

GOLDEN WEST CYCLE HONDA 275R NEVADA 1000 WINNER

Long distance desert dominator

There's an art to building a fast race quad, but putting together an ATV that can win an event like the torturous Nevada 1000 almost qualifies as magic. Consider what the machine has to do; it needs to have the power to run with the fastest quads made, and it has to have the durability to run wide open for hours. We're talking a *thousand miles* of racing here!

Just to complicate matters, the machine has to be tractable, and not just a top-end rocket, because parts of the course are technical. The last thing you want is an engine

with no low-end torque or

an explosive power delivery on a rocky, challenging climb. When Doug Eichner crossed the finish line ahead of all the other ATVs at the Nevada 1000, we had to find out what makes the highly modified Golden West Honda 250R he rode with teammate William Yokley run so fast, for so long. Amazingly enough, Golden West, a major mail-order high performance parts company, built the machine with parts right from its shelves. That means you could put together a quad as fast and as remarkably rugged as the Eichner/Yokley machine for next year's Nevada 1000, or other long-distance



Even at desert racing speeds on rough terrain, the machine's wide stance and long wheelbase keeps it stable.





GOLDEN WEST CYCLE HONDA 275R

desert events. If only you could phone Golden West (contact: [800] 383-6776) and order Yokeley's and Eichner's riding skills, too!

To see what the race-winning machine was like, we went riding with Eichner. After we had enough photos of him on the Golden West Honda in the bag, we hopped on his race machine. We didn't want to give it back! Here's what it's like.

WHAT'S INSIDE THE ENGINE?

Almost every performance part Duncan Racing offers for the Honda 250R engine. The heart of the motor is the Duncan power-valve-equipped PC2000 cylinder. To broaden the power, the big-bore cylinder ups the Honda 250 engine's displacement to 275cc. A Duncan Racing-modified 37.7mm Keihin carb adds top-end power and lets the engine rev for the open desert terrain. The ignition-timing setting is fixed on the stock Honda engine, so an adjustable Hinson billet ignition holder was added. Duncan's Paul Turner Eliminator pipe and Fat Boy Silencer complete the engine package.

Even though the engine is highly modified, Golden West knew it would have the reliability for the Nevada 1000. That's because the combination of parts on the Eichner/Yokely machine has been extensively tested by Duncan Racing before being offered for sale. Numerous racing teams have also proven similar combinations to be reliable in competition.

WHAT KIND OF POWER DOES IT PUT OUT?

This machine is stronger, over a wider rpm range, than any two-stroke race machine we've ridden recently. The GWC R always feels like it's in its power-making range, so it's not necessary to be in just the right gear to get the machine to accelerate hard. Usually, it's possible to just roll the throttle on to get into the real meat of the power. In situations where the engine is revving hard, Eichner's machine always has some extra pull available on top, too. This engine is far easier to ride than typical, highly tuned two-strokes that feel dead before the power hits and then go flat after the power peak. It feels something like a modern full-race four-stroke quad, like the type powered by a Honda CRF450 motocross motorcycle engine.



Golden West used Duncan Racing's PC2000 power-valve 275cc cylinder with desert porting for the Nevada 1000. This engine had the power and reliability to dominate the long, high-speed race.



The Golden West machine's full-race rear suspension includes a fully adjustable Custom Axis shock and Roll Design swingarm.



Abundant, controllable power makes Golden West's modified Honda as effective on technical sections of a desert course as it is in wide open spaces.



For the speeds Eichner and Yokely hit on the Nevada 1000 course, high-end suspension is a must. Custom Axis remote reservoir shocks keep the front end under control.

The powervalve cylinder is the key to the wide power spread. Because the power valve varies the exhaust port size, it effectively varies the porting, so the engine operates like it is tuned for low-end and top-end power.

WHAT MAKES IT HANDLE?

Proven desert racing chassis technology. Riding a distance event like the Nevada 1000 would be torture with a machine that doesn't have the ability to offer a comfortable ride on bumps ranging from small rock impacts, to whoops, to high speed G-outs. To handle this huge spectrum of conditions, Golden West used Custom Axis shocks. Desert courses can be rutted and very rocky, so the ride height is higher than is common for a motocross or cross country machine for maximum ground clearance. Massive suspension travel, 12 inches at the front wheels and 13 out back, add to the ground clearance and help the machine absorb what the rough terrain and high speeds dish out.

