

Title: Transportation of Animals	Policy No.
	IACUC-012
	Effective Date: 8-11-2014
	Updated: 2/13/2023

1. Reference(s):

Guide for the Care and Use of Laboratory Animals 8th Edition

Guide for the Care and Use of Agricultural Animals in Research and Teaching

2. Policy:

This policy will address the transportation requirements for all research animals under a current, approved Animal Care and Use Protocol (ACUP). Transportation of research animals must follow all requirements set forth in this policy.

The process of transportation should provide an appropriate level of animal biosecurity while minimizing zoonotic risks, protecting against environmental extremes, avoiding overcrowding, providing for animal physical, physiologic, or behavioral needs and comfort, and protecting the animals and personnel from physical trauma.

Cage spills and escapees must be reported immediately to the University Attending Veterinarian at 405-744-8967.

This policy does not address any biosafety, chemical, or radiological aspects that may be inherent in the protocol. If the animals are involved in a protocol that includes these or any other components that may warrant restrictions on transportation, those elements must also be factored into the transportation plan or, if applicable, transportation may be prohibited.

2.1. Planned/Approved Transportation

Transportation of animals is to be done in a timely manner. Efforts to minimize excessive stress should be implemented from the time animals are removed from their home in the shipping location to the time they are delivered to their new site in the receiving location. The most direct route should be taken when transporting animals in order to minimize the time spent in transit and in areas where the public may be present (i.e. common hallways or lobbies).

Animal transportation may be intrainstitutional, interinstitutional, or between a commercial or non-commercial source and a research facility. Careful planning for all types of transportation should occur to ensure animal safety and well-being, as well as minimize any occupational health risks and public exposure to allergens and/or zoonotic agents.

2.1.1. Transportation between animal facilities requires the approval of the facility managers and PI(s). All facilities involved must be approved spaces in a current, up-to-date ACUP in place for the animals being relocated.

2.1.2. Transportation of inexplicably ill, non-ambulatory, weak, and unhealthy animals must not be loaded or transported unless necessary for medical attention.

2.1.2.A. If animals become injured or non-ambulatory during the course of transport, appropriate steps should be taken immediately to segregate these animals and care for

their needs. Livestock animals must not be dragged, hoisted, or dropped from transport vehicles. If the animal cannot be removed then the animal should be euthanized as per ACUP prior to removal.

- 2.1.3.** Movement of animals within or between sites or institutions should be planned and coordinated by responsible and well-trained persons at both the sending and receiving site to minimize animal transit time or delays in receipt.
- 2.1.4.** All persons relocating animals in a vehicle must have valid drivers' license.
- 2.1.5.** To ensure animal comfort and safety, all plans for animal shipments must include instructions for emergency responses in accordance with the mode of transportation used. These instructions must include emergency contact phone numbers for the IACUC Manager, OSU's Attending Veterinarian, and the PI for the ACUP.
- 2.1.6. Containment of Animals**
 - 2.1.6.A.** Determination of the appropriate density of animals in a transportation cage must take into account weather conditions, the physical characteristics of the species (such as horns, pelage condition), and the preferred posture, if any, adopted during transportation.
 - 2.1.6.B.** All animals must be transported in species-appropriate containers. Such containers must be sanitizable or disposable, provide a secure environment that is escape proof, have a solid floor, and be free of floor openings or sharp edges that could possibly injure the animals.
 - 2.1.6.C.** Animals must be transported in an environment in which it can maintain its body temperature, becoming neither hyperthermic nor hypothermic.
 - 2.1.6.D** Animals can be transported in individual or group enclosures. If social groups are transported, groupings should be established before transportation when practical so that dominance orders will not need to be established during or after transportation.
 - 2.1.6.E.** Animals (primarily rodents) that are transported from housing areas to laboratories in micro-isolator cages must be covered and lids secured during the transportation of animals between locations and shielded from public view. Filter tops must be on rodent cages and cages must not be stacked on top of each other when stacking cages compromises ventilation.
 - 2.1.6.F.** For aquatic species and amphibians, special considerations are required for the transportation in an aqueous or sufficiently moist environment, and special attention should be given to avoiding temperature extremes for poikilotherms.
 - 2.1.6.G.** The transport of livestock involves a complex of operations including handling, loading and unloading, unfamiliar environments, and - in some cases- isolation, social disruption, confinement, loss of balance, fluctuations in environmental temperature and humidity, exposure to pollutants (e.g. truck exhaust, etc.), feed and water deprivation, and other factors. The safety and comfort of the animal should be the primary concerns in the transportation of any animal.
 - 2.1.6.G.1.** Animals must be provided with proper ventilation.
 - 2.1.6.G.2.** Adequate floor space must be available that minimizes slipping and injury.
 - 2.1.6.G.3.** Livestock should not be transported on trucks that do not have sufficient clearance to accommodate their height.
 - 2.1.6.G.4.** Truck beds or trailers for livestock transport should be clean, dry, equipped with a well-bedded, non-slippery floor, and the inside walls and lining of

vehicles/trailers should have no sharp edges or protrusions that would be likely to cause injury.

