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BA English Honours | Semester V | Calicut University

Introduction to Language and Linguistics

Course Code: ENG5CJ303 • Module 3 Notes

Module III: Language Descriptions: Sounds, Words, Sentences & Meaning

1. Phonetics and Phonology: The Architecture of Speech Sounds

Phonetics and phonology represent the physical and cognitive foundations of spoken language. While *Phonetics* analyzes the physical properties of human speech sounds regardless of language, *Phonology* investigates how speech sounds function systematically within a specific language to encode meaning.

- **Branches of Phonetics:**
  - *Articulatory Phonetics:* Investigates how speech sounds are produced by the movement and contact of vocal organs (articulators).
  - *Acoustic Phonetics:* Analyzes the physical sound waves transmitted through the air, measuring frequency, amplitude, and duration using spectrographs.
  - *Auditory Phonetics:* Investigates how the human ear, auditory nerve, and brain perceive and decode acoustic speech signals.
- **Airstream Mechanisms & Vocal Tract Organs:** The vast majority of world languages (including English and Malayalam) rely on the **Pulmonic Egressive Airstream Mechanism**, where air is pushed outward from the lungs through the trachea, larynx, and vocal tract. Active articulators (lower lip, tongue tip, blade, dorsum) move toward passive articulators (upper lip, upper teeth, alveolar ridge, hard palate, soft palate/velum, uvula, pharynx).
- **Classification of Consonants (The Three-Term Label):** English possesses 24 consonant phonemes classified by three parameters:
  1. *Voicing:* Whether the vocal cords in the larynx vibrate (Voiced: /b/, /d/, /g/, /v/, /z/, /m/) or remain apart without vibrating (Voiceless: /p/, /t/, /k/, /f/, /s/, /ʃ/).
  2. *Place of Articulation:* The anatomical location of constriction: Bilabial (/p, b, m, w/), Labiodental (/f, v/), Dental (/θ, ð/), Alveolar (/t, d, s, z, n, l/), Post-Alveolar (/r/), Palato-Alveolar (/ʃ, ʒ, tʃ, dʒ/), Palatal (/j/), Velar (/k, g, ŋ/), Glottal (/h/).
  3. *Manner of Articulation:* How the airstream is obstructed: Plosives/Stops (complete closure followed by sudden explosive release: /p, b, t, d, k, g/), Fricatives (narrow constriction producing audible friction: /f, v, θ, ð, s, z, ʃ, ʒ, h/), Affricates (plosive closure released slowly into frication: /tʃ, dʒ/), Nasals (velum lowered, air escapes through nasal cavity: /m, n, ŋ/), Lateral (/l/), and Approximants/Semivowels (/w, r, j/).
- **Classification of Vowels:** Vowels are produced with an open vocal tract without audible friction. English Received Pronunciation (RP) features 20 vowel phonemes:
  - *12 Monophthongs (Pure Vowels):* Classified by tongue height (close/high, half-close, half-open, open/low), tongue advancement (front, central, back), and lip rounding (rounded, unrounded). The most ubiquitous vowel in English is the **Schwa (/ə/)**, an unstressed mid-central lax vowel.
  - *8 Diphthongs (Gliding Vowels):* Closing diphthongs gliding toward /ɪ/ (/eɪ, aɪ, ɔɪ/) or /ʊ/ (/əʊ, aʊ/); Centring diphthongs gliding toward /ə/ (/ɪə, eə, ʊə/).
- **Phonemes, Allophones & Suprasegmentals:** A *Phoneme* is the smallest contrastive phonological unit that changes meaning (demonstrated via *minimal pairs* like /bæt/ and /pæt/). *Allophones* are non-contrastive phonetic variations of a phoneme occurring in complementary distribution (e.g., the

aspirated [pʰ] in "pin" vs. the unaspirated [p] in "spin"). Suprasegmentals encompass stress, pitch, and intonational contours.

