

## CLINICAL TASK LIST – MENTOR REFERENCE

Student's Last Name: \_\_\_\_\_ First Name: \_\_\_\_\_

Student ID: \_\_\_\_\_ Graduating Class Of: \_\_\_\_\_

Practice Name: \_\_\_\_\_

The Northern Virginia Community College's Veterinary Technology Program is accredited through the American Veterinary Medical Association (AVMA) and requires students to complete numerous hands-on and didactic essential skills to graduate from our program. The Veterinary Technology Program has separated these skills into several courses which are listed below. Laboratory animal and large animal essential skills are not required in practice as the NOVA Veterinary Technology Program will supply those items to complete the essential skill.

While it is the responsibility of the NOVA Veterinary Technology Program faculty and staff to teach, assess, and sign off on these required skills with the students, we ask that mentors oversee and assist students with honing these skills at the practice where they work after they have been taught the skill in our program.

Please note:

- Required tasks are denoted by an asterisk (\*).
- *Italicized* text denotes hands-on (psychomotor) skills; all other text denotes didactic (knowledge-based) skills.
- Students are expected to physically perform skills that are *italicized*. Skill assessment is expected to be performed on live animals.
- Rubrics for the italicized hands-on skills are provided to the student at the beginning of each course.
- **If a student misses a lab or field trip that requires completion of any required essential skill, it may be the student's responsibility to complete those skills with their own resources and equipment.**
- Students taking VET-lab courses online should be aware that most, if not all, of the required essential skills must be completed at their practice via video recordings and/or other assignments that will be evaluated by NOVA faculty. It is the student's responsibility to discuss their courses with their mentors prior to the start of class to ensure their practice has the necessary equipment to perform any assigned essential skills.

As a mentor, I understand the above information and have been provided the list of AVMA required essential skills for each veterinary technology course.

Mentor's Last Name: \_\_\_\_\_ First Name: \_\_\_\_\_

Mentor's Signature: \_\_\_\_\_ Date: \_\_\_\_\_

# CLINICAL TASK LIST – MENTOR REFERENCE

## **VET 105: Introduction to Veterinary Technology**

### **OFFICE AND HOSPITAL PROCEDURES, CLIENT RELATIONS, and COMMUNICATION**

#### **Management**

- Recognize roles of appropriate regulatory agencies\*
- Maintain appropriate disposal protocols for hazardous materials\*

#### **Law and Ethics**

- Understand and observe legal boundaries of veterinary health care team members\*
- Respect and protect the confidentiality of client and patient information\*

### **NURSING**

#### **Patient Assessment**

- Describe and use common animal identification methods\*
- *Demonstrate effective and appropriate humane restraint techniques to include efforts to reduce stress during handling for various animal species:*
  - *properly restrain dogs and cats for procedures\**
  - *encage and remove dogs and cats from cages\**
  - *apply dog muzzle safely\**
  - *apply Elizabethan collar\**
  - *use restraint pole and other restraint aids\* [GROUP]*
- *Demonstrate the ability to obtain objective patient data:*
  - *temperature (dog, cat, horse)\**
  - *pulse (dog, cat, horse)\**
  - *respiration (dog, cat, horse)\**
  - *auscultate heart/lungs (dog, cat, horse)\**

#### **Patient Care: Husbandry**

- Grooming:
  - *trim nails (dog, cat)\**
  - *express canine anal sacs\**
  - *clean and medicate ears (dog, cat)\**
- Demonstrate understanding of permanent identification\*

#### **Patient Care: Nutrition**

- Understand life stage energy and nutrient requirements of well animals (dog, cat, horse, cow)\*
- Understand and identify substances that when ingested result in toxicity:
  - Identify common poisonous plants\*
  - Be familiar with substances (organic and inorganic) that cause toxicity\*

#### **Patient Care: Therapeutics**

- *Administer enteral medications: Hand pilling (dog, cat)\**
- *Administer topical medications (including ophthalmic)\**

