PAUL GOTHE BOCHUM

PAUL GOTHE GmbH

Manufacturer of Emissions Control Technology

since 1924

Product Info: Mercury-MTP-Probe (EPA PS 12B and 30 B)

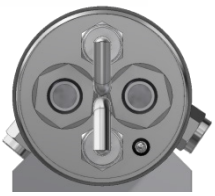
For measurement of Hg-Emission with range from 0,03 to 100 µg/m³.

*The **MTP Probe** for Mercury emission monitoring (**M**ercury **T**rap **P**robe) as convenient alternative to sampling with impinger.*

- ✓ According to US EPA PS 12 B and Test Method 30 B and future CEN/TS guidelines for the Mercury emission monitoring with sorbent traps.
- ✓ With integrated S-Pitot tube and thermocouple to determine the gas velocity, to calculate the volume proportional suction rate.
- ✓ High accuracy because of the two paired three-partition sorbent traps, according to QA requirements (relative deviation of the results from the two traps max. 10%).
- ✓ Thermocouple inside the gas flow avoids overheating more as 130 °C.
- ✓ No Hg losses in the sampling tube because the gas gets at first in contact with the traps.
- ✓ By adjusting the suction time and volume flow rate, the method can be used universally and independent from the Hg concentration.
- ✓ Low maintenance

Suction probe:

- ➢ **Length from 500 to 2000 mm**
- ➢ **Probe diameter: 60 mm**
- ➢ **Material: Steel or Titanium**

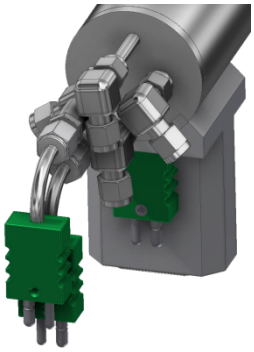


Front: S Pitot with NiCr-Ni and two traps

Applications:

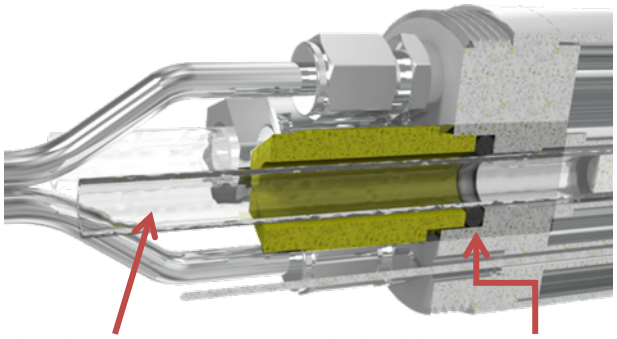
- ➢ **coal-fired power plants**
- ➢ **cement plants**
- ➢ **waste incinerators**
- ➢ **iron and steel works**
- ➢ **chemical industry**

Rear:
4 x cutting ring connections:
2 x for S-Pitot, 2 x for suction
3 x NiCr-Ni
1 x duct temperature
1 x controlling gas temperature
1 x temperature for heat control



General data:

- ➢ **possible range Mercury: 0,01 – 1000 µg/m³**
- ➢ **short and long term monitoring**
- ➢ **heated probe for flue gas temperature < 200 ˚C**



Sorbent traps with three-partition sorbent:

1. Sampling adsorption section.
2. Control section for the breakthrough ≤ 5% of the complete Mercury concentration from the first section.
3. Spike section (QA with the required recovery rate 75 – 125%).

The sorbent traps Ø 10 mm are gas tight closed through Viton O-Rings.
Changes of the traps are very fast, simple and comfortable.
One NiCr-Ni directly behind one sorbent trap for the measurement of the gas temperature prevents temperature over 130 °C.
Our PID - temperature controller prevent temperatures below the dew point.

Info: www.paulgothe.com

Art.-No.: 4.8-A: Stainless Steel, length: from 500 mm to 2000 mm
Art.-No.: 4.8-T: Titanium, length: from 500 mm to 2000 mm
(Other lengths available on request)