**TRAINING IN THE RESPONSIBLE CONDUCT OF RESEARCH**

Cold Spring Harbor Laboratory (CSHL) takes an active and innovative role in providing education and training in the Responsible Conduct of Research (RCR) to students and staff. All CSHL staff, postdoctoral fellows, graduate students and research technicians are required to follow the guidelines established for ethical and responsible conduct in scientific research. A copy of these guidelines is provided to all staff upon hire and is reissued each year.

In Month and Year I will attend the Responsible Conduct of Research Course at CSHL. This course features interactive lectures given by CSHL faculty, administrative personnel, and external guest speakers, as well as case studies and breakout group activities. Topics covered in this comprehensive, multiday course include: avoiding research misconduct in the lab, human subjects and materials, whistleblower policies, roles and responsibilities associated with research funding, use of biohazardous materials, the ethical use of animals in research, responsible research conduct in the lab, and how to identify and report misconduct in scientific literature. The case studies for this course include the “Introduction to the Responsible Conduct of Research” by Nicholas Steneck at the Office of Research Integrity, and “On Being a Scientist” by the National Academies. In addition, the course includes the video series on misconduct from the Office of Research Integrity, HSS. In January 2023, I completed a course in Scientific Rigor and Reproducibility offered by CSHL. This was a 10-hour course spanning 5 sessions that featured interactive lectures and breakout room case studies. Topics covered in this course included: experimental design, data management, discipline-specific measures in rigor and reproducibility, and data analysis and integrity. In addition, in Spring 2017, I took a semester long course Responsible Conduct, Rigor and Reproducibility in Research through UC Berkeley’s graduate Molecular and Cell biology department. This course met weekly and covered a variety of topics including research misconduct, ethical use of animals, proper handling of research funds, and design of reproducible experiments. It included both lectures and small group case studies with acted out scenarios. In Spring 2020, I took the Responsible Conduct of Research Refresher course which covered the same material but was designed for mid-career graduate students instead of first year students.

In addition to these interactive training courses offered by CSHL, I have also completed the required online RCR training provided by CITI. The CITI on-line course covers a range of topics including authorship, collaborative research, conflicts of interest, data management, plagiarism and research misconduct.

Educational training programs in the humane and ethical use of animals are conducted by the laboratory veterinarian and the animal facility managers. All new investigators receive one-on-one training in the standard operating procedures of the appropriate animal facility and receive a copy of the Laboratory Animal Resources User Guide. Wet-lab training on specific techniques is available to all research personnel who will be working directly with animals (not applicable to the current proposal), and a Surgery Wet-Lab training (didactic and hands-on components) is required for all investigators performing IACUC-approved survival surgical procedures on animals (not applicable to the current proposal). All protocols are screened by the IACUC, and most procedures are conducted or supervised by the facility manager or laboratory animal technicians. For those investigators working with human subjects/materials (not applicable to the current proposal), the CSHL Institutional Review Board requires them to be certified in the Protection of Human Subjects by completing the appropriate online course provided by CITI. While this project does not require work with biomedical data or samples, in January of 2023 I completed this training.

**RCR Course - 2022 Syllabus (note: each session will include a Faculty perspective)**

Day 1 The Ethical Use of Animals in Research *R. Rubino, D.V.M., Director, Laboratory Animal*

*Resources/Attending Veterinarian*

Roles and Responsibilities Associated *W. Goldschmidts, Ph.D., Vice President, Office of*

with Research Funding *Sponsored Programs*

Whistleblower Policies *K. Raftery, Vice President, Human Resources*

Introduction to the Ombuds Office *K. Nurieli, Ombuds*

Ethics of Research Commercialization *A. Whiteley, Vice President, Business Development/Tech Transfer*

Human Subjects and Materials *D. Esposito, Ph.D., Director of Research Compliance*

Use of Biohazardous Materials *J. Pisciotta, Manager, Environmental Health & Safety*

Day 2 Discussing Responsible Conduct of *Various Faculty*

Research in the lab: personal approaches

Case Studies/Breakout Groups *Various Faculty*