Date received in office: \_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_ IACUC#: \_\_\_\_\_\_\_\_\_\_\_\_\_\_\_



**Institutional Animal Care and Use Committee Animal Use Protocol Application**

**Initial Review**

Use this form to apply for any new use of animals for teaching or research or for the continued use of animals 3 years or more after the last protocol approval. The Institutional Animal Care and Use Committee (IACUC) will review the protocol and determine if it is to be approved. This application must have full IACUC approval prior to initiation of the project. Following approval, subsequent animal usage will be restricted to that outlined in the application. Detailed IACUC policies and procedures apply and are available from the Office of Research and Sponsored Programs.

**Annual Review and Expiration**

The maximum period of approval for an application is 3 years. Investigators will receive notification of the need for renewal of existing protocols 90, 60 and 30 days prior to expiration of animal use approval. Pursuant with PHS guidelines, failure to receive approval by the required deadlines will result in the suspension of the protocol. For federally funded research, suspension of a protocol will be reported to the appropriate federal agency (e.g., NIH, NSF).

**Amendments**

Proposed changes to an approved protocol in personnel, funding agency, species, numbers of animals, and/or procedures should be submitted to the IACUC using an Animal Use Protocol Amendment application.

**SUBMISSION, ROUTING & REVIEW OF PROTOCOL APPLICATIONS**

1. Submit your protocol application (minus the face page), signed by the principal investigator (PI) and department chair, via email to:

Research Compliance Officer, Office of Research and Sponsored Programs

***researchcompliance@uca.edu***

2. The protocol will be forwarded to the IACUC for review.

3. The Research Compliance Officer will notify the investigator of the committee decision. Approved applications will be assigned a protocol number which must be referenced on:

* All internal correspondence regarding the approved animal use,
* All purchase order requisitions for animals to be used under the protocol, and
* All identification cards for animals under the protocol.

4. After approval, the PI should consult with the Office of Research and Sponsored Programs to assure that notice of protocol approval is forwarded to the appropriate sponsoring agency if the study is supported by external funding.

**IACUC Animal Use Protocol Application**

1. **Administrative data**

|  |
| --- |
| [ ]  New [ ]  Renewal [ ]  RevisionProtocol #:  |
| Title of project:  | *IACUC office only* |
| Protocol # |
| Approval Date: |
| Department:  | Expiration Date: |
| Principal investigator:  | Campus Mail Address:  |
| Telephone: | Fax:  | Email :  |
| Funding agency or sponsor (if applicable):  |
| DEA license:  |

1. **Collaborators/students/other personnel**: **training & qualifications**

Indicate by completing the following table the qualifications of investigators and professional, technical, or student personnel who will be overseeing or actually performing experimental procedures with animals including all personnel who may have direct contact with animals and animal tissues. Indicate the individual’s involvement in surgical procedures or euthanasia.

|  |  |  |  |  |  |
| --- | --- | --- | --- | --- | --- |
| Last name, first name | Degree, certification, or licensure | Experience with species(years) | Experience with procedures (years) | Will perform euthanasia?(Y or N) | Will this person be involved in surgery or surgical care?(Y or N) |
|       |       |       |       |     |     |
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If an investigator, student, or technician listed in this protocol application is performing the procedure for the first time, describe the type of training (below) they will receive, the person(s) who will provide that training, and the qualifications of the person to provide such training.

1. **Contact information for all personnel (from 2 above)**

|  |  |  |  |  |
| --- | --- | --- | --- | --- |
| Name | Department | Campus phone number | Off-campus phone number | Contact in case of emergency?(Y or N) |
|       |       |       |       |       |
|       |       |       |       |       |
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1. **Peer review**

Has or will this protocol undergo peer review and be evaluated for scientific merit and experimental design?

 [ ]  Yes [ ]  No

If Yes, who provides peer review? (e.g., NIH/NIA, or the name of an individual if no review committee):

1. **Non-technical (lay) summary of project**

In the space below, please provide a brief nontechnical (lay) description of this project. The language used should be understandable to a non-scientist with a 9th grade education; hence, you should avoid the use of medical terminology. This summary should focus on the procedures performed on the animals (including methods of euthanasia). There is no specific word limit; the summary should be brief, but complete.

