

LINGUISTICS (AS) {LING}

American Sign Language and Irish Gaelic courses are sponsored by the Department of Linguistics and offered through the Penn Language Center. Please see <http://ccat.sas.upenn.edu/plc/>

120. Introduction to Speech Analysis. (C) Yuan. Satisfies Quantitative Data Analysis.

This course focuses on experimental investigations of speech sounds. General contents include: the fundamentals of speech production and perception; speech analysis tools and techniques; and topics in phonetic studies. The course consists of integrated lectures and laboratory sessions in which students learn computer techniques for analyzing digital recordings.

Undergraduate Courses

L/R 001. Introduction to Linguistics. (C) Natural Science & Mathematics Sector. Class of 2010 and beyond. Liberman/Buckley. Also fulfills General Requirement in Living World for Class of 2009 and prior.

A general introduction to the scientific study of language structure, history, and use. Topics include notions of "grammar"; written versus spoken (and signed) language; the structure of sounds, words, sentences, and meanings; language in culture and society; language change over time; language acquisition and processing; comparison with non-human communication systems.

010. Fundamentals of the Grammar of Standard English. (L) Staff. Offered through CGS.

LING 010 uses a combination of traditional and modern approaches to grammar to improve the student's knowledge of the English language. The course covers a wide range of topics, including traditional grammar (parts of speech and sentence diagramming), prescriptive grammar/stylistics (dangling participles, split infinitives, etc.), modern generative syntax (sentence structure, pronoun reference), discourse structure, and composition. LING 010 is of use to anyone who wishes to strengthen his or her oral and written communication skills as well as to those students who plan to teach English or language arts.

SM 054. Bilingualism in History. (A) Sankoff. Freshman Seminar.

This course takes a historical approach to tracing (and reconstructing) the nature of language contacts and bilingualism, over the course of human history. Contacts between groups of people speaking different languages, motivated by trade, migration, conquest and intermarriage, are documented from earliest records. At the same time, differences in socio-historical context have created different kinds of linguistic outcomes. Some languages have been completely lost; new languages have been created. In still other cases, the nature and structure of language has been radically altered. The course introduces the basics of linguistic structure through a discussion of which aspects of language have proved to be relatively stable, and which are readily altered, under conditions of bilingualism.

SM 057. Language and Popular Culture. (A) Staff.

The purpose of this course is to examine representations of human (and non-human) language as they appear in popular media such as the film, television, cartoons, advertising, and other popular genres. Popular (mis)conceptions of what human language is like will be contrasted with more scientific conceptions of language based on the knowledge constructed in linguistics, psychology, cognitive science, anthropology, and other disciplines.

SM 058. Language and Cognition. (B) Living World Sector. All classes. Embick.

Because of its apparently species-specific nature, language is central to the study of the human mind. We will pursue an interdisciplinary approach to such questions in this course, moving from the structures of language as revealed by linguistic theory to connections with a number of related fields that are broadly referred to as the "cognitive sciences". A number of specific topics will be addressed from these related fields. The structures of language and its role in human cognition will be set against the background of animal communication systems. We will examine the question of how children acquire extremely complex linguistic systems without explicit instruction, drawing on psychological work on the language abilities of children. Additional attention will be focused on the question of how language is represented and computed in the brain, and, correspondingly, how this is studied with brain-imaging techniques.

L/R 102. Introduction to Sociolinguistics. (B) Society Sector. All classes. Labov/Sankoff. Satisfies Quantitative Data Analysis.

Human language viewed from a social and historical perspective. Students will acquire the tools of linguistic analysis through interactive computer programs, covering phonetics, phonology and morphology, in English and other languages. These techniques will then be used to trace social differences in the use of language, and changing patterns

of social stratification. The course will focus on linguistic changes in progress in American society, in both mainstream and minority communities, and the social problems associated with them. Students will engage in field projects to search for the social correlates of linguistic behavior, and use quantitative methods to analyze the results.