2. Morphology: The Internal Architecture of Words

Morphology investigates the grammar of words, analyzing how smaller meaningful units are assembled into complex lexical items:

- **Morpheme, Morph & Allomorph:** A *Morpheme* is the minimal unit of grammatical or lexical meaning that cannot be divided further without losing sense. A *Morph* is the physical phonetic or orthographic realization of a morpheme. An *Allomorph* is a contextual variant of a morpheme (e.g., the past-tense morpheme {-ed} realized as [t] in "walked", [d] in "played", and [ɪd] in "wanted").
- **Free vs. Bound Morphemes:**
  - *Free Morphemes:* Can stand autonomously as independent words (e.g., dog, cat, sing, open). Divided into Lexical (content words: nouns, verbs, adjectives) and Functional (grammatical words: conjunctions, prepositions, pronouns).
  - *Bound Morphemes:* Cannot stand alone; must attach to other morphemes as affixes (prefixes: un-, re-; suffixes: -ness, -ed, -ly) or bound roots (e.g., -ceive in receive, deceive).
- **Inflectional vs. Derivational Morphology:**
  - *Inflectional Morphemes:* Never change the grammatical category (part of speech) or core meaning of the word; they merely encode grammatical relationships such as tense, number, aspect, or degree. English has only eight inflectional suffixes: plural {-s}, possessive {-'s}, 3rd person singular present {-s}, past tense {-ed}, progressive {-ing}, past participle {-en}, comparative {-er}, superlative {-est}.
  - *Derivational Morphemes:* Create new words, frequently changing the grammatical category or profoundly altering core meaning (e.g., sing [verb] + -er -> singer [noun]; happy [adj] + -ness -> happiness [noun]; un- + happy -> unhappy).
- **Word Formation Processes in English:** Compounding (blackboard), Blending (smoke + fog = smog; motor + hotel = motel), Clipping (influenza -> flu; examination -> exam), Acronyms (NASA, SCUBA) vs. Initialisms (BBC, FBI), Conversion / Zero-Derivation (butter [noun] -> to butter [verb]), Backformation (editor -> to edit; television -> to televise), Coinage / Neologism (Google, Kodak), and Borrowing (bazaar, algebra, tsunami).

3. Syntax: Structural Analysis & Generative Grammar

Syntax investigates the mathematical and grammatical principles governing how words combine into phrases, clauses, and sentences:

- **Immediate Constituent (IC) Analysis:** Codified by Leonard Bloomfield and American structuralists. Sentences are not flat linear bead-strings; they possess hierarchical, nested syntactic constituent structures. IC Analysis segments sentences into successive binary layers of immediate constituents using bracketings or tree diagrams down to ultimate constituents (words/morphemes).
- **Phrase Structure (PS) Rules:** Rewrite rules generating basic hierarchical phrase structures:
  - S → NP + VP
  - NP → (Det) + (AdjP) + N + (PP)
  - VP → V + (NP) + (PP) + (AdvP)
  - PP → P + NP

- **Chomsky's Transformational Generative (TG) Grammar:** Introduced in *Syntactic Structures* (1957) and *Aspects of the Theory of Syntax* (1965). Chomsky separated syntactic competence into:
  - *Deep Structure (D-Structure):* An abstract underlying syntactic representation generated by Phrase Structure rules and the lexicon, determining semantic meaning.
  - *Surface Structure (S-Structure):* The final linear arrangement of words produced after applying transformational operations (movement, deletion, insertion).
  - *Transformational Rules:* Operations transforming active declarative kernel sentences into passive structures, yes/no interrogatives, WH-questions, and relative clauses without altering the fundamental deep semantic proposition.

4. Semantics & Pragmatics: Meaning and Context

The study of meaning is divided between literal sentence meaning (Semantics) and contextual speaker meaning (Pragmatics):

- **Lexical Semantics:** Examines semantic networks between lexemes:
  - *Synonymy:* Sameness of meaning (conceal / hide).
  - *Antonymy:* Oppositeness of meaning: Gradable (hot/cold), Complementary/Binary (dead/alive), Relational/Converse (buy/sell, teacher/student).
  - *Polysemy vs. Homonymy:* Polysemy occurs when a single word possesses multiple related meanings (e.g., foot of a person, foot of a bed, foot of a mountain). Homonymy occurs when two historically unrelated words accidentally share identical spelling and/or sound (bank of a river vs. financial bank).
  - *Hyponymy & Hypernymy:* Hierarchical inclusion: Dog is a *hyponym* of the superordinate *hypernym* Animal.
- **Semantic Change:** Broadening/Widening (holiday originally meant "holy day"), Narrowing/Specialization (meat originally meant any solid food), Amelioration (queen originally meant woman), Pejoration (villain originally meant peasant farmhand).
- **Pragmatics: Language in Action:**
  - *Deixis:* Words whose meaning is completely dependent on physical context (Person deixis: I, you; Spatial deixis: here, there; Temporal deixis: now, yesterday).
  - *Presupposition & Entailment:* An underlying assumption taken for granted in an utterance ("Have you stopped smoking?" presupposes the listener used to smoke).
  - *Austin & Searle's Speech Act Theory:* In *How to Do Things with Words* (1962), J.L. Austin demonstrated that words do not merely describe reality; words perform physical actions (Performative Utterances, e.g., "I pronounce you husband and wife"). A speech act comprises:
    1. *Locutionary Act:* The physical act of uttering a meaningful linguistic sentence.
    2. *Illocutionary Force:* The communicative intention or social act performed by the utterance (promising, warning, commanding, requesting, apologizing).
    3. *Perlocutionary Effect:* The actual psychological or physical consequence produced on the listener (convincing, frightening, pleasing, infuriating).
  - *H.P. Grice's Cooperative Principle:* Conversational participants implicitly cooperate to achieve communicative success, adhering to four **Conversational Maxims**: Maxim of Quality (truthfulness), Maxim of Quantity (informative balance), Maxim of Relation (relevance), and Maxim of Manner (clarity). Flouting a maxim creates a *conversational implicature*.

