t wasn't our idea to call this Volvo naughty. Volvo uses this term—and attitude—to promote the vehicle. And apparently it works, based on comments we received on the street and on our Facebook page. Volvo indeed has a lingering stigma as a solid but staid set of wheels. We've had good spins in several newer Volvos over the past few years, particularly enjoying the C70 hardtop convertible, with its inline-5 engine and all-wheel drive. We picked the concept S60 as one of our favorites at the North American International Auto Show in Detroit a year ago. Now it's in production, and we're behind the wheel.

# T6 TURBOCHARGED INLINE-6 ENGINE

The spirit of the S60 is in its sheet metal and creature comforts, but the heart of the best is its T6 turbocharged inline-6 engine. Delivering 300 hp and 325 lb-ft of torque (at a low 2100 rpm), the engine delivers fuel economy of 18/26 mpg city/highway (21 combined). The T6 powerplant is on the list of Ward's 10 Best Engines for 2011.

The first T6 engine appeared in the 2009 XC60, but for 2011, it was heavily reworked to reduce internal friction, for both better performance and fuel economy. The new T6 matches the torque of Volvo's V8, but its 2100-rpm power point compares to 3950 rpm for the eight, and the T6 is 17 percent more fuel efficient than the V8. (The T6

is also available in the Volvo S80 sedan and the XC60 and XC70 crossovers.) Fuel economy was also improved with new engine management software and remapping the six-speed Geartronic automatic transmission.

#### **VOLVO S60 BODY AND CHASSIS**

There's no mistaking the evolution of Volvo away from the box of yore, to more curvaceous shapes. The S60 joins the growing pantheon of 4-doors seeking to project a coupe-like profile. Rear door height and back seat headroom are largely intact, but a coupe is insinuated by a continuous body curve from the C-pillar to the taillights. Contoured sheet metal arching above the front wheels, as well as aerodynamic wraparound headlights, create a smooth flow from front to rear.

The interior is roomy for five occupants, but very driver-centric, with neatly clustered instruments easily accessible and slightly angled toward the driver. Our test car came in black leather, with Shimmer Graphite aluminum inlays; two wood inlays are also available.

Information from audio, navigation and other systems is presented on a seven-inch high-definition color display in the center stack, while the driver has access to the same functions via steering wheel controls.

Underneath it all is Volvo's most dynamic chassis ever,

with a choice of three designs. The standard Dynamic Chassis optimizes control and agility while maintaining a comfortable ride. For a smoother ride on rougher streets, there is a Touring Chassis, a no-charge option. The major difference is in dampers and front and rear subframes. A self-adjusting FOUR-C (Continuously Controlled Chassis Concept) active chassis (included on our test S60 at just \$750), has sensors that continuously monitor the car's behavior and adjust the dampers in fractions of a second to suit the current driving situation. The driver can select from three different settings: Comfort, Sport and Advanced. On all three, engineers improved steering and applied stiffer springs and more damping. All-wheel-drive software has also been pushed to the sportier end.

#### SAFETY AND HANDLING TECHNOLOGIES

Volvo's Pedestrian Detection system is a world first: it can detect pedestrians who walk into the road in front of the car, warn the driver and automatically apply full braking power if the driver does not respond in time, completely avoiding a hit up to 22 mph. Related Collision Warning and City Safety systems apply brakes if the car detects an impending collision with a vehicle or object in front. Driver Alert Control detects and alerts a tired or distracted driver. Blind Spot Information System detects vehicles in the offset rear blind spot on both sides, and Lane Departure Warning alerts the driver if the car runs across lane markers without the turn indicator on.

Adaptive Cruise Control maintains a set gap to the vehicle in front, but now operates at speeds below 19 mph, all the way down to standstill. The S60 can be equipped with parking sensors front and rear and a Park Assist camera at the rear. An optional camera in the front grille has a 180-degree field, able to see around a corner to help negotiate blind exits and parking.

