

Sample Collection and Submission Guide

Samples are recorded and processed routinely by the date and time in which they are received. All samples will be initially processed within seven days of receipt with results available twenty-one days after processing. Some laboratory diagnostic techniques take longer than others, which may affect result punctuality.

Sample Collection

Tree disease diagnosis is largely dependent on the quality of the sample and on the relevant information provided by the submitter. Samples must be of sufficient quality and quantity to allow for proper laboratory testing and pertinent information, such as sample tree identification, is essential.

1. Collect samples before the application of pesticides in order to increase the probability of recovering the causal pathogens.
2. Samples should be collected from symptomatic trees showing tinning/transparent crowns, foliage discoloration, and/or excessive cone production.
3. Samples should not be collected from dead or severely declined trees; determining the causal agent from such trees is highly unlikely. Samples should not be collected from dead roots for the same reason.
4. Submit a generous amount of sample material to allow for all required laboratory processes: collect 12 to 18 inches of first order lateral roots that are $\frac{3}{4}$ to 4 inches in diameter.
5. Carefully excavate to avoid unnecessary damage to the sample.
6. Excess soil should be removed from root samples. Samples should retain just enough soil to maintain moisture levels.
7. Do not add water or pack a sample in water.
8. Wrap samples in a dry paper towel and seal in a zip-top bag.
9. Keep samples refrigerated from collection to submission and do not expose them to high heat situations, such as baking in the sun or in the back of a vehicle.
10. Keep all samples in separate bags and label appropriately.
11. Complete a "Tree Disease Diagnostic Form" for each sample, available on the Forest Health Cooperative webpage (<https://fp.auburn.edu/ForestHealthCooperative/default.htm>).

Sample submission

Samples may be mailed to the Forest Health Cooperative Diagnostic Laboratory or delivered in person to Daniel Anderson at 3301 Forestry and Wildlife Sciences Building, Auburn University, Alabama 36849-5418.

1. All samples must be submitted with a completed "Tree Disease Diagnostic Form."

2. When submitting samples by mail, either mail them early in the week to avoid weekend layovers or use an overnight service. You may also deliver them in person.
3. Samples should be mailed in an appropriate sized box, with padding, or in a padded envelope.
4. If sample is a suspected high-risk pathogen, contact Diagnostic Laboratory personnel for appropriate packaging and mailing instructions

Forest Health Cooperative
Forest Health Dynamics Laboratory
 3301 Forestry and Wildlife Sciences Building
 Auburn University, Auburn, AL 36849-5418
 Daniel Anderson (dda0003@auburn.edu)
 334-844-8037
<https://fp.auburn.edu/ForestHealthCooperative/default.htm>



Diagnostics Laboratory Use Only:

Date Received: _____

Received by: _____

Tree Disease Diagnostic Form

Please include ALL relevant data; maintain an office copy; submit original copy with specimen.

Date Sample Taken: _____

Date Sample Shipped: _____

Sample No. () of ()

Submitter Information:

Client Information:

(If different from Submitter)

Sample ID: _____

Name: _____

Company: _____

Address: _____

City/Zip: _____

Phone No: _____

Fax No: _____

Email: _____

Preferred contact method for results:

Mail: ___ Submitter ___ Client

Fax: ___ Submitter ___ Client

Email: ___ Submitter ___ Client

Tree and Site Information

Select ALL that apply.

Tree (Pine or Hardwood spp.): _____

Planting Type: ___ Forest ___ Nursery ___ Greenhouse ___ Other: _____

Exposure: ___ Full sun ___ Partial shade ___ Full shade ___ Windy ___ Protected ___ Irrigated

Aspect: _____ % Slope: _____

Soil Type: ___ Sand ___ Silt ___ Clay ___ Loam ___ Other: _____

Age of Planting: ___ 0 – 10 ___ 11 – 20 ___ 21 – 30 ___ 31 – 40 ___ 41 – 50 ___ 51+

Foliage Symptoms: ___ Wilted ___ Spotted ___ Yellowed ___ Mosaic ___ Other: _____

Root Symptoms: ___ Rotted ___ Resinous ___ Stained ___ Insect Signs ___ Other: _____

Insect Attack: ___ BTB ___ SPB ___ Ips ___ Weevils ___ Termites ___ Hylastes

Insect Damage: ___ Foliage ___ Branches ___ Bole ___ Roots

Prevalence: ___ Entire Planting ___ Localized ___ Scattered % Planting Affected: _____

Degree of Damage: ___ High ___ Medium ___ Low

Recent Chemicals: ___ Pesticide ___ Fertilizer What/when applied: _____

Recent Silviculture: ___ Thin ___ Prescribed fire ___ Other: _____

Problem Description: _____
