

DID YOU KNOW..

by : **BOB STEIN**

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Leather seats: The very best product I know of for leather care is LEXOL leather conditioner! PERIOD. Used for years on fine skates, harness, etc. The newer multi-purpose products do not penetrate to rejuvenate and preserve the leather. LEXOL is best! Lexol Corp., West Caldwell, NJ. 07006 (No, I do not own stock in the company).

Engine cleaning: A very fine NON-FLAMMABLE solvent is VARSOL. It is used to clean aircraft engines and engine compartments.

STEERING WHEEL REMOVAL: Volvo says to use a puller. Fine, if you have one. Often the wheel will lift off the shaft easily. If not:

1. Bend back the locking tab and loosen the nut far enough so that it protects the ends of the thread on the shaft.
2. Use a pipe, or piece of hollow shaft. Feed horn wire into the shaft.
3. Place pipe against steering shaft end and rap sharply with a hammer while applying moderate pressure upward on steering wheel. Use your knees or a helper.

This is how flywheels are often removed from small engines like lawn mowers. It works well.

FRONT SHOCK TOWERS-Preventive Maintenance

The front shock towers (mounts) where the upper end of the shock fastens, is a little weak and is subject to failure due to fatigue. I have seen many of them crack or open up. It is smart to reinforce them before they break. Drill a hole for the shock rod in a piece of 3/16" steel and weld on top of the tower.

I strongly recommend this reinforcement before using any high performance shocks like Koni or Bilstein in front, especially if you want to set adjustable shocks at their firmest setting.

My own opinion is that 1800's do fine with regular front shocks and better rear shocks, along with heavier rear springs, for normal driving. I have no experience with racing or driving which makes different demands and requires different equipment.

REAR SPRINGS

ES Springs are equal to and interchange with 122 Sedan.

ES or 122 springs are a stiffer alternative for coupes.

Heavy duty 122 springs, which were an option, would be a stiffer alternative for the ES, and extra firm for coupes.

All of these will physically fit all models.

March/April 1982

Changes Through The Years

Volvo made a handful of modifications over the years, both major and minor. The major ones - the E coupes and the ES - don't need rehashing. Some of the minor ones could stand airing.

Tach Sending Unit. 61-63. Now extinct. Eliminated in 64.

Lower A Frame Bushings, Front, 61-64. Identical to uppers and mounted the same way, with clamps. This was a much better arrangement than the "improvement". Much easier to replace.

Lower Front Shock Mount Plate, 61-64, had only one bolt. Later cars had two. Stronger.

Rear Suspension. Single arm clamped around axle, 61-65. Not as strong, more maintenance, but may handle slightly better than later two rod system.

Manifolds and Headpipes. Two piece, 61-65. Aluminum intake and iron exhaust, single headpipe. I think this was the best setup. These cars start easier, idle better, and have just as good a response. 66-67 used a one piece cast iron intake and exhaust, with a dual headpipe. These were good, but I haven't been convinced that running a dual headpipe into a single exhaust does any good. 68-69 used a single manifold with additional throttle plates and "humps". These were supposed to preheat the mixture. These are the worst that Volvo ever came out with. They are hard starting, hot, cranky, and the throttle plates can stick or freeze up. This was NOT an improvement. Change to a 66 or 67 manifold. It fits exactly and is a smart, simple conversion,. Or, at least remove the throttle plates and plug the holes shut (weld, braze, tap), if it gives trouble. If your headpipe is bad, change to a single pipe and the earlier two piece manifolds. You'll like it.

OD Switch. On Dash. 61-63. Not bad. From 64-69, a "touch" type switch on the column. These gave trouble and are hard to replace. When they break, a dash mounted switch is a good alternative. I like to mount a small bracket under the dash with a toggle switch. 70-73, OD switch on column. This is a good, positive switch that moves up and down.

Headlight Dimmer. On the floor to 69. OK, but prone to rust and malfunction. 70-73, in directional lever. Nice, but hard to replace.

Carrier Bearing Mount. 61-66, mounts with fingers that slide into rubber. Removing drive shaft is easy. this is a nice fix. 67-69, bolts must be removed to drop the shaft. Ok, but a pain. 70-73, like 67-69, but with a small, useless spring to complicate things.

Drive Shafts. 67-71, heavy. Large flanges. 72-73, lighter. Smaller flanges.

Transmission Flanges. 68 only (69?), large, flywheel type. Unnecessary. And a pain.

Radiators. 61-65, large top tank. The best. 66-73 have overflow bottle. OK, but if you have a slight vacuum leak, your radiator could lose coolant but your overflow tank appear full. This is a cheaper, poorer system. The rubber seal in the radiator cap deteriorates. Replace often.