103. Introduction to Language: Language Structure and Verbal Art. (A) Arts & Letters Sector. All Classes. Noyer.

The purpose of this course is to explore the relationship between linguistic structure and the use of language for artistic purposes. The syllabus is organized as a sequence of units, each built around a particular theme. These include the sound structure of poetry (meter, rhyme, and other linguistic patterns in *Jabberwocky*, the *Odyssey*, Shakespeare, the Troubadours, and others); how precise linguistic data can be used to solve an outstanding literary problem (determining the approximate date when *Beowulf* was composed); and the structure of folktales of various cultures and of narratives of everyday experience.

105. (CIS 140, COGS001, PHIL044, PSYC107) Introduction to Cognitive Science. (A) Brainard/Ungar.

Cognitive Science is founded on the realization that many problems in the analysis of human and artificial intelligence require an interdisciplinary approach. The course is intended to introduce undergraduates from many areas to the problems and characteristic concepts of Cognitive Science, drawing on formal and empirical approaches from the parent disciplines of computer science, linguistics, neuroscience, philosophy and psychology. The topics covered include Perception, Action, Learning, Language, Knowledge Representation, and Inference, and the relations and interactions between such modules. The course shows how the different views from the parent disciplines interact, and identifies some common themes among the theories that have been proposed. The course pays particular attention to the distinctive role of computation in such theories, and provides an introduction to some of the main directions of current research in the field.

L/R 106. Introduction to Formal Linguistics. (A) Schwarz.

This course is intended as an introduction to the application of formal language theory, automata theory, and other computational models to the understanding of natural human language. Topics include regular languages and finite state automata; context-free languages and pushdown automata; recursive transition networks; augmented transition networks; tree-adjointing grammars.

110. Introduction to Language Change. (B) History & Tradition Sector. All classes. Ringe.

This course covers the principles of language change and the methods of historical linguistics on an elementary level. The systematic regularity of change, the reasons for that regularity, and the exploitation of regularity in linguistic reconstruction are especially emphasized. Examples are drawn from a wide variety of languages, both familiar and unfamiliar. Since there are no prerequisites, the course includes mini-introductions to articulatory phonetics, basic phonology (especially the principle of contrast), and basic morphology (especially inflection), all of which must be understood in order to understand the ways in which they change.

L/R 115. Writing Systems. (A) History & Tradition Sector. All classes. Buckley.

The historical origin of writing in Sumeria, Egypt, China, and Mesoamerica; the transmission of writing across languages and cultures, including the route from Phoenician to Greek to Etruscan to Latin to English; the development of individual writing systems over time; the traditional classification of written symbols (ideographic, logographic, syllabic, alphabetic); methods of decipherment; differences between spoken and written language; how linguistic structure influences writing, and is reflected by it; social and psychological aspects of writing.

135. (PSYC135) Psychology of Language. (M) Dahan. Prerequisite(s): LING 001 or PSYC 001.

This course describes the nature of human language, how it is used to speak and comprehend, and how it is learned. Subtopics include animal communication, language pathologies, second-language learning, and language in special populations (such as Down Syndrome and autistic children, and children born deaf or blind).

160. (AFRC160) Introduction to African American and Latino English. (A) Labov.

An introduction to the use and structure of dialects of English used by the African American and Latino communities in the United States. It is an academically based service learning course. The field work component involves the study of the language and culture of everyday life and the application of this knowledge to programs for raising the reading levels of elementary school children.

SM 161. (AFRC161) The Sociolinguistics of Reading: A Service Learning Seminar. (A) Labov.

This course will be concerned with the application of current knowledge of dialect differences to reduce the minority differential in reading achievement. Members will conduct projects and design computer programs to reduce cultural distance between teachers and students in local schools and to develop knowledge of word and sound structure.

230. (LING503) Sound Structure of Language. (B) Noyer.

An introduction to phonetics and phonology. Topics include articulatory phonetics (the anatomy of the vocal tract; how speech sounds are produced); transcription (conventions for representing the sounds of the world's languages); classification (how speech sounds are classified and represented cognitively through distinctive features); phonology (the grammar of speech sounds in various languages: their patterning and interaction); advanced issues in phonological representation (syllables and feature geometry); Optimality Theory (constraint-based versus derivational phonological grammars).

240. (GRMN210) Structure of a Language. (M) Staff.