## **SURGICAL NURSING**

### **Patient Management**

- Provide post-operative care: adequate nutrition\*

## **VET 116: Breeds & Behavior**

### **OFFICE AND HOSPITAL PROCEDURES, CLIENT RELATIONS, and COMMUNICATION**

#### **Communication**

- Develop and provide client education in a clear and accurate manner at a level the client understands (i.e., oral and written form, including educational handouts)\*

## **NURSING**

### **Patient Assessment**

- Recognize common domestic animal species and breeds\*
- Recognize and assess body language and behaviors (including pain assessment scales) for various animal species\*

### **Patient Care: Husbandry**

- Demonstrate understanding of breeding/reproduction techniques\*

## **VET 121: Clinical Practices I**

### **OFFICE AND HOSPITAL PROCEDURES, CLIENT RELATIONS, and COMMUNICATION**

#### **Management**

- Create and maintain individual client records, vaccination certificates, and other appropriate forms\*

#### **Communication**

- Recognize the legality of the veterinary-client-patient relationship\*

#### **Law and Ethics**

- Demonstrate a commitment to high quality patient care\*

## **NURSING**

### **Patient Assessment**

- Obtain a thorough patient history\*

### **Patient Care: Therapeutics**

- Develop understanding of wound management and abscess care\*
- Perform physical therapy:
  - explain care of recumbent patient\*

## **SURGICAL NURSING**

- It is essential that technicians have knowledge of routine surgical procedures and related equipment, including surgeries in these categories:
  - ovariectomy – dog\* and cat\*
  - cesarean section - all common species\*
  - orthopedic procedures\*
  - orchiectomy - all common species\*
  - tail docking\*
  - onychectomy - dog and cat\*
  - laparotomies - all common species\*
  - dystocias in common species\*
  - dehorning - cattle and goats\*
  - prolapsed organs - common types, species, and incidence
- Provide post-operative care:
  - fluid therapy\*
  - bandaging\*
  - wound management\*
  - discharge instructions\*

## **VET 122: Clinical Practices II**

### **OFFICE AND HOSPITAL PROCEDURES, CLIENT RELATIONS, and COMMUNICATION**

#### **Management**

- Create and maintain all appropriate facility records and logs in compliance with regulatory guidelines (e.g., **radiography**, surgery, anesthesia, laboratory, controlled substance)\*

#### **NURSING**

##### **Patient Care: Therapeutics**

- *Administer enemas\*[GROUP]*

#### **SURGICAL NURSING**

- Provide surgical assistance:
  - understand the principles of operation and maintenance of fiber optic equipment\*

#### **IMAGING**

- *Implement and observe recommended radiation safety measures\**
- *Implement radiographic quality control measures\**
- *Properly utilize radiographic technique charts\**
- *Demonstrate an understanding of the modifications of diagnostic imaging techniques as they apply to: mice, rats, guinea pigs, lizards, amphibians\**
- *Position live animals and produce diagnostic radiographic images (dogs\*, cats\*, horses/ponies/donkeys/mules\*)*
- *Appropriately label, file, and store images\**
- *Demonstrate an understanding of completing radiographic logs for systems, reports, files and records\**
- *Perform radiographic contrast studies — perform one of the following\*:[GROUP]*
  - *GI Series*

- *Perform on a sedated canine radiographic techniques utilized in screening for canine hip dysplasia\****[GROUP]**
- Demonstrate proper maintenance of radiographic equipment, including recognition of faulty equipment operation\*

