PCB 4843 – Principles of Neuroscience

Principles of Neuroscience is a three-credit course exploring the structure and function of the mammalian nervous system, with emphasis on human neuroanatomy, neurophysiology, and neuropharmacology. Highly-motivated students interested in medical-, veterinary medical-, or graduate biological science-related careers will enjoy this challenging (and fascinating) lecture-based course!

Topics include: Molecular basis of learning and memory (e.g., neurotransmitters), functional organization of the brain, integration/coordination of sensory and motor systems, mechanisms of neuropathology (e.g., Alzheimer’s disease), diagnostic techniques (e.g., brain imaging, EEGs), and computational models of brain function.

Prerequisites: General Chemistry with Laboratory (CHM 2045), Organic Chemistry (CHM 2210), General Biology with Laboratory (BSC 2010/2010L, BSC 2011/2011L), General Physics (PHY 2053), and General Physiology (PCB 3712).

*Permit required for registration (use the online permit request form)*