

Microphone probe, long 1017342

Instruction manual

04/14 MH/ALF



1. General instructions

The transducer in the microphone probe is sensitive to moisture and mechanical stress.

- Do not subject the transducer to any mechanical stress and do not let it come into contact with any liquids.
- When doing experiments using heating rod K (1017340), do not position the microphone probe directly above the heating rod. Place it in the eccentric drill hole (there is a risk of the transducer being damaged by overheating).

2. Description

The microphone probe is intended for measuring changes in sound pressure inside Kundt's tube E. It consists of a thin metal tube with a transducer (miniature microphone) at the front end. A thread is provided for attachment of the probe disc of the Kundt's tube E.

3. Technical data

Frequency range:	20 Hz to 16 kHz
Connector:	3.5 mm jack plug (tip)
Length of cable:	1 m approx.
Dimensions:	6 mm diam. (approx.) x 810 mm
Weight:	150 g approx.

4. Operation

- In order to measure sound propagation times, insert the microphone through the eccentric hole in the end cap of the tube and through the guide disc inside the tube.
- For experiments investigating standing waves using the Kundt's tube either open or closed, screw the sensor disc onto the end of the microphone probe (only screw it on gently).
- Caution: Move the microphone and the sensor disc into the Kundt's tube only very slowly (there is a risk of damage to the

speaker and microphone probe due to compression of air).

- During experiments which need heating rod K (1017340) inside the Kundt's tube, **do not position the microphone probe directly above the heating rod.**
- Connect the microphone probe to the microphone box.

5. Additionally recommended equipment

Kundt's tube E	1017339
Microphone box (230 V, 50/60 Hz)	1014520
or	
Microphone box (115 V, 50/60 Hz)	1014521
Pulse box K	1017341
Microsecond counter (230 V, 50/60 Hz)	1017333
or	
Microsecond counter (115 V, 50/60 Hz)	1017334
Microphone probe, short	4008308
Heating rod K	1017340

6. Storage, cleaning and disposal

- Keep the equipment in a clean, dry and dust-free place.
- Before cleaning the equipment, disconnect it from its power supply.
- Use a soft, damp cloth to clean it. Do not let the transducer come into contact with any liquids.
- The packaging should be disposed of at local recycling points.
- Should you need to dispose of the equipment itself, never throw it away in normal domestic waste. Local regulations for the disposal of electrical equipment will apply.

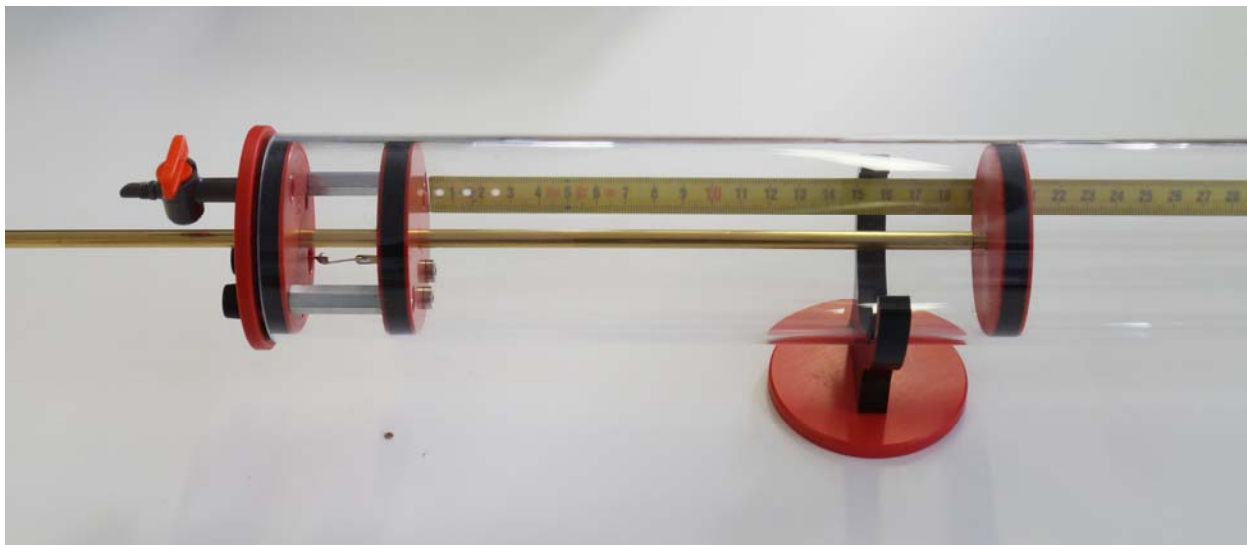
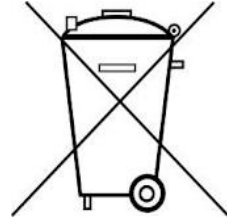


Fig. 1 Microphone probe with sensor disc screwed on