## **VET 131: Clinical Pathology I**

### **NURSING**

#### **Patient Assessment**

- *Collect Urine Sample:*
  - *collect voided urine sample (dog or cat)\**

### **LABORATORY PROCEDURES**

#### **Specimen Analysis**

- *Perform urinalysis:*
  - *determine physical properties (e.g., color, clarity, specific gravity)\**
  - *test chemical properties\**
  - *examine and identify sediment\**
- *Perform CBC to include:*
  - *hemoglobin\**
  - *packed cell volume\**
  - *total protein\**
  - *white cell count\**
  - *red cell count\**
- *Perform microscopic exam of blood film:*
  - *prepare film and stain using a variety of techniques\**
  - *perform leukocyte differential – normal vs abnormal\**
  - *evaluate erythrocyte morphology – normal vs abnormal\**
  - *estimate platelet numbers\**
  - *calculate absolute values\**
  - *correct white blood cell counts for nucleated cells\**
- Calculate hematologic indices\*
- *Coagulation tests – perform one of the following\*:[GROUP]*
  - *buccal mucosal bleeding time*
  - *activated clotting time (ACT)*
  - *prothrombin time (PT)*
  - *partial thromboplastin time (PTT)*
  - *fibrinogen assay*
- Identify blood parasites:
  - *Dirofilaria sp/Acanthocheilonema sp (formerly Dipetalonema sp)\**

## **VET 132: Clinical Pathology II**

### **NURSING**

#### **Patient Care: Therapeutics**

- *Perform Critical Care:*
  - *collect and crossmatch blood for transfusion\*[GROUP]*

### **LABORATORY PROCEDURES**

#### **Specimen Management**

- *Select and maintain laboratory equipment\**
- *Implement quality control measures\*[GROUP]*
- *Understand how to ensure safety of patients, clients, and staff in the collection and handling of samples\**

#### **Specimen Analysis**

- *Perform blood chemistry tests (BUN, glucose, common enzymes)\**
- *Perform serologic test (ELISA, slide/card agglutinations)\**
- *Perform microbiologic procedures and evaluations:*
  - *collect representative samples\**
  - *culture bacteria and perform sensitivity tests\**
  - *identify common animal pathogens using commercially available media and reagents\*[GROUP]*
  - *perform common biochemical tests\*[GROUP]*
  - *perform staining procedures\**
  - *culture and identify common dermatophytes\**

## **VET 133: Clinical Pathology III**

### **NURSING**

#### **Patient Assessment**

- *Prepare diagnostic specimens for shipment\**

#### **Patient Care: Therapeutics**

- *Collect/evaluate skin scrapings\**

### **LABORATORY PROCEDURES**

#### **Specimen Management**

- *Prepare, label, package, and store specimens for laboratory analysis\**
- *Perform parasitologic procedures for external parasites and identify:*
  - *mites\**
  - *lice\**
  - *ticks\**
  - *fleas\**
  - *flies\**

- *Perform diagnostics procedures for parasites:*
  - *Antigen kit\*, direct\*, filter, Knotts\**
  - *fecal flotations\**
  - *fecal sedimentation\**
  - *direct smears\**
  - *centrifugation with flotation\**
- *Identify common parasitic forms:*
  - *nematodes\**
  - *trematodes\**
  - *cestodes\**
  - *protozoa\**
- *Perform cytologic evaluation:*
  - *collect, prepare, and evaluate ear cytology\**
  - *collect, prepare, and evaluate canine vaginal smears\*[GROUP]*
- *Perform necropsy procedures:*
  - *perform postmortem examination or dissection on non-preserved animal\*[GROUP]*
  - *collect samples, store and ship according to laboratory protocols\*[GROUP]*
  - *explain how to handle rabies suspects and samples safely\**

## **VET 135: Anesthesia**

### **PHARMACY and PHARMACOLOGY**

#### **Administration**

- Explain appropriate drug administration route, methods, and when used\*
- Demonstrate the ability to accurately record medical information\*

#### **Dispensing**

- Given a drug order, properly prepare medications for dispensing, including performing accurate calculations\*

### **NURSING**

#### **Patient Assessment**

- *Perform Venipuncture:*
  - *saphenous (dog, cat)\**

#### **Patient Care: Therapeutics**

- *Administer parenteral medications:*
  - *subcutaneous (dog, cat)\**
  - *intramuscular (dog, cat)\**
- *Fluid Therapy:*
  - *administer subcutaneous fluids\**
  - *place intravenous catheters (cephalic)\**
  - *determine/maintain fluid infusion rate\**

## **SURGICAL NURSING**

- *Students must have participated in surgeries in these categories:*
  - *orchietomy – dog\*, cat\**