Advanced Linguistic Science, Morphosyntax & Sociolinguistic Praxeology (Extension Phase 1)

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1. Foundational Paradigms in Linguistic Theory & Grammar Architecture

Linguists and cognitive scientists navigate essential theoretical cleavages within Module 3:

- **Empiricism vs. Nativism (The Poverty of the Stimulus):** B.F. Skinner's behaviorist model posited that children learn language through external stimulus-response reinforcement and imitation. Noam Chomsky decisively refuted this in 1959, formulating the *Poverty of the Stimulus* argument: children effortlessly acquire infinite, grammatically complex linguistic structures despite exposure to incomplete, flawed spoken input. Chomsky posited the *Innateness Hypothesis*—human infants possess a genetically pre-wired biological Language Acquisition Device (LAD) governed by Universal Grammar (UG).
- **Descriptivism vs. Prescriptivism:** Prescriptive grammar attempts to enforce arbitrary etiquette rules ("Never end a sentence with a preposition", "Do not split infinitives"), often rooted in artificial Latinate models. In contrast, modern scientific linguistics is strictly *descriptive*: its goal is to observe, record, and formulate the actual unconscious structural rules native speakers intuitively employ in real-world communicative ecosystems.
- **Systemic Functionalism vs. Formal Syntax:** While Chomskyan generative grammar treats syntax as an autonomous, abstract mathematical algorithm divorced from social use, M.A.K. Halliday's Systemic Functional Linguistics (SFL) argues that language structure is inextricably shaped by social function, organized around three overarching metafunctions: *Ideational* (construing human experience), *Interpersonal* (enacting social relationships), and *Textual* (creating coherent discourse).

2. Comparative Analytical Matrix: Levels of Linguistic Architecture

A structured comparative assessment delineates performance metrics and structural units in Module 3:

Linguistic Level	Basic Analytical Unit	Primary Analytical Focus	Exemplary Rule / Framework
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Morphology	Morpheme (Free/Bound)	Internal word structure, inflectional paradigms, derivational word formation.	Root + Affixes; Compounding, Blending, Clipping, Backformation.
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Semantics & Pragmatics	Lexeme / Speech Act	Literal sense relations (hyponymy, polysemy) and contextual utterance meaning.	Austin's Speech Act Theory (Locution, Illocution, Perlocution); Gricean Maxims.

3. Glossary of Linguistics, Phonetics & Sociolinguistic Variables

Linguistic Term	Subfield	Standard Scientific Definition & Application
Minimal Pair	Phonology	Two words differing by only a single sound segment in the identical position, proving that the two sounds are distinct contrastive phonemes (e.g., /pɪn/ and /bɪn/).
Allomorph	Morphology	A positional phonetic variant of a morpheme that does not alter meaning (e.g., the plural morpheme {-s} pronounced as [s] in "cats", [z] in "dogs", [ɪz] in "horses").
Diglossia	Sociolinguistics	A situation where two distinct varieties of a language co-exist in a speech community: a High (H) variety for formal/written domains and a Low (L) variety for casual speech.
Isogloss	Dialectology	A geographical boundary line mapped across a linguistic territory indicating the geographic limit of a specific linguistic feature (lexical item, vowel pronunciation).
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Pidgin vs. Creole	Language Contact	A Pidgin is a simplified, non-native contact trade language with no native speakers; a Creole is a full-fledged language that develops when a pidgin is acquired as a first language by children.

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