

MARKET UPDATE

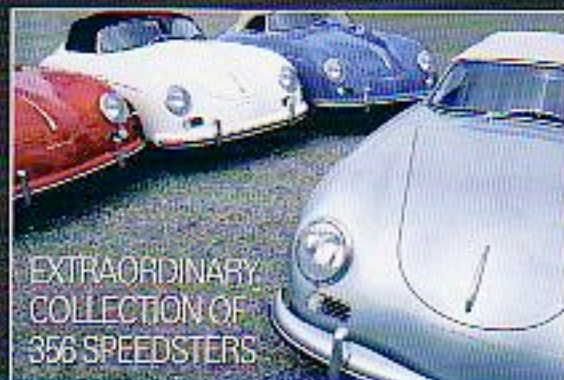


911 TURBO & 912

The Magazine **11** About Porsche  
**excellence**

**Porsche's New 911**

DOES IT LIVE UP TO THE LEGEND?



EXTRAORDINARY  
COLLECTION OF  
356 SPEEDSTERS

RUF'S FASTEST TURBO EVER!

221+ MPH  
590 HP



\$4.99 (Canada \$6.99)

OCTOBER 2004



# SOMETHING BLUE

THE MARRIAGE OF 590 HP TO THE R TURBO CREATES THE FASTEST RUF CAR YET  
STORY AND PHOTOS BY IAN KUAH

While testing for *Excellence* and other automotive magazines in recent years, I've driven a huge number of modified Porsches. In addition to uprated factory Turbos, these have included normally-aspirated 911s with either aftermarket turbo- or supercharger setups. And, as potent as some of these have been, one feature of the Ruf R turbo 590's power delivery stands head and shoulders above the rest: Its ability to rev

smoothly and sweetly through its power-band as if it were a far smaller engine.

Today's 3.6-liter 911 powerplant is a very big engine compared to the smaller and lighter sub-3.0-liter flat-six engines from the 1970s. Although each generation of the flat-six engine has been getting more powerful and torque rich, with those achievements has come bigger and heavier pistons. Among these later 911 engines, only the finely honed racing units

have anything near the revving ability of the earlier, "small-block" 911 engines.

However, this Ruf motor's free-revving ability is immediately apparent when leaving the in-town confines of Pfaffenhausen. Although other modified 996-based Turbo engines have lightweight connecting rods and lightened flywheels, they don't seem to make quite the same difference to the character of the engine. Drive a little further and sampling this engine's elasticity



gets plain addictive. Another factor at work here is ECU programming. Introducing exactly the right amount of fuel and burning, it with the right amount of spark at the right instant contributes to smoothness and good low-speed response. For a current normally-aspirated engine with Bosch's Digital Motor Electronics (DME) to pull smoothly from idle speed is a given, but for a turbocharged one like this Ruf motor to do so is remarkable.