## **VET 211: Animal Diseases I**

### **OFFICE AND HOSPITAL PROCEDURES, CLIENT RELATIONS, and COMMUNICATION**

#### **Management**

- Establish and maintain appropriate sanitation and infection control protocols for a veterinary facility, including patient and laboratory area\*

#### **Patient Care: Husbandry**

- *Environmental conditions: implement sanitation procedures for animal holding and housing areas\**

## **NURSING**

### **Nutrition**

- Understand key nutritional factors in disease conditions\*
  - be familiar with therapeutic foods\*

## **VET 212: Animal Diseases II – N/A**

## **VET 214: Dentistry**

### **NURSING**

#### **Patient Care: Dentistry**

- Understand client education regarding home care\*

## **VET 216: Pharmacology**

### **OFFICE AND HOSPITAL PROCEDURES, CLIENT RELATIONS, and COMMUNICATION**

#### **Management**

- Manage inventory control\*

### **PHARMACY and PHARMACOLOGY**

#### **Administration**

- Read and follow veterinarian's pharmacy orders\*
- Recognize groups of drugs, their mechanisms, and clinically relevant side effects\*
- Recognize the safe and effective manner in which vaccines must be administered; recognize and explain common side effects\*
- Accurately perform appropriate calculations; use weights and measures correctly\*

- Safely and effectively administer drugs by common parenteral and enteral routes; explain appropriate routes and methods and when used\*
- Demonstrate the ability to monitor therapeutic responses\*
- Demonstrate understanding of controlled substance regulations\*

### **Dispensing**

- Demonstrate compliance with regulations governing prescription drugs versus over-the-counter drugs\*
- Demonstrate compliance with all federal regulatory guidelines for drug purchase, storage, administration, withdrawal, dispensing, disposal, and inventory control (e.g., biologics and therapeutic agents, pesticides, and hazardous wastes)\*
- Demonstrate understanding of regulations governing maintenance of controlled substances log book\*

### **NURSING**

#### **Nutrition**

- Understand current developments in nutritional supplements and additives including benefits and potential toxicities\*

### **ANESTHESIA**

#### **Pain Management**

- *Complete controlled substance log\** (does not need to be official controlled substance log; mock logs may be utilized)

## **VET 217: Lab/Zoo/Wildlife Medicine**

### **LABORATORY ANIMAL PROCEDURES**

#### **Mice or rats, and rabbits**

- *Recognize and restrain (mouse, rat, rabbit)\**
- *Determine sex and understand reproduction (mouse, rat, rabbit)\**
- *Perform and/or supervise basic care procedures:*
  - *handling (mouse, rat, rabbit)\**
  - *nutritional needs/diet\**
  - *provide food, water, and enrichment in a species-appropriate manner (mouse/rat, rabbit)\**
  - *identification\**
- *Perform methods of injection:*
  - *subcutaneous (mouse/rat, rabbit)\**
  - *intraperitoneal (mouse/rat)\* [GROUP]*
- *Collect blood samples*
  - *Intravenous (mouse, rat, rabbit)\*[GROUP]*
- *Perform oral dosing (mouse, rat)\* [GROUP]*
- Have working knowledge of anesthetic and recovery procedures\*
- Identify and describe clinical signs of common diseases\*

## **AVIAN, EXOTIC, and SMALL MAMMALS PROCEDURES**

- *Recognize, understand, and perform restraint techniques of birds\**
- *Demonstrate the ability to perform a physical exam and accurately record results: birds\**
- *Perform nail trim (bird)\* [GROUP]*

## **VET 221: Advanced Clinical Practices III**

### **OFFICE AND HOSPITAL PROCEDURES, CLIENT RELATIONS, and COMMUNICATION**

#### **Management**

- Recognize and respond to veterinary medical emergencies\*
- Perform basic filing of medical records, radiographs, lab reports, etc.\*
- Create and maintain all appropriate facility records and logs in compliance with regulatory guidelines (e.g., radiography, surgery, anesthesia, laboratory, **controlled substances**)\*