Clutch. 61-65, four spring type disc. 66-73, multiple fingers. Quicker and tougher. 61-69, hydraulic. Nice 70-73, cable, OK.

This list is probable incomplete and does not deal with cosmetics. It is based on personal observation and I'm not always positive of the particular year a change was made. I think this is understandable since an older car may have been modified before I got it, and Volvo, no doubt, made mid-year changes.

The 68 is a unique model in this respect, cosmetically. I have seen the following variations on 68's: side marker reflectors. No side reflectors. Early type steering wheel. Late type steering wheel. Unique 68 122S steering wheel. Low back seats. High back seats. (Head restraints). Early style interior handles, (silver), 140 style handles, (black plastic).

May/June 1982

HANDLING. Middle year coupes (65-68) seem to corner better than E coupes (70-72). The only difference in the suspension of the cars seems to be that the later cars have wider wheels, 5 1/2", (vs. 4 1/2" for the earlier cars) and use 185/15 tires rather than 165/15. I haven't made the comparison with identical shocks and tires, but still, I suspect the sidewalls of the 185's OR the wider wheels- as illogical as it sounds. 165 tires on the wider wheels don't seem to help much. ES's don't corner as well as coupes, probably due to a higher center of gravity and the extra weight of the body and glass high and behind the rear axle, but they are nicer on the highway, somewhat more stable on the straight-away.

AUTOMATIC TRANSMISSIONS. The three speed Borg-Warner 35 used in 71-73 1800s is not known for its durability, but it is nice to drive. In my 72 ES with 3.90 rear, 4000 rpm is about 80 mph, and performance is excellent. down shifting to second is quick and it will stay in second till about 75 so passing is a breeze. The only fault I can find is that the transmission is designed not to go into first gear (even manually until under 6 mph) so engine braking in snow and ice is limited. Highway mileage is about 26 MPG and for everyday driving the automatic is a pleasure!

ES SEATS. 72E and early 72 ES seats are softer than later 72 and 73 ES seats. Softer foam is used. The earlier seats are much more comfortable than the later ones. They are also slightly less prone to open at the seams as the leather shrinks,

UPPER DASH. They all seem to crack on the earlier coupes, not on the later coupes and ESs. The tinted windshields on the later cars is probably responsible for preserving the covering and keeping the foam from shrinking. If you replace the upper dash on an early coupe, a tinted windshield would be smart.

GASOLINE. All the E's I've had worked fine with 89 octane regular gas, even the higher compression 70-71 B-20E's. I would not use no-lead. Retard the timing a degree or two if the engine pings. If all you can get is 87 octane and have a B-20E (70-71), a thicker head gasket (or an "F" head) to lower compression is the simplest solution.

PERFORMANCE. 72-3. If you want more snap, the simplest thing to do would be to try a 70-71 "E" head (or plane the head you have). This should raise the compression to 10.5:1. I don't know if the injection components are compatible. You might need a different air slide (aux. air pressure reg.), colder plugs: and possibly different injectors, but I doubt it.

CLINKS AND CLUNKS. A click or clink in first or reverse as you start is obviously a U joint (nine times out of ten). A clunk is probably a front bushing on a torque rod. My experience is that one of the two can be removed fairly easily. The other one is usually a bastard! The bolt rusts fast to the metal sleeve in the bushing. Try penetrating oil, but a torch or high-speed grinder is usually necessary. Cut the bolt head off and the nut and bolt close to the mounting ears, then spread the ears with a bar and drop the rod out. Once it's out you can drive the bushing out and replace it. Watch out for the gas tank and burning undercoating if you use a torch!

PARTS PRICES. The last Mitchell Collision Guide is dated 8/81. Most people around the country are being quoted prices that are 10 to 20% higher than in the guide.

LENSES. Someone ought to make a tail light lenses! \$24 - \$26 for a coupe lense is unconscionable! We should boycott Lucas! They are the suckers who no longer make 1800 headlight buckets, and want over \$55 for an ES tail light lens.

July/August 1982

FRONT JACKING POINTS. PLEASE DON'T use them! unless your car is a rust free gem. They will collapse sooner or later. Jack under A frame (or anywhere else. All frame parts on 1800's are folded sheet metal (translation: junk, "tin"). They usually rust from the inside and can disintegrate, sometimes leaving the undercoating intact. It would be smart to drill a couple of weep holes to let water and condensation out.