At desert racing speeds that can approach 90 mph, a rider needs all the control he can get. Eichner's machine uses a Roll Design Lobo chassis for its durability and rigidity. The Lobo II front end's 50-inch width makes the machine super stable, yet it's narrow enough to get through typical obstacles on the desert course.

An RPM 2+2 axle brings the rear width to 49 inches. Used with the Roll 18-inch swingarm, this setup provided the balance between stability and maneuverability Eichner needed.

ARE THERE MORE RACE-WINNING MUSTS?

Plenty. The details of a race-winning machine are as critical as its engine and chassis. A failure of any highly stressed part make victory evaporate like spilled race gas.

Golden West outfitted Eichner's machine with equipment that has proven to survive desert racing abuse. ITP XCT tires have the tall profile needed to help rims survive, and they offer excellent grip and durability at high speeds in rocky terrain. With Douglas Ultimate wheels, with rolled inner and outer edges, the wheel assemblies handled the Nevada 1000 course with ease. Honda brake calipers with Braking rotors and pads take care of the speed removal chores.

Even the seat was prepped for the long haul. A tall One Industries seat assembly gave the riders a comfortable place to perch when the rare opportunities to use it came up. Tag handlebars, outfitted with Golden West handguards, made sure the riders' fingers would be in place and that there would be something to hold onto after a thousand miles of desert.

HOW DOES IT FEEL?

Like a winner. The Roll Design chassis and long-travel Custom Axis suspension feels completely at home at speed in the desert. Even with settings that are firm enough to control bottoming for Pros like Eichner and Yokley, the suspension's compliance makes for a smoother ride than some stock machines.

This quad also has a light, effortless feel that production ATVs lack. In addition to making every maneuver noticeably easier, it also makes the machine less tiring to ride, something that really pays off in a race like the Nevada 1000. The machine's power also contributes to its handling ability. With such a strong, responsive engine, it's always possible to initiate a slide for cornering, and lifting the front end to clear bumps or ruts is no problem. Unwanted wheelies aren't part of the handling picture, though, so it's possible to really pour on the power and still hold the line you want up a steep climb.



Golden West skid plates protected the machine's underside from the miles of rocks on the Nevada 1000 course.

GOLDEN WEST CYCLE NEVADA 1000 HONDA 275R

Engine	Honda TRX250R
Cylinder	Duncan Racing PC2000
Displacement	275cc
Carburetor	Duncan Racing 37.7mm Keihin
Air filter	UNI
Ignition	Honda with Hinson billet holder
Exhaust System	Duncan Racing/Paul Turner pipe and silencer
Clutch	Hinson

CHASSIS

Frame	Roll Design
Front end/width	Roll Design Lobo II/50"
Front shocks/wheel travel	Custom Axis/12"
Steering stem	Roll Design
Rear axle/width	RPM 2+2/49"
Rear shocks/wheel travel	Custom Axis/13"
Swingarm length	18"

TIRES/WHEELS/BRAKES

Tires f/r	ITP XCT/ITP XD
Tire size	23x7-10/20x11-9
Tire PSI f/r	8 lb./8 lb.
Wheels f/r	Douglas Ultimate
Spindles	Honda TRX400EX
Hubs, f/r	Duncan Racing billet/Honda TRX250R

BRAKES

Calipers	Honda TRX400EX/Honda TRX250R
Pads	Braking
Rotors	Braking
Brake lines	Duncan Racing
Brake fluid	Maxima

HANDLEBARS/CONTROLS

Handlebars/bend	Tag T-2/CR HI
Grips	Tag
Handguards	Golden West Cycle
Throttle	Motion Pro Vortek
Clutch lever	Golden West Cycle
Cables	Motion Pro Terminator

DETAILS

Front bumper	Duncan Racing
Skid plate	Golden West Cycle
Seat	One Industries
Tank	IMS 4 gallon w/dry break
Plastic	Stock Honda
Footpegs	IMS
Chain	Tsubaki Omega O-ring
Contact	(900) 383-6776

The Golden West Cycle Honda is so smooth and controllable in desert terrain we could easily see how Eichner and Yokley go so fast on the Nevada 1000 course. It's just the part about going fast for a thousand miles we haven't figured out. □