		-		-
Address									
			ruction			a m la		_	
Postcode Account in the name(s) of		build Plea debi this assu I und rema deta	ding so se pay ts from instruc ired by derstan ain with ils will pank/bu	tion su the a tion su the Di d that h Unity be pa	Medi ccour ubjec irect this Med ssed	a Plo nt de t to s Debi instr lia P elec	c dire etailed safeg it Gua ruction lc and	d in uard rante n ma d, if s	ee. ay so,
Branch sort code	Signature(s)								_
Bank/building society account number	Date								
	Banks and building societi instructions for some type				direc	ct de	bit		

#### The Direct Debit Guarantee

This Guarantee is offered by all banks and building societies that accept instructions to pay direct debits If there are any changes to the amount, date or frequency of your direct debit to Unity Media Ple we will notify you 10 working days in advance of your account being debited or as otherwise agreed. If you request Unity Media Ple to collect a payment, confirmation of the amount and date will be given to you at the time of the request. If an error is made in the payment of your direct debit by Unity Media Ple or your bank or building society, you are entitled to a full and immediate refund of the amount paid from your bank or building society. If you receive a refund you are not entitled to, you must pay it back when instructed to do so by Unity Media Plc. You can cancel a direct debit at any time by simply contacting your bank or building society. Written confirmation may be required. Please also notify us.



## the market

by Philip Raby

A specialist Porsche dealer and consultant, Philip has been driving and writing about Porsches for over 20 years...

@RabyPorsche



# 911 Cabriolet

Depending on its age, a 911 Cabriolet could be a lot cheaper or a lot more expensive than a Coupé of the same age and type.

'm looking forward to the summer and heady days of top-down motoring in 911 Cabriolets. I know some purists scorn open-top

Porsches but I don't care – ever since I was a teenager hooning around in Triumph Spitfires, I've liked the whole wind-in-the hair thing – even though I no longer have much hair! And I'm not alone, the UK is Porsche's largest European market for cabriolets; a fact which puzzles some people as we don't have the sunniest weather, but if you think about it, it makes sense. There's no point having a cabriolet in a really hot climate as you'll just get, well, too hot. Live in southern France or Spain, and it's far more sensible to coccon yourself in an airconditioned coupé. The more temperate British climate, on the other hand, has perfect balmy summer weather for cruising alfresco.

Buy a brand-new 911 and you'll pay a hefty privilege for going topless. Across the range, you're looking at around a £9000 premium for a cabriolet compared to the equivalent coupé, which is not surprising as the former has to have a stiffer bodyshell and that complex fully automated roof system (which, when closed, gives Coupé-like levels of weather and noise protection – a world away from my old Spitfire rag-top!). By the way, it's not the same story if you choose an opentop Boxster over its Coupé equivalent, the Cayman – there's a £1000 to £3000 premium for the Cayman. To get an idea of just how popular 911 Cabriolets have become, just take a look at the classified adverts. At the time of writing, one-third of used 991s on Pistonheads were cabriolets, which dropped a little to 27 percent of 997s and 25 percent of 996s, so there's been an obvious increase in the cabriolet population in recent years. Go back further in time to the days of aircooled 911s and cabriolets hardly register, with just six percent of 993s, 964s and earlier 911s on the market





## the market place\_\_\_\_



being full convertibles. As we'll see, it's not just the numbers on the market that are distinct between water- and air-cooled 911s – the values are quite different, too.

In fact, I'll cut straight to the chase at this point – you'll pay a premium for a modern 911 Cabriolet, while the classic open-top 911s generally sell for less than the Coupé equivalent.

Why should this be? There are a number of factors but key for me is appearance. The old 911 Cabriolets look fine (albeit not as good as a Coupé) with the roof closed, but open it and it sits proud of the car rather like a folded pram hood, and you have to





fit a fiddly canvas tonneau cover over it to make it look at least half presentable. It wasn't until the 996 came along that Porsche managed to create a coherent cabriolet design, with a roof that folded neatly (and automatically) away under a body-coloured rigid panel. Roof down, a modern 911 Cabriolet has an aesthetically pleasing 'fat behind' while the raised roof is low and sleek. Furthermore, the older 911 Cabriolets didn't have such rigid bodyshells without a steel roof to keep them in check - the 996, on the other hand, was designed with an open variant in mind and is reassuringly stiff in cabriolet form.

The final reason for the air-cooled

911 Cabriolet's fall from favour is the increase in interest in roll-bar Targas, thanks in part to Porsche's reinvention of the roll-bar with the new 991 Targa. The traditional Targa is flavour of the month at the expense of the cabriolet. I think that's a shame because, from a practical point of view, the cabriolet wins hands-down – it's easier to drop and raise the roof and, when up, it's a snugger fit than the Targa's.

This, then, is actually good news if you're in the market for an air-cooled 911 and fancy a Cabriolet, as they tend to be considerably cheaper than an equivalent Coupé (and, indeed, a Targa). Also, because they're less desirable, there's a fair chance one won't be snapped up because you get a chance to see it. I found two 1996 993 Cabriolets with around 66,000 miles for £28,000 apiece – you'd be looking at over £30,000 if it was a Coupé with that mileage, while there were no less than three similar sounding 964s for between £23,000 and £25,000 – try and find a decent 964 Coupé for under £30,000 these days. Going back further in time, a late G50 gearbox 3.2 Carrera Cabriolet looked good value at £24,000.

Contrast those prices with those of more modern machinery. For most people, the best looking 996 is the sought after Carrera 4S and those wide rear hips work particularly well with the Cabriolet roof. If you want one, though, you'll need to part with around £23,000 to £26,000 – I couldn't find one for less and prices do seem to be holding very firm. Most Carrera 4S Coupés, on the other hand, are closer to £20,000 or less.

It's a similar story with the 997. Early coupés have dropped below £20,000 (although I'd argue they're best avoiding) while I couldn't find a Cabriolet, not even an early one, for less than £24,000, with most being priced considerably higher. That £24,000 would buy you a decent early

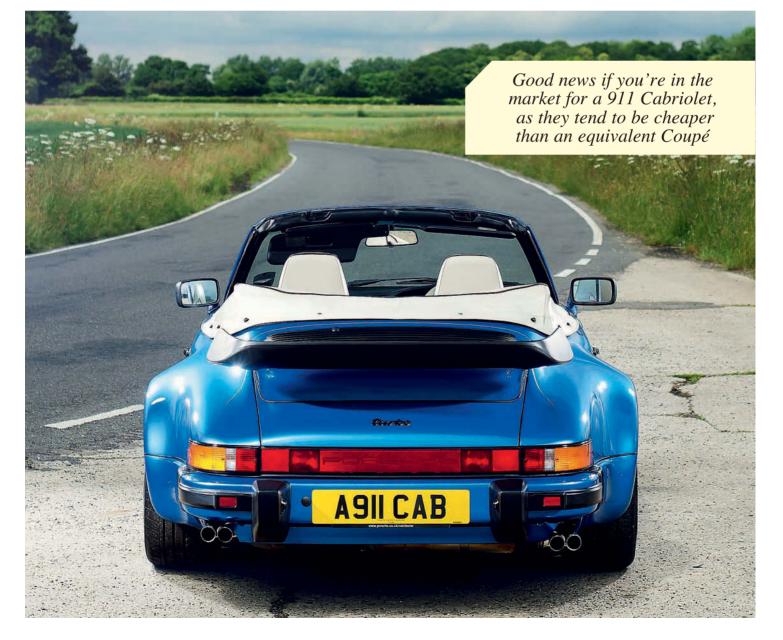


# the market



997 Coupé but it seems that an equivalently good cabriolet will be nearer to £30,000. It's a similar story right up the 997 price range and through to the used 991 market – Cabriolets are always more expensive than equivalent Coupés.

In summary, then, I'd consider a classic 911 Cabriolet as prices are relatively low and can only go up – especially if they come back into fashion (hey, global warming could come in useful here!) I'd also be happy to pay over the odds for a modern 911 Cabriolet for its great looks and sheer usability. Roll on summer!  $\odot$ 





We carry out a full range of Porsche servicing and Porsche repair projects on all popular and classic models including diagnostics and body repair work. Based in Uxbridge and serving the entire West London area, Porsche Torque are able to undertake all types of mechanical, cosmetic and restoration work to your complete satisfaction.

Fully equipped Porsche workshop Bodywork and restorations Diagnostics and Porsche tuning Free estimates Engine & gearbox rebuild specialists Collection & delivery service Pop in for a free mechanical assessment Audio & alarm fitting

50 YEARS COMBINED EXPERIENCE FROM EX OPC MASTER TECHNICIANS (AFN, HATFIELD)



### 01895 814446 / 07507 623997 www.porsche-torque.com

Unit C2, Arun Buildings, Arundel Road, Uxbridge. UB8 2RF



MALTO

### CLASSIC ADDITIONS



• Established 1989 •

Introducing our incredible **Super Soft Stretch** Indoor car covers, now available in 5 colours!





Order online at: www.classicadditions.com Or call 01938 561717 to enquire about our personalisation options

## www.specialistcarsltd.co.uk

# all you need to know...



## 918 & 919 Hybrids

Hybrid technology can be confusing, but it's here to stay, so as a Porsche buff you'd better know what you're talking about...

orsche is entering its second season in LMP1 with the 919 and has high hopes of success, despite the fact that this is only the second season the company has ever raced a hybrid in the highest level of sports car racing. The 919 has been completely redesigned in the body and chassis department but the bespoke hybrid powertrain has remained much as it was last year.

When we caught up with 919 works driver and former F1 star, Mark Webber, recently he emphasised the car's massive performance saying: "With a conventional engine, if you deploy more power at 240km/h it's not that dramatic. But with the hybrid, whatever the speed range, the power is exponentially higher." So hybrids can deliver high performance as well as efficiency and that is mainly to do with the enormous amount of torque an 'electric machine' can generate.

Before delving deeper into the 919 tech, it's worth revisiting basic hybrid terminology as it can be confusing. The two terms that matter most are 'series hybrid' and 'parallel hybrid'. A series hybrid is one where tractive power is delivered only by an electric drive with power from a battery that is topped up when needed by an engine and generator. The point is that the engine is not connected to the road wheels but is only used to charge the battery.

This concept is essentially the same as a range extender, a series hybrid which carries enough stored electricity in the batteries that the engine should only be used as a last resort. The distinction between a range extended electric vehicle and series hybrid, is to do with the amount of time the engine gets used, but mechanically, the same rules apply – the engine is not directly connected to the wheels.

Most hybrids on the roads today are parallel hybrids, which means both the engine and electric drive can power the road wheels, either individually or together (in parallel). The difference between a straight hybrid and a plug-in hybrid is simply that the plug-in has a bigger battery capable of storing more electricity, can be charged up before driving and has a longer electric-only range as a result. Straight hybrids have smaller batteries which effectively act as energy storage buffers. All modern hybrids recover kinetic energy (the energy in a moving object) using regenerative braking. This means the drive motor is used as a generator when the car slows to 'harvest' energy in the form of electricity, which is stored in the battery.

All Porsches, therefore, are parallel hybrids, including the 918 and the 919, though the two are quite different. The 918 is a road car powered by a 4953cc mid-mounted V8 engine integrated with a 115kW electric motor. A second, 95kW motor sits on the front axle and the whole lot can deliver 887PS and 1280Nm of torque. The 918 is a plug-in parallel hybrid so the lithium-ion battery can store a fair amount of energy - 6.8kW to be precise - and produces 220kW of power. This is not news but useful to revisit because the 919 has a completely different system. Few technical details are available because it's a racing car and by definition as much as possible remains top secret. But we do know some facts and the basic configuration.

The 919 is not a plug-in and is powered primarily by a relatively tiny, 2.0-litre, turbocharged, direct injection



The 918 road car uses a 4953cc V8 engine with an integrated 115kW electric motor



The 919 race car uses a completely different hybrid system compared to that of its road-going sibling

four-cam, V4 engine built from scratch especially for the job. The 500PS engine drives the rear wheels and the 250PS electric motor generator drives the front wheels (providing occasional all-wheel drive) but also acts as a generator to recover electrical energy through regenerative braking.

Regenerative braking is a bit like connecting the alternator of your car to the road wheels and switching it on when you apply the brakes. The effort of driving the generator also slows the car but some of the energy is recovered rather than lost as heat through the brakes means they now have less work to do. The recovered electrical energy is then stored in a water-cooled lithium-ion battery for reuse. The battery is specially developed by A123 Systems and is said to combine relatively high capacity with strong power output. In motorsport, this type of system is called an MGU-K or 'motor generator unit-kinetic'.

In common with current F1 technology, the 919 has a second energy recovery system, this time to recover thermal energy from the exhaust system. The 919 has a six megajoule recovery system which means that over the Le Mans distance the 919 can generate and use 581.2kW of electricity, enough to power a VW e-Golf on a trip from New York to Los Angeles, says Porsche.

Kinetic energy exists in a car when it's moving and is created by the engine and electric motors when the driver accelerates. Thermal energy in the form of waste heat is liberated by the engine. Heat energy in the exhaust is useful for driving a turbocharger turbine which in turn drives a turbocharger compressor to force air into the engine. However, when the driver lifts off the throttle, the exhaust energy normally goes to waste. In F1, an MGU-H (motor generator unit – heat) driven by the turbine, kicks in to generate electricity. As doing so slows the turbine, the MGU-H can also act as an electric motor to 'spool-up' the turbocharger and reduce lag when the driver accelerates again.

The 919 system is quite different and acts only as a generator but one driven by an additional turbine separate from the turbo. Normally in turbocharger systems, when maximum boost pressure is realised during acceleration, a valve called a wastegate vents to let excess exhaust pressure bypass the turbocharger to the atmosphere via the exhaust system. The same thing happens when the driver lifts off the throttle. This energy is literally wasted, so the 919 system replaces the wastegate with the second turbine driving the 'GU-H' (generator unit-heat) to generate electrical energy. As a result, the Porsche system is the only one of its kind to recover thermal energy when the car is slowing and also accelerating and doesn't introduce turbo-lag when it operates O



In conjunction with the 115kW rear motor, the 918 boasts a second 95kW motor on its front axle. Its lithium-ion battery can store 6.8kW

## tech guide



## Detailing (part two)

Having looked at the basics last month, we examine the finishing touches

f you read last month's *Tech* on detailing your Porsche, you may have been convinced that there's more to it than meets the eye.

I Detailing using high quality materials is the way to give a car's paintwork a better-than- new look with a deep, lustrous shine that you may not have believed possible, but it won't bring back failed material from the dead. However, Porsches have always been built using high quality paint which can usually be revived.

So last month we covered doing just that using detailing compounds, clay bars and high quality wax, but what about the rest of it? Wheels are a good starting point. Wheels, especially front wheels, suffer from black staining by brake dust. It's worse on the front because the front brakes do most of the work, generating more dust and heat too, which helps bake the dust into a hard caked layer.

Those wheel brushes you may have seen advertised and thought a waste of time and money, actually work well for getting into all the nooks and crannies of an alloy wheel. Those kitchen washing-up brushes also do a good job of getting the worst off and cover a wider area well. Once you've done your best with soap and water, try some Autoglym Clean Wheels (on cold wheels only).

It has an acidic base and smells strong so avoid getting it up your nose when spraying it on, but with a bit of elbow grease and a brush followed by rinsing, it does a more effective job of dissolving brake dust and muck than ordinary shampoo. You may find there are small pockets of baked-on brake dust remaining and if you can't shift those with another application, try a metal polish like Solvol Autosol and if necessary, resort to a toothbrush. Once you've done that, there are sealers you can apply to protect alloy wheels but as they're usually already lacquered or painted, it's probably best just to promise yourself to keep them clean.

Another widely overlooked aspect of a car's appearance are the tyres. In the old days, second-hand cars used to sit on dealer forecourts with the tyres daubed in 'tyre-wall black,' a paint for tyres. You can still buy tyre wall paint but it smacks of 'painting over cracks' (sometimes literally). More modern foam products like Armorall 'Tire Foam' is cheap and gives a natural 'back to black' look to tyre walls and mud flaps.

This stuff enhances what's already there rather than covering it up, so the trick here is to get the tyre wall very clean by scrubbing if necessary. Then spray the foam on covering the entire wall and leave it. After some time it will run off leaving the tyres with a naturallooking black sheen, much as they were when they were new. Spray it on liberally, it won't hurt or stain the wheel rims. With proper cleaning, an alloy wheel and tyre assembly can look absolutely stunning.

That leaves the rest of the black trim. Again, clean it thoroughly then use a rag or small brush to apply Back to Black (available from many manufacturers) to do exactly that. It works on any black plastic or rubberised surfaces including window rubber. Avoid getting it on glass or paint though, as you give yourself more work getting it off.

A tip here is to avoid getting polish or compound on black trim when detailing the paintwork in the earlier stages as it leaves white staining that can be hard to get off and which Back to Black won't hide completely.

Finally, clean the interior. You can use carpet cleaning machines on carpets after a good vacuum and a stiff brush to get bits out. Seats can get the same treatment but that's best left for warm weather when they dry quicker and avoid soaking the foam beneath the covering. For leather seats, there are a variety of leather creams available to clean and soften the leather. Also, make sure you choose your dash cleaning products carefully. Some valeting leaves a satin black dash surface deep glossy black which looks cheap and can never be recovered. Keep a natural look wherever possible.

You must also clean all the glass scrupulously with automotive glass cleaner. The inside of glass gets coated with greasy road film and looks awful. Cream cleaners work better than clear liquids on stubborn road grime but it's harder to get rid of all traces afterwards. Spend some time on this as clean glass makes a car look fantastic. Finally, having gone to all that trouble, an older Porsche looks great with some fresh wheel and bonnet badges ○



## **GMUND CARS**

SPECIALISTS IN SOURCING PORSCHES WORLDWIDE

#### WWW.GMUNDCARS.COM

Tel: 01423 797989 E-mail: andrew@gmundcars.com Tel: Andrew Mearns: 07887 948983 Nidd Valley Trading Estate Market Flat Lane Knaresborough North Yorks, HG5 9JA

SIMILAR CARS WANTED



1957 356A Cabriolet, Ihd, Ivory with Red, factory Hardtop, very original, £124,995



1963 356 C Cab, triple Black, new Motor, USA car, Ihd, new hood and interior,  $\pm 115{,}000$ 



1973 Porsche 914, 2.0 litres, Yellow, Ihd, ex USA, very good condition, £POA



1995 993 RS, UK rhd, 1 of 40 cars, Black/Black, air con, buckets, 62k miles, full history £POA



1970 911 T 2.2 Coupe, Ihd, Black/Black, fully restored, major engine re-build, £64,995



36k miles, original not restored, £24,995



1963 356 B T6 Coupe, matching numbers, Ruby/Black, with spare new engine, £99,495



1968 911 L 2.0 swb Coupe, Gulf Blue w/ black, Ihd USA car, recent work, £49,995



1983 911 SC Cab, Silver with Black / Black hood, 81k miles, £29,995



1966 911 2.0 swb Coupe, Ihd, Irish Green w/black, matching numbers, £89,995



1969 914/6, Canary Yellow, matching numbers, very early car, Ihd, £64,995



1986 911 Carrera Supersport, Guards Red w/Black, 66k miles, as new, £59,995





#### NOW ANYTIME CAN BE GO-TIME.

K&N<sup>®</sup> high-flow air filters are designed to increase horsepower with up to 50% more airflow. And with five-minute installation, better performance doesn't get much easier. Order yours online today.

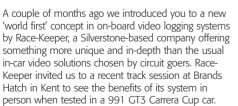
KNFILTERS.COM

## porsche shop\_





#### RACE-KEEPER DUEL STREAM SYSTEM



To recap, Race-Keeper offers the world's first 1080p HD dual stream on-board video logger, called HDX2. This system is able to record two broadcast quality video streams plus, and here's the unique part, it automatically synchronises this with data, allowing drivers to capture the visible action from their car alongside a whole host of other 'invisible' information which can be used to improve lap times and driving techniques. The standard setup uses built-in accelerometers and 20Hz GPS to log the car's position and behaviour on track, although additional data can be gathered via the use of an OBDII/ECU connection or additional sensors. In layman terms this system is akin to those used in top-level motorsport. Ever seen Mark Webber studying overlays of sector times, throttle and braking traces? Well this system can bring that level of detail, in combination with HD video footage, to the end user. All this means a customer can analyse, in detail, exactly how they're driving a car, where they may be able to find time on a lap and how changes to driving style or car setup affect track performance. Race-Keeper offers a single or dual camera setup. The two camera version can also be specified with OBDII or CAN capability allowing for expanded vehicle data gathering. Prices start from £1675.

Having witnessed first-hand the usability of the system and software, we can confidently confirm that this system is so much more than a simple 'plug and play' video camera. Seeing the Race-Keeper system professionally installed into a car and the amount of useable data it captures was a real eye-opener. During our visit the driver of the 991 GT3 seen here, Greg Caton from G-Cat Racing, was able to turn a





few laps, pit to analyse data and then adjust his ontrack approach accordingly. No other system in the world offers two 1080p HD video streams that are automatically synchronised with data including speed, lateral, inline and vertical G-force, 20Hz GPS derived track map as well as lap and split times.

Each HDX2 camera has on-board image stabilization technology and is able to record at either 1080p HD at 30 frames per second or 720p HD at 60 frames per second. The cameras are waterproof and the lens covers are easily replaceable. Also, the cable that connects the camera and box is fully detachable from both ends and securely locks into place when connected. Video files are recorded to either USB or SD in MPEG-4 format which means it is playable on most, if not all, electronic devices. The system is lightweight and engineered for purpose.

This system is ideal for everyone from a track day enthusiast to a professional racing driver, so is sure to appeal to a range of Porsche drivers. Visit www.race-keeper.com for more information.



## porsche shop\_



### PORSCHE CLASSIC RADIO NAVIGATION SYSTEM

#### How much? £900 (plus fitting)

Where from? www.porsche.com/uk This is the new navigation radio by Porsche designed to meet demand for a built-in device for classic sports cars. The unit combines the style of yesteryear with the benefits of modern technology. It fits perfectly into a DIN-1 slot and is operated by means of two knobs, six discreetly integrated buttons and a touch-sensitive 3.5-inch display.

Authentically styled, the radio blends harmoniously into the dashboard of classic Porsche models and bears Porsche lettering. With interfaces for a variety of external music sources, smartphone integration via Bluetooth, the Classic also has a built-in microphone. The integrated amplifier delivers 4x45 watts and can be connected either directly to the loudspeakers or to the original sound system using an optional adapter cable.

Radio reception has been optimised for the built-in aerial supplied ex-works, which is generally only a single telescope. The operating concept of the device is based on Porsche Communication Management (PCM). Drivers have a choice of arrows and two-dimensional or three-dimensional maps to display the route. The maps are stored on a microSD card with eight gigabytes of memory and are updated regularly. The new navigation radio is available immediately from Porsche Classic Partners or your nearest OPC.