250. Introduction to Syntax. (B) Santorini. This course was formerly numbered LING 150 and is identical in content.

This course is an introduction to current syntactic theory, covering the principles that govern phrase structure (the composition of phrases and sentences), movement (dependencies between syntactic constituents), and binding (the interpretation of different types of noun phrases). Although much of the evidence discussed in the class will come from English, evidence from other languages will also play an important role, in keeping with the comparative and universalist perspective of modern syntactic theory.

255. Formal Semantics and Cognitive Science. (K) Schwarz.

This course introduces the components and formal mechanisms underlying meaning in human language and uses them as a window on the human mind, its psychological development and adult cognitive processes. Topics include what kinds of concepts a noun or a determiner can encode; how children learn the meaning of words; how these "atoms" of meaning are combined in a mathematical procedure to yield the meaning of sentences; how semantic ambiguities are processed psychologically; and the development of a theory of mind. Formal tools from Set Theory and Predicate Logic will be introduced and applied both to the linguistic and to the cognitive characterization of meaning.

270. Language Acquisition. (M) Yang. An introduction to language acquisition in children and the development of related cognitive and perceptual systems. Topics include the nature of speech perception and the specialization to the native language; the structure and acquisition of words; children's phonology; the development of grammar; bilingualism and second language acquisition; language learning impairments; the biological basis of language acquisition; the role in language learning in language change. Intended for any undergraduate interested in the psychology and development of language.

SM 300. Tutorial in Linguistics. (A) Santorini. Prerequisite(s): Senior status or permission of the instructor. Majors only.

This tutorial allows students to deal in a concentrated manner with selected major topics in linguistics by means of extensive readings and research. Two topics are studied during the semester, exposing students to a range of sophisticated linguistic questions.

301. Conference. (C)

An independent study for majors in linguistics.

302. (LING502) Linguistic Field Methods. (M) Buckley/Legate. Prerequisite(s): Ling 230 and Ling 250.

Instruction and practice in primary linguistic research, producing a grammatical sketch and a lexicon through work with a native-speaker consultant and some reference materials. Consultant work is shared with LING 502.

310. History of the English Language. (A) Ringe/Kroch.

This course traces the linguistic history of English from its earliest reconstructable ancestor, Proto-Indo-European, to the present. We focus especially on significant large-scale changes, such as the restructuring of the verb system in Proto-Germanic, the intricate interaction of sound changes in the immediate prehistory of Old English, syntactic change in Middle English, and the diversification of English dialects since 1750.

319. (LING519, SAST333) Topics in Dravidian Linguistics. (M) Staff.

We will begin with an overview of the Dravidian family as a whole (languages, speakers, history of research), then followed by a general structural description of a particular modern Dravidian language (such as Tamil or Kannada), and concluding with a focus on a number of topics of crucial interest in the field (phonological, morphological, syntactic, sociolinguistic, historical) including close reading of recent scholarship in these areas. Students will write a paper on a topic of their own theoretical interest, using data from a selected Dravidian language.

398. Senior Thesis. (C) Staff.

404. Morphological Theory. (M) Embick.

This course will explore some issues concerning the internal structure of words. After a brief introduction to some basic terms and concepts, we will discuss the interaction of morphology with phonology. We will look both at how morphology conditions phonological rules and how phonology conditions morphology. Then we will turn to the interaction of syntax and morphology. We will look at some problems raised by inflectional morphology, clitics and compounds. The main requirement for the class will be a series of homework exercises in morphological analysis.

SM 411. Old English. (M) Kroch.

The main purpose of this course is to teach students to read Old English ("Anglo-Saxon"), chiefly but not exclusively for research in linguistics. Grammar will be heavily emphasized; there will also be lectures on the immediate prehistory of the language, since the morphology of Old English was made unusually complex by interacting sound changes. In the first eight weeks we will work through Moore and Knott's "Elements of Grammar" and learn the grammar; the remainder of the term will be devoted to reading texts.

440. Pidgins and Creoles. (H) Sankoff.

The origins and development of pidgins (languages of intercommunication that have evolved for practical reasons in situations of trade, conquest, or colonization, and spoken as second or auxiliary languages) and creoles (languages with native speakers that have developed from previous pidgins); relations between creoles and other languages; implications of creole studies for general theories of language and language change.

