NWP Pedagogical Merit Protocol

PURPOSE

The purpose of this protocol is to set out the requirements that ensure that all animal-based teaching and training conducted at Northwestern Polytechnic undergoes pedagogical merit.

BACKGROUND

The Canadian Council on Animal Care (CCAC) policy on Pedagogical Merit of Live Animal-based Teaching and Training (May 2016) requires that CCAC certified institutions that conduct animal-based teaching or training must have a formal pedagogical merit review process.

SCOPE

This protocol applies to all animal-based teaching and training activities at Northwestern Polytechnic that require an Animal Use Protocol (AUP), including teaching in an academic setting, institutional training, as well as non-degree/diploma/certificate credit courses (e.g. professional development or continuing education workshops).

STATEMENT

1. All teaching and training involving animals must undergo a peer review of pedagogical merit by at least two reviewers who are independent of the ACC.

2. An AUP must be reviewed and approved by the ACC before the animal-based teaching or training can commence. The ACC will not itself review the AUP for pedagogical merit.

RESPONSIBILITY AND PROCEDURES

Northwestern Polytechnic Vice President, Academics & Research (VPA&R) is responsible for establishing and maintaining a Merit Review Committee and ensuring that pedagogical merit review is conducted in accordance with CCAC policy.

The Merit Review Committee is responsible for reviewing the pedagogical merit of animal use in teaching or training. The Merit Review Committee is composed of reviewers who collectively have the expertise to assess the pedagogy of animal use in teaching and training. To assure that the pedagogical merit review is at arm's length from the course instructor, the course, and the ACC, the following terms and conditions are required:

1. Reviewers must be external to the course/laboratory for which the protocol will be undertaken, and must not be directly or indirectly involved in the course/laboratory design or implementation.

2. Reviewers have appropriate expertise in a relevant field, discipline, or sub-discipline to adequately review the proposal.

3. Reviewers cannot be a member of the ACC or any ACC subcommittee.

***Please note**: This form* replaces *and* supersedes *any* previous Instructor Form for Pedagogical Merit Review

4. Reviewers must disclose potential or perceived conflict of interest with a course instructor or course/laboratory to the Vice President Academics of Research.

The course instructor must complete and submit an AUP for the proposed teaching or training activity. As part of the AUP submission, the course instructor will complete the NWP Instructor Form for Review of Pedagogical Merit (See Appendix 1). This information, along with the AUP, will be provided to the reviewers to facilitate their review.

The NWP Animal Care Coordinator is responsible for identifying protocols that require Pedagogical Review and directing them to the Vice President of Academics and Research who will select a minimum of two reviewers. Ideally, the two reviewers should have knowledge in pedagogy and replacement alternatives to animal-based teaching or training should be involved in the pedagogical merit review. There is no requirement for the same individual to possess knowledge in both areas as long as both are covered.

The assigned reviewers will evaluate pedagogical merit of the application based upon the information presented on the NWP Instructor Form for the Review of Pedagogical Merit. Each reviewer will complete a Pedagogical Merit Reviewer Form (See Appendix 2) and states whether the animal-based activity has pedagogical merit or not. Reviewers are free to request additional information from the course instructor, through the Vice President, Academics & Research before rendering a final decision. A third review may be sought if there is a disagreement between the first two reviewers.

Reviewers' comments must be documented and forwarded to the instructor, who will be given the opportunity to make appropriate changes to the protocol and related documents, based on the reviews' comments, before resubmitting the documents to the reviewers, if necessary. Reviews will then send their final comments and conclusion to the VPA&R for pedagogical merit review who, if pedagogical merit is confirmed will submit the following to the animal care committee: the final protocol and the reviewers' comments and conclusions. If based on the comments and conclusions of the reviewers, the VPA&R decides that there is no pedagogical merit, the ACC should not undertake ethical review of the protocol.

The ACC will review the ethics of the AUP as per the NWP ACC Terms of Reference and render a final decision on the AUP once pedagogical merit is approved.

REFERENCE

1. CCAC Policy: Pedagogical merit of live animal-based teaching and training
2. CCAC Frequently Asked Questions: Pedagogical merit of live animal-based teaching and training

Instructor Form for Review of Pedagogical Merit for Animal-Based Teaching and Training Activities (Non-Expedited)

In accordance with new CCAC guidelines, all animal-based teaching or training courses must have a formal pedagogical merit review to determine if animal-based methods are essential to meeting learning objectives and outcomes. Your request for an animal-based training course at Northwestern Polytechnic will undergo an internal/external review to determine its pedagogical meritregarding its use of animals. Please complete the following questions on this form.