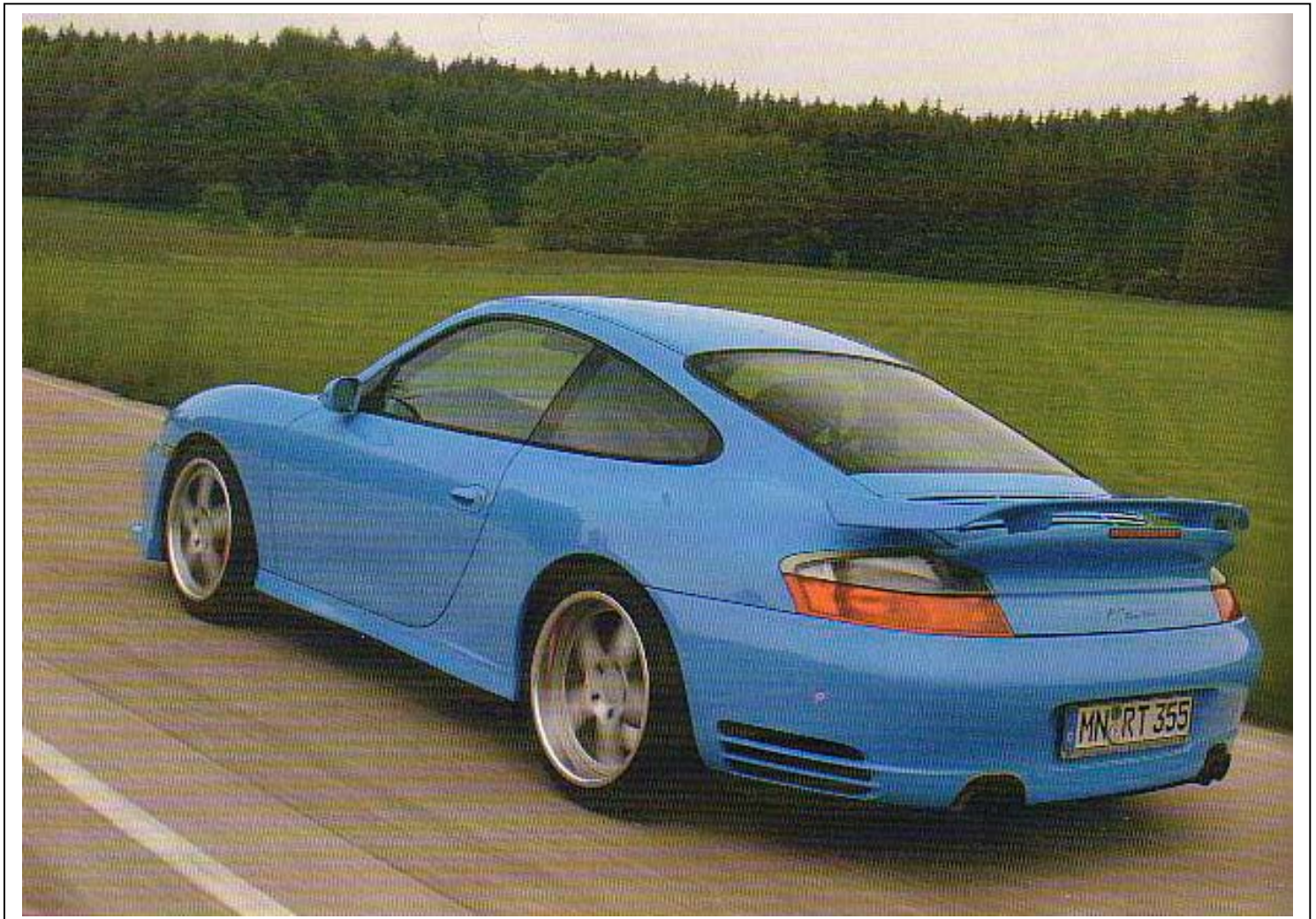
That, however, is just what it does. We were just leaving a village and doing about 30 mph in third gear when Alois Ruf suggested that I try dropping the box into sixth gear. I did and, with just 1200 rpm showing on the odometer, not only did the perfectly balanced engine not protest, it pulled away smoothly without a single judder when I began to feed in throttle. Applying the term impressive would be an understatement for a turbocharged engine with such huge power and torque potential that behaves like a pussycat.

The fundamental difference between the R turbo 590 and its 485-bhp, 520bhp, and 550-bhp R turbo stablemates is the internal work done to the motor. While the modifications to R turbo models with less power are mainly external with modified turbochargers, intakes, air filters, exhaust systems, and clutches, the 590-bhp conversion requires a much more in-depth modification regime.

This is the only R turbo variant that requires a complete engine rebuild. The extra power and torque the motor is being asked to produce means Ruf must check the condition of the engine, do some internal gas-flow work, and replace the factory connecting rods with custom titanium rods that reduce the reciprocating mass and add strength to a potential weak point in the 996 Turbo engine.

It is this labor-intensive process that effectively doubles the cost of Ruf's own 550-bhp conversion. It also means that the work can only be carried out by Ruf

WHEN WE SUGGEST THAT HIS NEW R TURBO 590 IS PROBABLY GOOD FOR OVER 600 BHP, ALOIS RUF JUST SMILES...