450. Languages in Contact. (I) Sankoff.

Multilingualism from a societal, individual, and linguistic point of view. The different types of contacts between populations and between individuals which give rise to multilingualism. Second-language acquisition and the problem of the "critical age." Cognitive and cultural aspects of multilingualism; applications to the teaching of languages. "Bidialectalism." Code-switching (alternation), interference and integration: the mutual influences of languages in contact. Political and social aspects of multilingualism.

SM 470. (AFST260, ENGL260, LALS260) Narrative Analysis. (M) Labov.

The course will develop our understanding of narrative structure on the basis of oral narratives of personal experience, told by speakers from a wide range of geographic backgrounds and social classes. It will link the principles governing oral narratives to the narratological examination of myth, literature and film by Propp, Greimas, Prince, Chatman, and others. The principles that emerge from the study of oral narrative will be re-examined in literary narrative, including Scandinavian, Greek and Hebrew epics, medieval romances, film, and modern novels, with attention to the differences between vernacular, literary and academic style. The class will then consider the work of psychologists on how narratives are remembered and understood, based on the causal network theory of Trabasso, and apply these principles to narratives written to teach children to read, particularly those designed to reflect the cultural and linguistic framework of African American children.

Graduate Courses

SM 500. Research Workshop. (C) Embick.

This course is intended for advanced graduate students who are interested in developing a research paper. Each student will present his or her topic several times during the semester as the analysis develops, with feedback from the instructor and other students to improve the organization and content of the analysis. The goal is an end product appropriate for delivery at a national conference or submission to a journal.

501. Survey of Sociolinguistics. (J) Sankoff. Prerequisite(s): LING 102 or equivalent.

Speech communities as a focus for the understanding of language evolution and change: language variation in time and space. The relationship between language structure and language use; between language change and social change. Populations as differentiated by age, sex, social class, race, and ethnicity, and the relationship of these factors to linguistic differentiation.

SM 502. (LING302) Linguistic Field Methods. (M) Buckley/Legate. Prerequisite(s): LING 530 and Ling 550.

Instruction and practice in primary linguistic research, producing a grammatical sketch and a lexicon through work with a native-speaker consultant and some reference materials. Consultant work is shared with LING 302. Each student will write a final paper on some aspect of the language.

503. (LING230) Sound Structure of Language. (B) Noyer.

An introduction to articulatory and acoustic phonetics; phonetic transcription; basic concepts and methods of phonological analysis.

505. Research Topics. (C)

A reading course on specialized topics in linguistics. Arranged by instructor.

510. Introduction to Historical and Comparative Linguistics. (A) Ringe.

Synchronic and diachronic systems. Analogic processes. Semantic change. Effects of contact. Internal reconstruction. Comparative method and reconstruction.

SM 515. Dynamics of Language. (C) Yang. Prerequisite(s): Ling 510.

This course introduces the tools, techniques, as well as current research on the approach to language as a dynamical system, which seeks to fruitfully integrate linguistic theory, psycholinguistics, corpus linguistics, and historical linguistics through the means of mathematical modeling. Topics include: string processing, dynamical systems and stability, stochastic processes, mathematical models of population dynamics, and dynamical models of language learning, processing, and change.

519. (LING319, SAST333) Topics in Dravidian Linguistics. (M) Staff.

After an overview of the Dravidian family as a whole (languages, speakers, history of research), and a general structural description on one particular language (Tamil or Kannada), this course will then focus on a number of topics of crucial interest in the field. Most recently, this has been grammaticalization, i.e. how languages recruit and utilize lexical material as grammatical morphemes over time. After a general review of this topic, grammaticalization in Dravidian in particular will be examined, especially how this works in highly diglossic languages such as Tamil. Students will write a paper on a topic of their own theoretical interest, using data from a selected Dravidian language, or a language with similar problems.

L/L 521. Introduction to Phonetics II. (B) Yuan. Prerequisite(s): LING 520.

525. (CIS 558) Computer Analysis and Modeling of Biological Signals and Systems. (A) Liberman.

