

## STANDARD OPERATING PROCEDURE

### RECEIPT, QUARANTINE, ACCLIMATION, AND PREVENTIVE HEALTH STANDARDS FOR HORSES PURCHASED OR DONATED FOR TEACHING AND RESEARCH

#### 1.0 PURPOSE:

- 1.1 This SOP specifies the responsibilities of the Animal Resources (AR) personnel relating to the receiving, quarantine, and acclimation and preventive health standards for horses (and ponies) used for teaching and research. Two populations of horses are included: those that are used for short term use (typically < 1 month) and those used and maintained for long term use in a resident herd (typically > 2 months) as blood donors for the Veterinary Teaching Hospital at the University of Georgia or as teaching or research horses.
- 1.2 The individual assigned to perform the duties and tasks listed in this SOP is responsible for its implementation.

#### 2.0 STANDARDS:

- 2.1 All animals should be housed and husbanded in accordance with the environmental, primary enclosure and enrichment standards outlined in the applicable husbandry SOP for horses. Refer to *SOP 01.012*, "Husbandry of Horses (stalled)" and *SOP 01.016*, Husbandry of Horses (pastured)."
- 2.2 Animals will be obtained only from vendor/sources approved by AR.
- 2.3 All animals from outside vendors must undergo a seven (7) day quarantine and acclimation period. Donated horses with a letter of health record from the Local Veterinarian (see 5.2.2) can be considered for donation directly into the Veterinary Teaching Hospital without quarantine, after it has also passed a general physical examination at the time of admission that is acceptable to the receiving Attending Clinician and Donation Officer.
- 2.4 Animals that do not meet the health status requirements, order specifications or do not have appropriate documentation may be subject to rejection by AR.
- 2.5 **No horse purchased for research will be accepted without US Department of Agriculture (USDA), Animal and Plant Health Inspection Service (APHIS) form 10-11, May 2000 (see Attachment 1) that is completely filled in and that states that the horse has had a negative Equine Infectious Anemia (EIA, Coggins') test result in the past 6 months.**
- 2.6 **Horses that are donated must have a copy of a negative Coggins test from within the previous 12 months at the time of admission. Donated horses must likewise have a record of current immunizations against Equine Eastern and Western Encephalitis, Tetanus, Influenza, and Rhinotracheitis. This vaccination history must be documented prior to acceptance into the Veterinary Teaching Hospital by a letter from the Local Veterinarian.**

#### 3.0 SPECIAL CONSIDERATIONS:

- 3.1 **Animal Health:** As the animals are received from the vendor/source, the general health condition of each animal must be evaluated by the individual assigned to this task. This individual is responsible for performing the physical health examination and carefully observing each animal for signs of illness upon receipt, including animals picked-up from the vendor and transported by AR personnel. **The results of the initial physical**

**examination for purchased and donated horses must be recorded either electronically in the medical record or in writing in the individual's medical or clinical use record.**

- 3.1.1 Observe the horses for respiratory problems
  - 3.1.1.1 Coughing
  - 3.1.1.2 Labored breathing
  - 3.1.1.3 Check for nasal discharge
  - 3.1.1.4 Check for lesions or inflammation of the muzzle or nostrils.
- 3.1.2 Check for lesions and/or contusions on the skin.
- 3.1.3 Check for ocular discharge. Check for conjunctivitis or inflammation around the eyes. Eyes should be fully open and clear. There should be no discharge or crusty matter present.
- 3.1.4 Check for lameness and/or stiffness in legs and feet. Look for overgrown hooves or cracks in hooves. Horses should exhibit normal posture, movement, and gait. Look for any animal unwilling to stand or reluctant to move.
- 3.1.5 Look for any signs of diarrhea and/or blood.
- 3.1.6 Look for any animals that appear to be dehydrated, depressed, weak, or has an unthrifty appearance.
- 3.1.7 Look for any signs of edema around the lower jaws and neck region.
- 3.1.8 Look for animals with lowered head and/or drooping ears.
- 3.1.9 The use of electric probes, "hot sticks," or "hot shots" in the movement, manipulation and/or transport of horses is strictly prohibited.
- 3.1.10 Horses purchased for research or teaching which are suspected of or found with any animal health problems should be reported to the Animal Health Technician (AHT), the Attending Laboratory Animal Veterinarian (AV) and/or the Lab Animal Facilities Supervisor (LAFS) before accepting the horses from the vendor/source. In situations where AR personnel are picking up animals from the vendor, a determination will be made as to whether to take receipt of the animal(s) or reject them.
- 3.1.11 Any horses acquired through the donation program which are suspected of or found with any animal health problems should be reported to the Veterinary Teaching Hospital Attending Clinician, the PI (if applicable), and the Donation Officer before accepting the it from the owner.

