

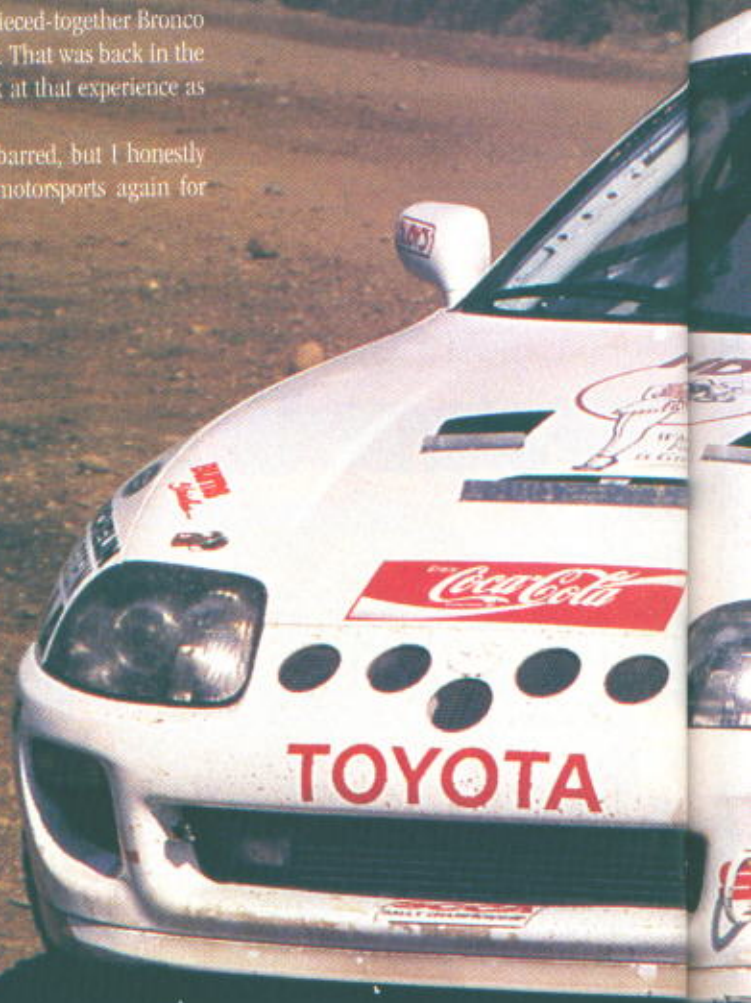
TOYOTA SUPRA TURBO

Inside the ultimate two-wheel drive rally car

by Garrett Lai • PHOTOGRAPHY: PAUL C. PECK, JOSH JACQUOT

Ralph Kosmides (pronounced Koz-mee-deez) dreamed of racing cars when he was just a teenager back in high school. But instead of just dreaming about it like so many young kids might do, he teamed up with a classmate and built a Ford Bronco in his friend's garage. The two students took the pieced-together Bronco to the Mint 400 off-road race in Nevada, and put it through its paces. That was back in the early '70s. He doesn't remember how they finished, but he does look at that experience as his first accomplishment in motorsports.

"I think it might have snowed that day and we ended up time barred, but I honestly don't remember," he recalled. Kosmides wouldn't participate in motorsports again for another 20 years. ▶







Ralph's partner in the failed assault on the Mint 400 was Cal Wells, who has since earned a name for himself with his championship-winning off-road team (Toyota, with Ivan "Ironman" Stewart) and a CART effort (Arciero-Wells, fielding cars this year for MCI with Max Papis, and for Panasonic with Hiro Matsushita). After high school, Kosmides worked as a pro mechanic, turning wrenches on Wells' crew for people like Rod and Steve Millen, Malcolm Smith and Ivan Stewart.

"After a few years of that kind of labor, I had to get out of the adrenaline cycle," said Kosmides, "and that's when I started Ruby's restaurant."

Ruby's is a 28-store restaurant chain with locations in California, Las Vegas and Philadelphia. If you can picture the Fifties diner from *Grease*, truly good milkshakes and awesome burgers, served by waiters in starched whites or waitresses in candy-striped attire, well, that's the good-time idea behind Ruby's. It has been a successful venture, so successful in fact that Kosmides was able to take a step back and

finally take up racing again.