A hands-on signal and image processing course for non-EE graduate students needing these skills. We will go through all the fundamentals of signal and image processing using computer exercises developed in MATLAB. Examples will be drawn from speech analysis and synthesis, computer vision, and biological modeling.

530. Phonology I. (A) Noyer. Prerequisite(s): LING 503 or equivalent.

First half of a year-long introduction to the formal study of phonology. Basic concepts in articulatory phonetics; the distribution of sounds (phonemes and allophones); underlying and surface forms, and how to relate them using both ordered-rule and surface-constraint approaches. The survey of theoretical topics in this term includes distinctive features (context, organization, underspecification); the autosegmental representation of tone; and the theory of phonological domains and their interaction with morphological and syntactic constituency. Emphasizes hands-on analysis of a wide range of data.

531. Phonology II. (B) Buckley. Prerequisite(s): LING 530.

Second half of a year-long introduction; continues LING 530. Topics to be surveyed include syllable structure and moraic theory; the prosodic hierarchy; the properties and representation of geminates; templatic and prosodic morphology; reduplication and emergence of the unmarked; and metrical phonology (properties of stress, foot topology, and issues of constituency). Emphasizes hands-on analysis of a wide range of data.

540. (SAST537) Language Policy. (M) Staff.

This course examines the sociolinguistic context of modern multilingual states and the impact of their linguistic policies on the cultural identity of linguistic minorities. In the United States, the history of multilingualism will be examined, tracing the growth of linguistic assimilationism and the rebirth of assertive bilingualism, and comparing it with policies of other multilingual societies in Europe, Africa, Asia and Latin America. Attention is paid to typological aspects of bilingualism, controversies surrounding intelligence and multilingualism, as well as attitudes toward language loyalty and ethno-linguistic identity in various societies. Special cultural factors such as the role of religion, immigrational recency, literacy, socio-economic status, race, educational level and ethnic pride will be surveyed in terms of their impact on maintenance and/or assimilation. Students will undertake a term project examining some aspect of the above topics in a real or historical community of their preference.

SM 548. Proof Theoretic Foundations of Linguistic Structure. (A) Clark.

This course covers the fundamentals of proof theory and logic as they apply to linguistics. The notion of a well-formed derivation is fundamental to all flavors of formal linguistics and all sub-disciplines of linguistics-phonology, morphology, syntax and semantics. It rests, ultimately, on axiomatic systems developed by logicians to encode the process of valid formal reasoning. We will place a particular emphasis on constructive methods and, where appropriate, develop connections with parsing theory, automatic theorem proving and computational semantics. Time

permitting, we will consider some introductory topics in substructural logic-systems that encode some proper sub-part of first order logic. These systems have proven very important in planning, theorem proving, dynamic logic and computational linguistics. The course is intended as a preparation for Linguistics 553 (Formal Semantics I). It includes a review of the propositional and predicate calculus before introducing tableaux and resolution systems, unification, axiomatic systems, natural deduction and sequent calculi. The latter two systems are particularly relevant for grammar formalisms like phrase structure grammars, TAGs and Categorical Grammar.

549. (CIS 477) Mathematical Techniques in Natural Language Processing. (A) Joshi.

Basic concepts of set theory, relations and functions, properties of relations. Basic concepts of algebra. Grammars, languages, and automata-finite state grammars, regular expressions, finite state transducers, context-free grammars and pushdown automata. Context-sensitive grammars- string context sensitivity and structural context-sensitivity. Mildly context-sensitive grammars. Turingmachines. Grammars ad deductive systems, parsing as deduction. Stochastic grammars. The course will deal with these topics in a very basic and introductory manner, i.e., the key ideas of the proofs and not detailed proofs will be presented. More importantly, throughout the course plenty of linguistic examples to bring out the linguistic relevance of these topics will be discussed.

550. Syntax I. (A) Kroch.

A general introduction at the graduate level to the analysis of sentence structure. The approach taken is that of contemporary generative-transformational grammar.

