Articulograph AG501

3D Recording of articulatory orofacial movements

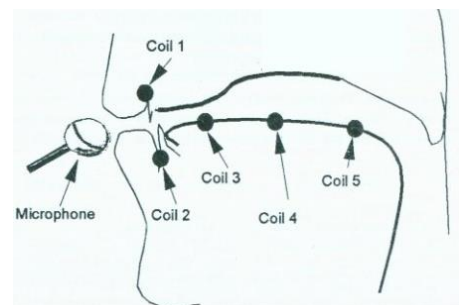## Most Precise Electromagnetic Articulograph (EMA)

Features

- Dynamic positional accuracy as precise as 0.3 mm (RMS)
- Position sampling frequency with an exact timing rate of 1250Hz / alternative 250Hz
- 1 MHz high speed data acquisition for slow motion data analysis
- Head movement corrected 3D-Real time display
- Individual service and a strong community

Application

It is widely used for linguistic and forensic research regarding numerous speech phenomena. The Articulograph is used for the assessment of speech motor behavior of individuals with Parkinson's disease, apraxia, dysarthria, or functional speech motor problems as found in stuttering Non-articulatory research regards grasping movements as can be found in sign language.
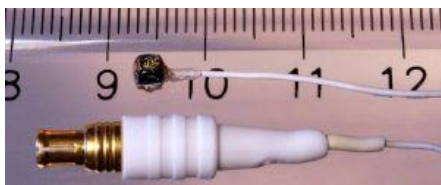
Technical specification

Model **Articulograph AG501**	All-in-one-system with stand, calibration unit, computer, various software, as well as the necessary acoustic equipment for synchronous sound recording. This combination guarantees reproducible results
Operation principles	Nine transmitter coils produce an alternating magnetic at different frequencies. It induces an alternating current in the sensors and results in the values of their position and angle.
Frequency range	7-14KHz
Measurement range	300 mm spherical measuring space
Number of channels	8, 16, or 24, easy to upgrade
Sampling rate	1250Hz alternative 250Hz
Dimensions	Min: 75cm x 111cm x 136cm Max.: 85cm x 111cm x 174cm (W x D x H)
Weight	63kg
Power consumption	60Watt
Power supply	100V – 230V ~ 50-60Hz

Sensor HQ220-L120-B

-Very flexible Noso-Free® coated cable
-Shielded against interferences
-Easy to use connectors

Service & community

Free hard- and software-support via Skype and e-mail.

Dedicated user platform (AGWiki) provided by Carstens: exchange experiences, discuss issues, find information. The active community provides various free software for the calculation and visualization of data.