### **3.2 Health and Safety:**

- 3.2.1 Follow all Personal Protection Equipment (PPE) requirements.
- 3.2.2 Follow all SOPs when using equipment and chemicals.
- 3.2.3 Material Data Safety Sheets (MSDS) and First Aid Kits are located in all Animal Facility Offices.
- 3.2.4 Be familiar with the locations of fire extinguishers, emergency showers and eye wash stations.
- 3.2.5 **NOTE:** Personnel should exercise care, caution, and good judgment while working with horses in confined areas such as stalls, the corridor of Building 11 and/loading and unloading horses. **BE CAREFUL.**
- 3.2.6 Personnel should wash their hands and lower arms after manipulating horses and/or working with chemicals.

### **3.3 Personal Protection Equipment:**

- 3.3.1 Appropriate attire is required while receiving and manipulating horses.
- 3.3.2 Gloves are required while receiving and manipulating horses with suspected contagious diseases.
- 3.3.3 Rubber boots and/or dedicated boot/shoes are required while receiving and manipulating horse with suspected contagious diseases.

## **4.0 MATERIALS:**

### **4.1 Equipment:**

- 4.1.1 Ropes and halters
- 4.1.2 Identification ear tags (as applicable)
- 4.1.3 Misc. horses handling equipment (as needed)

### **4.2 Chemicals:**

#### **4.2.1 Vaccines:**

- 4.2.1.1 Adult horses may be vaccinated for the following as appropriate.
  - 4.2.1.1.1 Eastern, western, and Venezuelan equine encephalitis
  - 4.2.1.1.2 Tetanus toxoid
  - 4.2.1.1.3 Influenza
  - 4.2.1.1.4 Rhinotracheitis
  - 4.2.1.1.5 West Nile Virus
  - 4.2.1.1.6 Rabies
  - 4.2.1.1.7 Strangles

4.2.1.2 Foals will be vaccinated according to the American Association of Equine Practitioners Guidelines for vaccination.

**4.2.2 Antibiotics:** Horses may be treated with appropriate antibiotics as determined by the AV during the quarantine and acclimation period.

**4.2.3 Anthelmintics:** Horses will be treated with an anthelmintic as determined appropriate by the AV, Attending Clinician, or Donation Officer and based on anthelmintic history, current health and use, and fecal egg count testing.

## **5.0 PROCEDURES:**

### **5.1 Animal Receiving:**

- 5.1.1 Upon receipt AR personnel should check all animal(s) to ensure they meet the animal order specifications for weight, age, gender, etc. If any animal(s) are found not meeting these specifications the Principle Investigator (PI), Assistant Director of Animal Resources (ADAR) and/or Animal Resources Manager must be notified before receipt of these animals can be approved.
- 5.1.2 Personnel should exercise caution, care, and use good judgment while working with horses and transporting horses from vendor/source to pastures and/or stalls.
- 5.1.3 Proper and appropriate techniques must be employed while manipulating and transporting horses. Exercise patience and care when moving horses to in order to minimize stress and reduce risk of injury to animal and yourself.

- 5.1.4 AR personnel must perform a physical health examination on each animal (refer to section 3.1, Animal Health) prior to official receipt from the vendor/source.
- 5.1.5 All horses must be accompanied with a USDA, APHIS Equine Infectious Anemia Laboratory Test form (*Attachment 1*) indicating the horse had a negative EIA test result.
- 5.1.6 Any animals failing the physical health examination will be rejected. In questionable cases, personnel should seek a second opinion from or consult with the veterinary staff.
- 5.1.7 Upon arrival the PI or his staff should be notified by the LAFS or their designee and given the opportunity to examine the animals. For purchased horses, the physical health examination will be performed by AR staff. For equine donations, the physical examination will be performed by the Attending Clinician or the Donation Officer.
- 5.1.8 Animals used for research or teaching projects lacking appropriate health and transit documentation (e.g., USDA APHIS forms, interstate shipment certificates, etc.) will be rejected.