### **ACCOLADES FOR THE VOLVO S60**

The all-new Volvo S60 has received a fistful of awards since its introduction in production form at the Geneva and New York auto shows last spring. In addition to its Ward's 10 Best Engines recognition, the S60 is an *Automobile Magazine* All-Star, has had its Pedestrian Detection with Full Auto Brake feature recognized by *Popular Science* as the Smartest Safety Feature in its annual Best of What's New Auto Tech category, and has had its low-speed collision-avoidance technology awarded the American Traffic Safety Achievement Award at the World Traffic Safety Symposium in New York.

#### **OUR TEST VOLVO S60 AWD**

..3.0L turbocharged inline-6: 300hp, 325 lb-ft INDIPPIMENTAL ...6-speed Geartronic automatic w/ Adaptive Shift Logic ..AWD w/ Instant Traction DRIVE. SUSPENSION/CHASSIS: Dynamic chassis, advanced stability control, corner traction control, driver-selectable speed-sensitive steering, front independent struts with anti-roll bar and anti-dive geometry, fully independent rear multi-link, 4-wheel power disc brakes with ABS, EBD, EBA, RAB, 18-inch alloy wheels, all-season tires. SAFETY/SECURITY: Five high-tech seatbelts, traction control, high strength safety cage, airbags galore, whiplash protection (front), adaptive steering column, perimeter lighting system, intelligent driver information, alarm system with battery backup, child safety locks, trunk release, tire pressure monitoring, rear foglight and more. COMFORT/CONVENIENCE: Keyless 2-step entry, 7-inch LCD monitor, sport seats with leather seating surfaces, 8-way power driver's seat, tilt/telescope leather steering wheel, graphite inlays, dual zone climate. Bluetooth™, 60/40 folding rear seat, electric parking brake, cruise, rear center armrest, heated mirrors, rear defroster and more. AUDIO: 4x40 watt 8-speaker system with single-CD and DVD player, WMA and MP3 capability, HD radio, USB and AUX inputs, illuminated steering wheel controls. SERVICE: Complimentary factory scheduled maintenance for 3 years or 36,000 miles. PREMIUM PACKAGE: Power glass moonroof, power passenger seat, dual xenon gas discharge headlights with active bending light (ABL).. TECHNOLOGY PACKAGE: Adaptive cruise, collision and pedestrian warning with full auto brake, distance alert, driver alert, lane departure warning .... Metallic paint (Flamenco Red Metallic)... FOUR-C chassis 750 Destination charge .. 850 ...\$ 43,450

#### **OUR WEEK WITH THE VOLVO S60 T5 AWD**

Driving a Volvo sedan (with NJ plates) made it fun to surprise people with the car's agility and performance: we could always hop on it and go. The S60's performance skills revealed themselves repeatedly, in normal driving. Heading toward a freeway on-ramp, we had a lucky break as a large stake-bed truck veered to the surface road, giving us about an eight-car gap against the other ramp lane. We were able to take them all, starting with an Escalade. We figured the Volvo surprised them all, and we felt like king of the pack. The S60 corners well: it's smooth, it goes where you point it, it maneuvers quickly and accurately. (A downside was somewhat abrupt shifting at times, as we cornered on surface streets.)

A front-wheel-drive S60 with T5 inline 5-cylinder engine starts at \$30,975.

Our logbook did contain a few frustrated moments with controls and switches for radio tuning, heated seats, headlights and dual climate zones. We were disappointed to have keyless entry but then to need to key, to insert in the dash, to use the stop/start button. We also found the car unforgiving in its shutdown sequence, requiring you to put it in park before turning it off, or forbidding your exit. Or so it seemed. An owner's luxury of more time with the manual should reveal all. On the positive side, the design ethic of Volvo seems to put many functions out of mind, so you can concentrate on the task at hand and enjoy the drive. Instrumentation is sparse but functions are extensive. With its center stack pad concentration and vital controls on the wheel, it's not overly complex, while other things seem to be automatic and mostly just leave you alone.