#### SPARK 1:43 1962 PORSCHE 718

#### How much? £46

**Where from?** www.racingmodels.com Similar to the 718 we brought you last month, this model is a miniature replica of the car driven to 15th place by Nino Vaccarella in the 1962 German Grand Prix. We really like these little Porsche single-seater Spark models.





#### PORSCHE MUSEUM 1:18 PORSCHE 917K

#### How much? £72

Where from? www.racingmodels.com This larger 1:18 scale model comes from the Porsche Museum in Stuttgart and recreates the Porsche KG Salzburg 917 K, the car which won the 1970 Le Mans race in the hands of Hans Herrmann and Dickie Attwood. This fantastically detailed model also comes in a lovely Porsche Museum box.





**How much?** £230 (Pallas M); £260 (Pallas M-Fix) **Where from?** www.cybex-online.com Young kids outgrow car seats quicker than petrolheads get used to new cars, but while motorists can put up with an unsuitable car for a while, children legally must be in a seat appropriate for their weight. Fortunately, CYBEX has announced a

Ocuber

seat which is suitable for children from 9-36kg. The Pallas M and Pallas M-Fix have side impact protectors at the side and by your child's head, and the safety cushion can be removed when your child's neck muscles are strong enough.

Ocuber

6



#### MINICHAMPS 1:43 PORSCHE 935/76

#### How much? £50

**Where from?** www.racingmodels.com This model is an extremely apt entry to Porsche Shop this month given our feature on John Fitzpatrick on page 51. The Skoal Bandit Porsche Team (John Fitzpatrick Racing) car was driven to third place at Le Mans in 1984 by David Hobbs, Philippe Streiff and Sarel van der Merwe.

#### TRIPLEWAX SHAKE & SHINE

Ocybex

**How much?** £5.75 (one-litre) **Where from?** Asda, Halfords, Motor World. Shake & Shine is the latest product to be unveiled by Tetrosyl. The Bury-based car care company has created a waterless wax and shine product, released under its Triplewax brand. The spray-on formula works on multiple surfaces – paint, metal, glass and rubber – and to use it, you simply shake the bottle to mix the wash and the blend of three waxes together, then spray it on, and wipe it off with a microfibre cloth.



# porsche shop\_



#### AUTOGLYM WHEEL PROTECTOR

How much? £9.99 (500ml) Where from? www.autoglym.co.uk It's all too easy to put off cleaning your alloys, but removing baked-on brake dust is hard work, and leaving it on can damage the finish. Autoglym - which marks its 50th year in 2015 - has worked with its motorsport partners to develop a solution. Wheel Protector is a superhydrophobic, durable barrier which minimises brake dust adhesion. Simply spray it on and walk away, and your wheels will repel dirt for up to four weeks.





## AUTO ART 1:43 996 GT3 RS

How much? £32.50

Where from? www.racingmodels.com As you're no doubt aware, this is the 996 GT3 RS as produced between 2003-2005. The RS badge, and lightweight blue wheels with side decals link the GT3 RS to historically important Porsches such as the Carrera 2.7 RS of the 1970s.





## GT SPIRIT 1:18 930 SLANTNOSE

How much? £86

Where from? www.racingmodels.com This 1983 Porsche 930 Slantnose is available as a 1:18 scale model in Metallic blue. This 'Special Order Program' Porsche featured a 330hp engine.



+44 (0) 20 8500 8811

**Telephone:** 

## How much? £58

This is the Les Charlots Le Grand Bazar Movie Porsche 911 2.7 RS as driven in the 1973 Tour de France by Herve Bayard and Rene Ligonnet. A unique and beautiful TrueScale 1:43 scale model supplied in an elegant showcase.







Porsche 911T 1973 2.4L Targa, LHD CIS Engine, 5-Speed Manual Gearbox, Signal Red with black interior.



Porsche 911T 1973 Coupe 2.4L LHD Manual Gearbox, Signal Yellow. The Porsche 911 has had a full "Bare metal" re-spray.



Porsche 911T 1973 Targa 2.4L Engine LHD Manual Gearbox, 46516 miles, Red with black interior.



Porsche 911T 1973 Coupe 2.4L MFI Engine, 5 Gear Manual LHD, Sepia Brown with a dark brown interior.



Porsche 911T 1972 Targa 2.4L, Manual Gearbox LHD, Red with Tan interior in excellent condition.

SEE OUR WEBSITE FOR A FULL LIST: WWW.DESIGN911.COM/CARS

## **CLASSIC CAR INSURANCE WITH EXTRA SPARKLE SIMPLY CALL FOR A QUOTE**

AND YOU COULD WIN A PERFECT BODYWORK COLLECTION KIT FROM AUTOGLYM IN OUR FREE PRIZE DRAW\*



CAROLE NASH

% reevoo • of custo

## Quote AUTOGLYM when you call 0800 083 097

Classic | Camper Van | Specialist | Military | Performance Visit us online at cherished.carolenash.com

Opening hours in the UK: Mon-Fri 9am-7pm, Sat 9am-5pm, "Terms and conditions apply, call for details †Based on an average customer, saving 28% when compared to buying three separate Carole Nash policies. Average customer = 57 year old male with full 10 years plus NCB, driving a 1965 MC B, 1973 MC B and 1972 MC Midget. Carole Nash Insurance Consultants Ltd is authorised and regulated by the Financial Conduct Authority.

**MUR** 

etta

803

11.75

ektari

The Independent Service Centre for Porsche

• MENU PRICE SERVICING • MOT TESTING
 • AIR CONDITIONING • ENGINE & GEARBOX REBUILDS

- FRIENDLY PROFESSIONAL SERVICE
- COURTESY CARS BY APPOINTMENT

"Pride in Porsche"

www.autohaus.uk.com Tel: 0247 666 2288 • Fax: 0247 666 2244 2 Newport Road, Holbrooks, Coventry CV6 4BQ



#### ROGER BRAY RESTORATION Milestone Services, London Road Whimple, Exeter, Devon EX5 2QB

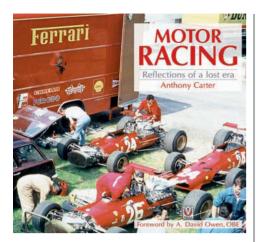


Due to high demand we will be having an open day on Saturday 25th April 2015 10am to 5pm.

There will be workshop tours various demonstrations, various parts on display and for sale and **BBQ** and refreshments. Everyone is welcome. Please can you let us know if you are planning on attending.

www.rogerbrayrestoration.com Tel: 01404 822005 Fax: 01404 822007 e-mail: parts@rogerbrayrestoration.com

## porsche shop\_



#### MOTOR RACING: REFLECTIONS OF A LOST ERA

How much? £14.99

Where from? Apple iBookStore, Google Play Books, Amazon Kindle Store

This eBook contains more than 206 pages, with over 300 photos in black and white and colour. Originally released as a hardback in 2005, *Reflections of a Lost Era* is a personal account of the motorsport industry, and starts in the 1960s. It features the author's trip to Maranello in 1967, tours of various road circuits, and meetings with cars and personalities. Plus, there are reproductions of programme covers, autographs, letters and tickets, which makes this more like a diary than a book.

#### COBRA CLASSIC SOFA

#### How much? From £699

Where from? www.cobraseats.com Bucket seat manufacturer Cobra has diversified into sofas. That's not an April fool joke – we doublechecked the date we learned about its newest product. The company which prepares the race seats for BTCC teams has decided to create hand-finished, custom-made two-seater sofas for petrolheads who want to feel like they're in the car even when in front of the TV. Made from a substantial tubular steel frame, the seat can be finished in any colour and are made of leather, suede, vinyl, Alcantara, or cloth.



#### MICHELIN CROSSCLIMATE TYRE How much? TBC

#### Where from? www.michelin.co.uk

Michelin's new CrossClimate is a summer tyre that has been certified for use in winter. It differs from an all-season tyre as it achieves the top 'A' rating for wet braking, and a 'C' grade for fuel efficiency. The new generation rubber compound resists heat build up, and v-shaped tread blocks with 3D sipes grip the snow, while bevelled angles on the rubber blocks improve braking performance on dry surfaces. The range will be available in 23 sizes for cars with 15- to 17-inch wheels.





### Chesterfield Diagnostic & Repair Centre Ltd. Chesterfield's ONLY Independent **Porsche Specialist**

All Levels of service and repair including:



**Gearbox Re-builds** Wheel Re-furbishment **Evans Coolants** Brakes Valeting **Performance Tuning Fixed Price Servicing** Repairs Diagnostics **4 Wheel Alignment** Suspension Clutches

#### For professional service in a family owned garage, Call 01246 234046

Unit 5, Vanguard Trd Est, Britannia Road, Chesterfield, Derbyshire, S40 2TZ 01246 234046 www.ChesterfieldDiagnostics.com

PORSCHE HREE GENERATIONS OF CARING FOR PORSCHE

At JMG we are dedicated to helping you get the best experience from your Porsche.

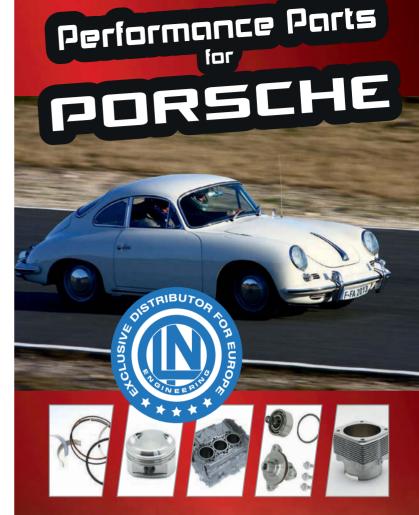
We service, diagnose, repair and improve Porsche Vehicles in our South of England workshops.

JMG Porsche are a family run business built on a foundation of three generations of Porsche experience stretching back to the early 1970's.

'We have moved' Our new address is nov JMG Porsche 98 Cobham Road Ferndown Ind Est Wimborne Dorset BH21 7RE

> Tel: 01202 488800 or 07000 996911 Email: service@jmgarage.co.uk mailorder@jmgarage.co.uk

www.jmgarage.co.uk



fast forward automotive provides a programme comprising of engine components and technical solutions to increase the vehicle performance for all Porsche models from 1955 to today.



New in our online shop: Piston Rings, Con Rods, Pistons, Cylinder Liners, Cylinders, Cam Shafts, Engine Bearings, Piston Pins, Crank Shafts from LN Engineering, Nickies and fast forward automotive.



fast forward automotive KG | Luisenstr. 39 | D-51399 Burscheid Phone/Fax: + 49 2174 6639699 | info@fastforward-automotive.com

#### www.fastforward-automotive.com

## SUBSCRIBE AND SAVE ALL OVER THE WORLD!



Subscribe to *GT Porsche* anywhere in the world and not only will you receive your favourite Porsche magazine by post directly from the printers but you could save over £30!\*



#### SELECT THE BEST SUBSCRIPTION FOR YOU...

 Location
 Subscription term

 12 months
 24 months

 European Union
 £62 - save 20%!
 £111.60 - Save £30.24

 Rest of World
 £78 - save 20%!
 £140.40 - Save £30.24

 North America
 \$115
 \$230

### COMBINED PRINT & DIGITAL SUBSCRIPTIONS ALSO AVAILABLE

To order your subscription today visit: www.gtpurelyporsche.com/subscribe.php

\* £30 saving on UK cover price applies to readers subscribing for 24 months

## next month



#### **PLUS:**

Le Mans 2015 preview Backdated 964 Advanced driving techniques

ONLY IN THE JUNE ISSUE OF GT PORSCHE ON SALE 14 MAY 2015

(Contents subject to change)

www.gtpurelyporsche.com

Available to download from www.gtpurelyporsche.com from 11 May 2015

30	lf ve	ou don't want to miss an issue of GT Purely Porsche
	delivered to your home. Just askl* *Subject to availability	Postcode
9115C	they will arrange for a copy of each issue to be reserved for you. Some stores may even be able to arrange for it to be	Surname Address
PORSCHE	If you can't always find a copy of this magazine, help is at hand! Complete this form, hand it in at your local store, and	Please reserve/deliver my copy of <i>GT Porsche</i> magazine on a regular basis, starting with issue:

International readers and stockists please contact Seymour International Ltd on +44 (0)20 7429 4000 or email: info@seymour.co.uk



#### GMÜND COUPE/356: 1948 – 1964

GMÜND COUPÉ/356: 1948 – 1964 Two-door, two+two Coupé, Roadster, Speedster. Rear-mounted four-cylinder air-cooled 'boxer' engine. This is where the Porsche story begins. After the aluminium prototypes and numerous projects for Volkswagen, Dr Porsche gave the go-ahead for his company to relocate from the converted shed in Gmünd to a rented workshop in Stuttgart (owned, incidentally, by Reutter, the coachbuilder responsible for building the 356 body for Porsche). At the 1949 Geneva Auto Salon Porsche displayed a 356 for the first time, with a coupé and drophead model taking the limelight. A makeshift production line was started in the same year. The following year the 356 was shown to a meeting of Volkswagen main dealers as well as European and overseas importers who promptly placed orders for 37 cars. The first Stuttgart-built 356 rolled off the production line in Easter 1950. The 500th Porsche was built on 21 March 1961, with the 1000th model arriving just six months later, and when the last 356 was built in 1964 – a 356C convertible – a total of 76,302 examples had been built. The arrival of the 356 also signalled Porsche's first forays into motorsport. Dr Porsche's cousin, Herbert Kaes, is thought to be the first to compete in a Porsche car when he took an early 356 and entered it in a race around the streets of Innsbruck, Austria on 11 July 1848 Kaes and the Porcche won their clase

the first to compete in a Porsche car when he took an early 356 and entered it in a race around the streets of Innsbruck, Austria on 11 July, 1948. Kaes and the Porsche won their class, obviously. The first recognised 'factory' victory came in 1951 in the 24 Heures du Mans (where else!) when Porsche's French importer, Auguste Veuillet, convinced Dr Porsche that by entering a car into the twice-round the clock race it would result in a big boost in sales and Porsche's global awareness. Veuillet, along with his co-driver Edmund Mouche, won their class in the 1100cc 356. The rest, as they say, is history. Today the 356 enjoys the status of a genuine classic car. Collectors and enthusiasts alike have seen that the majority of examples have been meticulously restored and maintained and this is reflected in the values they are reaching on the classic

this is reflected in the values they are reaching on the classic car market. Demand for all models and variants is high with the Carrera models some of the most sought after.



#### 356

Dimensions: Wheelbase (mm): 2100 – Length (mm): between 3850 (1950) and 4010 (1959). Width (mm): 1660

1948 to 1949: Gmünd Coupés:- the 356's predecessor was first produced in July 1948. The aluminium-bodied Gmünd Coupés used virtually all VW mechanicals from a four-speed gearbox to torsion bar suspension, and, of course, the Beetle-derived 40hp flat-four engine complete with twin Solex down-draught carburettors and 7.0:1 compression ratio. Drum brakes were fitted all-round. 1950: 'Pre-A' 356:- Following the move to Stuttgart, the 356's integral body was made of steel and the design given a higher waistline than Gmünd Coupés, with the distinctive V-shaped roof to accommodate its split-screen. The 1.1-litre engine now produced 40hp and, along with the other engines offered after 1952, was mated with Porsche's own four-speed gearbox. 1951: 1300cc and 1500cc (60hp) engines introduced. 1952: Split-screen front windscreen replaced with single piece window; bumpers mounted higher and further forward from body; rectangular rear taillights replaced with circular items. 1500cc engine loses 5hp but is more refined and was the first engine to feature the 'Alfinger' crankshaft. 1500 S (70hp) engine introduced. Fully synchronised gearbox fitted across the range. 1955: 356A:- New engines and suspension altered. New curved V-screen' does away with the need to split the screen, vinyl replaces cloth inside. New dash, combined ignition/starter. New gearbox in 1957. Four Cam Carrera's launched at the 1955 Frankfurt Motor Show, these engines were directly derived from racing technology, with GT-denoted models aimed specifically at motorsport. They were dry sumped, had reduced compression ratios and revved much higher. The bodies around them were lightweight, making them very potent on the road for their day. 1959: 356B:- 90hp 1600 introduced for Super 90 which gets 'compensating rear springs' to improve handling. Changes to bumper position, headlamps and numerous interior details. 1961: Larger rear window and engine cover with twin air intakes introduced, electric sliding roof optional; 1600 S engine gets four-ring pistons, S-90 gets modified flywheel. 130hp Carrera 2 announced (introduced in 1962), featuring Porsche-designed disc brakes. 1963: 356C:-Reworked engines, clutch from Super fitted to 75 and 95hp models, disc brakes introduced all-round, rear compensating spring special order only, no external changes but there was a rethink of the interior details. 1964: Porsche takes control of Reutter and 356 C introduced, Roadster dropped from the line-UD.

MODEL	MODEL YEAR	WEIGHT	ENGINE cc	Нр	TORQUE (lb ft)	0-62	TOP SPEED (mph)
Gmünd Coupés	1948 to '50	605	1086	35-40	50	23.0	80
'Pre-A' 356							
1100	1950 to '54	745	1086	40	51	23.5	87
1300	1951 to '54	810	1286	44	59	22.0	90
1300A	1954	830	1286	44	51	22.0	90
1300S	1953 to '54	830	1290	60	64	17.0	99
1500	1951 to '52	830	1488	60	75	15.5	105
1500	1953 to '55	830	1488	55	77	16.5	96
1500S	1952 to '55	830	1488	70	80	13.5	108
356A							
1300	1955 to '57	860	1290	44	60	22.0	90
1300S	1955 to '57	900	1290	60	65	17.0	99
1500GS Carrera	1955 to '58	835	1498	100	88	12.0	124
1600	1955 to '59	835	1582	60	81	16.5	99
1600S	1955 to '59	835	1582	75	86	14.5	108
1600GS Carrera	1958 to '59	835	1587	105	89	11.0	124
356B							
1600	1959 to '63	905	1582	60	81	16.5	96
1600S	1959 to '62	925	1582	75	86	15.0	108
1600S	1960 to '63	925	1582	90	89	13.5	112
1600S	1961 to '63	935	1582	75	86	15.0	108
1600GS Carrera C	T 1959 to '61	890	1588	115	99	10.5	124
Carrera 2	1962 to '64	890	1966	155	144	9.0	124
356C							
1600C	1963 to '65	935	1582	75	89	14	109
1600SC	1963 to '65	935	1582	95	90	13	116
2000GS	1962 to '64	935	1966	130	119	9.0	124

#### 987 997 & Cayman engine repair specialists 986 996

• Sales • Service • Repairs

Monthly paid maintenance package

• Re-con suspension parts







Tel: 01204 302809 Web: www.hartech.org Email: auto@hartech.org

#### pure data

#### 911(1964 - 1989)

(Zero) 0-Series - 1963 to 1966: '64 to '66 Model Year - Wheelbase (mm): 2211 Length/Width (mm): 4163/1610 – Sianificant developments: 911 (verv briefly 901) first shown at 1963 Frankfurt Motorshow, went on sale in 1964 with six-cylinder 2.0-litre engine. Targa announced in 1965 and goes on sale 12 months later. Weighs 50 kilos more than coupé

MODEL	MODEL YEAR	WEIGHT(kg)	ENGINE (cc)	Hp	TORQUE (lb ft)	0-60*	MPH
901	1963	1080	1991	130	119	8.5*	131
911	1964	1040	1991	130	120	8.3*	130
911	1965 to '67	1080	1991	130	128	8.3*	130
A Carian	1000 to 1000 100	7 11- 1-11-	Cianifia			COL- 0110	" internal constant

A-Series - 1966 to 1968: 1967 Model Year - Significant developments: 160hp 911S introduced, as are 5.5-in tyres. 911L had vented discs taken from 911S. Four-speed Sportmatic introduced in 1967. All models available as Taraa, alass window replaces plastic item from 1968.

MODEL	TRACK (f/r mm)	WEIGHT kg	ENGINE	Нр	TORQUE (lb ft)	0-62 0-60*	TOP SPEED (mph)
911L	1353/1321	1075	1991	130	130	10.6*	131
911T	1353/1321	1080	1991	110	116	8.3	124
911	1353/1321	1080	1991	130	128	9.1	130
911S	1353/1321	1080	1991	160	132	8.0*	137

A-Series - 1967 to 1969: 1968/69 Model Year - Significant developments: Wheelbase extended by 57mm to enhance handling, single battery replaced with twin 35amp alternatives in front luggage compartment to keep front end more securely planted and enhance handling. S and E both have mechanical Bosch fuel injection, 911T introduced, 'E' model replaces 'L'.

MODEL	TRACK	WEIGHT	ENGINE	Нр	TORQUE	0-62	TOP SPEED
	(f/r mm)	kg	CC		(lb ft)	0-60*	(mph)
911T	1353/1321	1075	1991	110	115	8.3	124
911E	1353/1321	1020	1991	140	129	8.4	134
911S	1353/1321	995	1991	170	135	8.0*	137
			- 1 10				6

C-Series - 1969 to 1970: 1970 Model Year - Significant developments: Increase in bore from 80 to 84mm raises engine capacity to 2.2-litres. Aluminium crankcase replaces magnesium alloy item. 225mm clutch introduced. Sportmatic no longer an option on 911S. Front upper strut attachment points moved forward 14mm.

D-Series - 1970 to 1971: 1971 Model Year - Significant developments: PVC-coated, galvanised underfloor areas introduced. Tweaks to injection and ignition required to meet new European emission laws

MODEL	TRACK	WEIGHT	ENGINE	Нр	TORQUE	0-62	TOP SPEED	
	(f/r mm)	kg	CC		(lb ft)	0-60*	(mph)	
911T	1362/1343	1020	2195	125	131	9.5	127	
911E	1372/1354	1020	2195	155	141	7.6*	137	
911S	1372/1354	1020	2195	180	147	7.0	138	
E-Series – 1971 to 1972: 1972 Model Year – Significant developments: Engine stroke increased								

to 70.4mm giving 2.4-litre capacity. Compression ratio dropped to allow use of regular petrol. Gearbox uprated to cope with increased torque. External oil filler cap located between door and rear wheel. All models supplied with Fuchs wheels.

F-Series - 1972 to 1973: 1973 Model Year - Wheelbase (mm): 2271 Length/Width (mm): 4127 (RS 4147)/1610 - Significant developments: External oil filler removed due to customer confusion at the petrol pumps. Chin spoiler introduced on S to reduce front end lift (option on T and E) and greater variance in standard wheels. 2.7 Carrera RS is first to be fitted with duck-tail rear wing.

