

**Autowoods highly recommends installation of your custom steering wheel by a certified G.M. airbag installer available through any dealership or authorized auto body shop. Custom shops are also excellent for installation services. We provide this guide for any who may feel comfortable with a few hand tools and understand the steps involved. We are certified G.M. Airbag System installers and licensed trainers. With over 10 years of experience, you will find detailed installation tips here found nowhere else. Please call us directly if you need additional clarification. We are always glad to provide technical support for our customers or potential customers. Read all instructions prior to installation.**

**Pre- Installation steps:**

- 1) Turn ignition key to "Ignition Power" without cranking motor and observe airbag lamp flash in instrument console. If airbag lamp flashes 6 or 7 times then turns off, then your airbag system is fully functional. If the airbag indicator remains on and does not turn off, then do not install your upgrade replacement steering wheel until your airbag system has been inspected and repaired first.**



- 2) After the system test pass, disconnect the negative battery terminal 15 minutes prior to installation. This step allows the SDM (Sensing Diagnostic Module or Airbag computer) to discharge the backup power for airbag. After this step, there is no way for ignition power or DM power to be available for deployment power.**

## **Removal of Airbag Module:**

1) With steering wheel aligned straight forward, remove the airbag module with a pointed tool that is inserted into each side of the airbag through an access pin hole. You will see a small access hole on each side of the steering wheel back cover. (see picture below) By using a drill bit or a scratch awl, push the inner release pin to disconnect the airbag. With one hand on the cover, you can feel each side of the airbag module release when this step is done.



2) Tilt the detached airbag to one side and remove the connector (s) that are plugged into the rear of airbag module. Single stage airbag will have one connector, whereas a dual stage airbag will have two connectors.



To disconnect, squeeze the connector to unlatch the wire connectors). Each one is color coordinated and keyed for re-installing. Lay airbag module on passenger floor board or other undisturbed area facing up.

### Service Advisory

- Carry any airbag with trim cover pointing away from you.
- Any airbag system component, ie. sensor, SDM, DERM or Airbag module that is accidentally dropped from a height of 36" or more should be replaced.
- Store with trim cover facing up.
- Never store airbag module near loose, or flammable objects.
- Never store near a heat source capable of producing 65 C. temperatures.

### Removal of Steering Wheel:

1) See picture of what wheel looks like underneath airbag. Next step is to unplug horn contact lead pin. The pin is tethered to red wire leads connected to the airbag retention brackets. Push pin down and turn 1/4 turn then pull out.



- 2) Disconnect the switch control wiring harness located upper center of wheel frame. This is a black connector that is plugged or taped to the frame.



- 3) Using a 13/16" deep socket, extension and ratchet driver loosen the nut which holds the steering wheel on the column spline shaft.



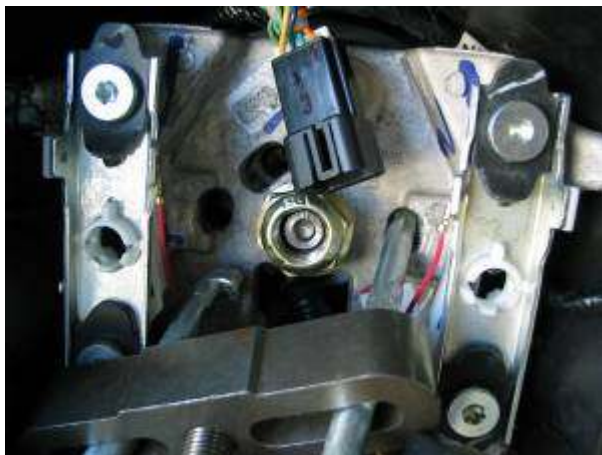
**Tip: Do not remove nut from shaft entirely. Leave nut on the end of shaft threaded a few turns in order to catch the wheel if it is extra tight and wants to "pop" off during removal.**

4) The only specialty tool you will need is a steering wheel puller with G.M. Puller Legs. NAPA Part # 3510 or equivalent available at most local auto parts stores, ie. Pep Boys, Auto Zone, O'Reilly etc. Steering Wheel Puller source Craftsman #41833 or equivalent also readily available at same locations.



