

**Connector Repair Kits  
for the Agilent 85025D  
and 85025E Detectors  
(Agilent Kit Part  
Numbers 85025-60026  
and 85025-60027)**

**Service Note**



# Notices

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## Manual Part Number

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## Safety Notices

### CAUTION

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A **WARNING** notice denotes a hazard. It calls attention to an operating procedure, practice, or the like that, if not correctly performed or adhered to, could result in personal injury or death. Do not proceed beyond a **WARNING** notice until the indicated conditions are fully understood and met.

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## ***Connector Repair Kits for the 85025D and 85025E Detectors***

### ***Description***

This kit provides the necessary parts required to replace the 2.4 mm or 3.5 mm connector on the detector. The only tool required is a 5/16 inch open end wrench. A small pair of tweezers may also be useful. After the connector is replaced, it is recommended that the operation of the detector be verified, with particular attention paid to the return loss specification.

### ***Parts Included in the Kits***

The following parts are included in the 85025-60026 and 85025-60027 Connector Repair Kits. Refer to [Figure 1](#) to see the reference designator locations.

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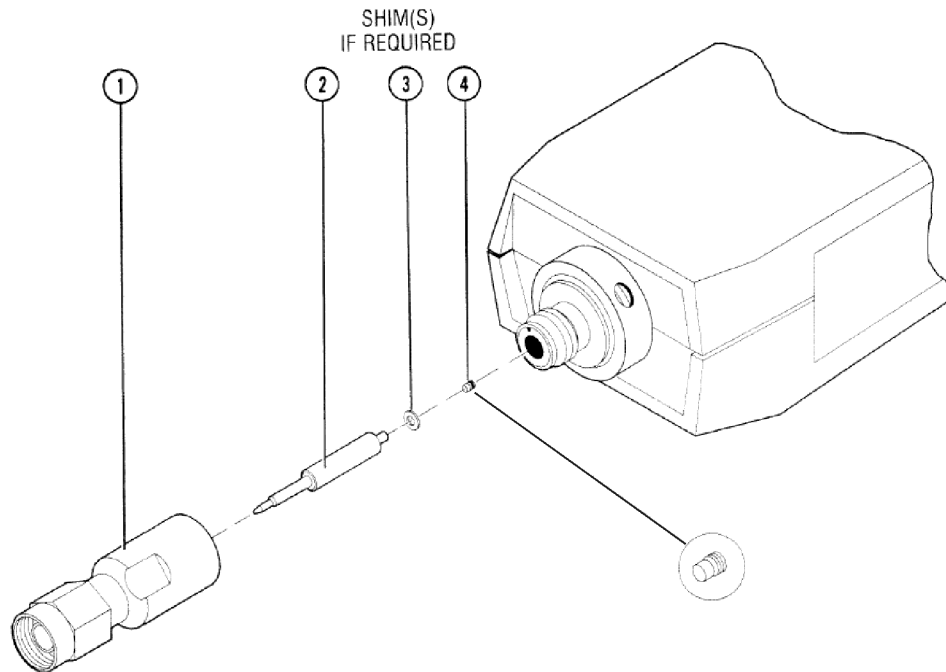
**NOTE** When assembled, the three parts that make up reference designator 1 are referred to as the connector housing.

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<b>Reference Designator</b>	<b>Description</b>
1	Connector body
1	Connector nut
1	Nut retaining ring
2	Center conductor assembly
3	Shim(s)
4	Bellows contact

## Procedure

**Figure 1** Exploded View of the Connector



85025e\_1\_001

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**CAUTION** All detectors are susceptible to damage from static discharge. **BEFORE** replacing the connector, ensure proper safeguards are taken to prevent damage from static discharge. Work only at a static free workstation and ensure you are properly grounded.

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**CAUTION** The bellows contact is extremely small and fragile. If tweezers are used to handle this part, use extreme caution.

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Read all instructions before proceeding.

1. Unscrew the existing connector housing from the detector.
2. Carefully remove the connector body and center conductor.
3. Ensure the bellows contact and any shims are still attached to the center conductor; if not, they must be removed from the main body of the detector.
4. Carefully remove the bellows contact (reference designator 4) from the plastic capsule, and place it on a hard flat surface with the narrow end pointed up.
5. Position the opening at the end of the center conductor assembly directly over the bellows and gently lower the center conductor until the narrow end of the bellows is fully inserted into the center conductor. Do not reuse the original bellows.

6. Install the center conductor assembly into the connector housing as shown in [Figure 1](#).
7. Remove all shims (reference designator 3) from the plastic capsule and place them around the center conductor, making sure they are centered and seated properly. The exact number of shims required (if any) has been determined by the factory and will vary from kit to kit. Use all shims provided.
8. With the new connector in an upside-down position, screw the detector body onto the connector from above. Ensure the center conductor is exactly lined up with the center of the threaded opening of the detector. If desired, a small amount of sealant may be used on the threads of the detector.
9. Tighten the connector body to 20 in-lbs.

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**NOTE** The pin depth of the connector assembly has been measured at the factory and, if assembled properly, should be correct.

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10. Verify proper detector operation with the performance tests in the User's and Service Guide (part number 85025-90063). Be sure to check the return loss characteristics.

### ***Contacting Agilent***

Assistance with test and measurement needs and information on finding a local Agilent office are available on the Web at:

[www.agilent.com/find/assist](http://www.agilent.com/find/assist)

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**NOTE** In any correspondence or telephone conversation, refer to the Agilent product by its model number and full serial number. With this information, the Agilent representative can determine whether your product is still within its warranty period.

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