MODEL	TRACK	WEIGHT	ENGINE	Нр	TORQUE	0-62	TOP SPEED
	(f/r mm)	kg	CC		(lb ft)	0-60*	(mph)
911T	1360/1342	1050	2341	130	144	8.1	127
911E	1372/1354	1050	2341	165	151	7.9	138
911S	1372/1354	1050	2341	190	158	6.6	144
Carrera RS	1372/1394	975	2687	210	188	5.8	152

G-Series - 1973 to 1974: 1974 Model Year - Wheelbase (mm): 2271 Length/Width (mm): 4291/1610 (Carrera 1652) - Significant developments: Shock absorbing bumpers introduced as a result of US legislation. Range-topping Carrera model came with 'black look' trim and 210hp. H-Series - 1974 to 1975: 1975 Model Year - Significant developments: Turbo introduced early 75 with four-speed gearbox and higher spec. Duck-tail replaced by whale-tail on Carrera models. Silver Anniversary model launched, 1063 sold.

MODEL:	TRACK	WEIGHT	ENGINE	Нр	TORQUE	0-62	TOP SPEED
	(f/r mm)	kg	CC		(lb ft)	0-60*	(mph)
911	1360/1342	1075	2687	150	173	7.9*	131
911 S	1360/1342	1075	2687	175	188	6.1*	142
911 Carrera	1372/1354	1120	2687	210	188	6.3	150
930 Turbo	1432/1500	1140	2993	260	253	6.0*	155

Best 997 book!

99



#### 911: 1963 - 1989

911: 1963 – 1989
Two-door, two+two Coupé, Convertible and Targa. Rearmounted six-cylinder air-cooled 'boxer' engine, four- and five-speed manual and four-speed Sportmatic gearbox.
For some a real 911 is an air-cooled 911, and some of the greatest examples are from this period. Two of the most iconic 911s ever produced – the 2.7 Carrera RS and 3.0 Turbo – arrived on the scene during this time and Porsche also gave us the sublime 1970 2.2 S. Bosch K-Jetronic fuel injection was introduced (1976) and the first 911 Cabriolets (1983) arrived in showrooms. The 3.2 Carrera fed the Yuppie boom (1983) and the Carrera Club Sport (1988) was the first lightweight 911 special since the original Carrera RS some 15 years earlier.
On its arrival the original 911, or 901 as Porsche had first intended calling it until the French manufacturer Peugeot pointed out that they owned the trademark to model designations with an '0' in the middle, was a huge leap forward from the company's original four-cylinder 356. With its 2.0-litre flat-six, five-speed gearbox, independent suspension and disc brakes the new 2+2 sports car was quickly snapped up when it first appeared at the 911 evolve at a pace. The Targa model was launched in 1965 in anticipation of US legislation that would ban fully convertible cars (it never happened, but the Targa proved a popular choice with its distinctive brushed stainless steel rollover hoop and zip-out plastic rear window). More power (160hp) and larger wheels (5.5-inches) arrived 12 months later, as did ventilated discs and a four-speed Sportmatic gearbox. The Targa's plastic rear window was replaced with a more conventional glass item in 1968.

rear window was replaced with a more conventional glass item in 1968. The start of the next decade saw the flat-six's capacity grow to 2.2-litres and gave us the sublime 2.2 S and a chunky 180hp (190hp in 1973). Measures were also taken to prolong the life of the 911 with PVC and galvanised floors both introduced, and the legendary Fuchs wheels became available across the range. 1973 was the year every 911 aficionado has indelibly inked on their mind: the 2.7 Carrera RS arrived. 975 kilos, 210hp, aluminium bodywork, lightweight glass and the infamous duck-tail spoiler signified the most focused, driver-orientated production 911 to date. Rarer R and S/T racing models had come and gone, but this was the first performance-orientated 911 road car to be sold through the dealer network. A legend was born.

#### Porsche 911 (997)

All models 2004 to 2012 by Grant Neal with Peter Morgan Your only guide to buying and owning a Porsche 997 160 full colour pages, A4 size, 220 illustrations and photos £16.95 +P&P

Familiarisation. timelines, Gen 1 & Gen 2, all the high performance cars. issues, what to look for when buying. owning and running a 997



Order now at +44 1672 514038 or online now: www.porsche997book.co.uk

#### pure data



customers with its first  $\overset{\circ}{\text{NS}}$  road car, Porsche unveiled its concept for a new, more powerful, luxury-orientated version of the 911 at the 1974 Paris Motor Show – the

911 Turbo. With a 3.0-litre flat-six motor and a single KKK turbocharger the new model produced 260hp delivered to the rear wheels via a four-speed manual gearbox. With a 0-62mph time of just 5.5 seconds and a 155mph maximum speed it was the fastest, most powerful Porsche road car to date, and its arrival coincided with the oil crisis. With its flared rear-wheel arches, deeper front and whale-tail rear spoiler it was far from subtle, but Porsche's customers loved it and nearly 3000 were built. In 1978 it gained a bigger, 3.3-litre engine and more power (now 300hp), could crack 160mph and would continue in production until 1989. Porsche also offered as a 911 Turbo Cabriolet and Targa model from 1987-88, as well as the 330hp 'slant-nose' coupé from 1983 through to 1989. And if you wanted the show without the go you could order Turbo-look Coupés, Cabriolets, Targas and Speedsters. Has there ever been a more blatant example of the excesses of the '80s?



During the 1980s Porsche hit upon a winning formula for its rear-engined sports cars, despite the best attempts by various management boards to try and kill it off. As engine capacity rose from 2.2-, through 2.4-, 2.7-, 3.0- and finally 3.2-litres, so did the power and performance of the numerous models and variants introduced. The first 911 Cabriolet arrived on the scene in 1983, and before this a whole of host models had come and gone: the 2.4S became the Carrera in 1974 with 2.7-litres and 210hp, and the 3.0 Carrera in '76 with 200hp (US emissions laws had strangled the flat-six a bit). The 3.0 SC arrived in 1978 with a feeble 180hp but redeemed itself in 1981 with the new 3.0 SC arriving with 204hp. In 1984 Porsche delivered its latest 911: the 3.2 Carrera. With 231hp, a 6.1 second 0-62mph and a

Carrera. With 231hp, a 6.1 second 0-62mph and a 151mph maximum speed the 911 was back on track. In 1987 the somewhat wayward 915 transmission was replaced with a slick Getrag G50 'box and this generation 911 saw out its final years able to hold its head high and compete with the more youthful opposition.

I-Series - 1975 to 1976: 1976MY - Significant developments: Bodies now zinc-coated, galvanised steel. Bosch K-Jetronic fitted to all models. Sportmatic now only three-speed, not four.

J-Series - 1976 to 1977;1977MY - Wheelbase (mm): 2271. Lenath/Width (mm): 4291 (Turbo 4318)/1610 (Carrera 3.0 1652, Turbo 1829) – Significant developments: Sportmatic cars get brake servo assistance. 'Black-look' trim standard on Targas.

MODEL	TRACK	WEIGHT	ENGINE	Нр	TORQUE	0-62	TOP SPEED
	(f/r mm)	kg	CC		(lb ft)	0-60*	(mph)
911	1360/1342	1120	2687	165	176	7.8	135
Carrera 3.0	1372/1354	1075	2994	200	188	6.3	150
930 Turbo	1432/1500	1195	2993	260	253	6.0*	155

K and L-Series (the SC) – 1977 to 1979: '78 to '79MY – Significant developments: Super Carrera combined old 911 and Carrera with 3.0-litre engine, all had servo-assisted brakes. Turbo 3.3-litre engine equipped with intercooler and tea-tray spoiler replaces whale-tail. SC (New A-Series) – 1979 to 1980: 1980MY – Significant developments: Revised ignition and camshaft timing results in 188hp SC model. Turbo gets twin-exit exhaust.

MODEL	TRACK	WEIGHT	ENGINE	Нр	TORQUE	0-62	TOP SPEED	
	(f/r mm)	kg	CC		(lb ft)	0-60*	(mph)	
911 SC	1369/1379	1210	2994	188	188	7.0	141	
930 Turbo	1432/1500	1300	3299	300	304	5.1*	162	
							6	

SC (New B-Series) - 1980 to 1981: 1981MY - Significant developments: First year of 17-digit international chassis number. SC now runs on 98RON fuel. SC (New C-Series) - 1981 to 1982: 1982MY - Significant developments: Limited edition 'Ferry Porsche' model goes on sale. Tea-tray spoiler option available for SC. SC (New D-Series) - 1982 to 1983: 1983MY - Significant developments: Cabrio rushed into production and launched following successful design study.

WUDEL	TRACK	WEIGHT	ENGINE	нр	TURQUE	0-62	TUP SPEED	
	(f/r mm)	kg	CC		(lb ft)	0-60*	(mph)	
911 SC	1369/1379	1210	2994	204	189	5.7*	146	
930 Turbo	1432/1500	1300	3299	300	304	5.1*	162	

Carrera (New E-Series) - 1983 to 1984: 1984MY - Wheelbase (mm): 2271 Length/Width (mm): 4291 (Turbo 4318)/1610 (Turbo) Significant developments: Carrera replaces SC. Engine capacity climbs to 3164cc, Digital Motor Electronic engine management introduced as was the engine oil-fed chain tensioner. Turbo-look option ads 50 kilos and increases drag.

MODEL	TRACK (f/r mm)	WEIGHT kq	ENGINE cc	Нр	TORQUE (lb ft)	0-62 0-60*	TOP SPEED (mph)	
911 Carrera	1398/1405	1210	3164	231	209	5.6*	152	
911 SC RS	1398/1405	960	2994	255	184	5.0	159	
930 Turbo	1432/1500	1300	3299	300	319	5.1*	162	
				ei 10				.1

Carrera New F-Series – 1984 to 1985: 1985MY – Significant developments: Carrera available with catalytic converter. Four-spoke steering wheel standard. Carrera New G-Series - 1985 to 1986: 1986MY - Significant developments: Sport seats now a no-cost option. Turbo-look track 1434mm front/1526mm rear.

MODEL	TRACK	WEIGHT	ENGINE	Нр	TORQUE	0-62	TOP SPEED
	(f/r mm)	kg	CC		(lb ft)	0-60*	(mph)
911 Carrera	1398/1405	1210	3164	231	209	5.6*	152
930 Turbo	1432/1500	1300	3299	300	319	5.1*	162
				ei ::::			101:

Carrera New H-Series – 1986 to 1987: 1987MY – Significant developments: Targa and Cabrio models available with Turbo engine. Slant-nose becomes an option. 915 transmission replaced by Getrag-built G50. Power hood standard on Cabrio. Carrera New J-Series - 1987 to 1988: 1988MY -Significant developments: Celebration anniversary model available. Club Sport model weighed 50 kilos less, blueprinted engine pushed power to around 241 hp. Carrera New K-Series - 1988 to 1989: 1989MY - Significant developments: 16-inch wheels now standard. Speedster introduced and available with either Turbo-look or flat-nose bodies

MODEL	TRACK	WEIGHT	ENGINE	Нр	TORQUE	0-62	TOP SPEED
	(f/r mm)	kg	CC		(lb ft)	0-60*	(mph)
911 Carrera	1398/1405	1210	3164	231	209	5.6*	152
Club Sport	1398/1405	1160	3164	231	209	5.6*	156
930 Turbo	1434/1526	1300	3299	300	319	5.1*	162

#### 964 (1989 – 1993)

1988 to 1989: 1989MY – Wheelbase (mm): 2271 Length/Width (mm): 4250/1651 – Significant developments: Launched in January 1989 with a new flat-six engine, suspension, brakes and numerous body parts, Porsche claim only 13 per cent carry over parts from predecessor. Carrera 4 split torque 31/69 front to rear. All wheel ABS and power steering standard, catalyst introduced. 1989 to 1990: 1990MY -Significant developments: All pre-964 models now deleted. Carrera 2 introduced, Targa and Cabrio

#### 'WG MOTORSPOR SPECIALISING IN PORSCHE

over 20 years' experience

- sales, servicing and parts
- fully equipped workshop
- specialists in all Porsche models
- accident repairs
- MoT testing
- dealer-level diagnostics
- member of Porsche parts programme
- friendly, professional advice
- servicing on all new vehicles without compromising manufacturer's warranty courtesy car available
- (by appointment)
- pre-purchase inspections
- menu pricing no hidden costs
- enthusiast owned and run (Porsche is our passion)
- german-speaking reception





#### **Porsche Fixed Price Servicing.** The quality you'd expect, a price you wouldn't.

No matter which Porsche you drive our fixed price servicing tariffs mean you don't have to choose between quality and cost\*.

Porsche accredited Technicians are trained to the highest standards and use the precise tools and genuine parts required to do the job to the standard your car deserves.

We also make it convenient thanks to our courtesy car, collection and delivery or customer drop-off services.\*\*

Get the best of both worlds with fixed price servicing from Porsche.

For more information visit www.porscheownerservices.co.uk



**Porsche Centre Aberdeen** 01224 877 778

Porsche Centre Belfast 028 9038 9999

Porsche Centre Bolton 01204 559 911

Porsche Centre Bournemouth 01202 983 033

**Porsche Centre Bristol** 0117 9002 911

**Porsche Service Centre Brooklands** 01483 421 911

**Porsche Centre Cambridge** 01223 872 872

**Porsche Centre Cardiff** 02920 350 911

> **Porsche Centre Colchester** 01206 855 500

**Porsche Centre Dublin** +353 (0)1235 3375

**Porsche Centre East London** 0208 519 9999

**Porsche Centre Edinburgh** 0131 475 5000

**Porsche Centre Exeter** 01392 822 800

**Porsche Centre Glasgow** 0141 885 6911

Porsche Centre Guildford 01483 408 800

**Porsche Centre Hatfield** 01707 277 911

Porsche Centre Jersev 01534 497 777

> **Porsche Centre Kendal** 01539 724 331

**Porsche Centre Leeds** 0113 389 0600

0116 276 4488

Porsche Centre Mid-Sussex 01444 242 911

Porsche Centre Newcastle 0191 295 1234

Porsche Centre Nottingham 0115 986 0911

Porsche Centre Portsmouth

Porsche Centre Reading

**Porsche Centre Sheffield** 0114 256 4455

**Porsche Centre Silverstone** 01327 355 911

Porsche Centre Solihull 0121 745 9911

Porsche Centre Sutton Coldfield 0121 378 5800

Porsche Centre Swindon 01793 615888

Porsche Centre Tewkesbury 01684 212 911

Porsche Centre Tonbridge 01732 361 222

Porsche Centre West London 0208 742 7000

Porsche Centre Wilmslow 01625 522 222

\* Participating Centres only. Fixed price service tariffs may be withdrawn or varied at any time. Contact participating Centres for full details, terms and conditions

\*\* Subject to availability

**Porsche Centre Chester** 0151 373 4899

**Porsche Centre Leicester** 

02392 212 350

0118 930 3911



911 (964): 1989 – 1993 Two-door, two+two Coupé, Convertible and Targa. Rear-mounted six-cylinder air-cooled 'boxer' engine, rear and four-wheel drive. For a company that had very little left in the piggy bank and suffering from an economic and sales downturn, Porsche's engineers pulled off a remarkable achievement when developing the 964-series 911. This latest 911 was '87 per cent new' over the model it replaced, and the big news surrounding the 964 was the increased capacity flat-six and the introduction of a four-wheel drive transmission. This resulted in the gearbox and rear final drive having two electronically-controlled wet clutches, limiting slip in both the centre and rear differentials. A torque tube connected the centre and front diffs. The torque split was 31:60 front-to-rear. Joining the new C4 was a Carrera 2 Coupé, Cabriolet

torque split was 31:60 front-to-rear. Joining the new C4 was a Carrera 2 Coupé, Cabriolet and Targa models, three Turbo variants: 320hp 3.3-litre, 360hp 3.6-litre, and a limited run 381hp Turbo S. The stripped-out 964 RS and limited run 3.8 RS were available from 1992. Overlooked by many, the 964 offers an affordable entry into classic 911 ownership, although they require regular maintenance and some TLC.



911 (993): 1993 – 1996 Two-door, two+two Coupé, Convertible and Targa. Rear-mounted six-cylinder air-cooled 'boxer' engine, rear- and four-wheel drive. Argued by many to be the most beautiful 911 design of all, the 993-series cars are also the best engineered, and for many purists the pinnacle of the model's achievement. The last of the air-cooled 911s had it all – pace, grace and, for once, a bit of space. The entry-level Carrera 2 was all you ever really needed, but who could resist the appeal of the Carrera RS or, for the first time, the all-wheel drive, twin-turbocharged Turbo? For the seriously brave there was the GT2 and those after the Turbo look without the go could always opt for the Carrera 2S and 4S.

could always opt for the Carrera 2S and 4S. The 993 also saw the introduction of VarioRam (in 1996). This controlled the length of the engine's induction tracts, and at low and medium engine speeds longer tracts would provide a fuller torque curve, while at higher engine speeds the shorter induction length delivered higher peak

available for both Carrera 2 and Carrera 4 models. Tiptronic available on C2. Both Cabrio and Targa 50 kilos heavier than coupé equivalents. 1990 to 1991: 1991MY - Significant developments: Rear drive, 3.3-litre 320hp 964 Turbo introduced complete with 'Cup' design mirrors, 1991 to 1992: 1992MY -Significant developments: Stripped-out Carrera 2 RS launched – the first RS since 2.7 Carrera RS in 1973 – and proves a hit for those who like their 911s raw. 381hp Turbo S model available to order (80 built). 1992 to 1993: 1993MY - Significant developments: Speedster introduced, rear-wheel drive only and based on Cabriolet for US market. 3.6 Turbo production begins in Jan 1993.

MODEL	TRACK (f/r mm)	WEIGHT kg	ENGINE cc	Нр	TORQUE (lb ft)	0-62	TOP SPEED (mph)
Carrera 2/4	1379/1374	1350/1450	3600	250	228	5.7	162
Carrera 2 RS	1379/1380	1250	3600	260	240	5.3	162
Turbo	1442/1448	1470	3299	320	332	5.0	168
3.8 RS	1440/1481	1210	3746	300	266	4.9	168
Turbo 3.6	1442/1448	1470	3600	360	383	4.8	175

#### 993(1993 - 1998)

**1993 to 1994:** 1994 Model Year – Wheelbase (mm): 2272 Length/Width (mm): 4245/1735 (Carrera 4S and Turbo 1795mm) – Significant developments: 993 production begins in Jan 1994. Internal engine upgrades increase power and torque. Multi-link rear suspension is one of the biggest developments in the 911's history and transforms 993 into a more driver friendly sports cars. Four-piston brake callipers standard front and rear. Two- and four-wheel drive offered across the range in either Coupé or Cabriolet quise. 1994 to 1995: 1995MY – Significant developments: Carrera RS introduced as is redesigned, all-wheel drive system for Carrera and Tiptronic S with steering wheel-mounted shift controls for automatic gearbox. New 408hp four-wheel drive, twin-turbocharged 911 Turbo is launched and includes a six-speed aearbox and hollow spoked allov wheels.

MODEL	TRACK (f/r mm)	WEIGHT	ÉNGINE	́ Нр	TORQUE (lb ft)	0-62	TOP SPEED (mph)	
		kg	CC		(in it)		(F /	
Carrera 2/4	1405/1444	1370/1420	3600	272	243	5.6/5.3	168/162	
Carrera RS	1413/1452	1270	3746	300	262	5.0	172	
Turbo	1411/1504	1500	3600	408	398	4.5	180	
10071 1000	1000101 01	·C: . 1		14 : 6		1	1 1 1	

**1995 to 1996:** 1996MY – Significant developments: VarioCam engines announced and up both power and torque; revolutionary sliding glass-roofed Targa introduced. Lightweight, 430hp, rear-wheel drive, homologation special GT2 launched. It's the most powerful and fastest 911 production road car ever built. 1996 to 1997: 1997MY - Significant developments: 430hp Turbo S offered as run-out model with 450hp factory engine upgrade also available. Turbo-bodied Carrera 2S built alongside Carrera 4S, but two-wheel drive obviously. It's the last rear-wheel drive, air-cooled 911. 1997 to 1998: 1998MY - Significant developments: An end of an era. Production of the all-wheel drive Carrera 4 and Turbo continues until July 1998 but when the last car finally rolls off the production line (a Carrera 4S) it marks the end of air-cooled 911 production after 35 years. The purists aren't happy, but it signifies a new dawn for Porsche

MODEL	TRACK (f/r mm)	WEIGHT kg	ENGINE cc	Нр	TORQUE (lb ft)	0-62	TOP SPEED (mph)
Carrera 2/4	1405/1444	1370/1420	3600	285	251	5.2	172
Carrera 2S/4S	1411/1504	1450	3600	285	251	5.2	172
Turbo	1411/1504	1500	3600	408	398	4.5	180
GT2	1475/1550	1290	3600	430	398	4.0	184
Turbo S	1411/1504	1500	3600	430	398	4.3	185

#### 996(1997 - 2004)

1997 to 1998: 1998 Model Year – Wheelbase (mm): 2350 Lenath/Width (mm): 4430 (Turbo & GT2 4435)/1765 (Turbo & GT2 1830) - Significant developments: All-new water-cooled, 3.4-litre VarioCam six-cylinder 'boxer' engines. Rear-wheel drive, six-speed manual transmission or five-speed Tiptronic S at extra cost. Traction control also available. Four-wheel drive Carrera 4 introduced at the end of the year along with Porsche Stability Management (PSM). 1998 to 1999: 1999MY - stripped-out, 360hp GT3 introduced. GT1-based engine helps create most focused 996 to date. Additional cooling for radiator, gearbox and engine account for extra weight over standard Carrera 2. Available in 'Comfort' or 'Club Sport' trim, breaks Nürburgring Nordschleife lap record for a production car (8mins 03sec). 1999 to 2000: 2000MY - the new 911 Turbo arrives. Twin-turbocharged, water-cooled flat-six with VarioCam Plus develops 416hp through four-wheel drive chassis, First 911 Turbo available with Tiptronic S. 996 -2000 to 2001: 2001MY – GT2 returns with 462hp, rear-wheel drive, Porsche Ceramic Composite Brakes and no PSM! Breaks production car lap record at the Nordschleife (7min 46sec)

MODEL	TRACK (f/r mm)	WEIGHT	ENGINE cc	Нр	TORQUE (lb ft)	0-62 0-60*	TOP SPEED (mph)
Carrera 2/4	1455/1500	1320/1430	3387	300	258	5.2	174
GT3	1475/1495	1350	3600	360	273	4.8	188
Turbo	1465/1522	1549	3600	416	413	4.2	190
GT2	1485/1520	1440	3600	462	457	4.1	197

Tel: 0844 7000997 Specialist Cars cellence comes as standard

# Covered.

To enjoy your pride and joy to its fullest, you need insurance that you can trust. Adrian Flux is the UK's largest specialist motor insurance broker, with over 40 years' experience, so you can be safe in the knowledge that we have you covered.



## 0800 085 5000 adrianflux.co.uk/porsche

Authorised and Regulated by the Financial Conduct Authority



We at Extreme Detailing are passionate about Porsche and keeping them looking their best.