## 5.2 Quarantine and Acclimation Procedures:

- 5.2.1 All horses purchased for teaching or research will be held for a seven (7) day quarantine and acclimation period at Building 11. If horses are already housed in building 11, then at least one stall must be left empty between them and standard practice disinfection used between working with the new and resident horses. Exceptions are horses used in non-survival anatomy labs in which case animals are euthanized the day of receipt or other projects which have the prior approval from the ADAR.
- 5.2.2 Equine donations with an accompanying letter of health from the Local Veterinarian [including reason for donation, major active medical problems and treatments, vaccination history (must be current for Eastern and Western Equine Encephalitis, influenza, and rhinotracheitis), vices and temperament] and a negative Coggins test, AND an initial physical examination that is deemed acceptable by the receiving Attending Clinician or Donation Officer, will be exempt from quarantine.
- 5.2.3 During the seven (7) day acclimation period for purchased horses, AR staff or the PI will have the right of refusal of any animal not suitable for research or teaching.
  - 5.2.2.1 Horses will be sold (if possible) or euthanized if not suitable.
  - 5.2.2.2 Any financial loss because of sale or euthanasia will be borne by the PI.
- 5.2.4 The health status of these horses should be closely monitored during the seven (7) day quarantine period. Animals may **not** be used during the quarantine and acclimation period.
- 5.2.5 A health history will be requested from the vendor/source. See 5.2.1 above for details of health information from the local veterinarian for equine donations.
- 5.2.6 Horses vaccinations and treatment for parasites (see Section 4.2) during quarantine will be determined after assessment of the health status and history of the horses.
- 5.2.7 Newly arriving animals must be segregated from other horses until their health status is verified.

- 5.3 Animal Use and Care:
- 5.3.1 Upon acceptance, a Clinical Health Record (CHR, see *Attachment 2*) will be created for each animal. **ALL PROCEDURES (INCLUDING A BRIEF SUMMARY OF THE PROCEDURE) PERFORMED ON ALL HORSES WILL BE DOCUMENTED ON THE FORM.** For horses used at the Veterinary Teaching Hospital (short term use donations and blood donors), the patient will have a hospital medical record that can be tracked through the horse's name, clinic number, and/or UGA Donation. **For all horses, all procedures and uses of the horse must have an approved AUP for that procedure and the AUP number must be recorded in the Clinical Health Record AND the medical record.** The medical record will be retained in UVIS or the paper record stored in the admissions office. The Clinical Health Record for all short-term use of donated horses and for blood donors used at the Veterinary Teaching Hospital will be stored in a designated medical folder in the Clinic Record and Computer Room. The Clinical Health Record for long term horses used for teaching or research that are permanently housed at the Oconee Farm Facility will be maintained at that location.
- 5.3.2 **For Equine Donations, all procedures that are category B or beyond, must be approved by the Donation Officer. The Donation Officer must be aware of the content of the AUP and give careful consideration to the type of use and frequency of use as outlined. Ultimately, the PI on the AUP is responsible for activities occurring on the AUP.**
- 5.3.3 **For Equine Blood Donors, all procedures that are category B or beyond, must be approved by the Blood Donor Officer. The Blood Donor Officer must be aware of the content of the AUP and give careful consideration to the type of use and frequency of use as outlined. Ultimately, the PI on the AUP is responsible for activities occurring on the AUP.**
- 5.3.4 **For resident research horses housed at the Oconee Farm Facility, all procedures that are category B or beyond, must be approved by the PI. The PI must be aware of the content of the AUP and give careful consideration to the type of use and frequency of use as outlined. Ultimately, the PI on the AUP is responsible for activities occurring on the AUP.**
- 5.3.5 Horses should receive standard feed and water as directed by the Donation Officer, the Blood Donor Officer, the PI, or the AV. When possible, stalled horses should receive paddock turn out and daily hand walking and grazing in hand. Long-term residents should have access to pasture turn out.
- 5.3.6 **Equine donations that are used for clinical teaching of fourth year veterinary students will be billed under the Hospital teaching account. If equine donations are used for research, the PI and Donation Officer must assure that costs are transferred off the Hospital Teaching and onto the PI's research account before use for research.**
- 5.3.7 Equine donations will be euthanized after two weeks, unless otherwise approved by the Donation Officer.
- 5.3.8 All horses maintained at either the Veterinary Teaching Hospital or the Oconee Farm Facility for > 2 months must also have consideration of long term care and preventative health maintenance. In addition to vaccinations (as outlined above in 4.2.1), and anthelmintic treatment (as outlined above in 4.2.3), these horses will also undergo annual booster vaccination, annual Coggins testing, routine hoof trims, and dentistry, as recommended by the PI, AV, or Blood Donor Officer. These procedures must be documented in the Clinical Health Record. If a long term equine resident requires medical treatment at the Veterinary Teaching

Hospital for an acquired problem, their treatment will be documented in their medical record that is maintained at the Veterinary Teaching Hospital.

