Accepted Manuscript

Fusion of Bottleneck, Spectral and Modulation Spectral Features for Improved Speaker Verification of Neutral and Whispered Speech

Milton Sarria-Paja, Tiago H. Falk

PII: S0167-6393(17)30470-3

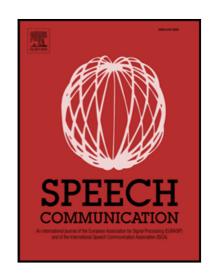
DOI: 10.1016/j.specom.2018.07.005

Reference: SPECOM 2581

To appear in: Speech Communication

Received date: 22 December 2017

Revised date: 11 July 2018 Accepted date: 26 July 2018



Please cite this article as: Milton Sarria-Paja, Tiago H. Falk, Fusion of Bottleneck, Spectral and Modulation Spectral Features for Improved Speaker Verification of Neutral and Whispered Speech, *Speech Communication* (2018), doi: 10.1016/j.specom.2018.07.005

This is a PDF file of an unedited manuscript that has been accepted for publication. As a service to our customers we are providing this early version of the manuscript. The manuscript will undergo copyediting, typesetting, and review of the resulting proof before it is published in its final form. Please note that during the production process errors may be discovered which could affect the content, and all legal disclaimers that apply to the journal pertain.

ACCEPTED MANUSCRIPT

Highlights

- We have addressed the problem of speaker verification (SV) based on whispered speech.
- Two fusion schemes (score-level and i-vector level) were implemented to overcome existing challenges observed for the task at hand.
- The use of bottleneck features in the context of speaker verification using whispered speech.
- Addressed challenges: Short duration utterances (4.5 seconds average),
 no whispered speech data during enrollment from target speakers, and
 negative effects seen when adding whispered speech recordings during
 enrollment
- Dedicated systems per vocal effort offer a promising solution. To this end, a neutral/whispered speech classification system was implemented

Download English Version:

https://daneshyari.com/en/article/6960456

Download Persian Version:

https://daneshyari.com/article/6960456

<u>Daneshyari.com</u>