COURSE NAME AND NUMBER:	**STUDENT LEARNING LEVEL:**
INSTRUCTOR/STUDENT RATIO	**LIVE ANIMAL/STUDENT RATIO**

DESCRIBE THE LEARNING OUTCOMES
Clearly describe the learning activity and the involvement of live animals.
Specify how well the learned behaviour must be performed (accuracy, speed, quality)
Explain how the learning outcomes are realistic and achievable based on: ○ **Composition (e.g. enrolled students / volunteers / non-credit participants)** ○ **Needs of the student group(s) (e.g. teaching / demonstration / essential task list)** ○ **Teaching activities (what, where) proposed**

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Explain how the timing of the inclusion of animals in the teaching/training is suitable for the projected timing of the intended learning outcome(s). (In other words, is it necessary for these students at this time in their academic program be able to do the listed procedures?).
Clearly describe the benefits for involving live animals in this course, at this point in time in the academic curriculum, to future study or career paths.
Does this course serve as a prerequisite for further study? YES / NO (circle) **If yes, prerequisite for what?**
LEARNING ASSESSMENT METHODS
Describe how students will be evaluated on knowledge or skill acquisition involving live animals? Assessment methods could include essays, multiple choice questions, laboratory reports, performance of a task, etc.
CONSTRUCTIVE CURRICULUM ALIGNMENT PARADIGM
Learning outcomes must strongly align logically with learning assessment methods. Do both align with learning activities in support of the outcomes? (For examples, refer to CCAC information on *Pedagogical merit of live animal-based teaching and training - Frequently Asked Questions*)

REPLACEMENT ALTERNATIVES
Show how you have made efforts to identify reasonable replacement alternatives. (Attach appropriate resource information that was consulted when researching replacement alternatives)
ADDITIONAL INFORMATION
Please provide additional information to support live animal use for this activity.

Applicant name:

Date:

Please forward this completed form to the Animal Care Committee Coordinator.

Please note: *This form* replaces *and* supersedes *any* previous Pedagogical Merit Reviewer forms.

Appendix 2

Reviewer Form for Review of Pedagogical Merit for Animal-Based Teaching and Training Activities (Non-Expedited)

A number of elements factor into deciding if animal-based teaching or training has pedagogical merit. For the purposes of the policy, the goal of this review is to determine if the live animal model proposed by the instructor is the best learning model in support of intended learning outcomes. In other words, is the involvement of live animals essential, or can replacement alternatives, either absolute (non-animal model such as a mannequin or computer model) or relative (such as eggs, cell cultures, tissues, or animals that current expert peer advice and interpretation of scientific evidence indicate have a significantly lower potential for pain perception, such as some invertebrates), be used.

Please answer the following questions and document your conclusion.

Course Number and Name:		
Instructor(s):		
LEARNING OUTCOMES		
Are the learning outcomes:		
a. Specific: are they clearly described and do they specify the involvement of animals?	☐ YES ☐ NO	If No, explain:
b. Measurable: do they specify how well the learned behaviour must be performed (accuracy, speed, quality)?	☐ YES ☐ NO ☐ N/A	If No, explain:
c. Attainable and Realistic: are they realistically achievable, given the composition, learning level, and needs of the student group(s), and the teaching activities (what, where) proposed? Are the animal/student ratio and instructor/student ratio appropriate to achieve the learning outcomes?	☐ YES ☐ NO ☐ YES ☐ NO	If No, explain:

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d. Timely: is the timing of the inclusion of animals in the teaching/training suitable for the projected timing of the intended learning outcome(s)?	☐ YES ☐ NO	If No, explain:
Are there clear benefits to involving animals in this course, at this point in time in the academic curriculum, to future study or career paths?	☐ YES ☐ NO	If No, explain:
Does this course serve as a prerequisite for further study?	☐ YES ☐ NO	
Are learning outcomes SMART? (See a, b, c and d above)	☐ YES ☐ NO	If No, explain:
LEARNING ASSESSMENT METHODS		
Are live animals involved in the assessment?	☐ YES ☐ NO	If No, explain:
Are the learning assessment methods clear?	☐ YES ☐ NO	If No, explain:
LEARNING ACTIVITIES		
Are the learning activities clear?	☐ YES ☐ NO	If No, explain:
CONSTRUCTIVE CURRICULUM ALIGNMENT PARADIGM (see question 7 in *the CCAC frequently asked questions: Pedagogical merit of live animal-based teaching and training*)		
Do learning outcomes strongly align logically with learning assessment methods, and do both align with learning activities in support of the outcomes?	☐ YES ☐ NO	If No, explain:
REPLACEMENT ALTERNATIVES		
Has the instructor made reasonable efforts to identify replacement alternatives?	☐ YES ☐ NO	If No, explain:

Please note: *This form* replaces *and* supersedes *any* previous Pedagogical Merit Reviewer forms.

Which resources were consulted?		

BEST LEARNING MODEL AND REPLACEMENT ALTERNATIVES

Based on SMART learning outcomes, constructive curriculum alignment, and the necessity for these students to achieve stated learning outcomes at this point in their teaching/training experience, is the liveanimal proposed in this course the best model in support of learning outcomes, or could equivalent absolute or relative replacement alternatives be used?

☐ BEST MODEL
☐ ALTERNATIVE

Explain choice:

If a replacement alternative would be more appropriate, provide options below:Absolute (e.g., computer simulation, model):

Relative (e.g., lower sentient live vertebrate or cephalopod, tissue, eggs, invertebrate):

CONCLUSION

With regard to meeting learning outcomes, the proposedlive animal model is:	☐ ESSENTIAL (has pedagogical merit) ☐ NOT ESSENTIAL (no pedagogical merit)

Reviewer name:

Date:

Please forward this form to the senior administrator responsible for pedagogical merit review, who will forward it to the instructor and the animal care committee.

Effective Date: January 1st 2017
Revision Date: May 20, 2022
Reviewed and Approved by ACC: December 10th, 2018

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