

Certificate in Neuroscience

The Certificate in Neuroscience will provide students the opportunity to pursue the many neuroscience related disciplines: brain imaging, molecular neuroscience, cognitive neuroscience, behavioral neuroscience, bio-engineering, clinical neuroscience, developmental neuroscience, and neuropsychology. The certificate will prepare students to work in neuroscience related jobs and disciplines, both in research and industry. These areas would include but are not limited to medicine, neuro-rehabilitation, occupational therapy, clinical therapists, physical therapy, forensics, biotechnology industry, hospitals, science writing and science education.

Requirements

Twelve credit hours are required for completion of the certificate. At least 6 hours must be at the 3000-level or above. A maximum of 6 hours from a department may be applied to the 12 hour requirement. All grades must be "S" or "C-" or better. Grades of "U" or "D+" or below will not be accepted. A maximum of 3 hours from problems/readings and/or internship sections may be applied and the student must demonstrate that the experiential learning was related to neuroscience. All certificate coursework must be completed at the University of Missouri-Columbia.

Bioengineering

BME 2017	World of Neuroscience	1
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Biological Sciences

BIO_SC 2017	World of Neuroscience	1
BIO_SC 2020	How the Brain Works	1
BIO_SC 3700	Human Physiology	5
BIO_SC 4500	Neurobiology	3
BIO_SC 4590	Computational Neuroscience	4
BIO_SC 4640	Behavioral Biology	3-4

Biomedical Engineering

BIOL_EN 4070	Bioelectricity	3
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Computer Science

CMP_SC 2017	World of Neuroscience	1
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Electrical & Computer Engineering

ECE 2001	Experimental Course	1-99
ECE 2017	World of Neuroscience	1
ECE 4590	Computational Neuroscience	4

Electrical Engineering

BIOL_EN 4075	Brain Signals and Brain Machine Interfaces (Electrical & Computer Engineering)	3
BIOL_EN 2017	World of Neuroscience	1

Medical School

MPP 3202	Elements of Physiology	5
MPP 4202	Medical Physiology	4
MPP 4204	Medical Pharmacology	4

Psychological Sciences

PSYCH 2017	World of Neuroscience	1
PSYCH 2110	Learning, Memory, and Cognition	3
PSYCH 2210	Mind, Brain, and Behavior	3
PSYCH 2220	Drugs and Behavior	3
PSYCH 3140	Cognitive Psychology	3
PSYCH 3150	Human Memory	3

PSYCH 3160	Perception and Thought	3
PSYCH 3511	Emotion Regulation and the Brain	3
PSYCH 3890	Music and the Mind	3
PSYCH 4110	Perception	3
PSYCH 4210	Physiological Psychology	3
PSYCH 4240	Cognitive Neuroscience	3
PSYCH 4561	Psychosis and the Brain	3
PSYCH 4570	Pediatric Neuropsychology	3
PSYCH 4973W	Human Cognition Capstone - Writing Intensive	3
PSYCH 4974W	Psychology of Art Capstone - Writing Intensive	3
PSYCH 4990W	Pain and the Brain Capstone - Writing Intensive	3
Speech, Language and Hearing Sciences		
SLHS 3890	Music and the Mind	3