551. Syntax II. (B) Legate. Prerequisite(s): LING 550 or permission of instructor.

The second half of a year-long introduction to the formal study of natural language syntax. Topics to be covered include grammatical architecture; derivational versus representational statement of syntactic principles; movement and locality; the interface of syntax and semantics; argument structure; and other topics. The emphasis is on reading primary literature and discussing theoretical approaches, along with detailed case-studies of specific syntactic phenomena in different languages.

SM 556. Historical Syntax. (M) Kroch. Prerequisite(s): LING 551 or the equivalent.

Introduction to the study of the syntax of languages attested only in historical corpora. The course will cover methods and results in the grammatical description of such languages and in the diachronic study of syntactic change.

SM 560. The Study of the Speech Community: Field Methods. (E) Labov/Sankoff.

For students who plan to carry out research in the speech community. Techniques and theory derived from sociolinguistic studies will be used to define neighborhoods, enter the community, analyze social networks, and obtain tape-recorded data from face-to-face interviews. Students will work in groups and study a single city block.

SM 562. Quantitative Study of Linguistic Variation. (I) Labov. Prerequisite(s): LING 560.

Multivariate analysis of data gathered in continuing research in the speech community; variable rule analysis and use of Cedergren/Sankoff program; instrumental analysis of speech signal; experimental techniques for study of subjective correlates of linguistic boundaries.

SM 563. Sound Change in Progress. (M) Labov. Prerequisite(s): LING 520.

The study of current sound changes in the speech community through instrumental means. Causes of linguistic diversity and consequences for speech recognition.

568. Dialect Geography. (M) Labov.

The principles, practices and findings of dialect geography from the nineteenth century to the present. Computational organization of dialect data. The study of current dialect differentiation in American English and other areas.

SM 570. Developmental Psycholinguistics. (B) Yang.

The generative literature on language acquisition has produced many accurate and insightful descriptions of child language, but relatively few explicit accounts of learning that incorporate the role of individual experience into the knowledge of specific languages. Likewise, the experimental approach to language development has identified processes that could provide the bridge between the data and the grammar, but questions remain whether laboratory findings can sufficiently generalize to the full range of linguistic complexity. This course is an overview of research in language acquisition with particular focus on the important connection between what children know and how they come to know it.

575. Mental Lexicon. (M) Yang.

An investigation of the psychological representations and processing of words. Topics include: the extraction of words from speech; lexical access and production; the induction of morphological and phonological regularities in word learning; decomposition of morphologically complex words; frequency effects in morphological processing; storage vs. computation in the lexicon; the past tense debate; morphological change. This course makes extensive use of linguistic corpora. Students will also be familiarized with experimental design issues in the psycholinguistic study of the lexicon.

580. (LING380) Semantics I. (A) Schwarz. Prerequisite(s): Ling 550. Corequisite(s): Ling 550.

This course provides an introduction to formal semantics for natural language. The main aim is to develop a semantic system that provides a compositional interpretation of natural language sentences. We discuss various of the aspects central to meaning composition, including function application, modification, quantification, and binding, as well as issues in the syntax-semantics interface. The basic formal tools relevant for semantic analysis, including set theory, propositional logic, and predicate logic are also introduced.

581. Semantics II. (B) Schwarz. Prerequisite(s): Ling 551. Corequisite(s): Ling 551.

The first part of the course expands the system from LING 580 to include intensional contexts. In particular, we discuss analyses of modals, attitude verbs, and conditionals, as well as the scope of noun phrases in modal environments. The second part of the course discusses a selection of topics from current work in semantics, such as the semantics of questions, tense and aspect, donkey anaphora, indefinites, genericity, degree constructions, events and situations, domain restriction, plurality and focus.

590. Linguistic Pragmatics I. (A) Staff. Prerequisite(s): LING 550 or permission of instructor.

This course is the first of a two-term introduction to linguistic pragmatics, the branch of linguistics whose goal is to provide a formal characterization of discourse competence, i.e. of what people know when they "know" how to use (a) language. Among the topics investigated are: The Cooperative Principle, conversational and conventional implicature, speech acts, reference, and presupposition.

SM 591. Linguistic Pragmatics II. (B) Staff. Prerequisite(s): LING 590.

