(AB) ANIMAL BEHAVIOR

Courses

AB 101. Foundations of Animal Studies. 3 Hours.
In this course students examine different fields and occupations within the animal studies field and the types of work that are included in each of these industries. Students also explore emerging perspectives in the field and the future of animal science in the global community.

AB 110. Human-Animal Bond: Animal Beh, Evolution & Therap Appli. 3 Hours.
In this course students study the evolution of human-animal relationships and the emotional and health benefits of the human-animal bond, animal behavior, and common methods of animal training. Students also explore human social and cultural factors relevant to Animal-Assisted Therapy to maximize safe interactions between clients and animals in professional settings.

AB 201. Animal Behavior. 3 Hours.
In this course, students study animal behavior through biological and psychological lenses. Deep exploration into the behavior of a species of the student's choosing complement examples of many species through the coursework. Students design and conduct an ethogram study on their species informed by factors that impact behavior, types and categories of behavior, applied behavior, and animal emotion and cognition. Prerequisite(s): AB 101.

AB 210. Emotional Support and Service Animals. 3 Hours.
The unique bond between people and animals is a powerful tool for healing. This course examines the different ways animals can be used to support human health and explores the role of pets and other animals in the treatment and rehabilitation of persons with a variety of physical and psychological disabilities. Students examine case studies such as correctional institutions and "cell dogs", therapeutic riding, child development and pets, mental health canines, animal therapy with homeless populations, and animal therapy in substance abuse programs. Students are encouraged to engage with a program within their own community, or connect with one online. Prerequisite(s): AB 110.

AB 211. Animal Cognition. 3 Hours.
In this course, students study the philosophy and research in concepts of cognition, reasoning, learning, communication, memory, and emotions as they apply to both wild and domestic animals. Students explore the research and philosophy of cognition in different species and the application of these principles to the management, welfare, and care of animals in a variety of environments. Prerequisite(s): PY 111.

AB 221. Animal Comparative Anatomy. 3 Hours.
In this course, students study the structure and function of anatomy and physiology across multiple vertebrate species and explore the implications for animal health and welfare. Students identify connections between species' physical characteristics and niches and assess the relationship between evolution, phylogeny, and anatomy and physiology. Students also utilize terminology relevant for effective communication about anatomy and physiology in fields such as veterinary medicine. Prerequisite(s): BY 191 and BL 191.

AB 224. Research Design for Animal Studies. 3 Hours.
In this course, students learn to develop research questions and hypotheses grounded in animal-focused inquiry and refine them into viable study plans. The course emphasizes the ethical, legal, and welfare considerations that guide research involving animals, with particular attention to IACUC principles and species-specific needs. Students examine methodological approaches used across animal studies and evaluate the suitability of different designs for various research contexts. Students apply their learning to design a complete research proposal tailored to a selected animal and research environment. Prerequisite(s): MS 132.

AB 234. Animal Health and Nutrition. 3 Hours.
In this course, students study important factors impacting the health and welfare of animal species and the implications of nutrition. Students explore factors that impact health and wellness, including the role of digestive systems, nutrition, home and veterinary preventative care, and exercise in health. Prerequisite(s): BY 191 and BL 191.

AB 301. Animal-Human Interactions. 3 Hours.
In this course, students study the history of animal-human interactions, current research in anthrozoology, and the application to practices in domestic, wild, and captive environments. Students also study the effects of animals on humans and of humans on animals with specific focus on animals and environments of the student's choosing. Prerequisite(s): AB 201.

AB 310. Animal-Assisted Thrpy:Understanding Techniques, Regs & Risks. 3 Hours.
Professional animal-assisted therapies demonstrate how the human-animal bond can create lasting social, emotional, cognitive, physical, spiritual and psychological changes. Animal-assisted therapeutic activities and learning are found in many settings. It is important that psychology practitioners understand how to safely, legally, and ethically integrate animals into their practice. Students study various techniques specific to animal-assisted therapy and understand best practices for working with animals during counseling sessions. Prerequisite(s): AB 210.

