## **Accepted Manuscript**

On the Relevance of Auditory-Based Gabor Features for Deep Learning in Robust Speech Recognition

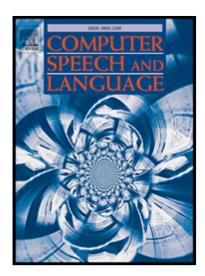
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PII: S0885-2308(16)30021-3 DOI: 10.1016/j.csl.2017.02.006

Reference: YCSLA 831

To appear in: Computer Speech & Language

Received date: 4 February 2016
Revised date: 17 December 2016
Accepted date: 10 February 2017



Please cite this article as: Angel Mario Castro Martinez, Harish MallidiSri, Bernd T. Meyer, On the Relevance of Auditory-Based Gabor Features for Deep Learning in Robust Speech Recognition, *Computer Speech & Language* (2017), doi: 10.1016/j.csl.2017.02.006

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#### ACCEPTED MANUSCRIPT

#### Highlights

- DNN-based speech recognition greatly benefits from spectro-temporal Gabor features
- Gabor filters with high temporal modulation encode the most relevant information
- A measure of phoneme similarity is proposed to quantify class separability
- This metric is used to explain the improved results on phoneme level

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