### **PHARMACY AND PHARMACOLOGY**

#### **Dispensing**

- Relay drug information to clients (e.g., handling, storage, administration, side-effects, drug interactions, safety, reasons for use of drug)\*

### **NURSING**

#### **Patient Assessment**

- Demonstrate effective and appropriate humane restraint techniques to include efforts to reduce stress during handling for various species:
  - *halter, tie, and lead horses/ponies/donkeys/mules\**
  - *restrain horses/ponies/donkeys/mules\**
  - *apply twitch (horses/ponies/donkeys/mules)\*[GROUP]*
- *Perform venipuncture:*
  - *cephalic (dog, cat)\**
  - *jugular (dog, cat, horse/pony/donkey/mule)\**
- *Collect urine sample:*
  - *catheterize male dog\* [GROUP]*
  - *perform cystocentesis (dog or cat)\*[GROUP]*

#### **Patient Care: Husbandry**

- *Grooming*
  - *Apply equine tail and leg wraps\**
- Demonstrate understanding of nursing care of newborns\*

#### **Patient Care: Nutrition**

- Develop and communicate hospital nutrition protocols\*

#### **Patient Care: Therapeutics**

- *Administer parenteral medications:*
  - *intramuscular (horse/pony/donkey/mule)\**

- *intravenous (dog, cat, horse)\**
- *Administer enteral medications:*
  - *dose syringe (horse)\**
- *Perform ocular diagnostic tests (including tonometry, fluorescein staining and Schirmer tear test)\**
- *Gastric intubation (dog or cat)\* [GROUP]*
- *Fluid Therapy:*
  - *place intravenous catheters (saphenous)\**
  - *maintain and care for catheters\**
  - *monitor patient hydration status\**
  - *develop familiarity with fluid delivery systems\**
- *Apply and remove bandages and splints\**
- *Apply established emergency protocols (simulation acceptable):*
  - *maintain emergency medical supplies/crash cart\**
  - *perform first aid and cardiopulmonary resuscitation\**
  - *use resuscitation bag\**
  - *apply emergency splints and bandages\**

### **Patient Care: Dentistry**

- *Perform Comprehensive Oral Health Assessment and Treatment (COHAT) (scaling and polishing) (manual and machine)\**

## **ANESTHESIA**

### **Pain Management**

- *Calculate dosages of appropriate anesthetic-related drugs\**
- *Administer anesthetic-related drugs (injection, endotracheal tube, mask)\**
- *Place endotracheal tubes in patients\**
- *Utilize clinical signs and appropriate equipment to monitor patient status during anesthetic procedures\* (e.g., esophageal stethoscope, blood pressure monitor, capnometer, electrocardiogram, pulse oximeter)\**
- *Evaluate patient and implement pain management protocols as directed\**
- *Recognize and respond appropriately to patients in compromised states\**
- *Perform appropriate resuscitation procedures as needed (e.g., calculate and administer appropriate anesthetic antagonists and emergency drugs as directed)\**
- *Record and maintain anesthesia records\**

### **Equipment/Facility Management**

- *Maintain and operate anesthetic delivery and monitoring equipment:*
  - *pulse oximeter\**
  - *capnometer\**
  - *esophageal stethoscope\**
  - *electrocardiograph (e.g., recognize abnormal rhythms/audible sounds, properly apply leads)\**
  - *anesthetic machines, including rebreathing systems, non-rebreathing systems and masks\**
  - *endotracheal tubes\**
  - *resuscitation bag\**
  - *scavenging systems\**

- *oxygen sources\**
- *blood pressure monitoring devices\**
- *laryngoscopes\**
- *temperature monitoring device\* (e.g. thermometer, etc.)*

## **SURGICAL NURSING**

- *Students must have participated in surgeries in these categories:*
  - *ovariohysterectomy (dog, cat)\**

