

MotorWeek Transcripts FYI 'BugE Electric Vehicle'

JOHN DAVIS: Looking for a way to curb your costs on gas, but you can't quite get your hands around a hybrid, and you're just aren't ready to go the motorcycle route! Well, there's another new option to consider for your solo transportation needs, and our FYI reporter Yolanda Vazquez has the scoop on this all-electric solution.

YOLANDA VAZQUEZ: It's the kind of car that stirs up one's curiosity.

MIKE HARVEY, FOUNDER, HARVEY COACHWORKS: It is quite a departure from what's normally on the road.

VAZQUEZ: And if Mike Harvey has his way – this space-age style electric vehicle called the bug-E could become the commuter car of the future.

HARVEY: It is designed to carry one person as efficiently as possible from point to point.

VAZQUEZ: This 3-wheel plug-in cycle car weighs less than 400 pounds and is powered by an electric motor and 4 lead-acid batteries. It has a standard driving range of about 40 miles and a top speed of 45 miles-per-hour.

Harvey got into the electric car business in 2006 – when gas prices hit \$3 a gallon. The former car customizer converted his '92 Cabriolet to battery power – but soon realized he couldn't make a living doing electric conversions.

HARVEY: Every car you convert is a one-off – you don't get that repeatability from a business standpoint.

VAZQUEZ: Further research led him to a company that manufactures and sells the bug-E as part of a do-it-yourself kit. Harvey began building the electric cars at his company garage in Knoxville, Maryland.

HARVEY: We decided to use our experience and take it to another level and make it a commercially viable vehicle.

VAZQUEZ: Each one takes about 4-5 days to assemble and most of the parts – lights, motor, wires – are off the shelf.

The single-seater has handlebar steering with hand brakes and a thumb throttle similar to an ATV.

HARVEY: Your lighting directionals, high beam low beam horns all here.

VAZQUEZ: Other amenities include this nifty storage space in front and a radio with an iPod connector. Harvey – who’s 6’1’’ can easily fit inside.

HARVEY: Well it kind of feels like an airplane cockpit. It takes a little getting used to because it’s not quite a car – but again it’s all about efficiency of space.

VAZQUEZ: Feedback on the SRT has prompted Harvey to build the XRT – extended range transport.

HARVEY: This independent rear is new – the original model had a stiff rear.

VAZQUEZ: The new model will go faster and further thanks to this experimental lithium iron battery pack.

HARVEY: It’s all a matter of energy densities – how much current and how much energy capacity you can you store onboard – and lithium allows us to store up to 5 times more.

VAZQUEZ: Improving battery power is key to the EV’s success – but the concept of an electric commuter is hardly new. Check out this 1975 electric citicar – now stored in Harvey’s garage.

HARVEY: That car will go about 30 miles-an-hour – about 40 miles on a charge so 30 years ago we had technology to do basic transportation.

VAZQUEZ: For Harvey – building the bug-E is a true labor of love. But his overall goal is to heighten the public’s awareness of electric vehicles -- by showing them what’s possible on the roads today.

HARVEY: More people see it, understand it, realize not talking about golf carts here – we’re talking about world class vehicles – like the Tesla and Volt if it comes out will be. And I think every household could probably use at least one EV -- if not a whole garage full of them.