Introduction to Phonology

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Not all [t] are the same. Not everyone produces it the same way. Not all words have the same [t]: [t] in 'tika' is not the same as that in 'pataka'. In phonetics, we saw how these sounds are produced and how they can be analysed. Here we will see the mental representation of those speech sounds of a language in an idealised speaker of the language. We will study the pattern and system of speech sounds in their abstract form.

- The study of the structure and systematic patterns of sounds in human language.
- The study of distinctive features (i.e., the properties or underlying design of the sound system).
  - Phonetic properties or features that distinguish phonemes from one another.

Phonetics vs phonology

Phonetics
- Real representation of sounds.
- Phones: any sound in human language.
- Two square brackets [ ].
- Phonetic explanations are independent of language.

Phonology
- Abstract representation of sounds.
- Phonemes: smallest structural unit distinguishing meaning.
- Two slashes / /.
- Phonological explanations are specific to particular language(s).

Phoneme and Phone

- Phone: Any speech sound, e.g., $[p]$
- Phoneme: A set of phones, where the phones are the variants of the same phoneme
  - e.g., in English, $[p]$ in 'spin' and $[p^h]$ in 'pin' belong to the same phoneme $/p/$
  - e.g., in Nepali, $[ɖ]$ (voiced retroflex stop) in 'ḍamaru' and $[ɽ]$ (voiced retroflex flap) in 'gāḍi' belong to the same phoneme $/ɖ/$
- Two phones belong to different phonemes if replacing one for the other changes the meaning of a word.
  - e.g., $/p/$ and $/p^h/$ are different phonemes in Nepali: $/pal/$ vs $/p^hal/$

Allophone

- All the phones of a phoneme
  - e.g., $[p]$ and $[p^h]$ are allophones of $/p/$ in English
- Depends on the phonetic environment.
  - Near the retroflex stops $[ʈ]$ and $[ɖ]$, alveolar liquid $[l]$ becomes retroflex $[ɭ]$, e.g., 'khāldo' [kʰɑːɭɖo] and godlā [godɭɑː]
  - $[l]$ and $[ɭ]$ are allophones of the same phoneme $/l/$

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