### **Patient Management**

- Properly identify patients and surgical procedures\*
- Patient assessment:
  - organize medical records/consent forms\*
  - review pre-operative evaluation\*
  - evaluate current patient status\*
  - organize and implement anesthesia\*
- *Palpate the urinary bladder and express it as needed\**
- *Prepare surgical site using appropriate aseptic techniques\**
- *Position patient for common procedures\**
- Provide surgical assistance:
  - *demonstrate proper operating room conduct and asepsis\**
  - *provide aseptic surgical assistance with care of exposed tissues\**
  - *demonstrate ability to perform aseptic surgical scrub and drying of hands\**
  - *demonstrate ability to don surgical cap and mask, and aseptically don surgical gown and gloves\**
  - *aseptically handle and pass instruments and supplies\**
  - *operate and maintain suction and cautery machines\**
- Coordinate pain management with the anesthesia/surgical team\*
- Provide post-operative care:
  - pain management\*
  - fluid therapy\*
  - adequate nutrition\*
  - wound management\*
  - bandaging\*
  - discharge instructions\*
  - *suture removal\**

### **Procedural Management**

- *Prepare surgical instruments and supplies\**
- *Prepare gowns, masks, gloves, and drapes\**
- *Operate and maintain autoclaves\**
- *Sterilize instruments and supplies using appropriate methods\**
- *Perform pre-surgical set-up\**
- Identify and know proper use for instruments\*
- Identify common suture materials, types, and sizes\*
- *Provide operating room sanitation and care\**
- Maintain proper operating room conduct and asepsis\*

- *Perform post-surgical clean-up (e.g., equipment, instruments, room, proper disposal of hazardous medical waste)\**

## **IMAGING**

- *Position live animals and utilize dental radiographic equipment to produce diagnostic intra-oral dental radiographic images (dog or cat)\**

## **VET 235: Hospital Management/Client Relations**

### **OFFICE AND HOSPITAL PROCEDURES, CLIENT RELATIONS, and COMMUNICATION**

#### **Management**

- Schedule appointments, admit, discharge and triage according to client, patient and facility needs through phone and in-person contact\*
- Create and maintain individual client records, vaccination certificates, and other appropriate forms:
  - develop computer skills\*
  - be able to utilize veterinary practice management software\*
  - be familiar with veterinary on-line services\* (e.g. laboratory submissions, client financing plans, continuing education, discussion groups)
- Handle daily client-based financial transactions\*

#### **Communication**

- Demonstrate an understanding of interpersonal skills and team dynamics\*
- Utilize appropriate interpersonal and public relations skills\*
- Demonstrate telephone etiquette\* (e.g. through role playing, educational resources, etc.)
- Apply crisis intervention/grief management skills with clients\*

#### **Law and Ethics**

- Interact professionally with clients and fellow staff members\*

### **PHARMACY and PHARMACOLOGY**

#### **Dispensing**

- Demonstrate compliance with all federal regulatory guidelines for drug purchase, storage, administration, withdrawal, dispensing, disposal, and inventory control (e.g., biologics and therapeutic agents, pesticides, and hazardous wastes)\*

## **VET 290 Coordinated Internship**

### **NURSING**

#### **Patient Assessment**

- Demonstrate effective and appropriate humane restraint techniques to include efforts to reduce stress during handling for various animal species:
  - *restrain (cattle, small ruminants)\**
  - *apply bovine tail restraint\**

- *apply ruminant halter (cow, small ruminant)\**
- *safely operate cattle chute\*[GROUP]*
- *Demonstrate the ability to obtain objective patient data:*
  - *temperature (cow, small ruminant)\**
  - *pulse (cow, small ruminant)\**
  - *respiration (cow, small ruminant)\**
  - *auscultate heart/lungs (cow, small ruminant)\**
- *Perform venipuncture:*
  - *jugular (ruminant)\**

### **Patient Care: Therapeutics**

- *Administer parenteral medications*
  - *subcutaneous (ruminant)\**
  - *intravenous (ruminant)\**
- *Administer enteral medications:*
  - *balling gun (ruminant)\**
  - *dose syringe (ruminant)\**

### **LABORATORY PROCEDURES**

#### **Specimen Analysis**

- *Perform microbiologic procedures/evaluations:*
  - *collect milk samples and conduct mastitis testing (e.g., CMT, bacterial culture)\* [Group]*