Phonetic Accommodation after Perceptual Exposure to Native and Nonnative Speakers

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Background

• Phonetic accommodation
  • is a source of addressee-oriented intra-talker variability
  • arises from the fact that our speech perception-production system is still flexible in adulthood

• Factors that are likely to influence phonetic accommodation?
  • Speakers’ conscious decisions for social distance adjustment (Shepard et al., 2001)
  • Gender and talker roles (Pardo, 2006)
  • Pragmatic goals (Kraljic et al., 2008)
  • Racial and dialectal attitudes (Babel, 2009, 2010)
  • Dialect, native status, and target language proficiency (Kim et al., in prep)
  • Which phonetic features appear to be affected?
    • Voice onset time of initial stops (e.g. Heller & Pardo, 2010; Nielsen, 2008; Sancier & Fowler, 1997)
    • Vowel formants (Babel, 2009; Delvaux & Soquet, 2007)
    • Spectral mean of /j/ (Kraljic et al., 2008)
    • Duration/speaking rate (e.g. Giles et al., 1991; Korean speakers of English might still read verbs with high pitch in Korean)

Methods

• Model speakers
  • 3 female native speakers of English (dialect: Illinois)
  • 2 female Korean speakers of English (proficiency: high and high-mid)

• Subjects
  • 60 female native speakers of English
  • 2 experimental groups and 2 control groups
  • Each group was exposed to one of the two sets of materials during the exposure phase.

• Procedure
  1. Pretest (Production)
  2. Exposure (Perception)
  3. Posttest (Production)

Methods (continued)

• Experimental Groups
  - Native 1: Mid proficiency nonnative model speaker
  - Native 2: High proficiency nonnative model speaker vs. native
  - Control 1: Native model speaker vs. nonnative model
  - Control 2: Native model speaker vs. nonnative model (low proficiency)

Preliminary Results: CV duration of monosyllabic words with a voiceless onset

Experimental Group 1
  - Auditory Exposure Effect on Generalization
  - Visual Repetition Effect on Generalization

Experimental Group 2
  - Auditory Exposure Effect on Generalization
  - Visual Repetition Effect on Generalization

Control Group 1
  - Auditory Repetition Effect on Generalization
  - Visual Repetition Effect on Generalization

Control Group 2
  - Auditory Repetition Effect on Generalization
  - Visual Repetition Effect on Generalization

Research Questions

1. Do subjects show phonetic accommodation after perceptual exposure to a model speaker? (YES and NO)
2. Do subjects generalize phonetic convergence patterns to untrained materials? (YES)
3. Does the linguistic distance between the model speaker and participants affect the degree of phonetic accommodation? (MAYBE)

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