We restore to perfection, protect then maintain our customer's cars so you can enjoy your car knowing it will always be kept looking its best.

> TEL: 0800 840 2058 WWW.EXTREMEDETAILING.CO.UK

Mobile business based in Hertfordshire Email: sales@extremedetailing.co.uk

f



Fixed Price Porsche Servicing Onsite Tyre Fitting & MOT Testing The Latest Diagnostic Tools Laser Wheel Alignment Engine & Gearbox Rebuilds Free Courtesy Car Service Complete Bodywork Repair Service Wheel Refurbishment Part & Full Porsche Restoration Perfomance Enhancements

01825 830424 service@paragon.gb.com www.paragongb.com



990. 1997 — 2000 Two-door, two+two Coupé, Cabriolet and Targa. Rear-mounted six-cylinder water-cooled 'boxer' engine. A water-cooled engine in a 911! Whatever next? Once the purists had calmed down, beneath the 996's slightly frumpy looks is one of the greatest cars of our time. Carrera 2 is all you ever actually need, but the four-wheel the Carrera 4 and Carrera 45 are unstopnable. The latter

Carrera 2 is all you ever actually need, but the four-wheel drive Carrera 4 and Carrera 4S are unstoppable. The latter, with its Turbo sourced brakes, suspension and bodywork is possibly the best value 911 Porsche has ever built. The 416hp, four-wheel drive Turbo is a contender for the greatest supercar ever built, and swept aside all in its way during its time on the price list. The 462hp GT2 was deemed a tad excessive for most on the road, and didn't enjoy the kudos of its predecessor, nor that of the 911 GT3. This stripped-out 911 was as close to a 911 RS you could get without actually calling it such. One of the most rewarding 911s when it was new, it's still a favourite amongst the purists but subsequent evolutions are better still. GT3 RS was further honed for the track, compromised for the road. The Targa featured the now traditional opening rear glass hatch, while the Cabriolet was perfectly at home in Miami.



997: 2004 – 2008 Two-door, two+two Coupé, Cabriolet and Targa. Rear-mounted 3.6- and 3.8-litre six-cylinder, water-cooled 'boxer' engine.

3.6- and 3.8-litre six-cylinder, water-cooled 'boxer' engine. More evolution than revolution, the second-generation water-cooled 911 has a hint of 993 look about it and was available with two engine options. 997 ownership began with the 321hp 3.6-litre Carrera, with the majority of customers opting for the more powerful 355hp Carrera S. Porsche Active Suspension Management (PASM) was standard on the Carrera S and allowed the car to play at continental GT cruiser one minute and Nordschleife slayer the next. Interior quality improved over 996. Turbo and GT3 models were even better than their predecessors, with the Turbo introducing Variable Turbine Geometry and Porsche Traction Management, while the GT3 got traction control! When Porsche combined these two models' philosophies the GT2 was built. At 530hp and 204mph it is the most powerful and fastest Porsche 911 to date. The Targa offered hatchback practicality – and four-wheel driver involvement.



911: 2008 – 2012 Two-door, two+two Coupé, Cabriolet and Targa. Rear-mounted 3.6- and 3.8-litre six-cylinder, water-cooled engine with Direct Fuel Injection and VarioCam Plus; normally New 996 - 2001 to date: 2002MY - Significant developments: Second-generation 996 introduced. Engine capacity grows to 3.6-litres, power increase to 316hp. Turbo's trip computer standard across ranae, as are Turbo headlights, Cup holders fitted for first time. New Carrera 4S introduced with Turbo brakes, suspension and wide-body. 996 Targa model launched with retractable sliding glass roof. 996 2003 to 2004: 2003MY - Significant developments: GT3 returns with 381hp while the GT3 RS has the same power but weighs 20 kilos less thanks to carbon fibre body panels and a plastic rear window. Turbo and Carrera 4S launched as a Cabriolet models, GT2 gets power hike to 483hp. 0-62mph time drops to 4.0 seconds, top speed climbs to 198mph. 996 - 2005: 2005MY - Significant developments: The 911 Turbo S makes a return and signals the beginning of the end for the 996. 450hp and PCCB come as standard

MODEL	TRACK (f/r mm)	WEIGHT kg	ENGINE cc	Нр	TORQUE (Ib ft)	0-62	TOP SPEED (mph)
Carrera 2/4	1465/1500	1345/1405	3596	316	273	5.0	178
Targa	1465/1500	1415	3596	316	273	5.2	177
Carrera 4S	1472/1528	1470	3596	316	273	5.1	173
Turbo	1472/1528	1540	3600	414	413	4.2	190
Turbo S	1472/1528	1549	3600	450	457	4.1	190
GT3	1485/1495	1380	3600	381	284	4.5	191
GT3 RS	1485/1495	1360	3600	381	284	4.4	190
GT2	1495/1520	1420	3600	483	457	4.0	198

#### 997 (2004 - 2008)

2004: 2005 Model Year – Wheelbase (mm): 2350; Length/Width (mm): 4427/1808; Height (mm) 1310/1300 (Carrera/Carrera S) - Significant developments: 3.6-litre 321hp, and 3.8-litre 355hp, water-cooled flat-six engines for Carrera and Carrera S respectively. New six-speed manual gearbox standard on both models, Porsche Active Suspension Management (PASM) standard on Carrera S lowers car by 10mm, cost-option on Carrera. 19-inch alloy wheels standard for Carrera S. 2005: 2005MY – Carrera 4 and Carrera 4S launched. Engines as Carrera and Carrera S respectively, rear body widened by 44mm, PSM now equipped with 'pre-filling' brake system to quicken responses. 2006: 911 Turbo and GT3 launched. The former features Variable Turbine Geometry, Porsche Traction Management and 480hp. The third-generation GT3 is the best all-rounder yet. PASM fitted as standard, as is a 415hp 3.6-litre flat-six engine and traction control. 911 Targa 4 and 4S launched based on the wider Carrera 4/4S shell and feature the full length glass sliding roof. GT3 RS launched. Same power as a GT3 but 20 kilos lighter and unique aero pack. 2007: 997 Turbo Cabriolet launched, followed by the new 911 GT2 with 530hp, rear-wheel drive, traction and stability control, and launch control. 204mph claimed maximum

MODEL	TRACK	WEIGHT	ENGINE	Нр	TORQUE	0-60	TOP SPEED
	(f/r mm)	kg	CC		(lb ft)		(mph)
Carrera	1486/1529	1395	3596	321	273	5.0	177
Carrera S (Pkit)	1486/1511	1420	3824	355	295	4.4 (4.4)	182
Carrera 4	1488/1548	1450	3596	321	273	5.1	174
Carrera 4S (Pkit)	1488/1548	1475	3824	355	295	4.8 (4.7)	179
Targa 4	1488/1548	1510	3596	321	273	5.3	174
Targa 4S	1488/1548	1535	3824	355	295	4.9	179
GT3	1486/1511	1395	3600	415	298	4.3	192
Turbo	1490/1548	1585	3600	480	457-501	3.6	192
GT3 RS	1497/1558	1375	3600	415	298	4.2	192
GT2	1515/1550	1440	3600	530	501	3.7	204

#### 997 gen-2 (2008 – 2012)

2008: 2008MY – Wheelbase (mm): 2350; Length/Width (mm): 4435/1808; Height (mm) 1310/1300 (Carrera/Carrera S) - Significant developments: All new 3.6-litre 345hp and 3.8-litre 385hp, watercooled flat-six enaines for Carrera and Carrera S now fitted with Direct Fuel Injection. Six-speed manual gearbox standard on both models and new seven-speed PDK available as option. Porsche Active Suspension Management (PASM) standard on Carrera S, cost-option on Carrera. 19-inch alloy wheels standard fitment for Carrera S. Minor styling changes to lights and bumpers. New PCM3, Bluetooth and steering wheels. Carrera 4 and 4S model get reflective light strip across tail and identical updates to two-wheel drive models. Cabriolet models of all variants go on sale with coupés. PDK-equipped cars two-tenths quicker to 60mph, but 1mph slower on the top speed. 2009: 2010 MY - Eagerly awaited Generation-two 997 GT3 is launched with larger capacity 3.8-litre, normally aspirated flat-six. New 911 Turbo quickly follows with all-new 3.8-litre, Direct Fuel Injection, twin VTG turbocharged engine, it's the first all-new engine for the 911 Turbo in 35 years. PDK replaces Tiptronic and Porsche offer optional steering wheel mounted paddle-shift controls for the first time. Limited run of 250 Sport Classic models mix Carrera 4 wide body looks with rear-wheel drive and a 408hp 3.8-litre Powerkit engine. Built by Porsche Exclusive it also features a double-domed roof, ducktail rear spoiler and the return of Porsche's famous Fuchs wheels and PCCB as standard. A bespoke leather interior also fitted. 911 GT3 RS is announced alongside Sport Classic at Frankfurt Motor Show. New RS comes with a wider front track, a new aero-pack that doubles downforce, a more powerful version of the Mezger 3.8 litre flat-six and a 25kg drop in kerb weight over a regular GT3. Air-con, PCM and leather all options. 2010: 2010MY -530hp Turbo S available as coupe or cabriolet. PDK with paddle-shift, PCCB, dynamic engine mounts, Sport Chrono Package Turbo and Torque Vectoring are all standard. Interior features a dual tone leather trim and adaptive sport seats. The 620hp 911 GT2 RS is the most powerful production Porsche the company has ever built. Based on the GT3 RS it features further aero dynamic tweaks and recalibrated PASM, Traction and Stability control systems. 3.6-litre engine is the final swan song for the Hans Mezger flat-six, and is fitted with a single-mass flywheel and a revised charge air intercooler. It's the first Porsche to feature different N-rated tyres on the front and rear axles. Carbon-fibre bonnet – and front wings if you wish - help shed the kilos as do the plastic rear and rear quarter windows. Only 500 built, and all sold out within three-months. To mark its 25th Anniversary Porsche Exclusive builds 356 911 Speedsters. As with the Sport Classic it features the Carrera 4 body with rear-wheel drive running gear and the

# NEW CUSTOWER CENTRE We're 2mins from J21 on the M6 NINEMEIST Servicing that's above and beyond

## Call +44 (0)1925 242

Ninemeister, 12 Chesford Grange, Warrington, Cheshire WA1 4RE www.ninemeister.com | ask@ninemeister.com | www.cloud9m.com



The racetrack is a very hot environment....Sometimes too hot. Be prepared.



Fire Extinguisher Quick Release, Mounts and Packages Most Models

If your car is on fire, the last thing you want to do is fumble with clamps and brackets found on traditional fire extinguisher mounts. In these critical moments the Rennline Fire Extinguisher Quick Release can mean the difference between a minor incident and a total loss. This mount is equipped with Rennline's exclusive Detent Release System (DRS) resulting in the smoothest, most precise operation possible. Designed with the racetrack in mind, our Quick Release is a true metal-to-metal mount which meets all sanctioning body requirements and works with all 3 inch extinguishers. Fully CNC machined from aerospace grade aluminum and assembled with stainless steel hardware, they are designed as a direct bolt on for all Rennline and most aftermarket fire extinguisher mounts.





RENNLINE.com

802.893.7366



2015

aspirated and turbocharged. Six-speed manual gearbox fitted as standard, seven-speed PDK, double-clutch gearbox optional. Porsche shows its green credentials by introducing its cleanest car to-date, claiming a 3.6 Carrera fitted with a PDK gearbox will return over 29mpg. This heavily revised flat-six engine should prove more reliable now the intermediate shaft is no longer needed, but some of the soul has gone AWOL when it comes to the flat-six's voice. PDK is a revelation, despite some complaining about the up/down buttons being the wrong way round. Although this is easily rectified with the optional paddle-shift controls.

way round. Although this is easily rectified with the optional paddle-shift controls. The 911 line-up expanded like no other series under the 997. Along with the regular Carrera, Targa, Turbo and GT models Porsche introduced four-limited production models – GT2 RS, GT3 RS4.0, Sport Classic and Speedster. The second-generation 997 Series was Porsche's most expansive line-up of the 911 in the car's history with 22 'basic' models having been introduced. Of the 22 models only four aren't available with PDK (Sport Classic, GT3, GT3 RS, GT2 RS and GT3 RS4.0) and two models are only available with the seven-speed double-clutch unit (Turbo S and Speedster). Only five models are offered with a narrow body (Carrera and Carrera S – coupé and cabriolets – and the GT3) with the rest of the range all use the wider body first introduced with the four-wheel drive models. 12 coupés, seven cabriolets, two Targas and a Speedster body coupés, seven cabriolets, two Targas and a Speedster body are available. Three different size of brakes are fitted, one of which is made from ceramic composite material, two suspension systems are available (passive and active – PASM), with five different front and rear track widths also used. Four different engines are offered.



991: 2012 – TO DATE
Two-door Coupé and Cabriolet, water-cooled and direct fuel injected flat-six, rear-engined, rear- and four-wheel flat-six, rear-engined, rear- and four-wheel flat is the 991 was no fifterent. There is the new seven-speed manual gearbox, a world first, dynamic chassis control (a first for the 911) and new, electronic power-steering. The latter causing ome to declare the 911 as we know it to have passed and the 400 mouth 'g of that far, although the effect it has to the car's character makes the 991 a very different 511 and new, electronic power-steering. The latter causing ome to declare the 911 as we know it to have passed and the the bace before.
There is much to praise about the 991, however. Both engines are a delight to experience, full of zing and gutteral grunt. The more powerful, 400hp 3.8-litre has an eich performance reach, but it's the 355hp 3.4-litre that is prover the manual gearbox, the latter not as slick nor as slick nor as sever the potional paddleshit control.
Thou opt for either the GT3 or Turbo models PDK is four only option. Many still haven't picked themselves up of the floor upon hearing that news. Porsche claims the double-clutch is not only quicker and more efficient, but is the 4911 was the last bastion of the truly wonderful manual gearbox, and now it's gone from the likes of the GT3 and the Turbo it feels

408hp Powerkit 3.8-litre motor. PDK only transmission available, PCCB standard and Pure blue paint or white the only colours. Windscreen is 72mm lower than standard and roof is a manual-electric mix that hides under a traditional Speedster double bubble enaine cover. First Porsche Speedster for 16 years. The final 997 series 911 could possibly be the best. Carrera GTS is available as either coupé of cabriolet and again mixes the Carrera 4 body with rear-drive running gear; again the 408hp 3.8-litre Powerkit engine does all the work. Six-speed manual or seven-speed PDK are both available, and PCCB is optional. 19-inch RS Spyder design wheels are standard and the GTs also features a SportDesign front bumper and deeper side sills. Inside is a mix of leather and Alcantara with a new SportDesign steering wheel also standard. Rear-seats are optional. 2011: Just when we thought Porsche was done with the 997 along came one more derivative. A 500hp, normally aspirated 4.0-litre flat-six engine with a crank lifted straight from a GT3 R. The car weighed 1360kg and had aero dynamic add-ons designed specifically for the Nürburgring. Everything about the 4.0RS was extreme. It cherry picked the very best bits from every 997 that had gone before it to produce the ultimate in rear-engined driving thrills. It's unlikely we'll see anything of its kind again. 2012: Porsche had time for one last 997 swansong: the Carrera 4GTS. As its name suggests it was a four-wheel drive version of the Carrera GTS. This really was the last 997

MODEL	TRACK (f/r mm)	WEIGHT	ENGINE cc	Нр	TORQUE (lb ft)	0-62* 6sp/7sp	TOP SPEED (mph)
Carrora		kg		745			
Carrera	1486/1530	1415	3614	345	285	5.1*/4.2	179
Carrera S	1486/1516	1425	3800	385	310	4.3*/4.1	187
Carrera 4	1488/1548	1470	3614	345	285	5.0*	177
Carrera 4S	1488/1548	1480	3800	385	310	4.7*	184
Carrera GTS	1488/1548	1420	3800	408	310	4.6/4.2	190/189
Carrera 4GTS	1488/1548	1480	3800	408	310	4.6	188
Targa 4	1488/1548	1530	3614	345	285	5.2*	176
Targa 4S	1488/1548	1540	3800	385	310	4.9*	184
GT3	1497/1524	1395	3797	435	317	4.0*	194
GT3 RS	1509/1554	1370	3797	450	317	3.8*	193
GT3 RS4.0	1509/1554	1360	3996	500	339	3.9	193
Turbo	1490/1548	1570	3800	500	479	3.6* (3.2**)	194
Turbo S	1490/1548	1585	3800	530	516	2.9**	195
GT2 RS	1509/1558	1370	3600	620	516	3.5	205
Sport Classic	1492/1550	1425	3800	408	310	4.6	187
Speedster	1492/1550	1540	3800	408	310	4.4	190

\* 0-60mph: cars fitted with six-speed manual gearbox; \*\* cars fitted with Sports Chrono Plus and PDK

#### 991 (2012 -)

2012: 2012 Model Year – Wheelbase (mm): 2450; Length/Width (mm): 4491/1808; Height (mm) 1303/1295 (Carrera/Carrera S) - Significant developments: All new 911s featuring a longer wheelbase, a lighter body and more technology than a 911 has every seen. The direct fuel injection engines are carried over from the 997 generation of cars, so to is the seven-speed PDK gearbox. However, a new seven-speed manual gearbox – based on the PDK – was introduced to replace the slick-shifting six-speed manual. Other mechanical highlights include the option of Porsche Dynamic Chassis Control (PDCC) on a 911 for the first time, dynamic engine mounts and torque vectoring. Electric power steering replaced the previous car's hydraulic setup; not one of Porsche's most popular decisions. There was also a new look both inside and out, the new interior regaining the air of quality that some felt had been lacking in more recent 911 generations. The Carrera coupé and cabriolet models were fitted with a 355hp, 3.4-litre engine, the Carrera S models with a 400hp 3.8-litre motor. 2013: The Carrera 4 and 4S coupé and cabriolet (width: 1852mm) joined the line-up at the end of 2012 as 2013 model year cars. Available with the same engine and gearboxes as the Carrera models, the four-wheel drive variants were equipped with a multi-plate, electronically controlled version of Porsche Traction Management. As with previous Carrera 4 models, the rear of the car was 44mm wider than the two-wheel drive derivatives. At the Geneva Motor Show in March Porsche revealed the new 911 GT3. Those who thought the 991 was a controversial 911 could barely speak when the specification of the new GT3 was announced. Out went the Hans Mezger 3.6-litre engine and in came a 475hp, 3.8-litre direct injection engine based loosely on the Carrera S's motor. This was just the beginning. No manual gearbox would be offered, instead only a heavily revised PDK unit would be fitted. There was also active rear-wheel steering, electric power steering and, for the first time the GT3 was no longer a narrow bodied car, its shell now taken from the wider Carrera 4. Soon after the GT3's announcement came the details for the new 911 Turbo. Well, two actually. The 991 will be available as either a 520hp Turbo or 560hp Turbo S, both fitted with a PDK gearbox only. Active rear-wheel steering, torque vectoring, PDDC, dynamic engine mounts are all available and, for the first time, the 911 Turbo features active aerodynamics for both the front and rear spoilers. The 911 Turbo's body is also 28mm wider than the Carrera 4 at 1880mm. 2015: GT3 RS - A new 4.0-litre version of Porsche's DFI engine producing 500hp, 460Nm torque (around 339lb ft), 0-62 in 3.3 seconds and a top speed of 192mph. A body constructed from aluminium, carbon fibre and magnesium weighing 10-kilograms less than the GT3 (at 1420kg). A staggeringly quick Nordschleife lap time of 7-minutes 20-seconds – faster than a Carrera GT. And a devastatingly aggressive aero-led aesthetic. GT3 RS is one of Preuninger's finest. Only available with PDK, the GT3 RS boasts double the downforce of the GT3 with less than a third of its drag-co-efficient. This is unheard of. A new Michelin rubber compound adorns the 9.5x20-inch front wheels and 12.5x21-inch rears providing 20% increased stickiness, with increased spring rates (up 10% over GT3) and a 50-milimetre wider rear axle, the changes between GT3 and GT3 RS are vast underneath. A 'paddle neutral' facility and a 'pit speed' button aid track use. PTV with rear limited slip differential, PASM active dampers and PSM feature. A Club Sport Package and seats straight from the 918 Spyder have been added inside - Sport Chrono is optional. The last naturally-aspirated 911? Sadly it may be so...

MODEL	MODEL	WEIGHT	ENGINE	Нр	TORQUE	0-62	TOP SPEED	
	YEAR	kg	CC		(lb ft)		(mph)	
Carrera	2012	1380	3436	350	287	4.8	179	

## call now 0121 5577 911 www.ramusporscha.com independent centre for Porsche Advanced Fault Diagnosis High Definition Digital Imaging Wheels Alignment Alloy Wheels and Tyre Fitting Suspension Package Upgrades Might Mi

## 50 PRE-OWNED PORSCHES ALWAYS IN STOCK, HOME OF THE ENTHUSIAST

Turbo S

1641 LANGSTAFF RD UNITS 1-3 CONCORD, ON, CAN 416.587.1198 jeff@segalmotorcar.com segalmotorcar.com









### SEGAL MOTORCAR

#### pure data



#### 912: 1965 - 1969: 1975

Two-door Coupé and Targa, rear-engined four-cylinder air-

Two-door Coupé and Targa, rear-engined four-cylinder air-cooled 'boxer' engine. 'The poor man's Porsche' was actually quite expensive, not that this stopped it from building a strong following, especially in the States. Sharing the 911's body, the 912 was fitted with a 2.0-litre, four-cylinder engine and came with a spartan interior that saw many of the 911's luxuries ditched. Developed on a yearly basis, the 912 closely followed the 911 in terms of new technology and very soon outsold its more expensive brother, with over 30,000 delivered during its first production run. Re-introduce in 1975, a further 2000 examples were built including a Targa Variant.



914: 1970 – 1976 Two-door Coupé with mid-mounted four- and six-cylinder air-cooled 'boxer' engines. Built by Karmann, Porsche's original mid-engined roadster was praised for its unrivalled dynamics, although its boxy looks and awkward gearbox were often criticised. The four-cylinder engines were sourced from VW, and the later six-cylinder Porsche units offered significant performance advantages – and even more of a challenge for the 'entertaining' dynamics. Sales were poor throughout the model's six-year lifespan.



#### 924: 1977 – <u>1988</u>

924: 1977 – 1988
Two-door, two+two Coupé, front-engined, four-cylinder water-cooled engine, rear-wheel drive, five-speed gearbox. The 924 was Porsche's first front-engined sports car and production car fitted with a water-cooled engine. Originally conceived, designed and developed for Volkswagen, it was eventually launched as a Porsche, albeit still powered by a W/Audi sourced engine. Performance wasn't earth-shattering, but its transaxle configuration provided the balance and handling worthy of the badge.
Continual development saw the 924 improve in the performance stakes, especially so when it received the 2.5-litre engine from the 944. Peak performance, however, came with the Turbo models, which delivered the much needed performance gain, ultimately reaching its peak with the Carrera GT, a homologation requirement in order for Porsche to race the car at Le Mans. A handful of more externe, lighter Carrera GTS models were also built.
Sadly for the 924, with every evolution came a price increase and the coupé quickly went from the affordable entry level Porsche it set out to be, to becoming an expensive, out-dated car.

