

# CWD: Sample handling & submission at TVMDL



## When submitting samples for IHC:

1. Samples must be fixed in 10% formalin. Antemortem - (retropharyngeal lymph nodes, tonsil biopsy, rectal biopsy) . Postmortem - (obex or retropharyngeal lymph nodes).
  - a. The rectal, tonsil biopsies, or retropharyngeal lymph nodes must be placed in plastic histopathology cassettes. These cassettes are available from TVMDL at no cost to the practitioner or producer. The plastic cassettes should be placed in 10% formalin prior to submission to TVMDL.
  - b. On the cassette, with pencil, write the official deer ID.
2. TVMDL recommends shipping samples by overnight courier or direct delivery to the laboratory.

## When submitting samples for ELISA:

1. Obex or medial retropharyngeal lymph node samples must be submitted fresh in a plastic tube or Whirlpack-type plastic container. *Tissues submitted in formalin cannot be tested with the ELISA method.\**
2. Upon collection, samples must remain chilled until delivery to the lab. If necessary, samples may be frozen until shipped.
3. Ship sample on cold packs; overnight courier is strongly recommended.

## When sending a deer head, remember:

1. Triple-bag all samples individually. If you have multiple deer heads in one shipment container, ensure they are bagged separately.
2. Send the head(s) with cold packs – *not frozen* – and use cold packs instead of ice cubes. The cubes may melt and water can affect the structure of the brain, which may cause an inconclusive test. This is also the reason for *not* freezing the deer heads. If freezing is necessary, we will make every effort to obtain a valid test but the submitter must realize that freezing may decrease the chance of a valid test result.
3. Use absorbent material in the package to prevent leaking.
4. Label each sample bag using an indelible marker; place the same ID on the form.
5. Fill out a TVMDL submission form and a TPWD CWD submission form listing individual deer ID on both forms and place them together in a plastic bag. Do not place the form in the bag with the deer head(s).

Call TVMDL for forms and/or instructions when necessary. Visit [tvmdl.tamu.edu](http://tvmdl.tamu.edu) to download the submission form and for shipping or delivery information.

Only laboratories approved by the USDA may perform diagnostic testing for CWD; TVMDL conducts approved live animal testing only at the College Station lab. If a complete deer head is sent for testing there is a \$20 fee to remove the brain stem for testing; an additional \$20 head disposal fee will apply. TVMDL recommends the more cost effective option of two tissue testing, which includes both the obex and medial retropharyngeal lymph nodes. Occasionally, testing one tissue (obex) results in an inconclusive test, which will then result in a second one-tissue test charge to test the retropharyngeal lymph nodes.

Detailed test information and fees are available online. Laboratory professionals are always available to answer questions or concerns regarding testing.