PIs	**Bernard P**, Spear J, Bigelow L, Pope E
Project Title	Identification and characterization of ultrasonic noise for the improvement of zoo animal welfare
Project Summary	Every organism experiences the world in a unique way. Unfortunately, most research has focused on understanding how humans perceive the environment and extrapolating that information to other organisms. It is well-known that noise causes numerous adverse outcomes; however, most studies only investigate impacts of human audible noise ignoring effects of sounds with higher frequencies (ultrasonic noise). Given various animals cannot only hear these sounds but also use them for other functions (i.e. communication, navigation), it is necessary to further our understanding of their presence and impacts to improve overall animal welfare. To gain a better understanding of the presence of ultrasonic noise within the zoo environment, various exhibits will be systematically surveyed using a specialized microphone and sources of noise within the hearing range of the animal occupants determined. Thus, results will improve zoo animal welfare and demonstrate the potential necessity of regulating ultrasonic noise exposure.
Amount	$13,150.00
Type of Application	Research

PIs	**Carr M**, Foley P
Project Title	Neutering feral cat of PEI Cat Action Team (CAT)
Project Summary	The Problem: There are too many feral cats on Prince Edward Island, causing problems for both the cats and local wildlife. The Solution: A Trap-Neuter-Return (TNR) program. This program will capture feral cats, spay or neuter them, vaccinate them, treat them for parasites, and release them back into their original territory. Why it's important: TNR programs improve the health and well-being of feral cats, protect local wildlife, and bring the community together to help animals. By reducing the number of feral cats, we can create a more humane and balanced environment for both humans and animals.
Amount	$5,183.27
Type of Application	Service

PIs	**Cusack L**, Proudfoot K
Project Title	Community perceptions of the role of veterinarians in multi-species welfare
Project Summary	The AVC Wildlife Service (WS) provides support for injured, orphaned, and displaced wildlife on PEI through veterinary care, rehabilitation, and applied research. The WS remains the only facility that offers full veterinary care and rehabilitation to wildlife, resulting in significant positive welfare effects that include direct impact on individual animals, population effects, wildlife health monitoring, and public education. The WS also offers early clinical skills training and exposure to spectrum of care to pre-clinical year veterinary students; consistent access to this level of hands-on training during years 1-3 of the curriculum at AVC is unique to the WS. In addition to continuing to support wildlife care, we aim to develop an assessment tool to investigate community perceptions on multi-species welfare and hypothesize a relationship between their value of different species and perception of the role of veterinarians in wildlife welfare. Information gained will help inform future wildlife care initiatives.
Amount	$52,000.00
Type of Application	Integrated

PIs	**Ogilvie A**, Foley P, MacLean R, MacLean M, Ellis L
Project Title	Medical and surgical care of homeless small animals
Project Summary	The goal of this project is to provide medical and surgical care for homeless companion animals species. Through this grant, the Atlantic Veterinary College and the PEI humane society identify homeless animals who require medical or surgical care, develop treatment plans in concert, and provide care to these animals that would otherwise be euthanized. Following care, these animals are adopted by community members. This grant directly improves the welfare of homeless companion animals and increases educational opportunities for students of the AVC. It fosters a sense of community for all members of the AVC involved in the care of these animals. The project members will also review requests for services from animal welfare organizations throughout Atlantic Canada. The project team tracks case numbers and expenditures to maximize the number of animals that may benefit from this grant.
Amount	$25,000.00
Type of Application	Service

PIs	**Overall K**, Martin C, Montelpare B, Vernick J
Project Title	Understanding when normal and abnormal behaviours diverge – using physiological and behavioural measures to define developmental trajectories for problematic behaviour. Part II: Physiology
Project Summary	We know little about early developmental phases of problematic and pathological behaviours in dogs, yet behavioural problems worsen with time if untreated, have adverse effects on physical health, and are the major reason for relinquishment and euthanasia. Accordingly, we developed and executed a test paradigm to establish composite markers of patterns of behavioural development. We tested puppies at 3-, 6-, 9- and 12-months using standardized behavioural tests, and had clients concomitantly complete a detailed, scorable questionnaire about their dog. We also collected blood samples at 3- and 12-months to measure inflammatory and stress-response markers. Ongoing analysis shows that at least 2 of our tests at 3-months predict pathology at 12-months, suggesting that dogs do not outgrow early concerns and early intervention can spare both dogs' welfare and their lives. This proposal seeks support to analyze the stored laboratory samples, to establish the physiological 'costs' of the development of behavioural pathology.
Amount	$19,700.00
Type of Application	Research

PIs	**Spears J**, Crane B, Stewart K, Knight J
Project Title	Evaluation of teaching cattle and horse welfare using automated AI technology
Project Summary	This project aims to obtain and employ a commercially available system of cameras and AI driven software to provide continuous, autonomous monitoring of teaching cattle and horses at the AVC. The system, called the BETSY™ system, will allow for greatly improved monitoring, tracking and recording of animal behaviors and physical characteristics that could positively or negatively impact animal welfare. The use of AI technology in these processes provides greater sensitivity and automaticity in handling large data sets required to process and interpret the information which provides a more precise monitoring of the animals. Ultimately, such a system will benefit animals beyond AVC, and will provide a demonstration and research arena for the benefit of future animal welfare research and regulatory decision making at other institutions and the Canadian Council on Animal Care.
Amount	$7,000.00
Type of Application	Service