I. Introductory concepts: Morphogenesis of languages (183-187)

A. Materials: internal constraints
   1. Sounds
   2. Words
   3. Grammatical constructions

B. Morphogenetic processes (in this case, in the socioeconomic register)
   1. Stratification
      a. Sorting
      b. Consolidation
   2. Meshworks
      a. Interlocking of heterogenous materials
      b. Intercalary elements
      c. Generation of endogenous stable states
   3. Evolution of replicators
      a. Types:
         (1) [Memes (imitation)]
         (2) Norms (learning)
      b. [Mechanism (probe head)]
         (1) variation
         (2) selection
         (3) exploration of phase space
            (a) pre-structured space
            (b) production of novel structures (drift)

C. Results of these processes are languages
   1. Meshworks: continuum of dialects
   2. Hierarchies: standard vs. minor languages
   3. NB: Mixtures or becomings of both are the only thing found in reality

II. Crystallization of Romance languages from Latin (“crystallization” = metaphor?) (187-199)

A. Variation in meshwork of dialects; loss of prestige dialect selection pressure
   1. Carolingian reforms insufficient to stop centripetal forces
   2. Hierarchies of towns produce new standards

B. New uses for writing produce pressure to enforce new standards

Excursus on “naming” (189-191)
Frege: meaning as instructions (necessary and sufficient conditions) for identification
Kripke and Putnam: causal reference: indexicality through social pressure

C. Utility of causal theory of reference for linguistic history
   1. Social practices of standard enforcement explain isolation/hierarchies
   2. Renders standard language claims to greater “rationality” suspect

D. Social obligation and linguistic morphogenesis (191-198)
   1. How do informal social networks act as enforcement mechanisms?
      a. Types of networks
         (1) Closed / high density:
            (a) high interaction and little social mobility
            (b) ghettos / high society
         (2) Open / low density:
            (a) low interaction and chance for social mobility
            (b) middle class
      b. Language carries information about group membership
      c. Results
         (1) High density networks = focused norms; consolidation
         (2) Low density networks = diffuse norms; further variation
d. Note that only collectively stabilized variants are unit of selection
e. Isolation vs contact important variables

2. Example: Migration and birth of English
   a. Series of invaders into Celtic-Roman Britain
      (1) Teutons (Jutes, Angles, Saxons)
      (2) Christian missionaries (Latin)
      (3) Vikings
      (4) Normans
   b. Norman invasion removed Old English conservation and set English flowing
      (1) Move from synthetic (inflection) to analytic language (word order)
      (2) Seen as progress in rationality, but is instead a common simplification

III. Excursus: Pidginization and creolization as linguistic morphogenetic processes (196-198)
A. Pidginization as process (may or may not result in replicating norms)
   1. Sabir example
   2. Characteristics
      a. Simplification (stripping of redundancy)
      b. Low redundancy entails reliance on context and gesture
      c. Creative adaptation (e.g., by slaves w/ different languages)
   3. Old model: two-step process aiming at production of creole
      a. Simplification of target language
      b. First generation of children create a newly redundant creole

B. Creolization
   1. Expanding vocabulary
   2. Re-creation of linguistic redundancy

Brief recap of morphogenetic processes (198-199)
   Stratification / hierarchization (urban centers): DG: major languages ("standard")
   Consistency / meshworking (social networks): DG: minor languages ("dialect")
   Pidginization / creolization (trade or slave contact)

IV. Creation of major Romance languages (199-209)
A. “Local majors”
   1. French from Francien (langue d’oïl) (Parisian dialect)
      a. Accelerated urbanization / political centralization of Paris
   2. Spanish from Castilian
   3. Delays in formation of Italian and German due to political fragmentation
B. Struggles between local majors and Latin for language of public administration
   1. Factors affecting Latin
      a. Church administration
         (1) Benedictine Rule establishes Latin in monasteries
         (2) Carolingian Reforms
      b. Agricultural / commercial / urban intensifications: demand for lay literacy
      c. Black Death attacked “organic substratum” of Latin: clerical die-off
   2. Two deciding factors
      a. Prestige for position of dialect in hierarchy
      b. Sheer number of language speakers for long term survival
   3. Triumph of vernaculars over Latin
      a. Series of edicts changing status of language in official proceedings

Excursus on speech acts: catalysis of “social phase transitions”

b. Increasing vocabulary
   (1) word-formation
   (2) borrowing (memes)
      (a) vs. inheritance of basic words
      (b) different prestige levels or registers in English
   c. Code switching (“internal contact” and “internal variety”)
C. Linguistic homogeneity needs morphogenetic explanation
   1. Urbanization
   2. 16th-17th C linguistic engineering
      a. Techniques
         (1) academies
         (2) dictionaries
         (3) grammars
      b. Context: empire, absolutism, Counter-Reformation
      c. Locations
         (1) Spain: Nebrija and Castillian grammar
         (2) Italy: Florence and its Accademia della Crusca
         (3) L’Académie Française: Richilieu 1634
      d. Results: addition of new set of norms
   3. Impact of printing press
      a. Protestant Reformation and vernacular Bibles
      b. Promotion of written form of language as standard (grapheme vs phoneme)