Carrera 4	2012	1430	3436	350	287	4.9	175	
Carrera S	2012	1395	3800	400	325	4.5	188	
Carrera 4S	2012	1445	3800	400	325	4.5	185	
GT3	2014	1430	3799	475	325	3.5	196	
GT3 RS	2015	1420	3996	500	339	3.3	192	
Turbo	2014	1595	3800	520	486	3.4	195	
Turbo S	2014	1605	3800	550	516	3.1	197	

#### 912 (1965 – 1969: 1975)

**912 –** Wheelbase (mm): 2211 (1969 – 2268 , 1976 – 2272) Length/Width (mm): 4163 (1976 – 4293)/1610. Significant developments: 356C four-cylinder engine, four- or five-speed gearbox, disc brakes, MacPherson front and semi-trailing rear suspension, low-spec interior. 1969: Larger wheelbase and 911 body introduced before production ends for six years. 1975: Re-introduced using the 914's VW 2.0-litre. Heavier than its predecessor, five-speed aearbox fitted as standard.

MODEL	MÓDEL YEAR	WEIGHT kg	ENGINE cc	Нр	TORQUE (lb ft)	0-62	TOP SPEED (mph)	
912	1965 to '69	950	1582	90	86	11.6	115	
912E	1975	1132	1971	90	98	13.0	110	

#### 914 (1970 – 1976)

914 – Wheelbase (mm): 2459 – Length/Width (mm): 4050/1650 Significant developments: 1.7-litre VW four-cylinder and de-tuned 911T 2.0-litre six-cylinder engines offered, MacPherson front and rear trailing link suspension, disc brakes all-round, five-speed gearbox and low-spec interior. 1972 – 914-6 dropped due to poor sales. 1973 – 2.0-litre engine becomes an option. 1974 – Bore increase raises displacement to 1795cc.

MÓDEL	MODEL YEAR	WEIGHT kg	ENGINE cc	HP	TORQUE (lb ft)	0-62	TOP SPEED (mph)
914 1.7	1970 to '73	970	1679	76	96	13	108
914 1.8	1974 to '76	970	1795	72	99	12	110
914 2.0	1973 to '76	970	1971	95	105	10.5	115
914/6	1970 to '72	940	1991	110	115	8.2	119

#### 924(1977 - 1988)

**924** Wheelbase (mm): 2400; Length/Width (mm): 4213/1676; Track front/rear (mm) 1418/1372; Significant developments: Four-cylinder engine, four-speed transaxle gearbox, front MacPherson struts and rear semi-trailing arm suspension, four-stud 5.5x14-inch steel wheels and floating callipers. VW/Audi three-speed auto assembly but with ratios specific to the 924; 1977: Getrag five-speed dog-leg gearbox optional. Rubbing strips added. Martini 924 SE launched; 1978: Bodyshell now hot-dipped zinc-coated. Oval tailpipe introduced; 1979: Separate air blowers improve ventilation; 1980: Five-speed Audi-derived gearbox introduced. Fuel tank capacity raised to 66-litres, second fuel pump fitted. Le Mans SE model offered; 1981: Carrera GT introduced. Kurzhals fuel pump introduced. 50th Jubilee SE model offered; 1982: Carrera GTS introduced. Limited-slip diff an option. Torque converter uprated on auto 'box. Ventilation system upgraded. 911 three-spoke steering wheel now standard; 1983: Turbo's spoiler becomes standard. Front anti-roll bar uprated to 21mm; **1984:** 924 gets 944 tilt-slide roof mechanism; 1985: 924 replaced by 924S; 1986: 924S arrives in UK. 2.5-litre engine shared with 944 (as are gearbox, brakes and suspension) but de-tuned; 1987: Rear axle strengthened; 1988: 924 gets 944 enaines. Power steerina standard. Le Mans SE launched.

crigines. rower.	engines. Tower steering standard, ee mans se ladirened.									
MODEL	MODEL	WEIGHT	ENGINE	Нр	TORQUE	0-62	TOP SPEED			
	YEAR	kg	CC		(lb ft)		(mph)			
924	1976 to '78	1080	1984	125	122	9.9	125			
924	1979 to '85	1130	1984	125	122	9.9	125			
924 Turbo	1979 to '81	1180	1984	170	181	7.8	140			
924 Turbo	1982 to '84	1180	1984	177	185	7.7	140			
Carrera GT	1981	1180	1984	210	203	6.9	150			
Carrera GTS	1982	1121	1984	245	247	6.2	155			
924S	1986 to '87	1190	2479	150	144	8.5	134			
924S	1988	1195	2479	160	158	8.2	137			

#### 928 (1978 – 1995)

928 Wheelbase (mm): 2500; Length/Width (mm): 4524/1835; Track front/rear (mm): 1551mm -1552/1530 -1529mm. Significant developments: 1978: 90° V8, five-speed, rear-wheel drive, independent A arms at front, trailing arms at rear, discs all-round, automatic available, luxury interior 1983: Regular 928 and 'S' models replaced with by 928 S2 model; 1987: S4 introduced with 5.0-litre V8 and 316hp; 1989: 928GT loses 44 kilos and gains 14hp. 0-60mph drops below 6.0 seconds; 1993: Final 928 GTS sees V8's capacity grow to 5.4-litres and 350hp.

MODEL	MODEL YEAR	WEIGHT kg	ENGINE	Нр	TORQUE (lb ft)	0-62 0-60*	TOP SPEED (mph)
928	1978 to '82	1490	4474	240	268	7.5*	142
928 S	1980 to '82	1530	4664	300	284	6.8	146
928 S2	1983 to '86	1589	4664	310	295	6.5*	155
928 S4	1987 to '92	1600	4957	316	317	6.0	165
928 GT	1989 to '91	1566	4957	330	317	5.6	165
928 GTS	1992 to '95	1600	5397	350	362	5.2	169

#### 944 (1983 – 1991)

944 Wheelbase (mm): 2400, Length/Width (mm): 4213/1735. Track front/rear (mm): 1472/1451; Significant developments: Body based on the 924 Turbo, as was suspension, but used 2497cc engine. Brakes from the 924 Carrera GT; 1985: New dash, power steering becomes standard. RHD models have left parking wipers. Transmission casing revised. Cast alloy lower wishbones and semi-trailing rear

# Beäulieu events

# **SIMPLY PORSCHE** SUNDAY 7 JUNE 2015



A great day out for all Porsche motoring enthusiasts!

# ALL PORSCHE MODELS WELCOME PEOPLE'S CHOICE AWARD

PORSCHE

Entry Includes all Beaulieu attractions: National Motor Museum Palace House & Gardens Beaulieu Abbey World of Top Gear



Call 01590 612888 | Trade 01590 614614 beaulieuevents.co.uk **[f**] 🎾

£1 handling charge on non-online purchases \*T&Cs apply, see website for details

Independent specialist for servicing, repair, improvement and restoration of all Porsches

T: 01865 331234 E: sales@autofarm.co.uk W: www.autofarm.co.uk







928: 1978 — 1995 Two-door, two+two Coupé, front-engined, water-cooled V8. Built to succeed the 911, 928 went head-to-head with Jaguar's XJS and Mercedes' SL. V8 engine offered stonking performance and grew to a mighty 5.4-litres and a heady 360hp before stepping aside to allow the 911 to continue its success story. Auto 'box most popular choice, although a manual is the one to go for, and both choices offer intergalactic cruising ability. Dynamically as sharp as any Porsche, the 928's popularity is not without foundation.



#### 944: 1983 - 1991

944: 1983 – 1991 Two-door, two+two Coupé and Convertible, front-engined, water-cooled. NA and turbocharged. The 944 was an unprecedented success, breaking all sales records and keeping Porsche afloat during the 1980s. The 924's body and turbo suspension formed the basis, but the 944 felt better. Turbo models offer good combination of performance and ability, although the last of the line 16-valve S2 models are probably the better option. If your budget doesn't stretch that far a good 2.7 will do. Cabriolet had sleek looks with Coupé's performance, though loss of rigidity takes shine off the driving experience. Considered to be the perfect introduction to Porsche ownership.



#### 959: 1988

YOY, 1900 Two-door, two+two Coupé, flat-six, twin-turbocharged water/air-cooled flat-six. 197mph, 4WD, supercar. Based (lightly) around the 911, the 959 was Porsche's homologation special for Group B rallying. A technical *tour de force* for its time, the 959 boasted all-wheel drive with active torque split-drive, selectable traction settings (dry, wet and snow conditions), electronically-adjustable ride height and damper control, water-cooled cylinder heads and multi-stage turbocharging, and a 911 evolved composite body providing 'zero-lift'. All 283 959s built cost Porsche more than double the price the customer was as asked to pay than double the price the customer was as asked to pay.



968: 1992 – 1995 Two-door, two+two Coupé and Cabriolet, front-engined, water-cooled. Porsche's last attempt at a front-engined Coupé resulted in its best effort to date. What the 944 derived 3.0-litre four-cylinder engine lacked in character, its chassis – especially in Club Sport spec – soon made up for. Regular car not as sharp as bare-to-the-bone Club Sport or semi-stripped Sport, but all offer one of the best front-engined/rear-drive experiences. Convertible lacks dynamics and looks a little frumpy, while limited edition Turbo S offer 911 levels of performance. Comparatively cheap to buy and run, 968 is one the safest Porsche ownership experiences.

arms standard; 1986: Turbo launched with 2.5-litre engine, gas-filled shocks, anti-roll bars and four-pot brakes. Power steering standard, redesigned interior; 1987: LSD revised, ABS, driver and passenger airbaas optional. 944 S 16-valve used aearbox and driveshafts from Turbo: 1988: Turbo SE offered with uprated engine, 7- and 9x16-inch alloys. 944's engine capacity increased to 2.7-litres with larger bore, new block. Celebration SE offered; 1989: 944 gets ABS as standard, discontinued at end of model year. Turbo gets Turbo S engine and new rear spoiler. S2 production begins in Jan 1989, Cab in July; 1990: S2 Cabrio launched (70kg heavier than Coupé); 1991: Turbo Cab launched, airbags standard on European Turbo models.

MODEL	MODEL YEAR	WEIGHT kg	ENGINE cc	Нр	TORQUE (lb ft)	0-62	TOP SPEED (mph)
944	1982 to '87	1180	2497	163	151	8.4	131
944	1988 to '89	1260	2681	165	166	8.4	136
944 S	1987 to '88	1280	2497	190	170	7.9	142
944 S2	1989 to '91	1310	2990	211	207	6.9	149
944 Turbo	1985 to '88	1350	2497	220	243	6.3	152
944 Turbo	1989 to '91	1350	2497	250	258	5.9	162
944 Turbo S	1988	1350	2497	250	258	5.7	162

#### 959 (1988)

959 - Wheelbase (mm): 2272 - Length/Width (mm): 4260/1840 - Significant developments: Aircooled six-cylinder engine, liquid-cooled heads, four-valves per cylinder, twin turbocharged. All-wheel drive, six-speed gearbox, active split-driver, double wishbone suspension front and rear with adjustable ride height. Aluminium and composite body panels, four shocks per 17-inch wheel, 322 and 308mm discs front/rear Adjustable ride height and dampers

MODEL	MODEL YEAR	WEIGHT kg	ENGINE cc	Нр	TORQUE (lb ft)	0-62	TOP SPEED (mph)	
959	1988	1451	2847	450	370	3.7	197	

#### 968 (1992 - 1995)

968 – Wheelbase (mm): 2400, Length/Width (mm): 4320/1735, Track front/rear (mm): 1477/1451 (1457/1445 with 17" wheels)- Significant developments: 3.0-litre four-cylinder S2-derived engine, S2 suspension, four-pot fixed callipers, ABS and 7- and 8x16-inch alloys; 1993: Lower spec and stripped down Club Sport launched with 7.5x17-inch alloys (front) and 9x17-inch (rear), no driver's airbag and all 'unnecessary' equipment (electric windows, sunroof etc) removed. Turbo S launched with 8-valve Turbo head and 305hp. Similar spec to CS; 1994: 968 Sport introduced with same chassis tweaks as Club Sport but with a number of creature comforts (and weight) reinstated. Standard 968 dropped from lineup, Sport and Club Sport continue for further 2 months

MODEL	MODEL YEAR	WEIGHT kg	ENGINE cc	Нр	TORQUE (lb ft)	0-62	TOP SPEED (mph)
968	1992 -1994	1370	2990	240	225	6.5	156
968 Sport	1994 -1995	1400	2990	240	225	6.5	156
968 Club Sport	1993 - 1995	1320	2990	240	225	6.3	160
968 Turbo S	1993 -1994	1300	2990	305	369	5.0	175

#### Boxster 986 (1997 – 2004); 987 (2005 – 2009; 2009 - 2013); 981 (2013 - )

**BOXSTER –** Wheelbase (mm): 2400. Lenath/Width (mm): 4133/1740 Track front/rear (mm): 1465/1528 ('96-'03), 1455/1514 (03-04) - Significant developments: Introduced in 1997 with 2.5 'boxer' engine, five-speed manual transmission, four-pot callipers front and rear, ABS, dual and side airbags; 1999: Boxster S launched with 3.2-litre version of boxer engine and six-speed gearbox. White dials, titanium-trimmed windows and twin-centre exit exhaust pipes and larger 17-inch alloy wheels only exterior change to distinguish 'S' from standard model. Entry-level Boxster's engine capacity raised from 2.5- to 2.7-litres. resulting in healthy power hike to 220hp. Both models available with five-speed Tiptronic gearbox; 2003: Boxster's first face-lift. Both 2.7 and 3.2S models gain extra 8hp, raising power to 228hp and 252 respectively. S's torque also up by 3lb ft. Front and rear bumpers are new, and the air intakes are improved for both aerodynamics and cooling. New retractable rear spoiler also fitted. Clear indicators, upgraded interiors (cup holders), sportier exhaust note and lighter alloy wheels help differentiate the new from the old.

MODEL	MODEL	WEIGHT	ENGINE	Нр	TORQUE	0-62	TOP SPEED
	YEAR	kg	CC		(lb ft)		(mph)
Boxster 2.5	1997 to '99	1260	2480	205	180	7.0	155
Boxster 2.7	1999 to '02	1260	2687	220	192	6.6	156
Boxster S	1999 to '02	1295	3197	252	225	5.9	161
Boxster 2.7	2003 to '04	1275	2687	228	192	6.4	157
Boxster S	2003 to '04	1295	3179	260	228	5.7	164

BOXSTER 987 (2005MY -) Wheelbase (mm): 2415, Length/Width (mm): 4315/1780. Track front/rear (mm): 1490/1534 (2.7), 1486/1528 (3.2S) - Significant developments: 2005: 2.7 and S launched with subtly revamped exterior and new interior. 2.7 gains 12hp over old model, while 3.2-litre ups power by 20hp. Torque is also increased in both cars. PCCB, PASM and Sport Chrono pack are optional extras, variable ratio steering rack standard; 2006: 2007 Model Year – VarioCam Plus engines from the Cayman and Cayman S replace existing engines; power up to 245hp and 295hp respectively, revised Tiptronic S software; 2009: 2009 Model Year – All-new flat-six engines: 255hp 2.9-litre is new entry model, 310hp 3.4-litre motor with direct-fuel injection for the S. Six-speed manual gearbox standard, seven-speed PDK optional. Limited-slip differential, touchscreen

sat-nav and Bluetooth phone are all optional extras. Both models get new front and rear bumpers. 2010: The lightest production Porsche money can buy goes on-sale in the form of the Boxster Spyder.



Founded in 1961, our mission is to enhance the Porsche-owning experience of our membership, now in excess of 12,000 enthusiasts. We do this by embracing all models of the margue, from the earliest 356 to the very latest supercar. Whether it's £600 or 600 hp, Porsche Club Great Britain is here for you. Patron: Dr Wolfgang Porsche

#### **Porsche Club GB benefits**

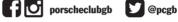
Porsche certificate of authenticity High quality monthly magazine Comprehensive events calendar Club insurance scheme Members' discounts

**Regions & Registers** Race Championship Valuation service Factory visits Trackdavs

#### Join us

We are proud to be the only officially Porsche AG recognised Porsche Club in the UK and we'd love to welcome you as a member. For a free, no obligation enquiry pack visit www.porscheclubgb.com or call Cornbury House on 01608 652911







endent Pors

HDX2 The world's first

multi-camera, full 1080p HD data logger





BOXSTER (986): 1997 - 2004; BOXSTER (987): 2005 – 2012

BOXSTER (987): 2005 – 2012 Two-door, mid-engined, six-cylinder convertible. The saviour of Porsche after the recession-hit '90s, the Boxster offered true entry-level Porsche ownership. 911-esque looks drew criticism from press (and 911 owners!), but sublime chassis and instant responses more than made up for this. Early straight-line performance worries of original cars now totally forgotten thanks to 2.7 and 3.2 S engines. Boxster S is now serious contender for the only Porsche you'll ever need. Superb chassis dynamics provides Boxster with serious point-to-point ability and rewards are purer for some than current 911s. Image not the strongest, but crucially Boxster stimulates all the right senses and is a real mini-911 with down-to-earth running costs. Eight years after the first car's launch a heavily revised Boxster arrived. Both the 2.7 and 3.2 S feature slightly improved straight-line performance and a new exterior, but the real step forward is in cabin quality, which now mimics the 997's for layout and quality. With the old Boxster still at the top of the roadster pack, Porsche needed to do little to the driving dynamics to keep the new model fresh. However, like it did with the 997, Porsche has achieved the impossible and made an almost perfect car even greater. S receives Cayman S's 3.4 engine, 2.7 gets 5hp boost. 2010 saw the introduction of the lightest Porsche road car:

perfect car even greater. S receives Cayman S's 3.4 engine, 2.7 gets 5hp boost. 2010 saw the introduction of the lightest Porsche road car: the Boxster Spyder. Weighing 80kg less than the Boxster S on which it is based it's been on a extreme diet. The electronic hood is replaced by a canvas rain cover saving 21kg. The doors and front luggage lid are aluminium and the interior has been comprehensively stripped with no radio, air-con, cup holders, door pulls and door bins. Even the wheels are lighter. The Boxster was already a dynamic masterpiece, but the Spyder takes things to the next level. Replacing the original Boxster was never going to be an easy task, but in the 981 it appears Porsche managed to do just that.



#### BOXSTER 981: 2012 -

BOXSTER 981: 2012 — Two-door, two-seat, mid-engined roadster. 2.7 or 3.4-litre water-cooled flat-six, rear-wheel drive, six-speed manual gearbox fitted as standard, seven—speed PDK double-clutch gearbox available as an option. How do you improve on perfection? In the Boxster's case we're not sure how but we're sure glad they had a go. What, on paper at least, looks like a collection of individual improvements and upgrades amount to a finished product that is one of Porsche's very best road cars. The Boxster has always been inherently right and in the 981 Porsche improved on its mid-engined dynamics further

981 Porsche improved on its mid-engined dynamics further still allowing you to maximise the performance on offer from either of its flat-six engines. That it also looks more honed and aggressive, has a far greater quality interior and now comes equipped as standard with those little bits of kit that should have always been so, makes for one of the best sports car packages you can buy.

The 2.7 needs entrusias been so, makes for one of the best sports car packages you can buy. The 2.7 needs enthusiasm to extract the most from it and if it was our money we'd go for a 3.4S straight-out-the-box with only a slippy diff the essential extra to take full advantage of the car's sublime chassis.

Electric folding roof is replaced with a Lotus Elise style canvas rag, there's a new engine cover, aluminium doors and front luggage compartment lid and the radio, sat-nav and air-con have all been ditched. The standard seats are hip hugging sport bucket items and the doorcards and door pulls are inspired by the 911 GT3 RS. There is even a set of lighter alloy wheels and the ECU map from the Cayman S to extract a further 10hp from the 3.4-litre motor. Six-speed manual is standard, PDK optional with Sport Chrono Plus and Launch Control Porsche claim a 4.8-second 0-62mph time.

MODEL	MODEL YEAR	WEIGHT kg	ENGINE cc	Нр	TORQUE (lb ft)	0-62 0-60*	TOP SPEED (mph)
Boxster 2.7	2005 to '07	1295	2687	240	200	6.2	160
Boxster 3.2S	2005 to '07	1345	3179	280	237	5.5	168
Boxster 2.7	2007 to '09	1295	2687	245	201	6.1	160
Boxster 3.4S	2007 to '09	1345	3386	295	251	5.4	169
Boxster 2.9	2009 to '12	1335	2893	255	214	5.9	163
Boxster 3.4S	2009 to '12	1355	3436	310	265	5.3	170
Boxster Spyder	2010 to '12	1275	3436	320	273	5.1	166

BOXSTER 981 (2012MY -) Wheelbase (mm): 2475, Length/Width (mm): 4374/1801. Track front/rear (mm): 1526/1536 (2.7), 1526/1540 (3.4S) - Significant developments: 2012: Just like the 911 the Boxster came in for a major overhaul in 2012, its first since the original was launched in 1996. A longer wheelbase, lighter, wider track and cleaner, more efficient engines the Boxster had grown into a true thoroughbred. The range now started with a 265hp 2.7-litre engined Boxster, fitted with a six-speed manual as standard or available with the optional seven-speed PDK (which adds 30kg to the kerbweight). The Boxster came with the same transmission options but was powered by a 315hp 3.4litre engine. PASM is optional on both models, so too are dynamic engine mounts and Porsche Torque Vectoring which also includes a mechanical locking differential. Electromechanical power steering is standard. Wheels sizes range from 18 through to 20s, and the brakes are more powerful, the S borrowing its discs and callipers from the 991 Carrera. An electric parking brake is now standard, PCB still optional. The 981 wears a completely new body and new roof and the interior takes its styling cues from the 991

MODEL	MODEL YEAR	WEIGHT kg	ENGINE cc	Нр	TORQUE (lb ft)	0-62	TOP SPEED (mph)
Boxster 2.7	2012 -	1310	2706	265	206	5.8	164
Boxster 3.4S	2012 -	1320	3436	315	265	5.1	173

#### Cayman 987 (2005 – 2009; 2009 – 2013), 981 (2013 -

Cayman S – Wheelbase (mm): 2415, Length/Width (mm): 4315/1801, Track front/rear (mm): 1490/1534 (Cayman), 1486/1528 (Cayman S); 2006 - 3.4-litre water-cooled flat-six is enlarged Boxster S engine with 997 Carrera 2 internals producing 15hp and 14lb ft of torque over the midengined roadster. Six-speed manual gearbox is standard with first and second ratios shorter than those found in the Boxster S. Tiptronic S optional, variable rate steering also carried over from Boxster and Carrera models. Boxster'S brakes standard fitment, but PCCB optional as is Porsche Active Suspension Management (PASM) and Sports Chrono pack. Body is 100 per cent stiffer than Boxster S, and is as stiff as a 997 Carrera 2 Coupé, Porsche Stability Management (PSM) comes as standard; 2006: 2007 Model Year – Entry-level Porsche coupé receives 2.7-litre flat-six engine fitted with VarioCam Plus technology. Five-speed manual gearbox standard, six-speed manual and five-speed Tiptronic S available as option. Steel springs and gas dampers standard, PASM optional; 2009: 2009 Model Year – All-new flat-six engines with 265hp 2.9 replacing 2.7 engine, with a new 320hp 3.4-litre motor for the S, which also comes with direct-fuel injection as standard. Six-speed manual gearbox standard with seven-speed double clutch PDK an option. Optional limited-slip differential turns it into a genuine 911 alternative. Mild redesign includes new bumpers and head and tail-lamps. PCM3 is available with touchscreen sat-nav and Bluetooth phone capability. 2011: 2011 Model Year - Cayman R introduced; lighter more powerful version of Cayman S with 330hp and 1295kg kerb weight. Aluminium doors and front bonnet, 19-inch wheels and an Alcantara sport interior. First R model in 43 years. Series production car.

