COGNITIVE SCIENCE MINOR

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The cognitive science minor consists of five disciplinary areas: behavioral, biological, computational, linguistic, and philosophical. Each course, except the overview, falls into one or more disciplinary areas.

Students interested in pursuing the minor should contact the program director for further information.

Department Programs

Majors
- Neuroscience Major, B.S. (http://catalog.unc.edu/undergraduate/programs-study/neuroscience-major-bs/)
- Psychology Major, B.A. (http://catalog.unc.edu/undergraduate/programs-study/psychology-major-ba/)
- Psychology Major, B.S. (http://catalog.unc.edu/undergraduate/programs-study/psychology-major-bs/)

Minors
- Cognitive Science Minor (p. 1)
- Neuroscience Minor (http://catalog.unc.edu/undergraduate/programs-study/neuroscience-minor/)

Graduate Programs
- M.A. in Psychology (http://catalog.unc.edu/graduate/schools-departments/psychology-neuroscience/)
- Ph.D. in Psychology (http://catalog.unc.edu/graduate/schools-departments/psychology-neuroscience/)

Requirements
In addition to the program requirements listed below, students must:
- take at least nine hours of their minor "core" requirements at UNC-Chapel Hill
- earn a minimum cumulative GPA of 2.000 in the minor core requirements. Some programs may require higher standards for minor or specific courses.

For more information, please consult the degree requirements section of the catalog (http://catalog.unc.edu/undergraduate/general-education-curriculum-degree-requirements/#degreerequirementstext).

**Code** | **Title** | **Hours**
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**Core Requirements**
PSYC 330 | Introduction to Cognitive Science (prerequisite, PSYC 101) | 3

Four other courses distributed over at least two disciplinary areas, at least two of which must be numbered 400 or above, as follows:

**Behavioral:**
- INLS 203 Human Information Behavior
- INLS 318 Human Computer Interaction
- INLS 418 Human Factors in System Design
- INLS 512 Applications of Natural Language Processing
- NSCI 222 Learning H
- NSCI 225 Sensation and Perception H
- NSCI 434 Cognitive Neuroscience
- PSYC 230 Cognitive Psychology H
- PSYC 430 Human Memory
- PSYC 432 Psychology of Language
- PSYC 433 Behavioral Decision Theory
- PSYC 461 Cognitive Development

**Computational:**
- COMP 110 Introduction to Programming and Data Science H
- COMP 116 Introduction to Scientific Programming
- COMP 210 Data Structures and Analysis
- COMP 455 Models of Languages and Computation
- COMP 486 Applications of Natural Language Processing
- COMP 560 Artificial Intelligence
- COMP 562 Introduction to Machine Learning
- COMP 581 Introduction to Robotics H
- INLS 318 Human Computer Interaction
- INLS 500 Human Information Interactions
- INLS 509 Information Retrieval
- INLS 512 Applications of Natural Language Processing
- INLS 523 Introduction to Database Concepts and Applications
- INLS 541 Information Visualization
- INLS 613 Text Mining
- STOR 215 Foundations of Decision Sciences
### Cognitive Science Minor

<table>
<thead>
<tr>
<th>Course Code</th>
<th>Course Title</th>
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<tbody>
<tr>
<td>STOR 435</td>
<td>Introduction to Probability</td>
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<tr>
<td>STOR 565</td>
<td>Machine Learning</td>
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<tr>
<td><strong>Linguistic:</strong></td>
<td></td>
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<tr>
<td>COMP 486</td>
<td>Applications of Natural Language Processing</td>
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<tr>
<td>INLS 512</td>
<td>Applications of Natural Language Processing</td>
</tr>
<tr>
<td>LING 145</td>
<td>Language, Communication, and Human and Animal Minds $^H$</td>
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<tr>
<td>LING 333</td>
<td>Human Language and Animal Communication Systems</td>
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<tr>
<td>LING 401</td>
<td>Language and Computers</td>
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<tr>
<td>LING 460</td>
<td>Making Sense of Big Data: Textual Analysis with R</td>
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<tr>
<td>LING 540</td>
<td>Mathematical Linguistics</td>
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<tr>
<td>LING 545</td>
<td>Language and Mind</td>
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<tr>
<td>LING 547</td>
<td>Language Deficits and Cognition</td>
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<tr>
<td>PHIL 145</td>
<td>Language, Communication, and Human and Animal Minds $^H$</td>
</tr>
<tr>
<td>PHIL 445</td>
<td>Advanced Philosophy of Language</td>
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<tr>
<td><strong>Philosophical:</strong></td>
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<tr>
<td>LING/PHIL 455</td>
<td>Symbolic Logic</td>
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<tr>
<td>PHIL 145</td>
<td>Language, Communication, and Human and Animal Minds $^H$</td>
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<tr>
<td>PHIL 155</td>
<td>Truth and Proof: Introduction to Mathematical Logic $^H$</td>
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<tr>
<td>PHIL 164</td>
<td>Morality and Business</td>
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<tr>
<td>PHIL 230</td>
<td>Mind, Matter, and Metaphysics: the Philosophy of Experience and Reality $^H$</td>
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<tr>
<td>PHIL 335</td>
<td>Theory of Knowledge</td>
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<tr>
<td>PHIL 340</td>
<td>Philosophy of Mind</td>
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<tr>
<td>PHIL 440</td>
<td>Philosophy of Mind</td>
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<tr>
<td>PHIL 445</td>
<td>Advanced Philosophy of Language</td>
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### Additional Requirements

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<tr>
<th>Course Code</th>
<th>Course Title</th>
<th>Hours</th>
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<tbody>
<tr>
<td>PSYC 101</td>
<td>General Psychology</td>
<td>3</td>
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**Total Hours**: 18

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$^H$ Honors version available. An honors course fulfills the same requirements as the nonhonors version of that course. Enrollment and GPA restrictions may apply.

$^1$ Recommended preparation, PSYC 210 or another quantitative reasoning course.

The minor is open to all, including psychology majors, who are still limited to no more than 45 credit hours in the department. Students and their advisors should take careful note of the specified prerequisites for advanced offerings in this listing. The specified courses (or their equivalent from other institutions) provide a necessary background for entry into these advanced courses.

See the program page here (http://catalog.unc.edu/undergraduate/programs-study/psychology-major-ba/) for special opportunities.