AB 321. Introduction to Wildlife Care and Management. 3 Hours.
In this course, students learn about the care and management of wildlife in captive settings. The course is structured around the theme of animal welfare. Through the course, students gain perspectives on the principles of animal welfare and how these are applied to wildlife management strategies. Each week students explore relevant content, examine contemporary use cases, and apply knowledge to proposing solutions to problems. Prerequisite(s): AB 201.

AB 325. Aquatic Animal Care. 3 Hours.
This course introduces principles and practices in the care, management, and welfare of aquatic animals across marine and freshwater environments. Students will apply behavioral, health, and welfare principles to the professional care of aquatic animals in captive, rehabilitation, and conservation settings, and will assess indicators of welfare to inform care decisions. Prerequisite(s): AB 201.

AB 333. Animal Disease. 3 Hours.
In this course, students study how infectious and non-infectious diseases impact animals, inclusive of causes, transmission, symptoms, and treatments. Students explore relationships between host and parasite species and how certain species are vectors for zoonotic disease. Prerequisite(s): BY 191 and BL 191.

AB 334. Animal Breeding and Genetics. 3 Hours.
In this course, students study animal reproduction and genetics across a variety of species while also completing a focused study on one species of choice. Students also explore potential genetic outcomes of reproduction, gestation and development timelines, and reproductive care. Additionally, students consider the ethics of population management through breeding programs and sterilization techniques. Prerequisite(s): BY 191 and BL 191.

AB 341. Animal Care and Wellness. 3 Hours.
In this course, students study theories around the physical, psychological, and social needs of animals as they apply to positive wellness. Students develop care plans and husbandry plans for specific animals based on these needs and explore species-specific requirements for nutrition, veterinary care, and recognizing indicators of positive wellness and wellbeing. Students also develop a Care Manual for a species and environment of their choosing. Prerequisite(s): BY 191 and BL 191.

AB 381. Human Dimensions of Wildlife Care and Rehabilitation. 3 Hours.
In this course, students will evaluate the social, cultural, and political factors that influence human–wildlife interactions and shape wildlife care and rehabilitation practices. Students will learn about the human-dimensions that impact wildlife care and rehabilitation decisions to develop or improve education, outreach, coexistence, or engagement strategies. Prerequisite(s): AB 321.

AB 401. Animal Training. 3 Hours.
In this course, students study the basic concepts of learning theory, associative and non-associative learning, classical and operant conditioning, and social and observational learning as they apply to animal training. Students explore the application of different training techniques to a variety of species and examine the effects of stress and environments on training goals. Prerequisite(s): AB 201.

AB 410. Canine- and Feline-Assisted Interventions. 3 Hours.
In this course, students study the history, current research, and new practices of canine- and feline-assisted interventions, activities, and therapies. Topics include the examination of models and applications of animal-assisted interventions (AAI) with small animals, animal welfare in AAI, and various methods associated with integrating animals into therapeutic environments. Prerequisite(s): AB 301 or AB 310.

AB 411. Equine-Assisted Interventions. 3 Hours.
In this course, students study the history, current research, and new practices of equine-assisted interventions, activities, and therapies. Topics include the examination of models and applications of equine-assisted activities, therapies, and interventions (EAAT), equine welfare in AAI, comparisons between mounted (including hippotherapy) and unmounted work, and various methods associated with integrating equines into therapeutic environments. Prerequisite(s): AB 301 or AB 310.

AB 421. Designing Captive Wildlife Experiences. 3 Hours.
In this course, students learn about the design of captive wildlife experiences. The course functions as the capstone for the Captive Wildlife Care Certificate program. Through the course, students gain perspectives on the history and epistemology of habitat design for captive animals. Students also explore the theories of behavioral enrichment and applied animal cognition. Prerequisite(s): AB 321.

AB 425. Aquatic Animal Habitats. 3 Hours.
This advanced course focuses on the design, assessment, and management of aquatic habitats that promote species-specific welfare and ecological sustainability. Students will apply sustainability and welfare standards to design aquatic habitats that promote species-specific welfare and ecological balance, and explain the environmental, behavioral, and technical factors that influence habitat performance and animal wellbeing. Prerequisite(s): AB 325.