While he could take his success anywhere, he chose the relatively obscure sport of Pro Rally to satisfy his cravings for motorsport action. "I was looking for a series that offered a family-oriented, casual type of event," said the affable restaurateur. "Not that rallying itself is casual, but the environment is. It reminds me a lot of what off-road racing was like when I was starting out."

"My goal when I started rallying was to win a National Championship, but I figured I'd have to cut my teeth for awhile," related Kosmides. "I bought a car and we built it up, an early European Ford Escort, and I learned how to really drive a rally car." So how do you learn to drive a rally car? Kosmides paused for a second. "You learn by bending up a lot of race cars!"

The key to driving fast in a rally, according to Kosmides, is commitment. "It takes



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a lot of commitment to go down a road that you don't know, at a speed that's very fast. It takes a lot of commitment to go over a blind crest, hoping the road is going to go straight. It's a style of driving that's not for the faint of heart." Kosmides definitely seems to have that trait, having won the SCCA Northern Pacific Divisional title in the over 2.0-liter class in his first year out, and also won the Northwest Region Championship in '95.

After the Escort came a normally aspirated Toyota Supra in 1996. Kosmides missed winning the Group 5 Drivers' Championship that year, but he was instrumental in helping Toyota win the Manufacturer's Championship, and finished seventh overall.

But Kosmides wanted a bigger piece of the pie; he wanted the Group 5 National Championship, and he thought a Turbo Supra would be the car that would let him do it. So he drove a limited schedule with



the normally aspirated Supra in '97, using the time to create his current turbo model for an assault on the '98 season in Group 5. *Sport Compact Car* agreed to sponsor it. This put the magazine in the company of Toyota, T023RD, Coca-Cola and Rod Millen Motorsports, all major players in motorsports.

You'll remember from our past install-

ments of Project Toyota Supra Turbo (Oct. '97, May '98) that this car was entirely gutted, the body was seam welded and a 4130 chrome-moly cage was welded in place. This platform is an evolutionary descendant of Kosmides' successful normally aspirated car, so the suspension was very similar. The Supra offers an amazing 10 inches of suspension travel, which is a def-

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inite asset when it comes to flying along on gravel-strewn fire road. But there's a lot more development left to talk about.

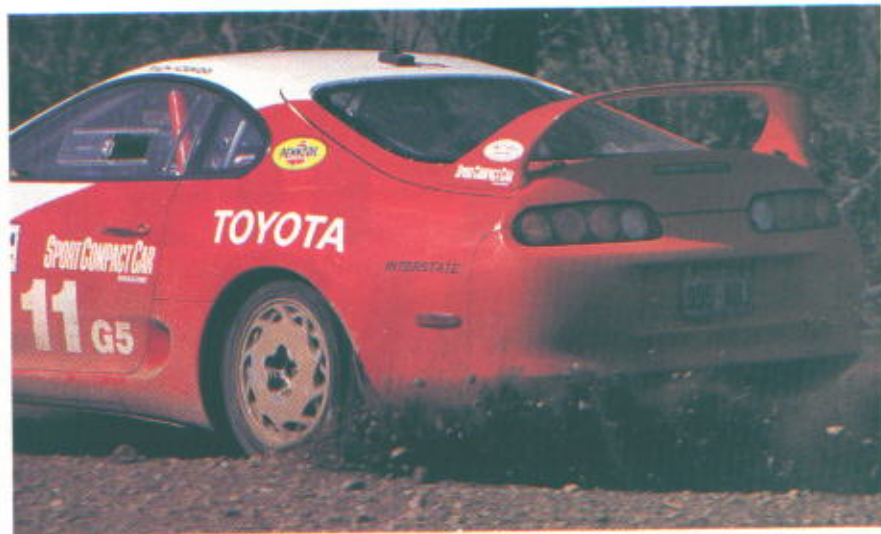
Brakes are among the Supra's most highly developed areas. The factory binders are great for the street, but they just barely fit inside a 17-inch wheel. And the largest rally tires available in the states are for 16-inch wheels. So the stock brake system was replaced with Brembo calipers, a set of master cylinders with an adjustable balance bar and stock rotors turned down to fit inside the 16-inch wheels. An interesting touch was the use of stock front rotors in the rear. Additionally, the rear calipers were rotated to the front of the axle (stock Supras carry rear calipers behind the axle), where there's better cooling airflow from the side vents.