V. Internal linguistic morphogenetic processes (209-213)
A. Push-chain and drag-chain dynamics as variation / selection mechanisms
   1. Great Vowel Shift as homeostatic and autonomously vocal
   2. But same mechanisms at work in vocabulary and syntax as source of heterogeneity
      a. De-semantization or grammaticalization (“to get” “to do”)
      b. Variable rules:
         (1) Labov - Chomsky debate:
         (2) language as heterogenous mix of norms in constant change (different rates)
   B. But always remember: mix of linguistic materials with other material flows
      1. Urbanization as catalyst of variation
         a. Middle-class hyper-correction: diffusion of norms
         b. Rural immigration / ghettos: new focused norms: mosaic vs melting pot
      2. Nationalization
      3. Colonization

Chapter 2: Arguments and Operators (215-226)

I. Introduction
A. Chomsky’s approach:
   1. Context-free robot operating on dictionary and set of rules
   2. Different types of rules: generation of deep structure and transformation
B. DG’s complaint: Chomsky not abstract enough
   1. Language must be semantic, pragmatic, collective, political, etc.
   2. Linguistic AM as diagram of historical dynamics of human collectives
II. Combinatorial productivity in patterns of behavior in social dynamics
A. George Zipf: combinatorial constraints
B. Zelig Harris: socially obligatory information: measured in bits
   1. Types of constraints
      a. Likelihood
      b. Operator-argument
      c. Reduction
   2. Language as self-organizing/symmetry-breaking; departures from equiprobability
   3. Success of Harris: explains
      a. Emergence of language as double articulation
      b. Morphogenesis of other sign strings (math / music)
C. Mary Douglas can explain connection of Harris model with social dynamics / discourses
   1. Group / grid parameters explain 4-attractor model of lifestyles
   2. Group dynamics behind morphogenesis of discourses
III. Conclusion: collective nature of linguistic AM

Chapter 3: Linguistic History: 1700-2000 AD (227-255)
I. Introduction (227-230):
A. Two great processes in 18th and 19th centuries
   1. Nationalization (unification)
   2. Disciplining (uniformation)
      a. Articulation of mass
      b. Allow sorting by rank in new meritocratic hierarchies
B. Revolutionary citizen armies used both processes
   1. New reservoir of manpower created by national revolutions
   2. Processed by disciplinary institutions

II. 18th Century processes of language change (230-239)
A. Domestic homogenization
   1. France
      a. Dialectical variation seen as state-political problem
         (1) Assumption that structure of language determines structure of perception
         (2) [MDL believes the converse: see 322 n. 87]
      b. Linguistic unity needed for military
         (1) Exhortation of citizenry
         (2) Command of soldiers
         (a) NB: creation of patterns / thresholds in bodies politic for linguistic triggerings of somatic flows
         (b) e.g., institutional speech act creating militarized French nation acting
            i) on a sufficiently urbanized and proletarianized population
            ii) organized by administrative apparatuses
   c. Role of French National Education here
   2. England
      a. Creation of national market:
         (1) Command structure over meshwork of provinces
         (2) Speech acts catalyzing material flows
      b. Linguistic engineering: Johnson’s dictionary
B. Colonial heterogenization (and homogenization: replacement of many African languages)
   1. Caribbean slave plantations as linguistic laboratories:
      a. pidginization and creolization
      b. Re-enrichment in creolization:
         (1) role of children as free from constraint
         (2) i.e., pidgin is not a strong norm
   c. Creole concentration in Caribbean explained in terms of plantation dynamics
   d. Creoles as maximally variant, yet still connected to rest of meshwork

III. 19th C processes (239-247)
A. African colonization
   1. Types of colonial administration
      a. English / German indirect rule (Swahili as administrative language)
      b. French assimilation (French as administrative language)
   2. Local major rivals: Arabic; Hausa; Swahili
   3. Reasons for linguistic intervention
      a. recruitment for menial / clerical work
      b. Christianization / education
B. Technological change destroying geography as isolating factor
   1. American case: only emotional loyalty works to isolate us from British English
      a. Weak regionalisms
      b. Webster’s dictionary
      c. Black English
   2. Large-circulation newspapers
      a. Mechanism
         (1) Massification of opinion
         (2) Advertising: selling attention (appeal to constructed or natural triggers)
         (3) Tendency to anti-market corporate control of mass media
            (a) economies of scale leading to merger / takeovers
            (b) formation of news agencies
      b. Homogenizing effects:
         (1) aiming at lowest common denominator
(2) neutrality by quoting official sources (homogenization of point of view)
c. Heterogenization: dialect injection; register switching
C. Educational assimilation of urban working class
   1. linguistic homogenization
   2. but also heterogenization and code-switching
IV. Benefits of linguistic standardization (247-249)
A. Ease of diffusion of technical vocabulary
B. Political unification
   1. “State to Nation”
      a. France, England, Spain:
      b. “rationality” of standard justifies assimilation of minorities
   2. “Nation to State”
      a. Italy, Germany
      b. “authenticity” of language justifies building of common political institutions
   3. Nation-building and the “linguistic question”
      a. Opportunities
         (1) Former colonies
         (2) New territories (sometimes rump empires: Turkey
         (3) Minorities (Irish, Québécois)
      b. Challenge: transform population into reservoir to be tapped
V. Competition of English and French for global linguistic hegemony (249-255)
A. Claims to pre-eminence
   1. French culture and tradition
   2. English (American) business, science, technology
B. Gaullist reaction
C. Benefits to both from remnants of colonial educational systems
D. Forms of flow (one to many vs many to many)
   1. News agencies homogenization (one to many)
   2. Internet (many to many):
      a. Homogenization: English domination of techno-language
      b. Heterogenization: different kinds of “English”
         (1) Possibility of meshworks: multi-communities and de-massification
         (2) BUT always remember: meshworks are NOT guarantees of progress!

Conclusion and Speculations (257-274)