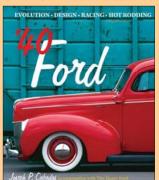
The Comfort-Sport-Advanced settings arrived at our offices set to Sport. Differences among the three felt subtle to us, so we checked the book. Comfort: a somewhat softer ride and the transmission shifts gears at lower RPMs, particularly suitable for long distance highway driving. Sport: in this mode, the vehicle's body sway is reduced during cornering and steering response is more immediate, the transmission shifts at higher RPMs for sportier driving. Advanced: body sway in curves is minimal and steering response is very direct, gear shifts are at higher RPMs in each gear. Sport and Advanced describe very similarly, and our driving experience was also similar, but the presence of FOUR-C active chassis control surely reveals itself regularly, whether it's noticeable or not. Unless fuel economy is highly compromised, we'd probably stay in Advanced.

Yes, the Volvo S60 is being promoted as naughty, at least a little bit naughty, at least against perceptions from the past. The rest of the world may perceive things much as they thought they used to be. But the proof is in the performance, and when you put the pedal to the metal, you'll know this car is as naughty as you want it to be.

## BOOKS: '40 FORD • US AUTO INDUSTRY

# '40 FORD: EVOLUTION-DESIGN-RACING-HOT RODDING

**by Joseph P. Cabadas :** Notable for streamlined style and deco details, the '40 Ford has gained in popularity among classic car nostalgists and hot rodders who



remember the models as monsters of the drag strip and as the affordable first cars or hot rod platforms of their youth.

Motorbooks and The Henry Ford Museum have teamed up to deliver an unprecedented celebration and history of the 1940 Ford. In this illustrated history, auto historian Joe Cabadas delves into the archive of The Henry Ford in Dearborn, Michigan, to offer a complete history of the '40 Ford: the design and production process that led to the car; its various body styles; motorsports



(both circle-track and drag racing); and hot rodding.

Sidebars feature key figures within Ford, the car in popular culture, significant contemporary automobiles from competitors and more. Two hundred rare photographs and illustrations from the collections of The Henry Ford and from photographers around the country marvelously illustrate the iconic automobile. The book hits bookstores March 24.

ABOUT THE AUTHOR: Born in Detroit. Joseph P. Cabadas

is a longtime automotive reporter and the award-winning author of Motorbooks' *River Rouge: Ford's Industrial Colossus* (2005) and *The American Auto Factory* (2003). He lives in Dearborn, Michigan.

# WITCH HUNT: ESSAYS ON THE US AUTO INDUSTRY AND THE BLITHERING IDIOTS WHO ALMOST KILLED IT

by Peter De Lorenzo: Peter De Lorenzo has dubbed the American auto industry a "seething cauldron of brilliance punctuated by flat-out incompetence." In Witch Hunt. De Lorenzo follows Detroit through the auto industry's most volatile time.



As Toyota stumbles, and GM and Chrysler are gutted by politicians and management both, De Lorenzo blisters paint with his prose, as his love of good cars and the true believers who build them alternates with his contempt for those he considers to stand in the way of good product and sensible business practices.

Witch Hunt is more than an analysis of a dysfunctional industry; it's a call to action demanding that what De Lorenzo sees as obstructionists in Detroit, Washington and beyond step aside and let the pride in our country's automotive industry be restored.

For information, visit www.witchhuntbook.com.



ABOUT THE AUTHOR: Peter De Lorenzo is a national columnist who founded <u>autoextremist.com</u>, a website devoted to news, commentary and analysis of the auto industry. His regular reports are nonpartisan, car-centric, and adamantly pro-American. Whether demystifying the buzz surrounding Tesla, or delivering the high-octane truth about Ford's success, De Lorenzo blends industry insight

and powerful prose on his widely-read blog. De Lorenzo also wrote *The United States of Toyota*. He is often quoted in national and international news outlets and has appeared on MSNBC, BBC, CNN, CNBC, CBS, Fox Business News, "Autoline Detroit," SPEED channel and numerous national radio programs to talk about the automobile industry and motorsports.