## **6.0 RECORDS:**

- 6.1 Health and vaccination papers (as applicable)
- 6.2 Invoice or Bill of Sale (as applicable)
- 6.3 Interstate transport documents (as applicable)
- 6.4 USDA, APHIS form 10-11, May 2000 (*Attachment 1*)
- 6.5 Clinical Health Record (*Attachment 2*)

## **7.0 DEFINITIONS AND REFERENCES:**

### **7.1 Definitions:**

- 7.1.1 Acclimation (Conditioning): time given to a newly arrived animal to become accustomed to its new surroundings before the research for which it is intended begins.
- 7.1.2 Anthelmintic: a type of drug that eliminates a wide variety of worms.
- 7.1.3 Antibiotic: A type of drug that kills or prevents the reproduction of pathogenic microorganisms on or in animals.
- 7.1.4 Enrichment: a method of providing animals with the opportunity to behave as they do in the wild, playing, foraging, grooming, and interacting in other ways with one another.
- 7.1.5 Material Safety Data Sheets (MSDS): summary of information (manufacturer information and product ingredients; physical/chemical properties, reactivity, toxicological, ecological information on the product; and personnel health hazards information.
- 7.1.7 Personal Protective Equipment (PPE): articles of clothing and equipment that protect workers against direct contact with infectious, toxic, or corrosive agents and against temperature extremes or other physical hazards
- 7.1.8 Primary enclosure: a cage, run or pen which is used as the principal housing containment area for animals.
- 7.1.9 Principal Investigator (PI): the scientist who plans and coordinates all phases of the research work and the research protocol.
- 7.1.10 Subclinical: an infection not detectable by usual means in one species but can be lethal to other species when transmitted to them.
- 7.1.11 Quarantine: isolation of an animal to prevent it from spreading or contracting disease and to allow it time to acclimate to new surroundings.
- 7.1.12 Vaccine: preparation of attenuated (weakened) or killed disease-producing viruses or microorganisms (or of substances extracted from them) administered by mouth or by injection to induce active immunity to the specific disease.
- 7.1.13 Veterinarians, types thereof
  - 7.1.13.1 Attending Veterinarian: The term “attending veterinarian” is a legal definition which identifies the veterinarian responsible for ensuring appropriate veterinary care for laboratory animals. At CVM, this position is held by the Assistant Director for Animal Resources (ADAR).

7.1.13.2 Attending Clinician: This refers to the VTH clinician who is the veterinarian on clinics providing direct veterinary care for the donated horse. This individual should be aware of all procedures outlined in the AUP.

7.1.13.3 Donation Officer: This defines a committed individual faculty member who is a veterinarian and who is assigned to be the custodian for donation horses and coordinates and integrates their care and use. This is not a floating assignment and is distinct from the “Clinical Veterinarian” as listed above. This individual should be listed on the Animal Use Proposal and should be aware of all procedures outlined therein.

7.1.13.4 Blood Donor Officer: This defines a committed individual faculty member who is a veterinarian and who is assigned to be the custodian for the equine blood donors and coordinates and integrates their care and use. This is not a floating assignment and is distinct from the “Clinical Veterinarian” as listed above. This individual should be listed on the Animal Use Proposal and should be aware of all procedures outlined therein.

7.1.13.5 Local Veterinarian: This is the Georgia-licensed DVM practitioner who is either the referring veterinarian for the donated horse or is the veterinarian from whom previous medical and vaccinated records will be obtained. This is NOT a VTH clinician or UGA CVM faculty member.

7.1.13.6 Principal investigator: In addition to 7.1.9 above, this is the individual faculty member who takes responsibility for the entire content of the Animal Use Proposal, ensuring that all individuals working with these horses are appropriately trained and are adhering to the content of the AUP. The AUP is submitted in the name of the Principal Investigator for IACUC approval.

7.1.14 Term of Use: “Short term use” horses are horses purchased or donated for research or teaching and are typically maintained for < 1 month of use before termination by euthanasia or resale (applies only to purchased horses) at the end of their use. “Long term use” horses are horses that were either donated or purchased teaching or research horses and are typically maintained for > 2 months, and therefore need attention to consideration of preventative health care (see 5.3.8).

## 7.2 References:

*SOP 01.012, “Husbandry of horses (stalled)”*

*SOP 01.016, “Husbandry of horses (pastured)”*

*SOP 02.004, “Pasture Management”*

*SOP 04.002, “Documentation of Animal Room Logs”*

*SOP 04.006, “Documentation of Pasture Logs”*

Lawson, PT (ed): *Assistant Laboratory Animal Technician Manual*, American Association for Laboratory Science, Memphis, 2005

National Research Council, *Guide for the Care and Use of Laboratory Animals* (<http://www.nap.edu/readingroom/books/labrats>)

Federation of Animal Science Societies, *Guide for the Care and Use of Agricultural Animals in Research and Teaching*

American Association of Equine Practitioners Guidelines