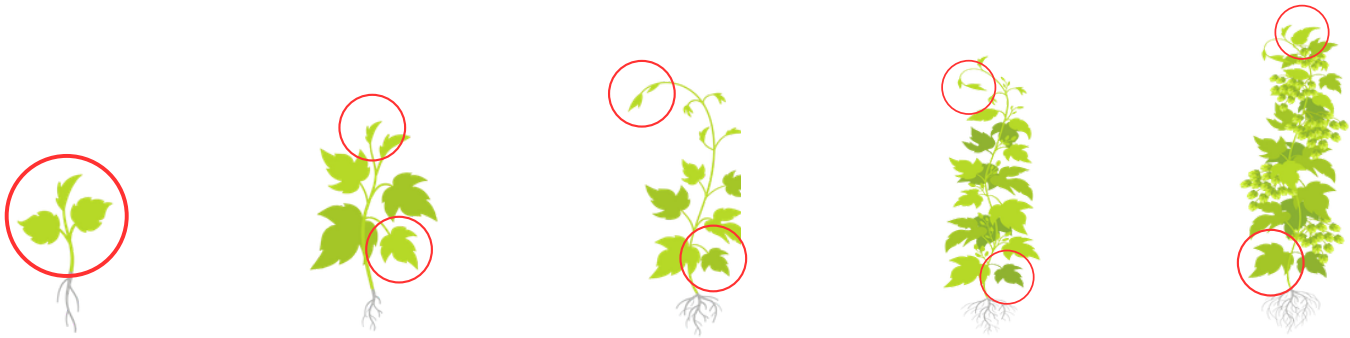
LEAF EXTRACT ANALYSIS
Sampling Guide - Hops



EARLY LEAF	SHOOT EXTENSION	VINING	FLOWERING	PRE-HARVEST

HOPS: RECOMMENDED SAMPLING INTERVALS

Submission Instructions

1. **Collect** NEW leaves and OLD leaves SEPARATELY in individually labeled bags:
   - New = newest recently-mature growth from the top of the plant
   - Old = oldest still-viable growth from the bottom of the plant
2. **Gather** a representative sample by pulling multiple new leaves and multiple old leaves from 20+ plants of the same variety from your sampling zone. Collect enough leaves so that each sample (new and old) will fill a 1 quart Ziploc bag or an Apical submission bag.
3. **Remove** petioles and all other non-leaf plant material from sample leaves. Ensure leaves are clean of dust, dirt and fertilizer. Rinse with non-chlorinated water if needed and pat dry before bagging.
4. **Order** reports online at https://www.apical-ag.com/grower/order/quick?step=1.
5. **Print** out your order summary and include it with your shipment.
6. **Write** the sample numbers from your order summary on each bag.
7. **Ensure** samples remain viable by minimizing shipping time and using cold packs and/or insulated packaging when shipping in warm conditions. Wrap frozen cold packs in paper to insulate them from direct contact with sample bags.
8. **Mail** samples (including check/money order or paid submission form) to:

Apical Crop Science LLC
1382 SE 3rd Ave, Suite 4
Canby, OR 97013

DO NOT SEND ANY INTERNATIONAL LEAF, SOIL, WATER, OR CNA SAMPLES WITHOUT PRIOR WRITTEN APPROVAL FROM APICAL. SUBMISSIONS THAT DO NOT COMPLY WITH THE ESTABLISHED SAMPLING PROTOCOL WILL BE DEEMED INVALID.

TIPS FOR BEST RESULTS:

1. Achieve optimal plant health by conducting the above LEA sampling process and applying Apical's tailored recommendations consistently throughout the growing season.

2. Always sample at a consistent time of day, preferably prior to 10am to ensure minimal transpiration — about two hours after sunrise is optimal. For indoor plants, sample within one hour of light cycle start.

4. Ensure samples are clean and surface-dry (not dried out) before bagging — dust, fertilizer residue, rain, and condensation affect accuracy.
   - If samples are not dry, please dry with paper towel or air dry to ensure leaves are not wet in sample bags.
   - **Please do NOT leave any paper (labels, paper towels, etc.) in bags with samples.**