

# BAYSTATE ORGANIC CERTIFIERS

## MAPLE PRODUCTION GUIDANCE MANUAL

### **Introduction**

Baystate Organic Certifiers (BOC) maple guidance for maple syrup production is consistent with the USDA National Organic Program (NOP) standard. All organic maple sap and syrup producers are subject to the general requirements of organic crop production, including recordkeeping, wherever appropriate. All guidelines are subject to existing Federal, State, and local food handling and sanitation requirements.

### **General Certification Requirements**

1. No synthetic fertilizers, herbicides, or pesticides not on the National List shall have been used in the 3 years preceding harvest of an organic crop.
2. All producers seeking certification (new or renewal) must submit an annual Organic Systems Plan (called an Organic Maple Plan by Baystate), pay an annual certification fee and have an annual on-site inspection. Initial inspections for new applicants must take place during the sap run.
3. All land where trees are to be tapped must be included in the application. This may include either owned or leased land, but all land included in the Organic Maple Plan must be managed in compliance to the NOP standards year-round. Written rental or tapping agreements are encouraged for rented sugarbush. If a written agreement is not in place, then Baystate may require contact information for the owner of the sugarbush, so we can verify that the sugarbush is managed organically year-round. If legal ownership of a rented sugarbush changes, the certified producer must update their Organic Maple Plan to indicate the current owner of the sugarbush.
4. Maps must include location of all stands, sugarhouse, and collection tanks, as well as adjoining land use and acreage. It is helpful if main tap lines, major roads, and physical features are denoted.
5. Facility diagrams should identify storage areas, processing areas with equipment layout, shipping areas, and the location of cleaning products. Flow of product may be included on the facility diagram or in a separate process flow description. If the operation is to conduct both non-organic and organic production, identify dual use and/or designated equipment and storage areas.

### **Sugarbush Management.**

Organic producers shall take the necessary steps to protect the sugarbush ecosystem. Forest management plans are not required by Baystate. If your state requires a forest management plan, then it should meet all practices as required by your state, and include the following issues:

- how forest diversity will be maintained or achieved.
- preservation or improvement of habitat for rare or endangered species.
- methods for control of invasive species, if needed.
- for pre-existing even-aged maple stands, a plan to convert the stand to multiple age classes.
- in areas where roads are required, they must be maintained in a manner that prevents soil erosion.

- if parts of the sugarbush are going to be grazed, a plan to ensure no long-term damage.

**Buffer Zones.**

Where tapped trees adjoin land in conventional agricultural management, the usual 50-foot buffer, measured from the drip line of the maple trees, should be observed. A buffer zone reduction may be requested in cases where the buffer is less than 50 feet and contamination risk is minimal.

**Pest Management.**

Operations should use preventative management practices to minimize and avoid pest problems. Any pest management products used must first be approved by BOC before application. Any pesticide applications used without prior approval and inclusion in the system plan will result in a noncompliance.

**Tapping Management.**

1. In response to the stresses to which maple trees are being exposed (pollution, pests, diseases) the following tapping guidelines are instituted:

<b>Diameter Breast Height (DBH)</b>	<b>Maximum Number of Standard Taps</b>	<b>Maximum Number of Health Taps</b>
0 to 8"	0	0
9 to 13"	1	1
14 to 22"	2	2
22"+	3	3

2. Where evidence of crown dieback or poor tap hole closing is present, the tree should either not be tapped, or tapped with not more than ½ of the taps allowed for that tree size.
3. Spouts are not permitted to be left at the end of tapping season (60 days after end of sap flow). Single use spouts, even when biodegradable, must be removed from the forest when spouts are removed.
4. The use of synthetic fungicides, antibiotics, sterilants, etc. in contact with trees is prohibited.
5. The use of paraformaldehyde and other tap hole pellets in any tapped trees is prohibited.
6. Tapped trees must not be marked with prohibited substances including synthetic paint (latex, oil, etc.).
7. Double tapping (the practice of tapping at two separate times in the sap season) is permitted with the submission of an approved plan. The total number of taps used throughout the year cannot exceed the number of allowed taps. For example, a 20" DBH tree could have one tap placed in December and a second tap placed in February. It could not have 2 taps placed in December and an additional tap placed in February. Baystate does not currently allow reboring and retapping of trees during a single sap season.

## **Sap Collection and Storage Equipment.**

Accepted methods:

- Use of metal and food grade plastic spouts, seals and food grade plastic tubing.
- Use of stainless steel or food grade plastic buckets and collection tanks.
- Wire used to hang mainline must be kept from damaging trees it is attached to or supporting it. Use of nails and bolts should be kept to a minimum.
- The use of equipment containing lead is not recommended. If it is used a plan of how lead contamination is avoided will be required. Producers with bronze gear pumps or uncertified brass fittings may need to submit annual lead tests.

