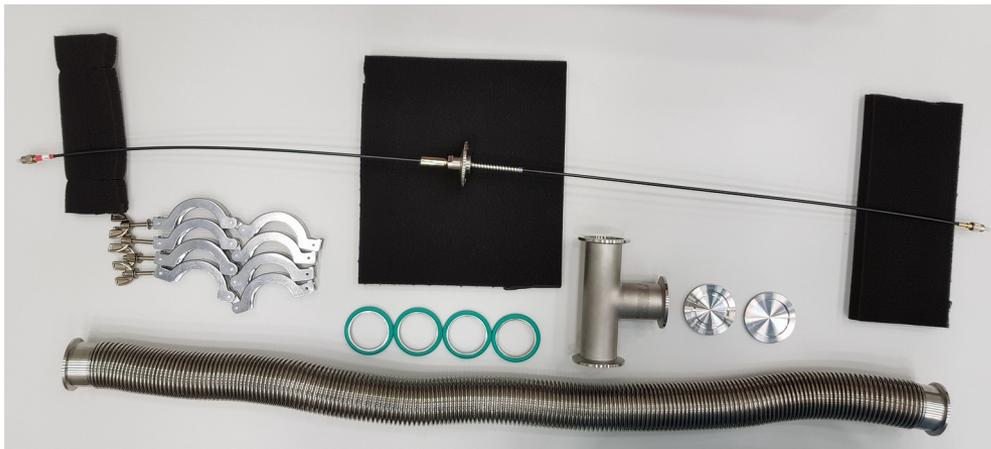


ArtPhotonics MIR fiber vacuum feed-through cable testing — vacuum leak rate result

ESO Public

Helium-Leak Test AP-SN2MCY

- ArtPhotonics demo cable SN2MCY
- Type CIR500/550-100-FC-FC-PE32
- KF40 interface, PEEK tubing
- Leybold PHOENIX Vario leak detector
- Sensitivity $5e-12$ mbar \cdot l/s
- Test procedure (20C):
 - Disassembly, deep cleaning, assembly of cable
 - Blind test without demo cable
 - Test with demo cable
 - He injection at all interfaces including fiber tips and tubing



Helium-Leak Test AP-SN2MCY

- Result:
 - Leak-rate below detection limit
- Item AP-SN2MCY leak-rate:
 - better than $5e-12$ mbar*l/s

