

## Boost Valve Kit

**Part No.**  
**77898E-3K**

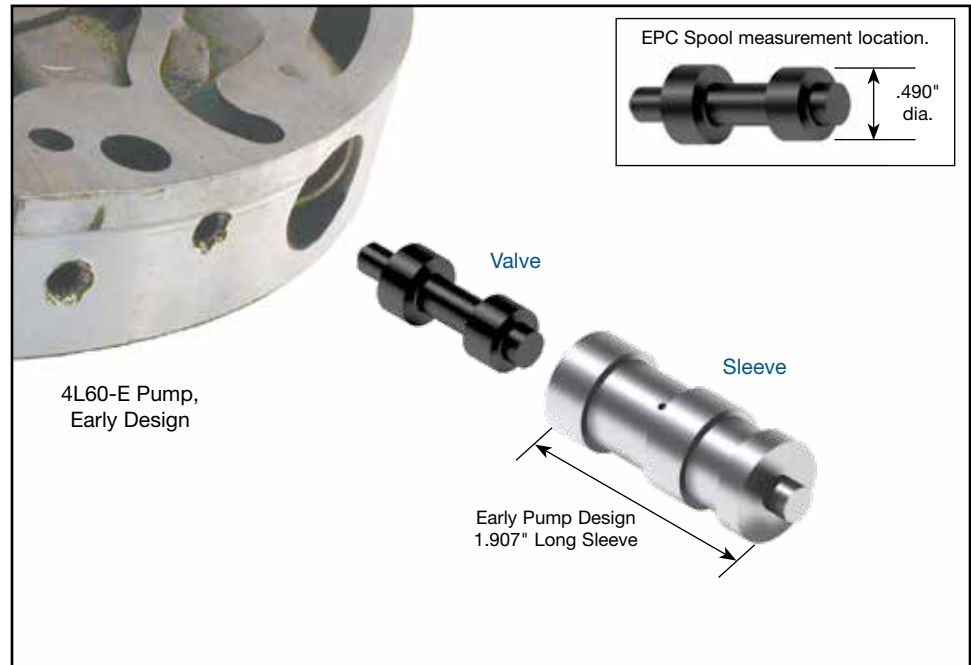
- Valve .490" dia.
- Sleeve

Patent No. 6,619,323

**NOTE:** Early pump design, .490" dia., factory style with increased ratio. See chart for details (**Figure 2**).

**WARNING:** OE has made multiple pump design changes. Transmission will not function properly if the wrong length sleeve is installed. Verify length of OE sleeve and select Sonnax kit with equivalent sleeve length (**Figure 2**).

## GM 4L60-E, 4L65-E



### 1. Dissassembly

- Discard the worn boost sleeve and valve.
- Save the OE retaining clip for reuse.

### 2. Installation & Assembly

- Lubricate all pieces of the Sonnax kit and position OE springs with assembly lube. Incorrect location will create high pressure.
- Insert Sonnax valve into Sonnax sleeve with the nubbed end facing out.
- Carefully push the Sonnax sleeve assembly into the pump body with the open end toward the two springs, only deep enough to reinstall the OE retaining ring clip.
- Return the OE retaining ring clip to the pump body.

### 3. Final Testing

A vacuum test at the port indicated holds 18 in-Hg or more (**Figure 1**).

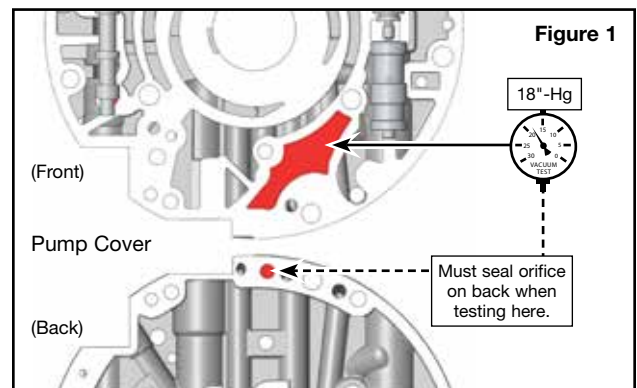


Figure 2

Sleeve	EPC Spool	OE Valve/Sleeve Design	Sonnax with O-Rings		Sonnax "Factory Style"	
Early Pump Design, 1.907" Long Sleeve	.421"	Valve 1 Band	No Sonnax ratio available. Sonnax 77898E-4K may be used, but noticeably firmer shifts will occur.		No Sonnax ratio available. Sonnax 77898E-6K may be used, but noticeably firmer shifts will occur.	
		Sleeve No Groove				
	.470"	Valve 2 Bands	77898E-4K	Valve: 1 Groove	77898E-6K	Valve: 1 Groove
		Sleeve 1 Groove		Sleeve: No Groove		Sleeve: No Groove
	.490" Upgrade for OE .470"	Valve N/A	77898E-K	Valve: No Groove	77898E-3K	Valve: No Groove
		Sleeve N/A		Sleeve: No Groove		Sleeve: No Groove
Late Pump Design, 1.809" Short Sleeve	.421"	Valve 3 Bands	77898E-14K	Valve: 3 Grooves	No Sonnax ratio available.	
		Sleeve No Groove		Sleeve: No Groove		
	.472"	Valve 4 Bands	77898E-16K	Valve: 4 Grooves	No Sonnax ratio available.	
		Sleeve 1 Groove		Sleeve: No Groove		