MODEL	MODEL YEAR	WEIGHT (kg)	ENGINE (cc)	BHP	TORQUE (lb ft)	0-62	MAX MPH
Cayman S	2005 – '09	1340	3386	295	251	5.4	171
Cayman 2.7	2007 – '09	1300	2687	245	201	6.1	162
Cayman 2.9	2009 - '12	1330	2893	265	221	5.8	164
Cayman S	2009 - '12	1350	3436	320	273	4.9	171
Cayman R	2011 –'12	1295	3436	330	273	5.0*	175

#### \*manufacturer's claim

Cayman 981 – Wheelbase (mm): 2475, Length/Width (mm): 4380/1801, Track front/rear (mm): 1526/1536 (Cayman), 1526/1540 (Cayman S); 2013 – 275hp, 2.7-litre and 325hp 3.4-litre DFI flat-six engines. Six-speed manual gearbox standard, seven-speed PDK optional (adds 30kg). New, lighter body and longer wheelbase; electromechanical power steering standard. PASM, Porsche Torque Vectoring and mechanical locking diff all optional as is the Sport Chrono pack and launch control and a sports exhaust. 18-20-inch wheels available, brakes carried over from the Boxster, including 991 Carrera stoppers for the Cayman S, PCCB optional. New interior as per 981 Boxster making the Cayman a serious alternative to a 911. As with all modern Porsches it is very spec sensitive and in our experience less always amounts to more. 2014: Cayman GTS arrives and finally moves the Cayman story on. 3.6-litre flat-six produces 340hp with 280lb ft torque. The heaviest Cayman to date (1345) is offset by the additional power, the package has been tailored to provide the best possible driving experience. PASM and Sport Chrono with Dynamic Engine Mounts come as standard. Standard GTS alloy wheels are 8 (front) and 9.5 (rear) x20-inch Carrera S rims. A no cost option is Sports suspension lowering the car by -20mm. The one to have. 2015: The Cayman we'd all been waiting for. 991 Carrera S 3.8-litre flat six, GT3 aluminium suspension and chassis parts, PTV, PSM fitted as standard. Only available with a sixspeed manual gearbox, shade lighter than the GTS (1340kg) but the rest of the figures don't do it justice. The 385hp figure is conservative, it feels quicker, 310lb ft toque equate to a 0-62 time 0.2seconds quicker than the GTS. Six-piston calipers (front), four-piston calipers (rear), ventilated discs or



# www.specialistcarsltd.co.uk



FINLAY GORHAM



Viewing by appointment only | Mobile: 07831 444100 Telephone: 01284 827427 | www.finlaygorham.com



#### pure data



CAYMAN 987: 2005 - 2013 weight distribution and mid-engined dynamic stability make the Cayman one of the finest drivers' cars ever made. This is something Porsche is acutely aware of, hence the model is not available with a limited-slip differential and, until further notice, we will only see smaller-engined variants of the Cayman to avoid any deflection for the company's headline sports car

adline sports car. At the end of 2010 Porsche announced the Cayman R at the LA Auto Show. Following a similar development programme as the Boxster Spyder, the Cayman R is a lighter, more powerful version of the Cayman S. Power is up 10hp to 330hp, and the kerb weight drops 55kg to 1295kg. Aluminium for the bonnet and doors and a stripped interior and a smaller fuel tank are all contributing



CAYMAN 981: 2013 Two-door, mid-engined, six-cylinder coupé. Like its Boxster sibling the Cayman underwent a thorough overhaul in 2012, which must have been a thankless task for the engineers as the outgoing 987 was deemed one of the best sports cars money could buy.

The oblight get was deened one of the best sports cars money could buy. Once again, though, Porsche's engineers came up trumps and produced a truly sensational car. Still sharing much with the Boxster – wheelbase, engines, gearbox, suspension and steering – the Cayman was finally let of its leash and allowed to show us just what it is capable of. Alert, precise, involving and dynamically astute, the 981 Cayman is one of the purest drivers cars and greatest sports cars to have come out of Stuttgart. It really is that good. The 2.7-litre car needs working hard to maximise its performance, but the 3.4S is honey sweet providing the perfect blend of performance with precision to make it one of the quickest cross-country cars you can buy. The manual is still the slick six-speed car carried over from the 987 and is still the default option. Even the electric power steering doesn't seem to effect the Cayman like it does the Boxster and Carrera models. Porsche perfection? Possibly.



CAYENNE: 2014 — Five-door, front-engined SUV. The changes are subtle for this, the fourth generation Cayenne ahead of the arrival of a completely new model expected in 2017. Five models were made available at launch, very much continuing where the previous version left off: S, Turbo, Diesel, Diesel S, and S E-Hybrid. They now have more power and torque, lower fuel consumption, sharper and cleaner exterior design and increased levels of interior comfort. Visual changes primarily comprise a longer aluminium bonnet, shapelier headlights (now incorporating the daytime running lights in a similar fashion to the Macan) and revised rear styling to match. Adaptive cooling vanes hidden in the front bumpers of the

#### optional PCCR A cut price GT3 and finally a Cayman to give the 911 a run for its money

							/-
MODEL	MODEL YEAR	WEIGHT (kg)	ENGINE (cc)	BHP	TORQUE (lb ft)	0-62*	MAX MPH
Cayman 2.7	2013 -	1310	2706	275	213	5.7	165
Cayman 3.4S	2013 -	1320	3436	325	272	5.0	175
Cayman GTS	2014 -	1345	3636	340	280	4.6	177
Cayman GT4	2015- 1	340	3800	385	310	4.4	183
de 6 - 1 - 1							

\*manufacturer's claim

#### Cayenne (2003 - 2007; 2007 - 2010; 2010-)

Cayenne – Wheelbase (mm): 2855, length/width (mm): 4782 (4786 Turbo)/1928, track front/rear (mm): 1655 - 1641/1670 - 1656 (17-20-inch wheels); Introduced in 2003 with choice of normallyaspirated or twin-turbocharged 4.5-litre V8. Six-speed manual gearbox for five- and six-speed Tiptronic S for Turbo (optional on S). Porsche Active Suspension Management (PASM), adjustable ride height, electronic damper control, differential locks, six-pot callipers, 18-inch alloys standard, 19and 20-inch optional. Porsche Traction Management, PSM, ABS, ABD and ASR all standard; 2004: Entrylevel Cayenne is the first Porsche to sport V6 power. 24-valve engine produces 250hp and 228lb ft, transmitted through a six-speed manual transmission. Steel springs standard, PASM and air suspension optional. V6 is also fitted with smaller brakes; 2006: 2006 Model Year - Cayenne Turbo S gains an extra 72hp, 0-62mph in 5.2 seconds, 167mph and 2355 kilos; 2007: 2007 Model Year - Second generation Cayenne: V6, V8 S and Turbo all get direct fuel injection engines to improve performance, economy and emissions, while face-lift improves the looks. Porsche Dynamic Chassis Control active anti-roll bars available on cars with PASM; 2007: 2008 Model Year - GTS model introduced. Combines Turbo looks with V8 S running gear. Shorter ratios in both manual and Tiptronic gearbox fitted. Turbo brakes standard. New Turbo S model announced. Power up to 550hp, torque to 553lb ft, 174mph and a 0-60mph in 4.3 seconds; 2009: 2009 Model Year – Porsche does the dirty and introduces a Cayenne diesel. Three-litre Audi sourced V6 is available in entry-level trim only but comes with six-speed Tiptronic S as standard. 100-litre fuel tank capacity provides over 600 mile range and 30mpg. 2010 Cavenne -Wheelbase (mm): 2895, length/width (mm): 4846/1939, track front/rear: 1655 (1643 Turbo)/1669 (1657 Turbo); Introduced in 2010 this is the first all-new Cayenne since the original. Bigger in every dimension the new Cayenne's design does an amazing job of disguising the car's larger dimensions and its natural bulk. Engine range is carried over from the previous model but now includes Porsche's very first Hybrid powered vehicle with the Hybrid Drive model which sees a 3.0 supercharged V6 working in parallel with a 47hp electric motor. All but the entry level Cayenne V6 petrol are equipped with a new eight-speed Tiptronic automatic gearbox (the V6 gets a six-speed manual as standard). Porsche has also done away with the original Cayenne's heavy duty four-wheel drive system, replacing the low ratio gearbox with the latest development of Porsche Traction Management with the enhanced electronics of the new Tiptronic S transmission. Diesel and Hybrid models get permanent all-wheel drive, while the others get an active system. PASM, PDCC and PCCB are all optional extra. All Cayenne's also get a new interior based on the design first seen in the Panamera and provides a higher level of quality and refinement that was missing in the outgoing model. 2012: The line-up grows with the introduction of the GTS. Fitted with the same 4.8-litre V8 as the Cayenne S, the GTS engine receives a host of modifications and upgrade that push power to 420hp and torque to 380lb (up 20hp and 11lb ft respectively). Eightspeed Tiptronic S is the only gearbox fitted and the chassis combines steel springs with PASM. Air suspension is an option. The GTS rides 24mm lower than an S, has a wider front and rear track and 20inch wheels are standard. Front bumper and lights are from the Cayenne Turbo, there is a new lower lip spoiler, side skirts and a bi-plane rear wing. The windows are framed with a black gloss trim. Leather and Alcantara trims the interior. 2013: Two new Cayenne's for the 2013 model year: the S Diesel and the Turbo S. The latter is a bell-and whistles Turbo with the boost wound up and the power increased 50hp to 550hp. Two-tone leather options are standard as is a host of standard equipment that is optional on the Turbo. The S Diesel takes a twin-turbo charged 4.8-litre Audi V8 diesel and creates the best Cayenne we've sampled. The spec is the same as the petrol engined S, but with enough torque to tear-up the book of toraue cliches

MODEL	MODEL YEAR	WEIGHT (kg)	ENGINE (cc)	BHP	TORQUE (lb ft)	0-62/60*	MAX MPH
Cayenne S	2003 to '06	2245	4511	340	310	7.2	150
Cayenne Turbo	2003 to '06	2355	4511	450	457	5.6	165
Cayenne	2004 to '06	2160	3189	250	228	9.1	133
Cayenne Turbo S	2006 to '07	2355	4511	521	531	5.2	167
Cayenne	2007 to '10	2160	3598	290	283	8.1	141
Cayenne S	2007 to '10	2225	4806	385	369	6.5*	156
Cayenne Turbo	2007 to '10	2355	4806	500	516	5.0*	171
Cayenne GTS	2007 to '10	2225	4806	405	369	6.1	157
Cayenne Turbo S	2008 to '10	2355	4806	550	553	4.0	174
Cayenne Diesel	2009 to '10	2240	2967	240	405	8.3	133
Cayenne	2010 -	1995	3598	300	295	7.5	143
Cayenne Diesel	2010 -	2100	2967	240	405	7.8	135
Cayenne S	2010 -	2065	4806	400	369	5.9	160
Cayenne S Hybrid	2010 -	2240	2995	380 <sup>1</sup>	427 <sup>1</sup>	6.5	150
Cayenne Turbo	2010 -	2170	4806	500	516	4.7	172
Cayenne GTS	2012 -	2085	4806	420	379	5.7	162
Cayenne Turbo S	2013 -	2215	4806	550	553	4.5	175
Cayenne S Diesel	2013 -	2195	4134	382	627	5.7	156
1 when combined with electric motor	, 333bhp and 324lb ft witho	ut. * 0-60 mph time					

#### Porsche Carrera GT (2003 – 2006)

Carrera GT – Wheelbase (mm): 2730, Length/Width (mm): 4613/1921, Track front/rear (mm): 1612/1587 Significant developments: All alloy, 40-valve V10 with titanium conrods, nickel/silicone liners, dry sump lubrication and VarioCam, revving to 8400rpm. Rear-wheel drive with six-speed manual gearbox. Carbon fibre monocoque with steel crash structures and carbon fibre bodywork. Double wishbone pushrod axles from and rear, 19-inch magnesium alloy wheels, 380mm ceramic composite



SCSPORSCHE E

The only independent purely Porsche specialist in Devon. Purpose built Porsche dedicated workshop with Porsche trained technicians for all your Porsche needs.

T: 01404 549921 M: 07762 244477/07770 933054 E: scsporsche@btconnect.com www.scsporsche.co.uk



#### pure data

new Cayenne are akin to those used on the 918 Spyder, as is the rollerball-style steering wheel, much like Macan. The biggest news is that the old petrol V8 has been replaced with a 3.6-litre bi-turbo petrol engine – part of Porsche's downsizing practices. It's the same unit we've seen in the Macan, and with 420hp and 550Nm torque on paper the new Cayenne offers greater performance than its eight-cylinder forebear. But, if you're talking about a petrol Cayenne then it's really all about the Turbo. In the Turbo we get the 4.8-litre bi-turbo V8 engine putting out 520hp with 750Nm of torque; it's fast and capable. The Diesel and Diesel S should be the best-selling Cayenne models for Porsche in the UK. The Diesel model makes use of the three-litre V6 coupled to the eight-speed Tiptronic. We expect that this will be the more popular choice in the UK, but the Diesel S really is brilliant and worthy of serious consideration despite being an older engine (the only engine which is not Euro 6 compliant) and commanding an £11,572 price premium over the £49,902 for the Cayenne Diesel. The power delivery is refined and

for the Cayenne Diesel. The power delivery is refined and almost like a petrol car, arriving low down. What's interesting is that the Diesel S is almost as quick as the Turbo, over

is that the Diesel S is almost as quick as the Turbo, over £30,000 cheaper, and it's more economical. The first plug-in Hybrid vehicle in the premium SUV segment, the S E-Hybrid uses the same drivetrain as the Panamera S E-Hybrid, although there are differences – chiefly the batteries. Driving requires an altogether new mindset. At £61,434 it's almost exactly the same price as the Diesel S – choosing between them is a question of priorities.



CARRERA GT: 2003 – 2006 Two-door, mid-engined, V10 Roadster. Still born Le Mans racer evolves into the greatest supercar every built. Carbon-fibre tub, 612hp V10, 205mph maximum and a birch wood gear knob. Perfection!



PANAMERA: 2009 – 2013
Five-door, front-engined, rear-and four-wheel drive saloon-coupé; normally aspirate, turbocharged and supercharged V6 and V8 petrol, diesel and hybrid engines, six-speed manual and seven-speed PDK transmission. The last new Porsche to be launched while Dr. Wendelin Weideking was running the company, the Panamera is Porsche's fourth model line and, according to the company, a car that creates a new class. Powered by either a normally aspirated 4.8-litre V8 or a twinturbo charged version of the same engine, Panamera is available in rear-wheel drive 'S' guise with a six-speed manual gearbox, or an all-wheel drive 4S or Turbo (both only available with the 7-speed PDK gearbox, which is also an option for the S).
3.6-litre V6 engine added to the line-up in 2010 with rear and four-wheel drive options. Rear-drive model gets six-speed manual as standard, Panamera 4 the seven-speed PDK and PASM suspension. V6 offer all the luxury and confort of the V8 models. Only a four-sche has been omitted in terms of luxury or convenience that has been omitted in the specification or options list.
Banamera range is extended further with the cracking diesel model in 2011, along with the S Hybrid and slightly bonkers Turbo S. The former two are rear-wheel drive only

discs front and rear with six-pot callipers. Built at Leipzig plant in Berlin, in left-hand drive only, over 1260 examples were built between November 2003 and May 2006.

MODEL					TORQUE (lb ft)	0-62	MAX MPH
Carrera GT	2003 to '06	1380	5733	612	435	3.9	205

#### Panamera: 2009 – 2013: 2014 – To Date

Panamera S, 4S, Turbo – Wheelbase (mm): 2920, Length/Width/Height (mm): 4970/1931/1418, Track front/rear (mm): 1658/1662 (1656/1646 Turbo); 2009 - 2010MY 400hp 4.8-litre water-cooled eight-cylinder engine or 500hp 4.8-litre water-cooled twin-turbocharged eight-cylinder engine, both engines feature Direct Fuel Injection (DFI) and VarioCam Plus one-sided variable camshaft management with adjustable valve lift, both engines meet EuroV emissions; six-speed manual gearbox and rear-wheel drive for S model, seven-speed PDK optional; 4S and Turbo models feature electronically controlled fourwheel drive transmission with Porsche Traction Management and PDK fitted as standard along with Auto Stop-Start. Engines are adapted from Cayenne SUV, but PDK transmission is unique to Panamera and differs from the unit in the company's sports cars. Double-wishbone front suspension, multi-link at the rear with Porsche Active Suspension Management (PASM) standard on all models, self-levelling adaptive air-suspension standard on Turbo. Porsche Stability Management comes as standard featuring: ABS brakes; ASR anti-slip control; MSR engine drag force control; ABD automatic brake differential; Brake Assistant; and a pre-filling of the brake system. Porsche Dynamic Chassis Control (PDCC) and Porsche Ceramic Composite Brakes (PCCB) optional on all models. 18-inch wheels standard on S and 4S, 19inch on Turbo; Variable rate steering standard, speed sensitive Servotronic steering optional. All models feature adaptive aerodynamics, with the S and 4S models utilising a two-way spoiler and the Turbo a four-way item. 4S and Turbo get 100-litre fuel tanks, the S has a 80-litre tank. Four individual seats for interior. Eight airbags fitted as standard; bi-xenon headlights standard across the range, adaptive light function for Turbo. Radar-based distance cruise control, four-zone air-conditioning, Porsche Entry & Drive (standard on Turbo) and Burmester High-End Sound system all feature on the options list. Sports Chrono Package Plus also optional and when combined with PDK offers Launch Control function. 2010 - 2010MY The first non-V8 engined Panamera arrives in the form of the 3.6-litre V6 petrol model. Panamera V6 , is available a rear or four-wheel drive, the former available with either a six-speed manual or optional seven-speed PDK, the later is PDK only. Engine produced 300hp and 295 lb ft of torque. Standard specification is the same as a V8 engined S model, except for a tyre pressure monitoring system and a PASM suspension, which are optional. 2011 – 2012MY The Panamera many were waiting for (well, in Europe at least) arrived in time for the 2012 model year in the shape of the Panamera Diesel. The 3.0-litre V6 turbocharged engine is donated by Audi and produces 250hp and 405lb ft of torque through an eight-speed Tiptronic S gearbox and with drive only to the rear wheels. The specification is on par with a V6 petrol engined Panamera with steel springs and gas dampers standard, PASM and air both optional. An 80 litre fuel tank is standard, providing a 745-mile range, the optional 100-litre tank providing 894-miles before refills. Along with the Diesel Porsche also added another fuel miser to the Panamera range in the guise of the S Hybrid. Following the path of the Cayenne S Hybrid, it's fitted with a 3.0-litre supercharged petrol V6 engine that produces 333hp and 324lb ft of torque, this is then connected to a 47hp, 221lb ft electric motor. Energy for the electric motor is storied in batteries fitted under the boot floor and these are charged via the engine and regenerative sources such as braking. Drive is to the rear-wheels only and via the eight-speed Tiptronic S gearbox. Standard spec is someway between an S and a Turbo model with both PASM and air-suspension both standard equipment; 19-inch wheels are standard. Full electric range is 1.2-miles and the electric motors have a 46mph maximum speed. The anecdote to Porsche two fuel sipping, CO2 friendly Panameras came in the form of the Turbo S – a Panamera Turbo would up to 11. The pair of turbo-chargers get lighter vanes made from a mix of titanium and aluminium allowing for a 30 percent reduction in spoolup time and the ECU has been remapped. Peak power climbs 50hp to 550hp and torque to 553lb ft in standard trim, or 590lb ft in Sport Plus mode via the standard Sport Chrono Package. 20 inch wheels are standard and the front and rear wheels are half and one inch wider. PDCC (Porsche Dynamic Chassis Control) and PTV+ (Porsche Torque Vectoring plus) are standard as is a electronic locking differential. Side skirts and a painted rear spoiler are standard and Agate grey exterior paint is exclusive to the model. Inside 14-way adjustable seats are standard. 2012 – 2012MY Take a Panamera 4S, fit a Porsche Exclusive bodykit and allow the engineers time with its 4.8-litre V8 on a dyno and you get the GTS. Active air intakes, reprofiled camshafts and a revised ECU extract a further 30hp from the benteight and an additional 15lb ft of torque. Turbo brakes are standard, as is air suspension and PASM which is reprogrammed to be tauter. Porsche Sport Chrono Plus is also standard as is the Turbo's fourpiece rear spoiler and the 19-inch alloy wheels. The chassis is 10mm lower and there 5mm spacers fitted to the rear axle. 18-way adjustable front seats and a sports steering with paddles are also standard. Four-wheel drive is the only configuration along with the seven-speed PDK.

