Small Hammer Mechanism (Gösele System)

The Gösele system small hammer mechanism is a structure-borne sound transmitter that, like the standard hammer mechanism, is based on the periodic impact of a moving mass. By contrast with the standard hammer mechanism, however, it is intended predominantly as an excitation mechanism for other components, namely walls, outfitting equipment, pipelines, structures in the automotive, aircraft and machine engineering industry, etc. However it can — with limitations — also be used for ceilings.

While with the standard hammer mechanism, the force of gravity is used to accelerate the striking hammers, the Gösele system small hammer mechanism uses an electro-dynamic force that is generated by periodic DC pulses.

Applications

- For determining the structure-borne sound sensitivity of walls and outfitting equipment in buildings
- Examination of the footfall sound insulation of ceilings and floating floors
- Determination of the joint insulation of structural elements
- Localisation of structure-borne sound bridges with floating floors
- Examination of the joints of double-layer house partition walls
- Examination of the structure-borne sound insulation of sanitary installations
- Examination of the structure-borne sound insulation of pipe mountings
- Excitation of components and structures in the automotive, aircraft and machine engineering industry

Properties / Technical Data

- Hammer weight: 22 g
- Impact pulse: 21 dB lower than with the standard hammer mechanism
- Impact velocity roughly twice as high as for the standard hammer mechanism
- Impact frequency: 10 Hz or individual pulse
- Operating temperature: -20°C to +50°C
- Power supply: 9 V DC plug-in power supply unit
  4 x 1.2 V rechargeable batteries
- Operating temperature: -20°C to +50°C
- Dimensions (housing: 110 mm x 45 mm x 165 mm)