WINDSHIELD WIPER BUSHINGS. These bushings at the top of the wiper post sometimes get "buggered" and the arm will slip. I've been told that Volvo doesn't list them or that they can't be obtained. All 122, and early 144 will fit, but they're hard to get off in usable condition. They are pot metal and quite thin. Use two screwdrivers and pry up at the lower edges, carefully. If you get one out of two, you're as good as I am. To install, lubricate and tap gently until flush with the top of the post.

FUEL INJECTION HOSE CLAMPS. These can leak as the hoses age and shrink. The Volvo clamps have a limited tightening range and will not clamp tight enough when the hoses compress with age. Replace them with 3/8" stainless clamps.

NOTE. I now have Volvo parts books and service manuals for ALL VOLVO'S through 1973. 444 through 144 and 164, most service bulletins, and a parts price book. (The fog is beginning to lift!)

NEWS. I have finally located a SWEDISH CONNECTION and can offer complete ROCKER PANELS made with Volvo's dies for \$100 post-paid. Hopefully there'll be other parts that I can arrange for.

September/October 1982

SHOP MANUALS: Hayne's is about the most explicit. Chilton's and Volvo's are good. However, there are times when some specs and information is in NONE of the manuals, including Volvo's. Some specs, for example, are only included in promotional literature, owner's manuals, or Volvo Car Handbooks, yearly books for Volvo salesmen.

OVERHEATING: Several members have called with overheating problems in traffic in E and ES cars with air conditioning. I can suggest:

1. An early radiator (up to '65) which has a top tank and a couple of quarts greater capacity. This should help some.
2. Throw out the fan clutch and get a 5 or 6 blade fan.
3. Figure out some way to mount an electric fan in front of the radiator and AC condenser.
4. Mount condenser farther forward to allow better air circulation. Hoses may have to be lengthened. Results may be minimal.
5. Replace radiator with an automatic trans. radiator and add a transmission oil cooler and circulating pump. This is quite extreme.
6. Install an oil cooler.
7. Open the hood.
8. Run AC intermittently.
9. Turn off AC and sweat.
10. Remove AC and sweat.

EXHAUST SYSTEMS: I suggest removing the exhaust mount at the transmission. This is a poor place to put stress on the system. The motor mounts only move a small distance compared to the body at the rear of the car. The system will have less stress without this mount. Another school of thought is that removing this mount is responsible for cracking the exhaust manifold on FI motors. The nature of the cracks doesn't seem to me to bear this out.

Midas Muffler Shops have exhaust systems for all 1800s. I was quoted \$43.95 installed for a front muffler on an ES. Volvo gets more than that for the muffler alone and Midas gives a guarantee. I don't know if they have the correct mounting hardware, but who cares? I have heard lately that the rear muffler mount for E and ES are no longer available.

Volvo uses too many mufflers and resonators on the E-ES cars! The front muffler does very little, anyway. I got mad last month and replaced the front muffler with a straight pipe on my 72ES. It's quiet enough and doesn't hang down to get caught on things and I've removed a lot of weight and stress on the whole system.

WATER AND OIL TEMP GAUGES ON E AND ES: NO TWO READ ALIKE! They are Junque, and the senders probable stink, too. The only way to check your particular water temp ga. is to get the system hot and check the coolant with a thermometer. Then you'll have a reference for your gauge.

LOCKS: If you have to replace a door or truck lock and don't have a key, or don't want the hassle of additional keys, try this:

1. Remove the lock.
2. Insert whichever key you want to use.
3. File or grind the flat pins flush with the cylinder, top and bottom.

Your key will now work. In some cases you may lose the effect of a pin or two, but it will be of no practical significance.

If you use a blank, the lock will open with a knife blade, screwdriver, or anything else you can get in it, but who'll know it? If this bothers you, file the blank down 1/16" or so, or any other shape that suits your fancy, insert and file.

November/December 1982

Steering: I never say this before, then twice in one week! Coincidentally, both cars were ES's.

Standing still, when rocking the steering wheel back and forth a moderate amount, there is a loud "clank" from the steering box area. It turns out that the vertical bolt that fastens the x-member to the left frame rail is not tight enough. Most of the steering stress is put on this rail just below the steering box. If the x-member is not fastened securely to the frame rail, the frame flexes from side to side from the stress.

Bend back the locking tab and tighten. 150 ft. lbs wouldn't be too much. That's VERY TIGHT with a breaker bar.

I'm seriously considering making a repair panel that would replace the headlite and parking lite area where rust is so common. The piece would straddle the seam between the fender and nose. It would cover both lites and go about four inches back. If you are interested in such a part, please drop me a line so I can get an idea whether it's worth the incredible amount of time, effort and money involved.