MODEL YEAR	WEIGHT (kg)	ENGINE (cc	) BHP	TORQUE (lb ft)	0-62	MAX MPH
2010 - 2013	1730	3605	300	295	6.8	162
2010 - 2013	1820	3605	300	295	6.1	159
2009 - 2013	1770	4806	400	369	5.0	175
2009 - 2013	1860	4806	400	369	4.4	175
2009 - 2013	1970	4806	500	516*	3.5**	188
2011 - 2013	1880	2967	250	405	6.8	150
2012 - 2013	1920	4806	430	383	4.5	178
2012 – 2013	1980	2995	380	427	6.0	167
2012 - 2013	1995	4806	550	553	3.8	190
	2010 - 2013 2010 - 2013 2009 - 2013 2009 - 2013 2009 - 2013 2010 - 2013 2012 - 2013 2012 - 2013	2010 - 2013         1730           2010 - 2013         1820           2009 - 2013         1770           2009 - 2013         1860           2009 - 2013         1970           2011 - 2013         1880           2012 - 2013         1920           2012 - 2013         1980	2010 - 2013         1730         3605           2010 - 2013         1820         3605           2009 - 2013         1770         4806           2009 - 2013         1860         4806           2009 - 2013         1970         4806           2009 - 2013         1970         4806           2011 - 2013         1880         2967           2012 - 2013         1920         4806           2012 - 2013         1920         2995	2010 - 2013         1730         3605         300           2010 - 2013         1820         3605         300           2009 - 2013         1770         4806         400           2009 - 2013         1860         4806         400           2009 - 2013         1860         4806         500           2010 - 2013         1970         4806         500           2011 - 2013         1880         2967         250           2012 - 2013         1920         4806         430           2012 - 2013         1980         2995         380	2010 - 2013         1730         3605         300         295           2010 - 2013         1820         3605         300         295           2009 - 2013         1770         4806         400         369           2009 - 2013         1770         4806         400         369           2009 - 2013         1860         4806         400         369           2009 - 2013         1970         4806         500         516*           2011 - 2013         1880         2967         250         405           2012 - 2013         1920         4806         430         383           2012 - 2013         1980         2995         380         427	2010 - 2013         1730         3605         300         295         6.8           2010 - 2013         1820         3605         300         295         6.1           2009 - 2013         1770         4806         400         369         5.0           2009 - 2013         1770         4806         400         369         4.4           2009 - 2013         1970         4806         500         516*         3.5**           2011 - 2013         1880         2967         250         405         6.8           2012 - 2013         1920         4806         430         383         4.5           2012 - 2013         1980         2995         380         427         6.0

\* 567lb ft when in Sport Plus Mode when Sport Chrono Package Plus fitted. \*\* 0-60mph time 2013-2014MY The gen-2 Panamera gets a new front and rear bumper, new lights and side sills and a range of new engines. The interior is untouched. Out goes the 4.8-litre normally aspirated V8 for the S and 4S models and in comes a 3.0-litre biturbo V6 that's more powerful than the V8 it repalces. The big V8 stays for the GTS and the Turbo, and the 3.6-litre petrol V6 stil lprops up the range along with the 3.0-litre turbo diesel. The big change is to the hybrid model. Now called the S E-Hybrid, it mates the 3.0litre supercharged V6 with an electric motor that's twice as powerful and battery pack that can store five times the energy. And if that's not enough, the E-HYbrid is also a plug-in hyrbid which means you can





0121 5595 093

GUILDFORD 01483 533 584

May 2015 153

www.tyrecity.co.uk

01562 829 753

#### pure data

and come with the conventional eight-speed Tiptronic S gearbox. In early 2012 the range is topped off with the GTS a breathed on Panamera 4S with more power, a Turbo look and sport inspired interior. It's no GT3 but it's a great way to hustle nearly two tons.



**918 SPYDER: 2014** – Two-door, mid-engined, petrol-electic plug-in hybrid. The supercar has evolved into the hypercar, one that combines the thoroughbred engine from an LMP2 race car with the pioneering engineering of electric motors and lightweight(ish) batteries. The 918 signals the beginning of a new dawn for Porsche, one that provides the company with a halo product on which to hang its Cayenne, Panamera, Macan and, potentially 911 hybrids from. To help the 918 along the way its launch coincides with Porsche's return to top flight sports car racing, including Le Mans, with an all-new LMP1 race car. A petrol-electric hybrid race car. The 918 has a lot to deliver, but on the eve of its launch it made an impressive debut with a sensational 6 minute 57 second lap of the Nürburgring Nordschleife.

# allor

#### MACAN 2014

<text><text><text><text><text>

charge the car while you're at work, asleep or being dragged around the shops. Other mechanical changes include the dropping of the six-speed manual - it's PDK for all the models bar the Diesel and S E-hvbrid, which aet the Cavenne's eight-speed Tiptronic.

=,=							
MODEL	MODEL YEAR	WEIGHT (kg)	ENGINE (cc)	BHP	TORQUE (lb ft)	0-62	MAX MPH
Panamera Diesel	2013 -	1880	2967	250	405	6.8	151
Panamera	2013 -	1770	3605	310	295	6.3	160
Panamera 4	2013 -	1820	3605	300	295	6.1	159
Panamera S	2013 -	1810	2997	420	383	5.1	178
Panamera 4S	2013 -	1870	2997	420	383	4.8	177
Panamera S E-Hybric	1 2013 -	2095	2995	416	435	5.5	167
Panamera GTS	2013 -	1925	4806	440	383	4.4	178
Panamera Turbo	2013 -	1970	4806	520	516	4.1	189
Panamera Turbo S	2013 -	1995	4806	570	553	3.8	192

#### 918 Spyder (2014 -)

918 Spyder – Wheelbase (mm): 2730, Length/Width (mm): 4643/1940, Track front/rear (mm): 1664/1612 Significant developments: 2013 – 2014MY Where to start with the most technologically advanced car Porsche has ever made? The engine is a 4.6-litre V8 that traces its routes back to the 2007 LMP2 RS Spyder race car, this alone develops 608hp and runs through a seven-speed PDK gearbox with drive to the rear axle. Then there is a 286hp electric motor fitted to the front axle complete with its own transmission. The 918 can be driven by the petrol engine, the electric motor or a combinaith of the two, which results in a maximum power output of 887hp and 944lb ft of torque (the V8 produces 676lb ft on its own). The V8 screams to 9150rpm and produces 132hp/litre. There are five driving modes: E-Power, Hybrid, Sport-Hybrid, Race-Hybrid and Hot Lap, each mode determines which power source is required. The chassis is a carbon-fibre monocoque with the body made from the same material and includea a two-piece Targa roof. PCCB brakes are standard, there are 20-inch wheels at the front, 21s at the rear with Michelin Pilot Sport Cup 2 tyres. Avaiable in two trim levels, Spyder and Weissach Package, the latter reduces the car's weight by 41kgs - the magnesium wheels account for a 14 kilo saving. Other weight saving measures include ceramic wheels bearings, titanium chassis bolts and brake pad supporting plates. Other upgrades include additional aero parts includeing aeroblades positioned behind the rear wheels, thinner paint and exposed carbon-fibre body parts. All this tech, lightweight construction and 887hp results in a very quick Porsche indeed: 0-62mph on 2.6 seconds, 0-124mph in 7.3 (7.2 if you order the Weissach pack), 0-186mph in 20.9 (19.9 with the full Weissach) and a maximum speed of 214mph. Then there is that lap time of the Nürburgring - 6 minutes 57 seconds.

MODEL	MODEL YEAR	WEIGHT (kg)	ENGINE (cc	) BHP	TORQUE (lb ft)	0-62	MAX MPH
918 Spyder	2014	1674	4593	608/286	676/944	2.6	214
918 Spyder Weissa	ch 2014	1634	4593	608/286	676/944	2.6	214

#### Macan (2014 –)

Macan – Wheelbase (mm): 2807; Length/Width (mm): 4681 (Turbo 4699mm)/1923; Track front/rear (mm): 1655/1651; Weight: 1865kg (S), 1880kg (S Diesel), 1925kg (Turbo) Significant developments: 2013 - 2014MY Built at Leipzig, Two petrol V6 engines are donated by the VW Group, as is the 4-cylinder, turbocharged petrol engine, so to is the V6 diesel although we've seen this before as it's the same unit that is used in the Cayenne. Macan S gets 340hp three-litre bitutbo V6, 157mph top speed and 5.4-seconds 0-62mph time; Turbo is equipped with 400hp, 3.6-litre biturbo V6, reaches 165mph and cracks 0-62mph in 4.8 seconds. S Diesel fitted with 3.0-litre single turbo V6 diesel engine reaches a 142mph maximum and 0-62mph in 6.3 seconds. All Macans feature the latest PTM four wheel drive running gear, and the drivetrain is essentially rear-wheel drive, sending the required torque load to the front axle when it's required, which is similar to how the 991 Carrera 4's PTM system works. PDK transmission is standard across the range – there is no manual option – and an 'Off-road mode' can be selcted from the cockpit at speeds of up to 80kmh, this shortens the gear ratios to aid traction. Auto Start/Stop is standard on all models. The S model is fitted with a 65-litre fuel tank. S Diesel a 60litre tank and the Turbo a 75-litre one. Both S models are available to order with a optional 75-litre tank. Depending on tyres fitted, the S returns between 31 - 32mpg on the combined cycle, the Turbo 30.7 31.7mpg and th S Diesel 44.8 – 46.3mpg. Emmissions for the three range from 150 – 157g/km for the S Diesel, 171 – 179g/km for the S and 176 – 184g/km for the Turbo. Steel springs and fixed rate dampers are standard on the S models, the Turbo comes with PASM as standard. All variants are avaiable with air-suspension with PASM at extra cost, providing an additional 40mm of ground clearance when driving off-road. A Sport button is fitted as standard - sharper throttle response, higher rev-limit, quicker PDK shift times – PTV Plus is optional, as is Sport Chrono. S models fitted with 350mm front brake discs, the Turbo 360mm, rears are 330mm and 356mm respectively. All Macan models are fitted with different size tyres front-to-rear. the S models are fitted with 8x18s on the front axle with a 235/60R tyre and 9x18s on the rear with a 255/55R tyre; the Turbo has the same width wheel and tyre but a larger 19-inch diamter and runs a 55R and 50R profile front-to-rear. The narrower front tyres are to provide greater steering feel, the wider rear tyres for optimum grip. All Macans are fitted with electromechanical power steering. Turbo is fitted with biexnon headlights as standard, S models fitted with halogens. Porsche Dynamic Light System (PDLS) optional on all models. Interior is a further evolution of the design first seen in the Panamera with a transmission tunnel rising up to meet the centre console. The three-spoke multi-function steering wheel, which comes as standard with paddle shift controls for the gearbox, is a variaiton on the design used in the 918 Spyder. Full length panoramic glass sunroof available at extra cost and S models are trimmed in partial leather and alcantara, with a full leather interior a cost option. Macan offers 500 litres of luggage capacity (with the rear seats in their upright position and up to 1500 litres depending on the configuration in use).

MODEL	MODEL YEAR	WEIGHT (kg)	ENGINE (cc)	BHP	TORQUE (lb ft)	0-62	MAX MPH
Macan	2014	1770	1984	237	258	6.9	138
Macan S	2014	1865	2997	340	339	5.4	157
Macan S Diesel	2014	1880	2967	258	427	6.3	142
Macan Turbo	2014	1925	3604	400	405	4.8	165

# READ YOUR DIGITAL COPY OF GTPORSSCHE anwhere in the world at anytime, on any device

## anywhere in the world, at anytime, on any device

#### Join the digital revolution and download your copy of *GT Porsche* today from just £2.99 per issue!

*GT Porsche* is the market leader when it comes to digital Porsche magazines. Not only can you download the latest issue direct to your desktop, tablet or smartphone device, but you can also buy back issues of the world's biggest Porsche magazine too!

Available on PC, Mac, iPad, Android devices, Kindle Fire, Windows 8 devices and BlackBerry Playbook you'll never be without your favourite Porsche magazine.

#### Download your copy of *GT Porsche* now via www.pocketmags.com/gtporsche

Subscription term	Subscription Cost	You Pay
12 issues	£28.99 – save 19%	£2.41 per issue!
6 issues	£14.99 – save 16%	£2.49 per issue!
Single issue		£2.99 per issue!







#### COMBINED PRINT AND DIGITAL SUBSCRIPTIONS NOW AVAILABLE

You can now subscribe to *GT Porsche* and receive a printed copy of the magazine every month along with a digital version to download and save nearly £40!

Subscription term	Cost (inc P&P)	Save
12 issues	£49.99	£39.89
12 issues	£69.99	£27.89
12 issues	£84.99	£21.89
	12 issues 12 issues	12 issues         £49.99           12 issues         £69.99

#### Order your digital subscription today www.pocketmags.com/gtporsche

Now available on:







App Store



www.pocketmags.com/gtporsche

Windows 8

# GT Porsche Back Issues



#### MAY 2014

**Cover Story:** 919 Hybrid **Inside:** 550 Spyder. First drive: 911 50th Anniversary Edition. Me & My Porsche: Phil Hindley's 911 SC R. Driven: Panamera S E-Hybrid. Road Test: Parr Motorsport 997 Turbo. René Metge interview. First look: 981 Boxster & Cayman GTS. Porsche and Le Mans, The Return: Part 2.



#### SEPTEMBER 2014

**Cover Story:** 911 Turbo 40th Anniversary: 930 & 991 Turbo S. **Inside:** Road Test: 991 Targa 4. UK first drive: 991 Turbo S. 914 2.0-litre versus 981 Boxster 2.7. 968 Turbo 'RS'. Pedro Rodriguez. *Market Place*: 997.2 GT3 RS. *Tech Guide*: Roll-cages. Buying a Porsche: £90-100,000.



#### JANUARY 2015 Cover Story: Carrera 3.0 vs 991 Carrera 3.4

Inside: 928 GTS. 935 Kremer K3 replica. 991 Targa 4S. 991 Cabriolet. 996 Carrera 4S Cabriolet vs 996 Turbo Cabriolet. First Drives: 991 GTS, 981 Boxster GTS, Macan S. *Market Place*: 997 Carrera GTS.



#### JUNE 2014

**Cover Story:** 911 2.4S Barn Find **Inside:** StudioTorino Moncenisio. First drive: 991 Targa. 911 Carrera 2.7 Targa. 981 Cayman 2.7. 997 Carrera. Ultimate Guide: The four-cylinder coupés: 924, 944 and 968. Porsche and Le Mans, The Return: Part 3. 997 Carrera revisted. Buying a Porsche for £60,000.



#### OCTOBER 2014

**Cover Story:** 993 Ultimate Guide **Inside:** 997 GT3 R-GT. LMP2 RS Spyder. First drive: Techart 991 Turbo S. Macan S Diesel 2000-mile test. George Follmer. How To Sell Your Porsche. *Market Place*: 986 Boxster. *All You Need To Know:* Brakes. *Tech Guide*: Steering wheels.



#### FEBRUARY 2015

**Cover Story:** 996 Turbo turns fifteen **Inside:** 996 GT2. Formula Two RSK. The TAG-McLaren Porsche years. 997 Carrera Ulitmate Guide. First Drives: Gemballa Cayenne and Panamera. Technical guide: chain tensioners. LMP1 2014 season review. *Market Place*: 914-6.



#### JULY 2014

**Cover Story:** Ultimate Guide: 987 Boxster **Inside:** 997 Speedster v 991 Turbo Cabriolet. First drive: Boxster & Cayman GTS. UK first drive: Macan Turbo. 996 Carrera 4S. Front-engined Porsches: the V8s 928 – Cayenne – Panamera. 956 1982 WEC debut. *Market Place* 911 3.2 Carrera (1983-'89).



#### NOVEMBER 2014

**Cover Story:** 944 Turbo vs 3.2 Carrera **Inside:** 911 GT1. Backdated 964 Targa. 997 GT3 3.9. New Cayenne, first details. Porsche's only F1 win. Classic restoration guide. How To Buy a Porsche. *Market Place*: 987 Cayman R. *All You Need To Know:* Weight. *Tech Guide:* Bodywork.



#### MARCH 2015 Cover Story: 911 T/R – a rare Sixties Porsche lives on Inside: Retro 911s: 997 Sport Classic vs 991 50 Years Edition. 356 Speedster.

Inside: Retro 911s: 997 Sport Classic vs 991 50 Years Edition. 356 Speedster. London Classic Car Show. M96/7 engine technical guide. Cayman GTS vs 914-6. Carrera 6. Panamera GTS first drive.



#### AUGUST 2014

**Cover Story:** 964 25th Anniversary **Inside:** Porsche at Le Mans, its return. 987 Cayman Ultimate Guide. 911 2.4 S Targa. 991 Carrera4 25th Anniversary. Derek Bell and the 962. *The Market Place*: 996 GT3 RS. *Tech Guide*: Strut braces. Buying a Porsche for £80-90,000. *All You Need To Know:* Transaxles.



#### DECEMBER 2014 Cover Story: 1974 2.7 Coupé Inside: RPM Technik 996 CSR. Redtek 911 SC. 964 Speedster. 991 Carrera GTS. 909 Bergspyder. Macan Turbo vs Cayman S. *Market Place*: 1974 911 2.4 S. *All You Need To Know*: Carbon fibre. *Tech Guide*: Bodywork pt2.



#### APRIL 2015 Cover Story: Cayman GTS n

**Cover Story:** Cayman GTS meets Cayman R **Inside:** 911 Carrera 2.7 RS Touring. Kremer K3. Cayman GT4 - revealed. 928 retrospective since end of production. 991 GTS first drive. Retromobile, Paris. Tony Dean profile. 964 50 Years Edition. TechArt Boxster.

To order your back issue call +44 (0)1732 748084 today! Or visit www.gtpurelyporsche.com or email subs@unity-media.com

\* £5 per back issue includes free P&P to any UK Mainland postal address. For all other delivery options please enquire by calling +44 (0)1732 748084

# new car data

MODEL BOXSTER	PRICE	ENGINE	POWER	TORQUE	0-62MPH	TOP SPEED	WEIGHT
Boxster 2.7	£38,810	6cyl/2706cc	265hp	206lb ft	5.8secs	164mph	1330kg
Boxster S	£47,035	6cyl/3436cc	315hp	269lb ft	5.1secs	173mph	1340kg
Boxster GTS	£52,879	6cyl/3436cc	330hp	276lb ft	5.0secs	174mph	1345kg
CAYMAN							
Cayman 2.7	£39,694	6cyl/2706cc	275hp	213lb ft	5.7secs	165mph	1330kg
Cayman S	£48,783	6cyl/3436cc	325hp	272lb ft	5.0secs	175mph	1340kg
Cayman GTS	£55,397	6cyl/3436cc	340hp	279lb ft	4.9secs	177mph	1345kg
Cayman GT4	£64,451	6cyl/3800cc	385hp	310lb ft	4.4secs	183mph	1340kg
911 COUPÉ (991)							
911 Carrera	£71,449	6cyl/3436cc	350hp	287lb ft	4.8secs	179mph	1380kg
911 Carrera S	£81,242	6cyl/3800cc	400hp	325lb ft	4.5secs	188mph	1395kg
911 Carrera GTS	£91,098	6cyl/3800cc	430hp	325lb ft	4.4secs	190mph	1425kg
911 Carrera 4	£77,924	6cyl/3436cc	350hp	287lb ft	4.9secs	175mph	1430kg
911 Targa 4	£86,377	6cyl/3436cc	350hp	287lb ft	5.2secs	173mph	1540kg
911 Carrera 4S	£87,959	6cyl/3800cc	400hp	325lb ft	4.5secs	185mph	1445kg
911 Carrera 4GTS	£95,862	6cyl/3800cc	430hp	325lb ft	4.4secs	188mph	1470kg
911 Targa 4S	£96,413	6cyl/3800cc	400hp	325lb ft	4.8secs	182mph	1555kg
911 GT3	£100,540	6cyl/3799cc	475hp	325lb ft	3.5secs	196mph	1430kg
911 GT3 RS	£131,296	6cyl/3996cc	500hp	339lb ft	3.3secs	192mph	1420kg
911 Turbo	£118,349	6cyl/3800cc	520hp	486lb ft	3.4secs	192mph	1595kg
911 Turbo S	£140,852	6cyl/3800cc	560hp	516lb ft	3.1secs	197mph	1605kg
	L 140,032	000000000000000000000000000000000000000	300HP		5.15665	тэлпрп	100388
911 CABRIOLET (991)				a a=11 - 6			
911 Carrera	£79,947	6cyl/3436cc	350hp	287lb ft	5.0secs	177mph	1470kg
911 Carrera S	£89,740	6cyl/3800cc	400hp	325lb ft	4.7secs	187mph	1465kg
911 Carrera GTS	£99,602	6cyl/3800cc	430hp	325lb ft	4.6secs	188mph	1495kg
911 Carrera 4	£86,583	6cyl/3436cc	350hp	287lb ft	5.1secs	175mph	1500kg
911 Carrera 4S	£96,619	6cyl/3800cc	400hp	325lb ft	4.7secs	183mph	1515kg
911 Carrera 4GTS	£104,385	6cyl/3800cc	430hp	325lb ft	4.7secs	183mph	1515kg
911 Turbo	£126,689	6cyl/3800cc	520hp	486lb ft	3.5secs	195mph	1665kg
911 Turbo S	£149,511	6cyl/3800cc	560hp	516lb ft	3.2secs	197mph	1675kg
CAYENNE							
Cayenne Diesel	£49,902	6cyl/2967cc	262hp	427lb ft	7.3secs	137mph	2110kg
Cayenne S	£60,218	6cyl/3604cc	420hp	405lb ft	5.5secs	160mph	2085kg
Cayenne S Diesel	£61,474	8cyl/4134cc	385hp	627lb ft	5.4secs	156mph	2125kg
Cayenne E-Hybrid	£61,474	6cyl/2995cc	416hp	435lb ft	5.9secs	150mph	2350kg
Cayenne GTS	£72,523	6cyl/3604cc	440hp	442lb ft	5.2secs	163mph	2110kg
Cayenne Turbo	£92,628	8cyl/4806cc	520hp	553lb ft	4.5secs	173mph	2185kg
Cayenne Turbo S	£118,455	8cyl/4806cc	570hp	590lb ft	4.1secs	176mph	2235kg
PANAMERA							
Panamera Diesel	£65,289	6cyl/2967cc	300hp	479lb ft	6.0secs	160mph	1880kg
Panamera	£63,913	6cvl/3605cc	310hp	295lb ft	6.3secs	160mph	1770kg
Panamera 4	£67,454	6cyl/3605cc	310hp	295lb ft	6.1secs	159mph	1820kg
Panamera S V6	£82,439	6cyl/2997cc	420hp	383lb ft	5.1secs	178mph	1810kg
Panamera 4S V6	£86,080	6cyl/2997cc	420hp	383lb ft	4.8secs	177mph	1870kg
Panamera S E-Hybrid	£89,377	6cyl/2995cc	416hp	435lb ft	5.5secs	167mph	2095kg
Panamera GTS	£93,391	8cyl/4806cc	440hp	383lb ft	4.4secs	178mph	1925kg
Panamera Turbo	£108,006	8cyl/4806cc	520hp	516lb ft	4.1secs	189mph	1970kg
Panamera Turbo S	£131,152	8cyl/4806cc	570hp	553lb ft	3.8secs	192mph	1995kg
Macan							
Macan	£40,276	4cyl/1984cc	237hp	258lb ft	6.9secs	138mph	1770kg
Macan S	£43,300	6cyl/2997cc	340hp	339lb ft	5.4secs	157mph	1865kg
Macan S Diesel	£43,300	6cyl/2967cc	258hp	427lb ft	6.3secs	142mph	1880kg
Macan Turbo	£59,300	6cyl/3604cc	400hp	405lb ft	4.8secs	165mph	1925kg
	200,000	30/1/ 300-rec	10011	1001011	1.03003	Toomph	1323118
918 Spyder	£701 155	901/1E07	0016-	044ዜ ድ	2 Car	214m-L	16741
918 Spyder	€781,155	8cyl/4593cc	894hp	944lb ft	2.6secs	214mph	1674kg
918 Spyder Weissach	€853,155	8cyl/4593cc	894hp	944lb ft	2.6secs	214mph	1634kg



