

Title (EN): **Relationship between trust and entrainment in speech**

Title (SK): **Vzťah medzi dôveryhodnosťou a rečovým prispôbovaním sa**

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Scientific project: Air Force Office of Scientific Research of the United States FA9550-15-1-0055

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Annotation: Within the project, we examined whether the prosodic variability of certain statements influences the perceived veracity of these statements and also whether prosodic entrainment of the speech synthesizer to be similar to the user's prosody influences the trust of the user to an automatic system that uses such synthetic voice. It turned out that although prosodic variability does not affect perceived veracity of the statement, it does affect the subjects' response time so that statements with a higher base frequency (f0) or intensity, facilitate the perception of untruth: longer reaction time if the statement is perceived as true, and shorter if untrue.

The original results of the project also include findings that the entrainment of the synthesizer's prosody can have a positive impact on the user's trust towards an automatic assistant who gives the user advice with such a voice.

Main scientometric outputs:

1. GÁLVEZ, Ramiro H. - BEŇUŠ, Štefan - GRAVANO, Agustin - TRNKA, Marián. Prosodic facilitation and interference while judging on the veracity of synthesized statements. In Proceedings Interspeech 2017, 2017, p. 2331-2335. ISSN 2331-2335. Typ: ADEB
2. BEŇUŠ, Štefan. Rečové prispôbovanie sa medzi človekom a automatickým systémom. In Kognícia a umelý život 2017. Igor Farkaš, Martin Tkáč, Ján Rybár, Peter Gergeľ. - Bratislava : Univerzita Komenského v Bratislave, 2017, s. 8-14. ISBN 978-80-223-4346-6. Typ: AFD