First impressions count, new speech research confirms

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Human beings make similar judgements of the trustworthiness and dominance of an unfamiliar speaker after hearing just a single word, new research shows, suggesting the old saying that 'first impressions

count' might well be correct.

In a research paper published in the journal *PLOS One*, researchers from the University of Glasgow in Scotland and Université Aix-Marseille in France describe how a new experiment shows that listeners draw similar immediate conclusions about the perceived personality of a speaker whether they hear a full sentence or even just a single word.

In the experiment, the researchers played clips of 60 Scottish voices, equally split by gender, to 181 volunteers. The volunteers listened to the voices reading two texts of similar lengths, one of which the researchers termed 'ambiguous content' and the other 'socially-relevant content."

The ambiguous content was the word "colours" and the phrase "some have accepted it as a miracle without physical explanation." The socially relevant content was the word "hello" and the phrase "I urge you to submit your essay by the end of the week," both of which were more likely to be regularly heard in real-life situations by the [study participants](#).

What the researchers found was that the study participants' judgements of the speakers' trustworthiness, dominance and attractiveness were strongly correlated, no matter whether they heard the half-second single-word clip or the three-second sentence, and no matter whether the content of the clips was ambiguous or socially-relevant.

Dr. Philip McAleer and Gaby Mahrholz of the University of Glasgow are the lead authors on the paper.

Dr. McAleer, a lecturer at the University's School of Psychology, said: "We know from previous research, some of which we've done here at the University of Glasgow, that humans make very quick judgements about each other just from the sound of their voices alone, and that

people's judgements of these voices are often very similar to each other.

"What less is known about is whether those impressions remain consistent when people hear others speak for varying lengths of time. We were keen to investigate this aspect further by playing our volunteers clips of the same person speaking a sentence and then one word in contexts which would be familiar and then rather less familiar.

"Our results suggest that humans do indeed make very similar judgements about other people's trustworthiness, dominance and attractiveness whether they hear a sentence or just a single word."

Ms Mahrholz, a postgraduate student at the School of Psychology, said: "Our first impressions are vital to how we make decisions about people, and it's theorised that those impressions are potentially built on the importance of self-preservation – is this new person a friend or a foe? Can they be trusted? Our new research adds to our understanding of how humans understand and relate to each other right from their first impressions.

"There are a lot of potential applications for research such as this, from building voices for artificial intelligence which people will feel more comfortable interacting with to creating more realistic speech for people who have lost their ability to speak. It's a really exciting area to be working in, and we're looking forward to continuing to explore it in future experiments."

The team's [research paper](#), titled "Judgements of a speaker's personality are correlated across differing content and stimulus type," is published in PLOS One.

  More information: Gaby Mahrholz et al. Judgements of a speaker's personality are correlated across differing content and stimulus type,