AB 441. Animal Welfare. 3 Hours.
In this course, students study the domains of welfare, laws and regulations as they relate to the social and behavioral components of animal wellbeing. Students will evaluate animal welfare using guidelines appropriate to the setting, apply welfare principles to improve wellbeing of animals, and employ industry-standard ethics for maintaining optimal animal welfare and wellbeing. Prerequisite(s): AB 201.

AB 445. Wildlife Rescue, Transport, and Triage. 3 Hours.
In this advanced course, students will apply biological, behavioral, welfare, and policy considerations to evidence-based decision-making about wildlife rescue. Students will learn about handling, containment and transport procedures to minimize stress and promote safety for both wildlife and responder, as well as requirements for communicating case information with rehabilitation facilities, veterinarians, and regulatory agencies. Prerequisite(s): AB 321.

AB 491. Animal Care and Behavior Capstone. 3 Hours.
This course serves as the capstone for students enrolled in animal-focused majors. Students carry out a capstone project along an area of inquiry defined and approved during the first week of the course. Students are expected to conduct their project in a self-directed manner and are expected to come to the course with a drafted project idea to discuss with the instructor/supervisor for approval. The types of projects vary based on student interest and availability of options. Students hoping to work on research projects or internships for their capstone are expected to contact and gain approval from appropriate organizations or individuals prior to the start of the course. The course culminates in a final project and presentation in the field of animal care and behavior. Prerequisite(s): (AB 310 or AB 341) and (AB 224 or SC 224).

AB 610. Anthrozoology: Animals, People, and Society. 3 Hours.
In this course, students will explore new concepts in animal-human interactions via research in anthrozoology and related fields and address new perspectives in the application of research in various fields of animal science. As part of this course, students will critically evaluate research in anthrozoology and assess the role of animal-human interactions in different areas of society and culture.

AB 621. Applied Animal Management. 3 Hours.
In this course students study how the missions of zoos, farms, and shelters can aim to support animal and human welfare. As part of this course, students explore management considerations for zoos, farms, and shelters, including finances, staffing, and services. Students also evaluate the efficacy of different business models for zoos, farms, and shelters in the context of animal and human welfare.

AB 641. Animal Welfare: Governance and Legislation. 3 Hours.
In this course, students will study animal welfare and the existing aims and legislation in supporting welfare across a variety of environments. Students will assess animal welfare assurances in various settings and propose or enhance existing animal welfare legislation.

AB 642. Animal Welfare: Biology, Behavior, and Affective State. 3 Hours.
In this course, students will examine the role of biology, behavior, and environmental factors in different aspects of animal welfare and well-being. Students will also assess emerging research and global perspectives on animal welfare to develop solutions to improve animal welfare and well-being.

AB 701. Advanced Animal Behavior. 3 Hours.
In this course, students will study the biology of animal behavior across a variety of species. Students will utilize quantitative and qualitative reasoning skills to examine the role of anatomy and physiology, genetics, evolution, and learned experiences in animal behavior. Discipline-specific conventions will be explored to support student communication skills in a manner aligned with professional expectations.

AB 702. Advanced Animal Training. 3 Hours.
In this course students study applied animal behavior and develop an in-depth training plan. Students explore classical conditioning, operant conditioning, and techniques for application of a variety of methods of training that are effective and humane.

AB 710. Behavioral Bio: Physi, Stress & Neurologic Resp in Animals. 3 Hours.
In this course, students study the physiological and neurological process of behavior in animals with special focus on stress and physiology related to domestic or captive species. Students also apply biological principles to management and handling practices as they relate to species and industries within the animal science field.

AB 711. Animal Cognition and Consciousness. 3 Hours.
In this course students study current research topics in animal cognition and consciousness and evaluate the application of these concepts to different fields of work in the animal science community. Students also discuss and develop new proposals for research in this field and collaborate on ideas for using emerging research to improve opportunities for animals in their respective industries.