Prohibited:

- Synthetic fungicides, antibiotics, fumigants, sterilants, etc. not on the National List are not allowed in contact with trees or organic product.
- All galvanized equipment in contact with sap or syrup is prohibited.

## **Sap Filtration and Reverse Osmosis.**

Accepted methods:

- Use of reverse osmosis, ultra-filtration of sap, and ultraviolet light.
- RO machines should be back flushed regularly to maintain membrane efficiency and rinsed thoroughly if any cleaners have been used in cleaning.
- Food grade paper and sand, felt, or synthetic filters may be used. If DE is used, the product cannot be labeled as 100% organic. (*See Labeling section for more information*).
- Defoamers are considered processing aids in the production of organic maple syrup. Processing aids must be approved on the National List (see section 205.605) or they must be organic agricultural products. In products labeled as 100% organic, only defoamers that are 100% organic agricultural products may be used. Most defoamers used for organic product are organic agricultural products like oils. Organic beeswax is allowed as a defoamer unless the packaging indicates the wax is prohibited for use in food. *CAUTION: Dairy products and some oils such as soybean and peanut oil are known allergens. If a producer chooses to use these as defoamers, it is recommended you provide this information on your label.*
- Storage containers and boiling equipment shall be made of food grade materials. All equipment must be washed and well rinsed with potable water.

Prohibited:

- Synthetic products and non-organic agricultural products are not allowed for use as defoamers for organic production. Organic beeswax that is prohibited for use in food is not allowed for use as a defoamer.
- Processing aids produced using genetically modified organisms, irradiation and sewage sludge are not allowed.

## **Cleaning and Sanitation.**

- Cleanliness in all parts of the sap collecting and boiling process should be scrupulously maintained.
- Conventional cleaning products may be used if followed by a thorough rinse. All equipment should be kept clean and free of traces of cleansing agents.
- Chlorine bleach products may be used to maximum-labeled rates for disinfecting/sanitizing surfaces. Rinsing is not required unless indicated by label. If required, rinse water must be potable.

## **Residue Testing.**

Baystate Organic Certifiers conducts periodic residue testing on no less than five percent of the total number of certified operations annually. Such tests are arranged by Baystate Organic Certifiers and expenses paid for by Baystate Organic Certifiers.

Baystate Organic Certifiers may randomly take a sample for analysis at the annual inspection or on a separate site visit. These samples may be analyzed for lead content, synthetic defoamer and any other residue of concern.

## **Labeling.**

Producers must submit their labels to Baystate Organic Certifiers for approval prior to sale.

- 100% Organic Products or Organic Products:
  - Products may be labeled anywhere on the package as “100% organic” or “organic” depending on which category the product qualifies for and may indicate ingredients individually as organic in the ingredient statement.
  - Producers may use the USDA seal and the Baystate Organic Certifiers logo. It is not a requirement to use either.
  - On the information panel below handler or distributor information, the certifying agency must be identified with a phrase such as “Certified organic by Baystate Organic Certifiers”.
  - Products represented as “organic” must contain at least 95% organic ingredients. The remaining 5% must also be organic unless those ingredients are not commercially available. This 5% may include non-agricultural substances (i.e., food grade DE) from the National List §205.605. These non-organic ingredients must not be produced using genetic engineering, sewage sludge or be irradiated.
  - 100% organic products must contain 100% organic ingredients including processing aids.
    - Using food grade DE as a filtering agent would disallow the product as 100% organic.
- If your product is labeled as both “organic” and “contains 100% pure maple syrup”, please be sure that it is not misconstrued that the product is also 100% organic.

## **Value Added Products.**

If you produce any value-added products to be represented as organic (i.e., maple candy or sugar), you will need to keep records that track all raw ingredients to the sale of the final product. Production of these

products and details of how these products are produced must be included as part of your organic maple plan.

### **Audit Trail.**

Audit trail and inventory control procedures must be readily auditable and detailed enough to trace all sap/syrup from the supplier, through the entire manufacturing process, and on through the distribution system to the retailer, using lot numbers or identifiable codes. A production log must be kept that shows how much syrup was produced on each day of boiling and how much syrup was repackaged on each day of canning. Producers certified only for sap production must maintain records of how much sap was collected in total.

All records, including production records, receipts for inputs (i.e., purchased organic sap, defoamers), receipts for supplies, purchase orders, bills or inventory records, and sales records must be made available for the inspector to review and must be kept for a minimum of 5 years.