[Type text in the text box]

1. **Animal numbers**

**Pain and distress classifications:** *All procedures that involve more than momentary or slight pain and discomfort to animals, require the appropriate use of analgesics, unless withholding of such agents is scientifically justified in writing and approved by the IACUC. This section must be filled out if you are working with any vertebrate animal or cephalopod, regardless of USDA status. Please refer to the* [*“USDA Pain Classifications.”*](https://www.aphis.usda.gov/sites/default/files/ac-tech-note-categorizing-animal-pain-or-distress.pdf)

NOTE: There is no Classification A.

Classification B: Animals being bred, conditioned, or held for use in teaching, testing, experiments, research, or surgery, but not yet used for such purposes.

Examples

* Breeding colonies of any animal species that are held in legal sized caging and handled in accordance with the *Guide* and other applicable regulations. Breeding colony includes parents and offspring.
* Newly acquired animals that are held in proper caging and handled in accordance with applicable regulations.
* Animals held under proper captive conditions or wild animals that are being observed.

Classification C: Animals upon which testing, research, experiments, or tests will be conducted involving momentary or slight pain or distress and no use of pain-relieving drugs, or no pain and distress.

Examples

* Procedures performed correctly by trained personnel such as the administration of electrolytes/fluids, administration of oral medication, blood collection from a common peripheral vein per standard veterinary practice (dog cephalic, cat jugular) or catheterization of same, standard radiography, parenteral injections of non-irritating substances.
* Euthanasia performed in accordance with the recommendations of the most recent AVMA Panel on Euthanasia, using procedures that produce rapid unconsciousness and subsequent humane death.
* Manual restraint that is no longer than would be required for a simple exam; short period of chair restraint for an adapted nonhuman primate.

Classification D: Animals upon which experiments, teaching, research, tumor bearing experiments, surgery, or tests will be conducted which have the potential to cause pain or distress to the animals and for which appropriate anesthetic, analgesic, or tranquilizing drugs will be used to prevent this pain and distress.

Examples

* Surgical procedures conducted by trained personnel in accordance with standard veterinary practice such as biopsies, gonadectomy, exposure of blood vessels, chronic catheter implantation, laparotomy or laparoscopy.
* Blood collection by more invasive routes such as intracardiac or periorbital collection from species without a true orbital sinus such as rats and guinea pigs.
* Administration of drugs, chemicals, toxins, or organisms that would be expected to produce pain or distress but which will be alleviated by analgesics.

Classification E: Animals upon which teaching, experiments, research, surgery, or tests will be conducted involving accompanying pain or distress to the animals and for which the use of appropriate anesthetic, analgesic, or tranquilizing drugs will adversely affect the procedures, results, or interpretation of the teaching, research, experiments, surgery, or tests.

Examples

* Procedures producing pain or distress unrelieved by analgesics such as toxicity studies, microbial virulence testing, radiation sickness and research on stress, shock, or pain.
* Surgical and postsurgical sequela from invasion of body cavities, orthopedic procedures, dentistry or other hard or soft tissue damage that produces unrelieved pain or distress.
* Negative conditioning via electric shocks that would cause pain in humans.
* Chaining of nonhuman primates not conditioned to the procedure for the time period used.

**You are required to fill out a justification for Classification E animals.**

If you have Classification E animals, provide a justification below. Otherwise, complete the tables and proceed to Section G.

Please explain the procedures producing pain or distress and the justify reasons for not using appropriate anesthetic, analgesic, or tranquilizing drugs.

[Type text in the text box]

|  |  |  |
| --- | --- | --- |
| Project period (1 year per line) | Number of animals by USDA pain/distress classification species #1 (e.g., mice): | Total number of animals |
| Year | From (mm/yy) | To (mm/yy) | B | C | D | E | Total of animals per category/year |
| 1 |       |       |       |       |       |       |       |
| 2 |       |       |       |       |       |       |       |
| 3 |       |       |       |       |       |       |       |
| Total number of animals (should be consistent with the number of animals described in the justification) | Total 3 years:        |

|  |  |  |
| --- | --- | --- |
| Project period (1 year per line) | Number of animals by USDA pain/distress classification species #1 (e.g., mice): | Total number of animals |
| Year | From (mo/yr) | To (mo/yr) | B | C | D | E | Total of animals per category/year |
| 1 |       |       |       |       |       |       |       |
| 2 |       |       |       |       |       |       |       |
| 3 |       |       |       |       |       |       |       |
| Total number of animals (should be consistent with the number of animals described in the justification) | Total 3 years:       |

1. **Justification for Number of Animals Requested**

Recommended: Attach a timeline/table and include any calculations (statistical analysis).