The beauty of a Ruf car is in the details. Want a Gulf Blue GT2-lookalike with far more power than the real thing? Maybe you want a Tangerine one with a Tiptronic and AWD. It's no problem. *Really.* As for Ruf's R turbo 590 demonstrator, it's full of trick features like true blue paint, an integrated roll cage, color-matched hard-back sport seats, a custom steering wheel that feels great in your hands, proper aluminum lug nuts, modular wheels, slimmer mirrors, and more. Talk to Ruf customers and they'll tell you that it's near impossible to order any Ruf car in base trim because you're confronted with too many unique options and irresistible trim bits...



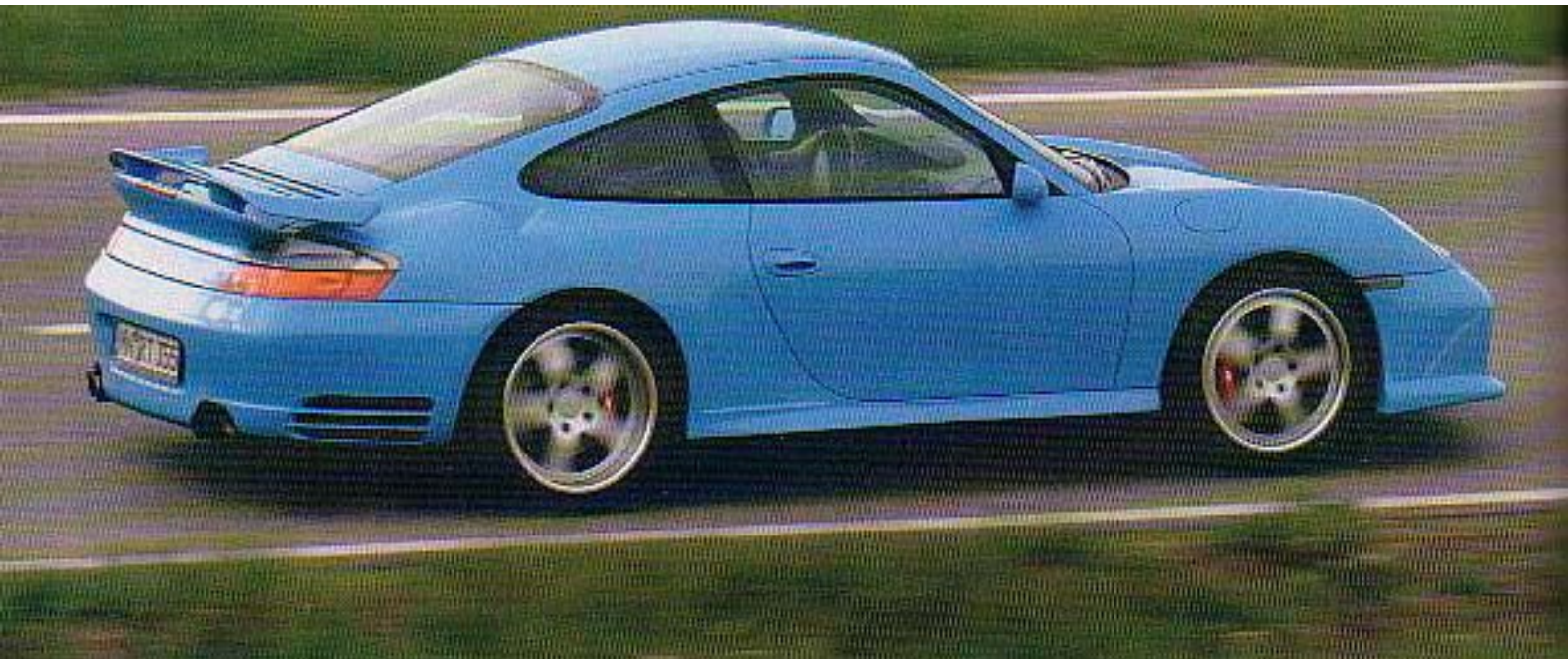
in Germany - as opposed to being a bolt-on conversion that can be shipped to customers abroad in a box. Power goes from an already healthy 550 bhp at 6000 rpm and 575 lb-ft of torque at 4000 rpm to a whopping 590 bhp at 6500 rpm with 612 lb-ft of torque at 4200 rpm. For comparison purposes, Porsche's fastest 911 can't come close. The 2004 911 GT2 is rated at "just" 477 hp and 472 lb-ft of torque. The factory says its \$440,000+ Carrera GT gives you 612 horses from 10

normally-aspirated cylinders, but its peak torque is far behind at 435 lb-ft.

