

### TRANSMISSION PARTS

Instructions

# **B1 Clutch Control Valve Kit**

# Part No. 15741-22K



• Valve • Sleeve • Spring

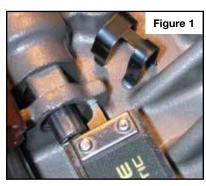
# **Tool Kit**

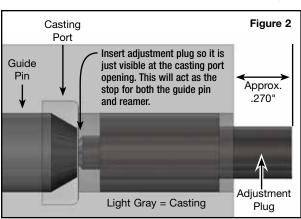
# Part No.

# F-15741-TL22

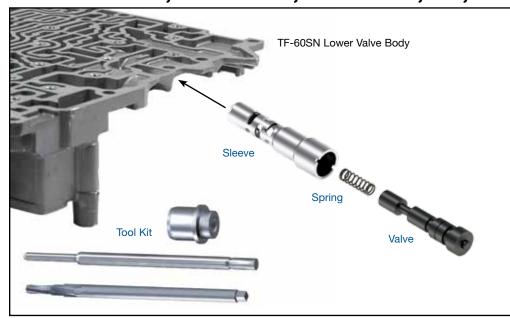
- Reamer
- Guide Pin
- Reamer Jig

**NOTE:** Sonnax "F-Tool" kits designed to service a specific bore require the VB-FIX, a self-aligning valve body reaming fixture. More information and instructions can be found online at www.sonnax.com.





# Aisin AW TF-60SN; Mini 6F21WA; VW/Audi 09G, 09K, 09M



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**CAUTION:** Prior to removal of spring adjustment plug, measure and record distance from plug to the casting. This dimension must be matched during reassembly (**Figure 1**).

#### 1. Disassembly

- a. Remove and save OE adjustment plug retaining clip.
- b. Measure and record adjustment plug-to-casting distance, then remove and save OE adjustment plug.
- c. Remove OE retaining pin and solenoid, set aside for re-use.
- d. Remove and discard OE valve and spring.
- e. Reinstall adjustment plug into empty bore, such that the inboard nub is just visible at the casting port (**Figure 2**). The approximate measurement from casting face to the end of plug

must be .270". Hold in place with adjustment plug retaining clip. The end plug will serve as the stop for the guide pin and reamer.

# 2. Bore Preparation

Ream B1 clutch control valve bore (for reaming instructions/reamer care, please visit www.sonnax.com). Sonnax reaming tool kit **F-15741-TL22** and **VB-FIX** are required for this operation.

# 3. Installation & Assembly

- a. After reaming, remove adjustment plug and thoroughly clean bore. Be certain all debris has been removed from valve bore and body.
- b. Reinstall OE spring adjustment plug and set to the reference dimension noted in disassembly procedure, then reinstall OE adjustment plug retaining clip.

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B1 CLUTCH CONTROL VALVE KIT 15741-22K, F-15741-TL22

Instructions

# 3. Installation & Assembly (continued)

NOTE: To reduce pressure loss past the spring adjustment plug threads, an ATF-compatible thread sealant can be used. Permatex® 24163 surface prep activator combined with blue threadlocker works well for this purpose.

Compound used must not create a permanent set.

- c. Install Sonnax spring into bore, ensuring spring I.D. fits over spring adjuster nub.
- d. Install Sonnax valve/sleeve assembly. A deep-well socket can be used for pressing sleeve into place.
- e. Reinstall OE solenoid and retaining pin.

#### 4. Fit Verification

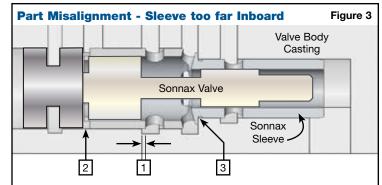
Ensure the sleeve ports align correctly with valve body ports (**Figures 3** and **4**). If significant misalignment is noted (= .015"), shimming or sanding of components may be necessary.



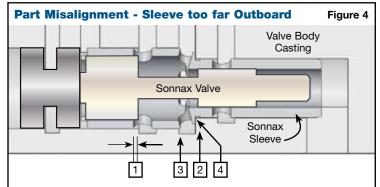
**NOTE:** Individual bore components vary dependent upon application; tuning of sleeve slot to casting port location is what is critical.

### 5. Final Testing

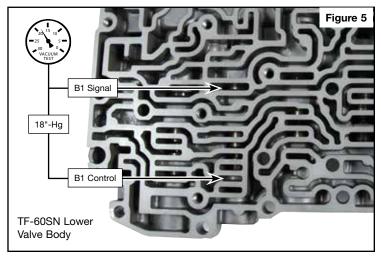
Vacuum testing at the port(s) indicated holds the recommended minimum 18 in-Hg (**Figure 5**).



- Note how the ports are positioned. A portion is under the casting, shifted right. This
  is incorrect; shift sleeve left by this distance.
- 2. Material will need to be removed from either this end of the sleeve or from the inboard of end plug.
- 3. Once material has been removed and sleeve is shifted left, the holes in sleeve should align with casting. The sleeve must be shimmed or Loctited at this location. Shim can be made from coil wire cut from spring.



- 1. This condition can occur due to reamer not traveling deep enough into the bore.
- 2. Casting variance and "valley-flashing" also can short stop reamer travel.
- To correct this and move sleeve to the right, remove material from the casting face and valley. A Dremel® 194 cutter works well.
- 4. In some situations, remove material from edge stop on sleeve.



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