2.1.6.G.5. Animals may be transported either loose in vehicles or may be haltered and tied in the case of cattle, sheep, and horses. Only animals that have been previously trained to a halter and that are of a quiet disposition can be tied when transported. Animals should be tied with a quick release knot to the sides of the vehicle at a height that is approximately even with the top of the shoulder (withers). The tie should be short enough so that the animals cannot step over the lead.

2.1.6.G.6. When possible, livestock animals should be shipped in groups of uniform weight, sex, and species. The animals should be transported at appropriate densities to reduce injuries. Appropriate stocking densities (area allowance) for transportation accommodations can be found in Table 5-2 (page 53) in the *Guide for the Care and Use of Agricultural Animals in Research and Teaching*.

2.1.6.G.7. Animals should be protected from heat or cold stress. Means of protection from heat stress include shading, wetting, and bedding with wet sand or shavings when livestock are at high density (e.g. on a truck) and air speed is low (e.g. the truck is parked). Means of protection from cold stress include wind protection (when the effective temperature in the animal's microenvironment is expected to drop below the lower critical level), adequate ventilation, and provide bedding material with high insulative properties (such as chopped straw) if the time the animals spend in the transport vehicle will exceed a few minutes.

2.1.6.G.8. The condition of the animals should be checked periodically during transit. Drivers should start and stop the vehicle smoothly and slow down for curves and corners.

2.1.6.G.9. As poultry are typically caught manually and loaded into transport crates that are stacked on an open bed truck, special attention to developing skilled staff for the catching, loading, and transport of poultry is important. The following factors should be minimized: Poor catching and loading techniques; increased time in transit; feed and water deprivation; transport with low air movement and high humidity that lead to environmental conditions resulting in bird body temperatures outside the thermal neutral zone ranges for poultry (8-18°C and 24-28°C for well-feathered chickens and poorly feathered chickens, respectively).

2.1.6.G.10. Animals should be loaded and unloaded easily and promptly.

2.1.6.H. For wildlife, transportation may occur between the capture site and field holding facilities. Animals may be transported on the ground, by water or by air depending on the circumstances and distance needing to be travelled. The most suitable containment method will depend on the species being held and the duration of containment. In general, mammals and reptiles are best temporarily contained in cloth bags, frogs in plastic bags or containers with some water, and birds in either cloth bags or holding cages. Soft containment methods (i.e. bags) are generally used for short to medium duration trips and hard containment (i.e. cage traps or transportation boxes) methods are used for longer duration trips where greater security of animals required.

2.1.7. Motor Vehicle Requirements:

2.1.7.A. Animals, other than livestock animals which require a trailer, must be transported in environmentally controlled vehicles, in the environmentally controlled area of the vehicle.

2.1.7.B. In extreme heat/cold conditions, vehicle interior should be allowed to cool or heat to appropriate temperatures before animals are loaded.

2.1.7.B. OSU Motor Pool Vehicles are authorized for planned/approved transportation by IACUC without inspection/approval.

2.1.7.C. Use of personal/private vehicles for animal transportation is discouraged due to potential animal biosecurity, safety, health, and liability risks for the animals, personnel, and institution. If use of a personal/private vehicle is necessary, the vehicle must have documented approval by IACUC Manager prior to the transportation event. Such approvals will be granted for a 6 month period to minimize variance in vehicle condition between the approval date and date of transportation.

2.1.7.D. For livestock transportation, vehicles should be of adequate size and strength for the animals carried.

2.1.8. Short Distance Transportation

Animals being relocated short distances from an on-campus building to another on-campus building may be done by walking, so long as the following conditions are met:

2.1.8.A. Bicycle or motorcycle transportation is prohibited.

2.1.8.B. Animals are protected from public view.

2.1.5.C. Stress and health of animals are not affected by extreme weather conditions.

2.1.5.D. Animals should be double contained in containers that meet the requirements of Section 2.1.6. of this policy.

2.2. Emergency/Unplanned Transportation

2.2.1. Emergency Medical

Appropriate loading and transportation will be determined by veterinarian caring for animal or OSU Attending Veterinarian.

2.2.2. Emergency/Disaster

Follow area specific disaster plans for animals at the specified facility.