5) Steering wheel legs will insert in through holes located on each side of center mounting shaft. Insert legs and turn to hook onto wheel frame. As each leg is positioned, hand thread the puller push bolt down till it meets with column spline, right above the positioned nut still on the shaft (remember). With driver or wrench, slowly turn puller push bolt until wheel is loose.

On left: Positioning legs. On Right: Leg is hooked and center push shaft on puller is ready to be turned with driver or simple wrench.



**When removing loosened steering wheel from the column, slowly guide the wires through the opening in wheel frame directly below the center shaft.**

**Column appearance after steering wheel is removed. Now time to turn our attention to removing component parts from stock wheel and install on upgrade AUTOWOODS Luxury steering wheel. We're half-way done and your doing great so far!**



## **Exchanging wheel component parts:**

**Tools needed to transfer back cover, retention brackets, control switches and wire harness for switches. Long screw driver or blunt tool, and T20 and T30 Torque drive bits.**



**1) Turn wheel over and remove back cover. T20 screw driver or ratchet will remove two (2) small screws. Don't loose these.**



**2) Next, loosen the wire harness that is neatly wrapped around the back frame. Make a mental note of how the harness is wrapped because we will be placing it on the upgrade wheel in the same fashion.**



**3) Using your screw driver, insert the driver into the same access hole where wire harness enters to connect to back of each control switch. Carefully push each switch just enough to be able to disconnect each switch.**



4) Lastly, use T30 Torque bit (an extension on a 1/4" drive works great for me) to remove the airbag retention brackets. **NOTE: The brackets have a top and a bottom and can be re-installed incorrectly by mistake. The tethered red leads are connected to the upper part of these brackets on inboard side. If these brackets are re-installed upside down (which is very possible), it will be nearly impossible to remove airbag in future without cutting up the back cover. (NOTE: The mounting holes in the new upgrade wheel will not be threaded since this is a new frame. The bracket threads will easily self-tap while re-installing on new frame.)**



**Wow! We're done! Well almost.... Just need to do everything in reverse... From start to finish may take 30-45 minutes... a professional should take about 20 minutes .... but the local GM service department will definitely charge you 1 hour service time!**



**Tips to make a professional job look like it was done by a  
PROFESSIONAL!**

**A) The airbag retention brackets need to be installed fully (screw all the way down). If your airbag appears misaligned (too high, tilts to right or tilts to left...then these brackets need to be adjusted. See photo below of airbag that needs further adjustments of these brackets.. This airbag module has a larger gap on the left. That would drive me nuts!**



**B) Regarding the wiring harness, the four connectors are dummy proof meaning all four connectors will only plug into the RIGHT switch. Nice going GM engineers...**

**C) While positioning the upgrade steering wheel back onto the column shaft, notice the arrow lines up with the "alignment mark" on the column spline. See picture below. We don't want a crooked wheel do we?**

## **MOST IMPORTANT AND FINAL INSTALLATION INSTRUCTION**

**After the steering wheel is installed and the battery is connected, the final step before taking your this truck for a spin around the block is to TEST your work ..... HOW? Simple, the onboard SDM computer (Sensing Diagnostic Module) will perform a Diagnostic routine every time you power up ignition. Remember your first step? Key up (cranking engine on is not necessary) and watch for the 6 flashing airbag indicator flashes in console. If after flashing your indicator lamp turns off, then Congratulations on a fine installation! If the indicator lamp remains on, then you will need to check your work and the connector(s) to the airbag module could not have snapped in correctly. Recheck and perform the system check again.**

**We thank all our customers for purchasing an AUTOWOODS steering wheel. We trust this guide has been practical and informative. If you feel a friend may have use for this information, please feel free to share this link. As always, we are glad to assist if further technical assistance is needed.**



**Victor Flores**

**GM Airbag Systems Specialist / Trainer**

**AUTOWOODS 817-767-2007**

**Copyright 2005 – 2007 Autowoods, 1601 S. Airport Dr. #252, Weslaco, TX**

**Disclaimer: Autowoods assumes no responsibility for improper interpretation and application of this technical guide. Individuals are responsible for all risk associated for performing this installation procedure.**