



Procedures for Submitting Entomological Samples Associated with Human & Animal Health

To submit samples please visit the following website and refer closely to the submission procedures:
<http://www.cals.ncsu.edu/plantpath/extension/clinic/submit-sample.html>

Caution: Exercise extreme care when handling potential parasites and disease carriers

What will be accepted and general tips for best results:

- arthropods (insects, spiders, centipedes, millipedes, mites, etc.), small invertebrates and small vertebrates (rodents, reptiles, amphibians, etc.), along with other evidence of these animals (fecal pellets, shed skins, damage, etc.) will be accepted; parasitic worms (e.g. roundworms, hookworms, tapeworms, etc.) must be submitted to a medical or veterinary pathologist/parasitologist
- if a photograph of the organism can be taken with clarity and magnification (e.g. microscope camera) from several views/angles, images alone may be enough to determine the organism; image samples are free to submit to the PDIC, though a follow up including fee may be necessary
- most arthropod specimens should be submitted dead or killed in alcohol (preferably $\geq 70\%$ ethanol or isopropanol) in a properly sealed vial or container; the specimen should be washed with alcohol to remove any foreign materials before storage; adult moths and butterflies should be submitted dry (see below)
- larger, soft-bodied specimens (e.g. caterpillars, grubs, large maggots, other larvae, etc.), unless shipped quickly in alcohol, are best preserved by dropping the specimen in boiling water for 1-2 minutes before transferring to alcohol (to prevent discoloration and decay)
- large dead and dried specimens can be sent dry but should be packaged securely in a container with a tissue, etc. so the specimen does not move and get damaged during transit; please do not send dried specimens alone in an envelope as they can be easily destroyed
- do not crush or dismember the specimens if possible; sending as many specimens (within reason) is optimal for getting a good diagnosis

What will NOT be accepted:

- animals in or accompanied by human or animal tissues, medical waste, blood, feces, urine, or bodily secretions will not be accepted; if unsure about the sample please contact the PDIC entomologist first
- live animals from out of state are not accepted under any circumstances

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