call now 0121 55 77 911

independent centre for

F

www.ramusporscha.com

All Porsche & OEM parts supplied, 1000s of Genuine parts already in stock

RAMUS PORSO

PERFORMANCE STYLING SERVICE PARTS

# specialist directory

pecialist Cars

I																
Addressed Defermence Core Tab 01407 255010 unused decodes uk	Accessories & Parts	Bodyshops	Brakes	Car Care	Car Clubs	Engine	Exhausts	Inspection	Insurance	Interiors	Manufacturers & Tuners	Memorabilia	Sales & Servicing	Suspension	Track days	Wheels & Tyres
Addspeed Performance Cars Tel: 01403 255616 www.addspeed.co.uk Adrian Flux Tel: 0800 081 8989 www.adrianflux.co.uk AmD Tel: 01869 323205 www.amdtechnik.com Analogue Automotive Tel: 01730 892220 www.analogueautomotive.co.uk Ashley Insurance Tel: 01785 214444 www.ashleyinsurance.co.uk Autofarm Tel: 01865 331234 www.autofarm.co.uk Autostrasse Tel: 01376 562922 Berlyn Services Tel: 01271 866818 www.berlyn-services.co.uk Belgravia Garage Tel: 0207 2359900 www.belgraviagarage.com Bilstein www.bilstein.com Blackboots Tel: 01494 797820 www.blackboots.co.uk	\ \ \ \	5	1	<i>√</i>		✓ ✓	✓ ✓	✓ ✓	\ \ \ \	<b>√</b>	✓ ✓		5 5 5 5 5 5 5	✓ ✓	1	✓ ✓
Bodytechnics Tel: 01753 505911 www.bodytechnics.co.uk The bodyshop for prestige vehicles. Porsche Centre approved body repairer		1														
Brian Miller MotorsTel: 0131 443 7806Cameron SportscarsTel: 01220 892244Carrera EngineeringTel: 01992 892333 www.carreraengineering.co.ukCargraphicTel: 0049 634 188 088 (D) 01293 537911 (UK) www.cargraphic.comCharles Ivey Specialist CarsTel: 020 77313612 www.charlesivey.com	<i>J</i> <i>J</i>	✓	55	J		55	555	\ \ \		\ \ \	<i>J</i> <i>J</i>		5 5 5	555		1 1
Chesterfield Diagnostics/Repairs Tel: 01246 234046 www.chesterfielddiagnostics.com Classic Additions Tel: 01938 561717 www.classicadditions.com Club Auto Sport Ltd Tel: 01384 410879 www.clubautosport.co.uk Dansk Tel: 07000 911993 Design 911 Tel: 0208 500 881 www.design911.com Direct Line Tel: 0845 246 8386 www.directline.com	5 5 5	✓	✓			✓	✓ ✓	✓	<u>_</u>	✓			✓	✓ ✓		✓
DMS Automotive Tel: 01264 729016 www.dmsautomotive.com         Dodo Juice Tel: 07990 518430 www.dodojuice.com         Douglas Valley Tel: 01257 472866 www.douglasvalley.co.uk         DS Motorwerks Tel: 07002 911356 www.dsdmotorwerks.co.uk         EBC Brakes Tel: 01604 583344 www.ebcbrakes.com         EBS Racing Tel: 001 800 462 3774 www.ebsracing.com	1	1	✓	<i>√</i>		✓							✓			
Eibach Suspension Tech Tel: 01455 286524 Elephant Racing Tel: +1 408 297 2789 www.elephantracing.com Essex Porsche Inspections. Tel: 07768 894324 porscheinspections@gmail.com Elite Direct Tel: 01708 525577 www.elitedirect.com Engine Builders Supply Co Tel: +1 775 6731300	✓							1						\ \ \		✓
Finlay Gorham Tel: 01284 827427 www.finlaygorham.com Flat-6 Coachworks Tel: 01686 440323 Email: flat-6@hotmail.com Gantspeed Engineering Tel: 01507 568474 www.gantspeed.co.uk Gmund Cars Tel: 01423 797989 www.gmundcars.com Gmund Collection Tel: 0870 2020911 www.gmundcollection.com Green Flag Tel: 0845 246 2130 www.greenflag.com		~							✓			~	<i>J J J J J J J J J J</i>			
GT One Ltd Tel: 01932 569911/944 www.gt-one.co.uk Hartech Tel: 01204 302809 www.hartech.org													~			
Harteen       Tel: 01204 302809       www.harteen.org         Firewood Works, Firwood Ind. Est, Thicket Ford Road, Bolton, BL2 3TR         Historika Classica Porsche 07836 384999       www.historika.com         HP Motorsports       Tel: 020 8500 2510       www.historika.com         Jasmine Porschalink UK       Tel: 01282 697171       www.jasmine-motorsport.co.uk         Jaz       Tel: 020 8903 1118       www.jazweb.co.uk         John Drake Zymöl Detailer       Tel: 01590 645623       www.johnsmodelcars.co.uk         JZM Ltd       Tel: 01923 269788       www.jzmporsche.com	5 5 5 5	✓ ✓	<i>J</i> <i>J</i> <i>J</i>	1			\ \ \	✓ ✓ ✓		1		\ \	<b>&gt;</b> <b>&gt;</b> <b>&gt;</b> <b>&gt;</b> <b>&gt;</b> <b>&gt;</b> <b>&gt;</b>	\ \ \	✓ ✓	5 5 5

# Tel: 0844 7000997

difference is the difference

# specialist focus



# Jasmine PorschaLink UK

Jasmine PorschaLink UK is one of the north's most respected Porsche specialists

# GT: How long have you been established and how did you get started?

JP: Jasmine PorschaLink UK evolved in 1997 from a one-man home-based enthusiast setup to an established reputable Porsche Specialist Service Centre with a 12 strong qualified and knowledgeable team. Several relocations later it is settled in its 6000sq ft purpose-built facility off the M65, 30 minutes north of Manchester.

#### GT: Who is in charge and what is their background?

JP: Brian Goff, ex-Oil and Gas Pipeline industry director. He was also a Porsche Supercup driver and is currently a 911 rally co-driver.

#### GT: Tell us a little about the products and services you offer?

JP: We offer Porsche owners a competitively priced and friendly experience. They can bring their car to us to be serviced, MoT'd or repaired. We also offer replacement parts, a wheel refurbishment service, race and track preparation as well as restoration projects.

GT: What do you think your potential customers are looking for in an independent specialist such as yourselves? JP: Customer service, trusted sensible prices, communication, convenience, personable service and real enthusiasm for the marque.

#### GT: What facilities do you have on site?

JP: We have all the comprehensive facilities you would normally expect from a respected Porsche Service and Repair Centre, i.e the latest specification ramps, air-con equipment, four-wheel laser alignment and many more. We also have a local bodyshop just off site. Oh and good coffee!

#### GT: What is your USP?

JP: Our qualified and knowledgeable staff who have absorbed endless problematic diagnostic scenarios and have come through to the other side as a result of years of living and breathing Porsche. We're a melting pot of pure Porsche knowledge, facts and figures. This is combined with our sensible pricing and customer service. We prefer to think we make our customers feel that they are the unique one.

#### GT: Which Porsches do you cater for?

JP: We have never knowingly turned any Porsche away. They are all welcome – any with seemingly impossible problems are simply seen as an exciting challenge.

#### GT: What is your background with the Porsche brand?

JP: Owner, Brian Goff's background with the Porsche brand is purely motorsport. He raced a 911 2.7 RS and a 964 RS in the 1992/'93 Porsche Supercup Series and also codrove a 1965 Porsche 911 in the FIA European Rally Championship and British National Championship. He is currently co-driving in a 1965 Porsche 911 on FIVA events in Europe. This experience has enabled him to fully understand Porsche's racing heritage and feel the real soul of how Porsches are built and prepared for road and track use.

#### GT: How many members of staff do you employ?

We are proud to employ a combination of experienced Porsche technicians, sales, administration and warehouse staff to form a strong, motivated team of 12 people.

#### GT: What exciting new products or services should we expect from you soon?

JP: We have recently launched several new and exciting services. Our gearbox rebuilding service, headlight cleaning service and soft-top reproofing service are all proving very popular right now and they also really complement our traditional core garage services. We are constantly listening to our customers and their needs and like to think we take on board their everchanging requests.

#### GT: Lastly, what is your opinion on the current state of the Porsche market and how have things changed since your business was founded?

JP: Wow now that's one big question. We have been involved in the Porsche industry for many years and the strength of the margue is always surprising. Who would have thought all those years ago the release of the Cavenne would follow on to the other 4WD models and a current 18 month wait for the sought after Macan? As for the historic classic models, who would have guessed the international dialling codes people would now be demanding for the old 1965-'73 cars. Incredible. The traditional core models are being produced at an astonishing rate by 'the mother company' and clearly its bank balance goes from strength to strength.

#### Contact Information

Jasmine PorschaLink UK 01282 697171 www.jasmine-porschalink.co.uk

	Accessories & Parts	Bodyshops	Brakes	Car Care	Car Clubs	Engine	Exhausts	Inspection	Insurance	Interiors	Manufacturers & Tuners	Memorabilia	Sales & Servicing	Suspension	Track days	Wheels & Tyres
K&N Tel: 01925 636950 www.knfilters.com						$\checkmark$										
LN Engineering Tel: +1 815 472 2939 www.lnengineering.com Loe Bank Motors Tel: 01706 826060 www.loebankmotors.co.uk						$\checkmark$										
Meguiar's Tel: 0870 2416696 www.meguiars.co.uk				1									V			
Milltek Sport Tel: 0115 944 0044 www.millteksport.co.uk							$\checkmark$									
Ninemeister Tel: 01925 242342 www.ninemeister.com	$\checkmark$	$\checkmark$	$\checkmark$			$\checkmark$	$\checkmark$				$\checkmark$		$\checkmark$	$\checkmark$	$\checkmark$	$\checkmark$
No 5 Garage Tel: 020 8993 7318 www.no5garage.com													~			
Northway Porsche Specialists Tel: 0118 971 4333 www.northway.co.uk											_		$\checkmark$			
Parr Motorsport Tel: 01293 537911 www.parr-uk.co.uk	~	V	V	V		V	V	$\checkmark$		$\checkmark$	V		~	V	V	~
Paragon Tel: 01825 830424 www.paragon.gb.com	$\checkmark$	$\checkmark$	$\checkmark$			$\checkmark$	$\checkmark$				$\checkmark$		~	$\checkmark$		$\checkmark$
Paul Stephens Specialist Cars Tel: 01440 714884 www.paul-stephens.com											$\checkmark$		$\checkmark$			
PCT Cars Ltd www.pctcars.co.uk Tel: 02476 407770									/					V		
Peart Insurance Tel: 0800 954 0037 www.peart.co.uk									V							
Performance Direct Tel: 0844 5733594 www.performancedirect.co.uk Performance Marque Tel: 0800 954 0037 www.performancemarque.com																
Peter Morgan Consulting Tel: 01672 514038 www.performancemarque.com								1	v							
Porsch-Apart Ltd Tel: 01706 824053 www.porsch-apart.co.uk	$\checkmark$															
Porsche Cars GB Tel: 0845 7 911 911 www.porsche.co.uk											$\checkmark$					
Porsche Club GB Tel: 01608 652911 www.porscheclubgb.com					$\checkmark$							$\checkmark$				
Porscheworx Tel: 020 7916 6911		$\checkmark$									$\checkmark$		$\checkmark$			
PortiaCraft Tel: 020 8959 1604													~			
911 Virgin Tel: 01895 255222 www.911virgin.com													$\checkmark$	_		
Pro 9 Tel: 01527 591992 www.pro-9.com.uk	/		$\checkmark$								/			$\checkmark$		
Promax Motorsport Tel: 01296 714856 www.promaxmotorsport.com	$\checkmark$										$\checkmark$		~			
PR Services Tel: 01277 630099 www.prs356.com	/	V									/		$\checkmark$			1
Ramus Porscha Tel: 0121 55 77 911 www.ramusporscha.com	V	V			V	V			V		/			V		V
Regal Autosport Tel: 02380 558636 www.regal-auto.co.uk											V					
Redline Racing Tel: 01642 751911 RGA Porsche Tel: 0207 7931447		$\checkmark$				$\checkmark$					v		$\checkmark$			1
<b>RPM Independent Porsche Specialists Ltd</b> Tel: 01296 661881 www.rpmtechnik.co.uk	5	5	5	5		1	1	1			1		$\checkmark$	1	1	5
RPM Specialist Cars Ltd Tel: 01423 865602 www.rpmspecialistcars.co.uk													$\checkmark$			-
<b>RPR626</b> Tel: 01388 811024/07836 330065 www.rpr626.com													$\checkmark$			
RSJ Sports Cars Tel: 01753 553969 www.rsjsportscars.co.uk													$\checkmark$			
Roger Bray Restoration Tel: 01404 822005 www.rogerbrayrestoration.com		./											./			
parts@rogerbrayrestoration.com; Milestone Business Park, London Road, Whimple, Exeter		•											v _			
Shirleys Garage Tel: 01676 522242 www.shirleys-garage.co.uk	_												$\checkmark$			
Specialised Car Covers Tel: 01943 864646 www.carcoversuk.com																/
Specialist Cars of Malton Tel: 07000 911993 www.specialistcarsltd.co.uk	$\checkmark$	$\checkmark$	$\checkmark$		V	~	~			~	V	V	~	~		<b>V</b>
SpeedArt Tel: 0870 757 5911 www.speedart.de											V					_
Spit & Polish Tel: 01732 367771 www.spitandpolish.co.uk Swissvax UK Tel: 0423 860022 www.swissvax.co.uk				1												V
Team Parker Racing Tel: 01455 822686 www.teamparkerracing.com						$\checkmark$							$\checkmark$		1	
Tech9 Motorsport Tel: 0151 4255 911 www.tech9.ms	$\checkmark$	$\checkmark$	$\checkmark$			1	$\checkmark$			$\checkmark$	$\checkmark$		$\checkmark$	$\checkmark$	1	5
TechArt Tel: +49 7152 933939 www.techart.de											$\overline{\mathbf{V}}$					-
The Independent Porsche Enthusiasts' Club Tel: 0845 602 0052 www.tipec.net					$\checkmark$											
Tognola Engineering Tel: 01753 545053						$\checkmark$					$\checkmark$					
TWG Motorsport Tel: 01733 332911													$\checkmark$			
The Wheel Restorer Tel: 01978 352980 sales@thewheelrestorer.co.uk																1
Unit F7, Bersham Enterprise Centre, Rhostyllen, Wrexham LL14 4EG																,
Yorkshire Classic Porsche Tel: 08434 996 911 www.yorkshireclassicporsche.co.uk	V	V	V	V			V	V		V		V	V			V





Servicing Car Sales Restoration Parts TECHART



Passionate about Porsche ESTABLISHED 1978

t.02476 407770 www.pctcars.co.uk

**Your Porsche** 

Whatever model Porsche you own, modern or classic, we have

the expertise, knowledge and experience to make sure you spend more time enjoying what your car was built for. Driving.

PORSCHE SALES . SERVICING & REPAIR . PARTS & ACCESSORIES . EXPERIENCED & PASSIONATE . PORSCHE WANTED



some of our services include:

- Servicin
- MOTs
- General repairs
- Wheel alignment

Visit our website for more details www.porsche-repairs.co.u

Also if you like to save money, then don't forget to follow us on Facebook for our very latest offers

#### CALL US ON: 01234 210 012



24 College Street Kempston, Bedford MK4 28LU info@porsche-repairs.co.uk

www.porsche-repairs.co.uk



- Full Engine Rebuilds
- A/C Servicing & Re
  Wheel Refurbishme
- Repairs
  - ections
- Foundry Close, Horsham, West Sussex. RH13 5TX
- www.addspeed.co.uk 01403 255616
- Four wheel alignment and corner weight gauges
- Bodywork repairs
- Engine rebuilds and race engines built to spec
- Alloy wheel overhauls and colour matching
- Menu servicing with free MOT offer
- State of art diagnostic machine for all models
- Interior refurbishment, connolising and trim work
- Mapping and tuning for all late models
- Stainless steel exhaust systems and upgrades
- Air conditioning repairs and regassing
- MOT tests
- Vehicle inspections and valuations



Independent servicing and repair specialists for classic and modern Porsche.

Call 020 8903 1118 or 01727 866 075 or visit www.jazweb.co.uk

WE'VE MOVED – Unit 18, North Orbital Commercial Park, Napsbury Lane, St. Albans, Hertfordshire AL1 1XB





A motoring journalist for over 25 years, Colin has contributed to GT Porsche for a decade

#### Colin Goodwin recalls his most memorable trips across Europe and why he refuses to use motorways...

ounds mad, but last month I drove a Caterham 160 to the Geneva Motor Show and back. The 160, if you're not up on your Sevens, is the recently launched cheap model that's powered by a 660cc three-cylinder turbo Suzuki engine out of a Jimny. Trust me, it's better than it sounds. Madder still, I did the outward and return legs each in a day. GT Porsche's editor and his predecessor Stuart Gallagher were at the bar in our hotel when I arrived (if you want to know how daft I was, all three of us were on the Porsche ticket at Geneva and like them I could have come out on a Boeing 737) with a couple of beers at the ready to revive me.

Actually, it was fantastic fun. Apart from a short squirt for four junctions outside Calais, I did the whole trip on N and D roads. The best roads in my experience are the D roads to the east of Chatillon-Sur-Seine (which is about 30 miles south of Troyes). I call them the Porsche roads because you can follow the D928 out of Chatillon-Sur-Seine and then turn on to the D959 after about 20 miles. With a bit of jiggling this will take you to Gray and set you up for the drive along the N5 into the Jura. On my recent trip these roads were deserted

> For decades I've shunned autoroutes for minor roads and it's always been worth it

and the Caterham was challenging and exciting. In a Cayman, even a 2.7, it would have been better still because I'd have been warm and dry.

For decades I've shunned autoroutes for minor roads and it's always been worth it. I've made these trips in Porsches many times, the first was a drive to Paul Ricard in 1995 in a 993 RS. On that trip I started off on autoroutes but by Troyes I realised that driving at 150mph was going to get me into trouble and that eventually it gets boring. So I went cross country and had a ball.

I took the same car to Le Mans with the-then Porsche PR boss. He'd never been in a car at over 120mph so had a bit of a shock. That was in the days when the French Gendarmerie hadn't launched their offensive on the Brits en route to Le Mans. Another year I bet an *Autocar* colleague that his long term test TVR Cerbera wouldn't get to Le Mans and back without conking out and that the 9111 would be driving would. The Porsche made it but so did the bloody TVR. It wouldn't have done if I hadn't got a hundred quid on it...

Apart from those of us lucky enough to live in the Scottish highlands, the chance to really enjoy a car in the UK is pretty rare. A journalist at a weekly car magazine that's not Autocar was last year caught doing 127mph on the A9 at 1.30am. He was fined £2000, banned for 15 months and his editor sacked him. The first two punishments are signs of the times, the latter was hypocrisy. I've taken to getting up early on a Sunday morning and driving to Brighton for a cuppa (from our house in Hampton) but the real answer is to pop across the channel for some entertaining motoring. And I don't mean to drive to Le Mans because as mentioned earlier, that particular treat has been ruined by the French police  $\bigcirc$ 



# **Porsche experts world-wide** count on us for world-class service.

# THE REASON: Porsche Parts Exclusively

For assistance we encourage you to contact our expert staff toll-free at 800-462-3774 Monday – Friday 8 am – 5 pm pst, or send us an email through our website at EBSracing.com.

We look forward to hearing from you!

# Engine Development Program

Current Projects

- 911 2.7-2.8 conversion
- 911 3.2-3.4 conversion
- 911 3.2-3.6 conversion
- Check our website for updates.

# **Fuel Injection Service**

## Diagnostics and rebuilds

- Fuel pumps
- Fuel distributors
- Fuel injectors
- Electronic control units

## **Guaranteed Used Parts**

- 356 to 996 GT3
- Pistons & cylinders
- Engine cases
- Crankshafts
- Cylinder heads
- Transmission Parts

## **Engine Rebuild Kits**

- 356 to 996 GT3
- Basic & master rebuild kits
- High-performance & racing
- Machine shop service available Tool rentals for EBS customers

## **Machine Shop Services**

- Crankshaft race prep
- Engine case upgrades
- Connecting rod rebuilds
- High performance valve jobs
- Competition camshafts

# Porsche Pistons & Cylinders

### **Engine Coatings**

- Thermal barrier coatings
- Drive film lubricants
- Thermal dispersants
- Oil Shed coatings
- Coated bearings in stock

# **Transmission Rebuilds**

- 901 to 996 Diagnostics & rebuilds
- Racing upgrades
- Special gear ratios
- Limited slip differentials

#### **Gift Items**

- Books & literature
- DVDs & accessories
- Gift items starting at \$20
- Gift certificates available Brey Krause safety equipment
- Sport & racing seats

Visit our website for: Secure Online Catalog Ordering **Bolt-on Performance Parts Porsche News and Updates** 



g Enc. | 4068 South NoCernan Bhill, Unit B | Rano, Nevede 895 775-673-1309 | Tolt Free: 3-800-462-3774 | Fex: 775-673-208 ht @ 2005 ERE Radio Inc. All Blabbe Re

PORSCHE PARTS EXCLUSIVELY

**800-462-3774 | EBSracing.com** 4068 S. McCarran Blvd. Unit B, Reno, NV 89502 International 775-673-1300 fax 775-673-2088

- 356 to 996 GT3 Mahle Motorsports • JE Lightweight Forged Pistons LN Engineering Nickies Perfect Bore Pistons & Liners
  - Reconditioned Mahle Cylinders



A complete range of Porsche classic & modern day replacement exhaust and body panels

Body Parts Engine Tin Ware

Exhausts

Heat Exchangers

Fuel Tanks

Oil Tanks

Lamps

Exhaust Fittings

Chassis Panels

Design911 are proud partners with Dansk & SSi Exhausts.

Manufacturers of high quality exhaust systems, catalysts, heat exchangers, body panels, chassis repair panels, oil pipes, engine heat shields, service products and lighting.

Retail & Trade enquiries welcome

















+44 (0) 20 8500 8811 www.design911.com DESIGN 911 Centre for Porsche