This course is the second of a two-term introduction to linguistic pragmatics. Among the topics investigated are: given/new information, definiteness/ indefiniteness, topic/comment, Centering Theory, discourse structure, and the functions of syntax.

595. Game Theoretic Pragmatics. (M) Clark.

A great deal of linguistic meaning can be explained if we conceive of language as being a signaling system used by rational agents. Game theory provides an explicit mathematical account of rational, strategic interaction. This course will lay out the fundamentals of game theory, evolutionary game theory and multi-agent systems necessary to develop a theory of "radical pragmatics." We will discuss game theoretic models of implicature; presupposition and accommodation; reference tracking; scalar implicature as well as a number of other phenomena.

SM 603. Topics in Phonology. (M) Buckley/Noyer. Prerequisite(s): LING 530-531.

Topics are chosen from such areas as featural representations; syllable theory; metrical structure; tonal phonology; prosodic morphology; interaction of phonology with syntax and morphology.

SM 604. Topics in Discourse Analysis. (C) Staff. Prerequisite(s): LING 550 and LING 590 or permission of instructor.

Selected topics in discourse and pragmatics, e.g. reference, presupposition, functions of syntax.

SM 610. (GRMN602) Seminar in Historical and Comparative Linguistics. (C) Ringe.

Selected topics either in Indo-European comparative linguistics or in historical and comparative method.

SM 615. Comparative Indo-European Grammar. (E) Ringe.

A survey of phonology and grammar of major ancient Indo-European languages and the reconstruction of Proto-Indo-European. A knowledge of at least one ancient Indo-European language is required.

SM 620. Topics in Prosody. (M) Liberman/Yuan.

SM 630. Seminar in Morphology. (M) Noyer/Embick. Prerequisite(s): LING 530.

Readings in modern morphological theory and evaluation of hypotheses in the light of synchronic and diachronic evidence from various languages.

SM 640. Formal Semantics and Mathematical Linguistics. (B) Clark.

Advanced readings in formal semantics and discrete and continuous models of linguistic behavior.

SM 650. Topics in Natural-Language Syntax. (C) Staff. Prerequisite(s): LING 551 or permission of instructor.

Detailed study of topics in syntax and semantics, e.g., pronominalization, negation, complementation. Topics vary from term to term.

SM 653. Topics in the syntax-semantics interface. (A)

Topics in the Syntax-Semantics Interface

SM 656. Seminar in Historical Syntax. (M) Kroch.

This course analyzes several well documented syntactic changes in the European languages with the tools of modern grammatical and quantitative analysis. The focus is on the competition between forms and systems as in the loss of the verb-second constraint in English and French and the competition between head initial and head final word orders in the several West Germanic languages.

SM 660. Research Seminar in Sociolinguistics. (M) Sankoff. This course will have different topics each term.

Students approaching the dissertation level will explore with faculty frontier areas of research on linguistic change and variation. Topics addressed in recent years include: experimental investigation of the reliability of syntactic judgments; the development of TMA systems in creoles; transmission of linguistic change across generations. The course may be audited by those who have finished their course work or taken for credit in more than one year.

999. Independent Study and Research. (C) Student must submit brief proposal for approval. May be repeated for credit.

Language Courses

071. American Sign Language I. (C) Staff. Offered through the Penn Language Center.

Introduction to learning and understanding American Sign Language (ASL); cultural values and rules of behavior of the Deaf community in the United States. Includes receptive and expressive readiness activities; sign vocabulary; grammatical structure; facial expressive, body movement, gestures signs; receptive and expressive fingerspelling; and deaf culture.

072. American Sign Language II. (C) Staff. Prerequisite(s): LING 071 or Permission of the Instructor. Offered through the Penn Language Center.

Increased communication skill in American Sign Language (ASL); cultural values and behavioral rules of the deaf community in the U.S.; receptive and expressive activities; sign vocabulary; grammatical structure; receptive and expressive fingerspelling and aspects of Deaf culture.

073. American Sign Language III. (C) Staff. Prerequisite(s): LING 072 or permission of instructor. Offered through the Penn Language Center.

