

Experimental approaches in electromagnetic articulography

Teja Rebernik¹, Jidde Jacobi^{1,2}, Roel Jonkers¹, Aude Noiray^{3,4}, Martijn Wieling^{1,4}
¹University of Groningen, ²Macquarie University, ³University of Potsdam, ⁴Haskins Laboratories

Goals

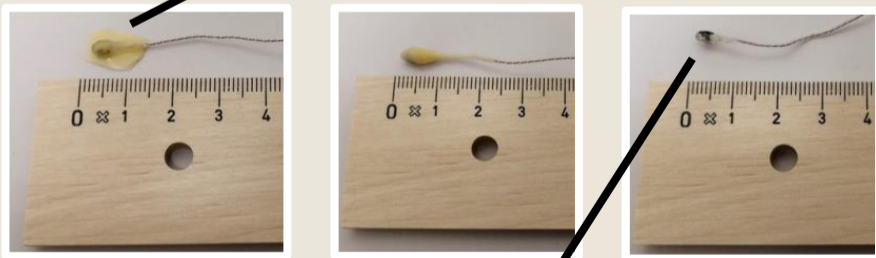
- ▶ **Review** all EMA studies (905 studies, up to 2019) focusing on sensor placement and preparation.
- ▶ Provide a **detailed description** of all steps involved in an EMA study.
- ▶ **Adhesion experiment** to test different sensor preparation.
- ▶ **Paper (link)** forthcoming in *Laboratory Phonology*.

Review results

- ▶ Sample size: $N \leq 10$ (75%).
- ▶ Tongue sensors: 3 along the median sulcus (44%)
- ▶ Differences in strategies for placement:
 - ▶ eye-balling;
 - ▶ measuring;
 - ▶ articulatory.

Experiment: sensor preparation

latex flap: adheres longest in the TB position



out-of-the-box: adheres longest in other positions



Contact: t.rebernik@rug.nl