Initially, the rules called for the Supra Turbo to be run with a ridiculously tiny restrictor plate in each turbo, which Kosmides said was less than an inch in diameter. The SCCA has since rescinded this

rule, which is a good thing since the car would overheat with the restrictors in place. But even though the restrictors are gone, the legacy remains, in the form of five round holes bored into the front fascia, just above the grille, to let air directly into the radiator instead of passing through the big HKS cen-

ter-mount intercooler. Heat is also the reason for the three large hood cutouts, with a big skidplate under the front of the car, there just aren't many places for the heat to escape.

With the only significant engine mods being an HKS center-mount intercooler, the Supra makes more than enough horsepower



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er to spin the Michelin rally tires on most any surface. HKS supplied one of its Fuel Cut Defencer products, and a bypass valve, but that's literally it for any extra horsepower goodies. The transmission is stock, but the Supra does sport a TRD clutch.

Dave Turner Motorsports put its consider-

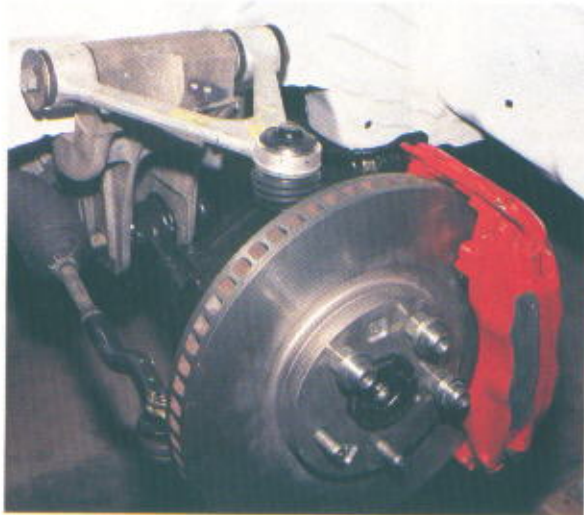
able rallying experience to work when fabricating the car, and from the beginning the car was designed to be service-friendly. So when it outfitted the car with Eibach springs and Bilstein shocks, Turner Motorsports redesigned the shock mounts so that the shocks could be removed from the top, instead of below. This makes for five-minute shock swaps, which should make ex-mechanic Kosmides happy.

In a similar vein, the stock air conditioner and heater were replaced by an after-market defroster (rallies are run under many conditions, after all), and the whole dash can be removed in just 10 minutes, via Dzus fasteners.

One thing that we never talked about before was the way this car performs. With six of this year's eight

championship events completed, Kosmides and his co-driver/navigator Joe Noyes practically own the series. "We've won three of the six events," said Kosmides. That puts the Ruby's squad on top in points (at press time), with more than twice the points of anyone else in the class. And it's a fast class, sporting a 3-series BMW packing a six-cylinder engine, a very fast VW Corrado, a Porsche, some Hondas and a number of early RX-7s.

"Unfortunately we crashed the car in the second event. It was actually very unfortunate, since it was on ESPN and they caught us on video. I put it into a ditch and rolled the car," Kosmides explained. "It didn't hurt the car structurally, but it dented every panel. It didn't hurt the car so much as it hurt my ego—and my wallet." And at another event Kosmides had his first mechanical DNF since he started racing Toyotas, when an inadequately supported power steering pump broke loose, pitching



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the fan belt. You can bet that pump bracket is bulletproof now.

Aside from his goal of winning a National Championship, which seems to be all but in the bag, Kosmides would really love to win the Woodner trophy. John Woodner was a legend of North American rallying, earning his reputation mostly behind the wheel of various Peugeots in the '70s and '80s, and his namesake trophy goes to the highest finishing two-wheel

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drive car. This competition is a lot more hotly contested, with Dave White's VW Golf and Bill Malik's Volvo 240 basically right on top of Kosmides for points. Kosmides is confident that he can win, but the battle is tight and those other guys are good.

Therefore, with three events left in the season at our press time, it looks like Kosmides might very well realize his dream of winning a National Pro Rally title. And then what? Hang it up? "No way!" said the Ruby's baron. "I plan to rally until I can't do it any more."

"If I don't go for the rally championship next year, I might try to take the Supra to Pikes Peak. That'll be tough, because the Supra doesn't fit well into a class, but it's one of those things that you try because you love competing." And for Ralph, the man with a string of successful restaurants to his name, that's all in a day's work. ■