[Type text in the text box]

1. **Documentation/literature search**

A literature search must be performed to prevent unnecessary duplication of research projects/courses performed at this and/or other institutions, and to demonstrate that there are no alternatives (such as computer models, tissue culture, etc.) to the use of live animals.

Please complete a MEDLINE search for alternatives and to rule out unnecessary duplication (<http://www.ncbi.nlm.nih.gov/entrez/query.fcgi?DB=pubmed>).

* date of literature search:
* databases, indexes or other sources used for review of literature:
* years covered in review:
* keywords:

Results of the literature search (required of all protocols)

Provide a narrative description of the result of the literature search. Include a “Statement of Assurance” that the literature was reviewed for non-animal or less sentient animal species to partially or fully replace animals (such as tissue culture or insect model) and that this project is not unnecessarily duplicative of research projects/courses performed at this or other institutions. This narrative should include adequate information for the IACUC to assess that a reasonable and good faith effort was made to determine the availability of alternatives or alternative methods. If the database search or other source identifies a valid alternative method (one that could be used to accomplish the goals of the animal use proposal), the written narrative should justify why this alternative was not used.

[Type text in the text box.]

1. **Species**

Note: If you will be using more than 5 species, please copy the table, complete, save, and attach as a separate file.

|  |  |  |  |
| --- | --- | --- | --- |
| **Species** | **Strain** | **Source** | **Max housed at 1 time** |
|  |  |  |  |
|  |  |  |  |
|  |  |  |  |
|  |  |  |  |
|  |  |  |  |

1. **Special requirements**

Are there special requirements for maintaining animals: [ ]  Yes [ ]  No

If you answer no, you are assenting that animals will be maintained according to the standard operating procedure of the animal facility. If yes, indicate the requirements below, such as caging type, bedding, type of water, and dietary requirements.

[Type text in the text box.]

Are there special instructions for animal care staff? [ ]  Yes [ ]  No

If yes, please describe the special instructions below.

[Type text in the text box.]

1. **Locations**

Where will animal experiments be conducted?

Will animals be outside of Animal Care Facility for more than 12hrs? [ ]  Yes [ ]  No

If yes, please indicate the building and room of the facility, which must meet satellite animal facility requirements.

1. **Disposition and Treatment of Animals**

Check all that apply.

Illness: [ ]  Call PI [ ]  Treat [ ]  Terminate

Death: [ ]  Call PI [ ]  Necropsy [ ]  Bag for disposal

1. **Wild or exotic species**

Are the animals considered wild or exotic? [ ]  Yes [ ]  No

Are permits required? [ ]  Yes [ ]  No

Have required permits been obtained or applied for? [ ]  Yes [ ]  No

If permits have been obtained, please attach a copy to this completed form.

If they have been applied for, please provide the date on which they were applied for and issuing agency.

1. **Invasive procedures**

Will invasive procedures be performed (any other than blood collection, catheterization, intubation, etc.)? [ ]  Yes [ ]  No

If yes, answer the following questions as applicable. If no, proceed to Section O.

* Will the procedure be done while the animal is under anesthesia? [ ] Yes [ ] No
* If yes, please describe the anesthesia to be used, including dose and route of administration.
* If no, please explain in detail below why anesthesia is not used.

[Type text in the text box.]

1. **Restraints**

Will the animals be restrained while they are awake? Restraints include chairs, slings, tethers, stanchions, metabolism cages, and other devices). [ ]  Yes [ ]  No

If yes, answer the questions below. If no, skip to Section P.

* + Method:
	+ Duration:
	+ Frequency:
	+ Frequency of observation during restraining:
	+ Person(s) responsible for observation:
1. **Surgery Type and Location and Anesthesia, Analgesics, and Euthanasia**

[ ]  Survival [ ]  Multiple Survival [ ]  Terminal [ ]  None (If none, proceed to Section Q)

Location (building and room) of surgical suite:

Describe the surgical procedure(s) in the space below.

[Type text in the text box.]

|  |
| --- |
| **Anesthesia, analgesia, euthanasia** |
|  | Drug | Dose mg/kg | Route | Frequency/duration |
| Preoperative |       |       |       |       |
|  |       |       |       |       |
| Intraoperative |       |       |       |       |
|  |       |       |       |       |
| Postoperative |       |       |       |       |
|  |       |       |       |       |
|  |       |       |       |       |
| Neuromuscular blocking agents |       |       |       |       |
|  |       |       |       |       |

Will neuromuscular blocking agents be used? [ ]  Yes [ ]  No

If yes, describe below how and by whom animals will be monitored. Also, if neuromuscular blocking agents are used without general anesthesia, provide justification.