One other thing: Ruf's quoted power figures are always conservative. The original Ruf CTR Yellow Bird was rated at 469 bhp. In reality, most CTRs packed at least 500 horses. When we suggest that the 590-bhp R turbo is probably good for over 600 bhp, Alois Ruf just smiles. The performance numbers seem to back up the theory of Ruf understatement. Earlier this year, the R turbo 590 prototype ran

to 221.34 mph at Nardo in testing with a taller rear-axle ratio, and its 0-62 mph time is rated at 3.7 seconds - numbers that should keep the fastest pilots happy.

The same Ruf suspension and huge 330-mm vented brake discs with four-piston calipers at each corner have no problems handling the extra power, either. Ruf's R turbo 590 models come with 18x8.5- and 18x11.5-inch modular wheels mounting a set of 235/40ZR18 and 295/30ZR18 tires. 19x8.5- and



Rear wing is more pronounced than the standard 911 Turbo's, but it is subtler than a GT2's. Gauges continue the Ruf tradition of green markings on black faces, which is something the Pfaffenhausen company picked after Porsche moved on to white markings. Shift knob is unique, as well...

**2004 Ruf R turbo 590**

**VEHICLE TYPE**

Rear-wheel-drive, rear-engined, two-seat coupe

**ENGINE TYPE** Water-cooled, horizontally-opposed, six-cylinder with twin turbochargers

**DISPLACEMENT** 3.6 liters

**VALVETRAIN** Dual overhead camshafts with four valves per cylinder

**REDLINE** 7000+ rpm

**HORSEPOWER** 590 bhp

**TORQUE** 612 lb-ft

**TRANSMISSION** Six-speed manual

**BRAKES** Four-piston aluminum monoblock calipers with ventilated steel discs

**WHEELS** 19x8.5 (f), 19x11 (r) alloys

**TIRES** 225/40ZR19(f), 305/25ZR19(r)

**OVERALL LENGTH** (in.) 175

**CURB WEIGHT** 3,250-ish pounds

**0-62 MPH** 3.7 seconds

**TOP SPEED** 221 mph

**BASE PRICE** 214,300 Euros (widebody) or \$264,747 at current exchange rates

**CONTACT** www.weissach.com



19x11.5-inch wheels with 225/40ZR19 and 305/25ZR19 tires are an option. Choose the 19s and the car's suspension geometry must be reset.

The R turbo 590 powertrain can be married to either rear-wheel-drive or all-wheel-drive 996 platforms, and we were able to drive one of each. The blue car shown in our photos had all four of its wheels driven and deployed its power with huge confidence out of bends -even at silly speeds. On a dry road, Ruf's white, rear-wheel-drive test car proved just as capable and had a bit more steering feel, as is normally the case with rear-drive 911s. Add inclement weather to the equation, however, and the four-wheel-drive R turbo would be our weapon of choice.

The white R turbo had one additional interesting feature we've not seen on any Ruf (or factory Porsche) model before. The company claims it has just perfected a height-adjustable suspension system that raises the car's ride height by up to two inches at the touch of a button. The function is designed to help the car clear

ramps and other obstacles that might be a potential hazard to the front spoiler or other underbody parts. A speed sensor drops the ride height back to normal once you exceed 19 mph. In practice, the system works well and seems like a good idea for any lowered 911.

Driving both cars reminded us that while many Porsche tuners can build a 911 that's just as fast (or even faster) than a Ruf car, none of them have the same official stature. Recognized by the German transport authority as a manufacturer rather than a tuner, Ruf builds up to 25 complete cars each year from bare shells. These shells are primed and painted in each client's choice of exterior color before being moved to the assembly area for the installation of mechanicals, electricals, and interior trimmings.

And this start-from-scratch philosophy is part of why a Ruf car simply feels more complete and more like a production car than any of its marketplace rivals. For would-be clients who appreciate such synergy, their first test drive will be a defining moment.