Expanded instruction of American Sign Language (ASL). Receptive and expressive activities; sign vocabulary; grammatical structure; receptive and expressive fingerspelling; narrative skills, cultural behaviors; and aspects of Deaf culture. Abstract and conversational approach.

074. American Sign Language IV. (C) Staff. Prerequisite(s): LING 073 or permission of instructor. Offered through the Penn Language Center.

Increases the emphasis on more abstract and challenging conversational and narrative range. Includes receptive and expressive readiness activities; sign vocabulary; grammatical structure; receptive and expressive fingerspelling; various aspects of Deaf culture and cultural behavior rules.

075. American Sign Language V. (C) Fisher. Prerequisite(s): LING 074 or permission of instructor. Offered through the Penn Language Center.

This course is an advanced ASL course in which students will continue to expand their conversational and narrative range. While receptive readiness activities continue to be an important part of the class, the emphasis moves toward honing expressive sign skills. Various aspects of Deaf culture and cultural behavior rules will be incorporated into the course; a key component of the course is a unit on Deaf history and famous Deaf people.

SM 078. Topics in Deaf Culture. (C) Fisher. Prerequisite(s): LING 074 or permission from coordinator. Offered through Penn Language Center.

This course is an advanced/conversational ASL course that explores several key topics related to Deaf Culture. Using only ASL in class, students will read and discuss books, articles, and films related to the following topics: What is Deaf Culture?, The History of the Deaf American, Communication Issues and Pathological Perspectives on Deafness, Deafness and Education, CODAs (Children of Deaf Adults), and Performing Arts by the Deaf. Vocabulary, grammar, and idioms related to the topics will be presented through direct instruction as well as through the course of class conversation.

SM 079. Linguistics of American Sign Language. (B) Draganac-Hawk. Prerequisite(s): Successful completion of Ling 073 or equivalent.

This course is an introduction to the basic concepts of linguistics as they relate to American Sign Language. Phonological, morphological, syntactic, semantic, and sociolinguistic principles of ASL will be examined and discussed. Successful completion of LING 073/ASL III or having the equivalent signing skills is required. An Introduction to Linguistics course (or the equivalent) is preferred but not required for this course. This course is taught in American Sign Language and is not voice interpreted.

081. Beginning Irish Gaelic I. (D) Blyn-LaDrew. Offered through the Penn Language Center.

Irish Gaelic, spoken primarily on the west coast of Ireland, is rich in oral traditions, song, poetry and literature. Knowledge of this language provides a foundation to understanding Celtic folklore and linguistics and also enhances the study of Anglo-Irish literature and history. The first-year course will include reading, conversation, listening and speaking.

082. Beginning Irish Gaelic II. (C) Blyn-LaDrew. Prerequisite(s): LING 081 or permission from instructor. Offered through Penn Language Center.

083. Intermediate Irish Gaelic I. (C) Blyn-LaDrew. Prerequisite(s): LING 082 or equivalent. Offered through the Penn Language Center.

085. Advanced Irish Gaelic I. (C) Blyn-LaDrew. Prerequisite(s): LING 084 or equivalent. Offered through Penn Language Center.

086. Advanced Irish Gaelic II. (C) Blyn-LaDrew. Prerequisite(s): LING 085 or equivalent. Offered through the Penn Language Center.

This course will emphasize reading of literary texts, and advanced aspects of grammar, composition, and conversation.

088. History of the Irish Language. (L) Blyn-LaDrew. Offered through the Penn Language Center.

From downloadable lists of computer terminology in Irish to Ogam inscriptions chiseled in stone in the 5th century, the history of the Irish language reflects the history of the people themselves. This course outlines the language's changes through time and emergence from the unwritten Celtic, proto-Celtic, and Indo-European speech of its ancestors. Beginning in the modern period, when the very status of Irish as a living language has been hotly debated, the course will look backwards at the Celtic cultural revival of the late 19th century, the impact of the famine, nationalism, colonialism, the arrival of Christianity and the Roman alphabet, and the position of Irish within the Celtic branch of the Indo-European language family. Term papers may be based on fieldwork in the Irish-American community, or research. Audio and visual resources will supplement the lectures. Knowledge of Irish Gaelic is not required.