[Type text in the text box.]

|  |
| --- |
|       |

Describe the post-operative care for survival procedures only.

 [Type text in the text box.]

Where are the animals held post-operatively? Building and Room#       N/A

[Type text in the text box.]

Under what circumstances will incremental does of anesthetics / analgesics be administered?

 If none, state this. Otherwise, describe below.

[Type text in the text box.]

**Q.** **Interventions for pain and distress**

What interventions are given? [ ]  anesthesia [ ]  analgesia [ ]  euthanasia [ ]  none

 Other:

Circumstances under which interventions are to be used: [ ]  as recommended by vet

 Other:

 What interventions are withheld? [ ]  anesthesia [ ]  analgesia [ ]  euthanasia

 [ ]  none

 Other:

 If interventions are withheld, please provide an explanation below why intervention is inappropriate.

[Type text in the box.]

1. **Regulation of animals**

Check all that apply: [ ]  euthanized [ ]  other (explain below):

In the box below, describe method(s) for euthanasia; for drugs, give name, route and dose. Also, describe a second method of euthanasia with which death is assured (e.g., decapitation, removal of heart, pneumothorax).

 [Type text in the text box.]

1. **Hazards to personnel:**

Mark each applicable hazard and describe. If any are answered “yes”, please explain. If none, please proceed to Section T.

* [ ]  Radioisotope
* [ ]  Carcinogen
* [ ]  Biohazard
* [ ]  Other

[Type text in the text box.]

1. **Body Fluids and Tissues**

Will body fluids or tissue from these animals be used by other investigators?

[ ]  Yes [ ]  No (If yes, describe below. If no, skip to XX.)

[Type text in the text box --- Spacing will adjust to accommodate the length of the narrative]

1. **Summary and Judicious Use of Animals**

In the box below, give a detailed summary to describe your work to the IACUC. Charts and graphs may be attached on a separate sheet. Please label and include each of the following:

* A brief description of the objective and significance of the proposed work, including the probable benefits of this work to human and/or animal health, the advancement of knowledge, or the good of society.
* A detailed description of all the procedures to which animals will be subjected.
* Your reason for selecting the species. Address whether other animals, especially lower species, would be suitable for these studies.
	+ - If transgenic animals are to be used, any expected effects of genetic manipulation should be described. If no effects are expected, this should be stated.
* Describe your experience with the proposed animal model and manipulation.

This summary should not be a copy of a grant proposal, abstract, teaching syllabus, or reprint. In this summary you should use language such that a scientist outside your field can understand.

[Type text in the text box]

**Principal Investigator Assurances**

All Assurances must be checked off by the PI before submission to the IACUC.

|  |  |
| --- | --- |
| [ ]  | I have a working knowledge of the PHS "Guide for the Care and Use of Laboratory Animals" and the USDA "Title 9 Animal Welfare Act" and its revisions. |
| [ ]  | The proposed work does not unnecessarily duplicate previous experiments, based upon the following type of computer literature search.  |
| [ ]  | All personnel involved in this project have been trained in the procedure to be used. |
| [ ]  | I and all personnel on the project have read any pertinent safety information, IACUC requirements, and security procedures (See IACUC Coordinator). |
| [ ]  | I shall be responsible for maintaining records of all animals used and the procedures carried out. |
| [ ]  | Any discomfort, distress or pain that may be associated with this research will be held to the absolute minimum. |
| [ ]  | Alternatives to any procedures that may cause pain or discomfort have been considered. |

*As Principal Investigator, I am aware that I have the ultimate responsibility, on a day-to-day basis, for the proper care and treatment of the laboratory animals. I agree to adhere to all federal, state and local laws and regulations governing the use of animals in teaching and research. I further assure the University of Central Arkansas Institutional Animal Care and Use Committee that the minimal number of animals will be used for the project and that every possible step will be taken to minimize stress or pain to the animals. I have carefully considered and concluded that no reasonable alternatives to the use of animals could be applied to this project, and that this project is not an unnecessary duplication of any previously published work.*

*I will submit appropriate annual review forms for this project, and obtain formal approval of the Committee prior to implementation of any changes in this protocol.*

\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_ \_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_

Principal Investigator Date

\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_ \_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_

Department Chair Date

**If the Principal Investigator is also the Dept. Chair, the College Dean/Assoc. Dean should sign the Assurance Statement**