Silencing the horn rod buzz.

Although the restoration project on my 1929 model 60C blindback was performed with the thought of making the car the tightest, quietest and coolest car going so as to maximize comfort on long tours, it did end up with the typical need for fine tuning that we have all experienced. True, because of the improvements I implemented in the restoration and reassembly process, most of these innovations would actually be point losers by judging standards, but that was not a concern, as my goal was tight and quiet.

Much to my dismay and aggravation, one item I did not think of modifying was the re-pop horn rod that was included with the F-100 steering box assembly I got from Mel Gross. The steering boxes are great, but the horn rods have their own problems. They buzz and vibrate at certain engine RPM's and can at times be really very annoying and very loud. I have come up with a fix that I think is new – but if not, it might be worth repeating as it has truly made the ride in my A much, much more enjoyable without the constant buzz.

What I found was the horn rod buzzes and vibrates at certain engine RPM's because of three things. First, the horn rod is a little too loose where in sits inside of the steering column up at the top where the steering wheel nut holds the steering wheel to the shaft. Second, The horn button itself is too loose and rattles around in its housing. Third, the wire that runs down the middle of the horn rod rattles as bad as a bunch of BB's in a tin can. Take a re-pop horn rod and tap on it with your hand – items two and three are very, very obvious.

The fixes are as follows – and yes folks, they work.

- 1- The re-pop horn rods are aluminum the originals were steel and sized better. The nominal 3/8" diameter aluminum tubing that the current manufacturer uses is only about 0.008" smaller in diameter than the original but leaves enough slop to allow the rod to start vibrating up at the top. To eliminate the slop, I wrapped a 1½" wide piece of aluminum tape (air conditioning duct sealing tape) once around the upper part of the tube right up under the bezel that the light switch is part of. Don't overlap the tape as it will make the diameter at that point too thick and it will not go into the steering shaft. Also, as you are laying on the tape, burnish it with a small round shaft or a Phillips screw driver. The aluminum tape takes up just the right amount of room and when lubricated will last as long as the aluminum tube. As you reinsert the horn rod into the steering column coat, don't forget to lubricate it with grease.
- 2- The horn buttons are a little smaller than the original and the spring that they use today is really weak compared to the original. There is not much you can do about making the horn button larger or its housing smaller, but you can eliminate the vibration by either installing an original spring, or by simply stretching the spring that is in there to twice its present length. To get at the spring, simply bend up the tabs on the underside of the light switch bezel and remove the button retainer, the button, the spring retainer, and the spring taking note the location of the four parts that are in there. The parts are big, so don't worry about loosing them. Stretch the spring and put it all back together. Using a larger socket that goes over the button but sits on the button retainer is a great way to hold the retainer solid while the tabs are bent back in place to secure the retainer. Don't worry, the tabs

won't break on one or two bends. Once assembled you will find the button nice and firm but still very operable.

3- The last one is the major fix and one has to be careful. The original horn rod had the wire in it, just like the re-pops, that runs from the button contact at the top down to the contact point at the bottom of the rod. The problem is, the insulation on the original wire was thicker in diameter than the new wire and also softer. The original wire had a thick rubber jacket over the copper which was then covered in a woven cotton jacket. The insulation took up more room allowing for less vibration (Motion) inside the tube. The new wire has a single, relatively thin, plastic or Teflon covering which is electrically fine, but mechanically vibrates and because it is harder, rattles all over the place inside the tube. Try it, grab a re-pop and shake it. The fix here is a little trickier. Since you can't really disassemble the horn rod (unless you have the special tools to redo the ends), you have to get at the wire through the sidewall of the tube. I did the following. I divided the tube length, starting about 8" from the contact end, equally so that I ended up with Five (5) equally spaced wraps of 11/2" blue painters tape on the rod with the first and last tape being about 8" from the ends. Masking tape is also OK. With a Dremel tool and a 1/8" diameter "ball" bit, I was able to put in five (5) 1/8" diameter holes in the tube side wall using the tape as a guide. Although it probably isn't necessary, I rotated the placement of the fill holes ¹/₄ turn around the tube as I went along the rod. After I got the holes open, I then pumped in a black roofing caulking into the holes so as to immobilize the wire. I am sure that any caulking or RTV silicone sealer would also work just fine. After pumping in the compound, remove the tape which saves a lot of cleanup. The idea of the caulking is to simply immobilize the plastic coated wire in the tube to keep it from rattling.

The above method works and I am pleased with the results. So if the horn rod buzzing bothers you, there is a way to fix it. If Tom Endy wishes to make a seminar out of "silencing the horn rods", I am available to help. Respectfully submitted, Lew Lewis.