



**THE OHIO STATE UNIVERSITY**

COLLEGE OF FOOD, AGRICULTURAL,  
AND ENVIRONMENTAL SCIENCES



Dear Farmer Cooperator (HOPS\_\_\_\_\_):

This is your 4<sup>th</sup> and final package this year! Fortunately, this is the easiest and quickest step of all. We are measuring dried hop cone quality and yield so we can relate to your other measured soil and petiole values. We will also validate how accurate an infrared machine in Piketon is at quickly and cheaply providing a hop quality analysis (alpha, beta acids, etc) on hop cones. We want to know if this can be a good tool to help you manage your hop yard quality.

**Your package contains the following items:**

- 2 Plastic UPS mailers with prepaid shipping labels: one to Alliance Labs and the other to Thom Harker in Piketon.
  - Labeled sample collection paper bags
  - Sample submission form already in mailer
- Standard stamped envelope (to Bethany Herman)
  - Datasheet for yields and any other in-season management or field notes

As a reminder, complete project information, as well as instructional videos, can be found online:  
**[go.osu.edu/hops-trials](http://go.osu.edu/hops-trials)**

We greatly appreciate your participation in this project and look forward to sharing the results with you!

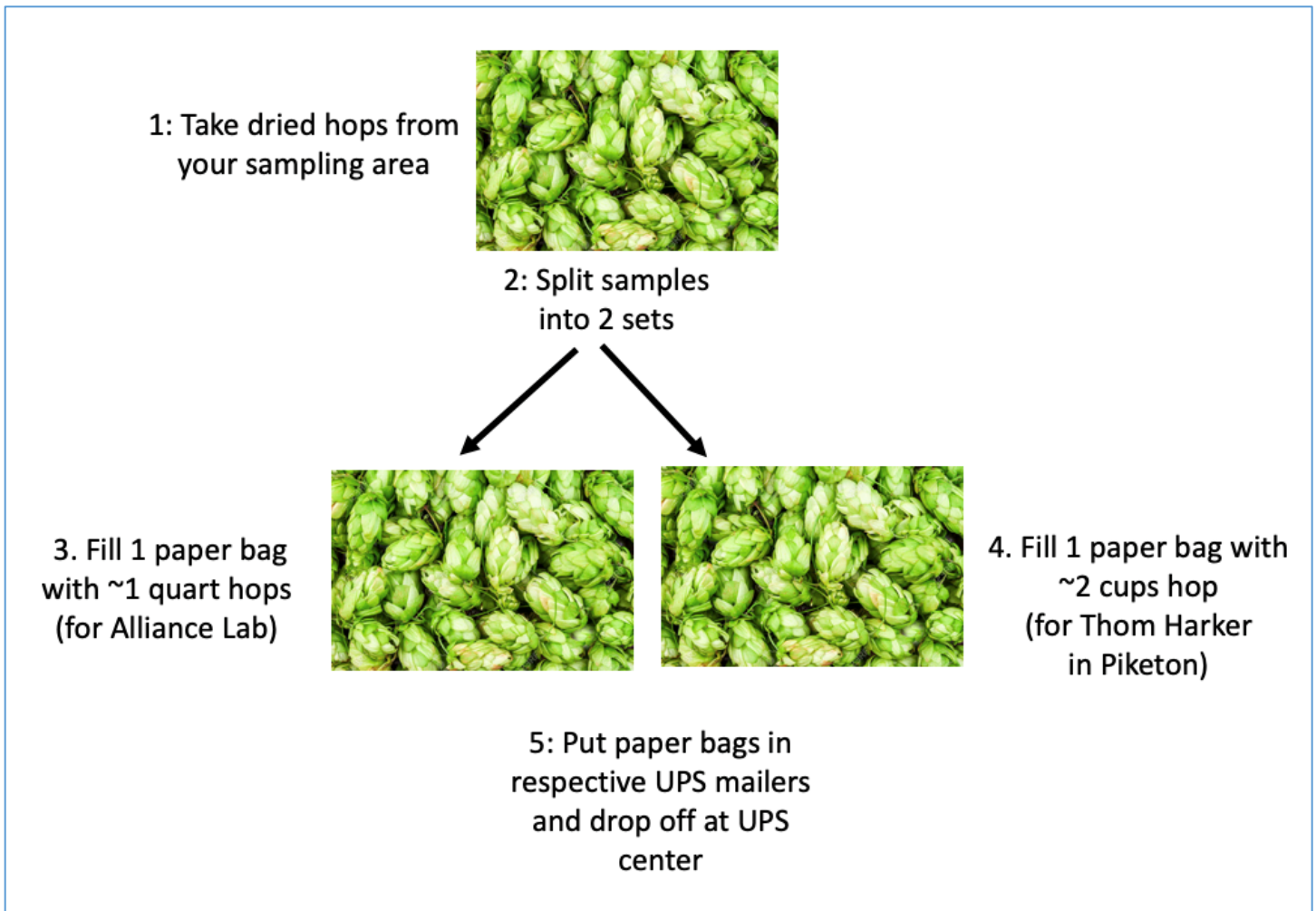
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## Overview of Dried Hop Cone Sampling Protocol



### **SAMPLE COLLECTION** (Steps 1 and 2 from above picture)

1. This step will happen **AFTER** you have harvested and dried the hop cones. We do not want these measurements on wet cones. Depending on the size of your sampling area, it may require some pre-harvest coordination to keep these cones separate from the rest of your hop yard. We understand the logistical challenges this might present, but to the extent that you can, we ask that you try your best to sample and send us hop cones from the sampling area(s) that you have pulled both soil and petioles and leaves from.
2. After harvest and drying, please take ~3-5 random handfuls of hops from your sampling area and mix in a clean bucket, bowl or container. Aim for enough sample to fill up a gallon zip lock bag.
3. Split sample into 2 sets, placing each set in the appropriate labeled paper bag. Alliance Lab asks for no less than 1 quart (think large canning jar or ziplock bag) and Thom at Piketon needs no less than 2 coffee cups. Do this for each sampling area.

### **MAIL SAMPLES TO LABS** (Steps 3-5 in above picture)

1. Fill paper bags with enough hop cones as described above. Fold bags and use supplied rubber bands to ensure bags will remain closed during shipping.
3. Drop off at UPS location for ground shipping. You can find the closest location here: [www.ups.com/dropoff](http://www.ups.com/dropoff). The provided labels will charge us when they are scanned in, so no need to pay for postage.

3. Note that we should try to keep these samples cool and get them to the lab for analysis ASAP. It's ideal to time the sampling/ drop off so that samples are not sitting in a hot environment (ex, inside a car in full sun). Alliance labs and UPS do not operate on the weekend, so shipping sometime Mon - Thurs is best. If your sample will sit overnight before shipping, please store in a cool, dry place (not fridge or freezer).

### **MAIL DATA AND ANY OTHER MATERIAL TO US**

1. Your package contains a stamped envelope addressed to Bethany Herman. Please use this envelope to mail back materials to us including:

- Petiole nitrate datasheet that we mailed you in the last mailing
- Datasheet for yields and other in-season management or field notes
- Any other materials or information you have not yet submitted or want to share