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Permalink

https://escholarship.org/uc/item/6jw5n873

Journal

Proceedings of the Annual Meeting of the Cognitive Science Society, 28(28)

ISSN

1069-7977

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Publication Date

2006

Peer reviewed

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Keywords: Vocal cues; mental state understanding.

Introduction

Jokes involve understanding complex mental states. They require the listener to understand that the speaker (1) intends to give wrong information, (2) does not intend for the listener to believe the wrong information (e.g. lying), and (3) intends for the listener to figure out the correct information. A normal statement, however, requires the listener to understand that the speaker (1) intends to give correct information.

How do parents cue their toddlers that what they are saying is intended to be a joke? One way is through vocal intonation patterns. Vocal intonation patterns are used to express different intentions. People vary pitch register for communicative purposes, for example, they use a higher pitch to express indignation, and a lower pitch to suggest confidentiality (Gussenhoven, 2004). Furthermore, speakers use falling intonation contours to indicate that the message is common knowledge between the speaker and listener, and raise their pitch at the end of a sentence to indicate an interrogative (Gussenhoven, 2004). In adults, specific vocal intonation patterns are used to express irony (Anolli, Ciceri, & Infantino, 2000). Finally, parents use different intonation contours to elicit babies' attention, show approval and provide comfort (Katz, Cohn, & Moore, 1996). Might parents then use intonation patterns to differentiate jokes from normal storybook sentences?

Methodology

Forty-one mothers read either a funny or unfunny book to their 18-24 month olds toddlers. Sentences from the books uttered by the mothers were analysed for mean fundamental frequency (F_0), amplitude, and speech rate, as well as intonation contours.

Results and Discussion

Mothers in the funny condition used a significantly higher mean F_0 and amplitude, and a faster speech rate. These characteristics may facilitate the child's comprehension as these are common characteristics of infant-directed speech (Fernald & Simon, 1984). Significantly different intonation contours were found between the sentence types such that funny sentences were characterized by a significant rising linear contour, while the unfunny sentences had no significant pattern (see Figure 1). Mothers may use a rising linear contour when joking to indicate that the sentence is open to interpretation (Gussenhoven, 2004).
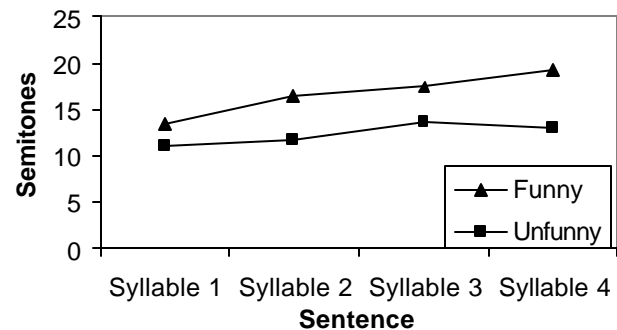

Figure 1. Intonation Contours of Funny and Unfunny Sentences

Acknowledgments

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