

NH Maple Rules

RSA 429:13-28

Chapter Agr 904

NH Department of Agriculture, Markets & Food

Division of Regulatory Services

January 2014

Why are we having this discussion?

1. A new maple grading system was promoted by the International Maple Syrup Institute to standardize maple grading across state and international borders.
2. The NH Maple Producers Association board of directors voted to adopt the new grading system.
3. The NH Department of Agriculture, Markets & Food will need to go through the rulemaking process to implement the proposed changes.

Impact to the NH Maple Producers

- Potential Growth

A cooperative grading system will allow greater expansion of markets for pure maple syrup.

- Public Perception

Food Safety and public health are growing concerns in the food industry. Being proactive with changes will be in the maple producer's best interest.

Existing language found in
NH Maple Rules Agr 904 will be in white

Suggested changes will be in yellow

Agr 904.03: Definitions

- Replace “consumer sized containers” with:
“**Packaged maple syrup**” means maple syrup packed in consumer sized containers of one gallon or less.

Agr 904.03: Definitions

- “Damage” means any defects that materially affect the appearance or the edibility or marketability of the syrup.
- “Damage” means any defect that affects the color, appearance, flavor, aroma, edibility or shipping quality of the maple syrup or maple products. Maple syrup which is fermented or which contains any buddy flavor, scorched flavor, or any other distasteful foreign flavor shall be considered damaged.

Agr 904.03: Definitions

- “Maple Products” means only maple syrup, maple sugar, maple cream, or any other product in which the sugar content is entirely derived from pure maple sap and to which nothing has been added.

Agr 904.03: Definitions

- “United States Department of Agriculture color standards” means the official United States Department of Agriculture permanent **glass** color standards for maple syrup contained in a comparative device for determining the color grade of maple syrup.

Agr 904.03: Definitions

- “Color Comparator” means any device that compares an unknown color with that of a standard color sample for comparison purposes.
- Color classes for maple syrup are based on United States Department of Agriculture color standards with the equivalent results to the following light transmittance values (%Tc) on a spectrophotometer; “Golden” ≥ 75.0 , “Amber” 50.0-74.9, “Dark” 25.0-49.9, “Very Dark” < 25.0 .
- Any color comparator that provides equivalent results to the %Tc values may be used.

Agr 904.03: Definitions

- “Batch Code” means any distinctive combination of letters, numbers, or symbols, or any combination, from which the origin of the manufacture, processing, packing, holding, and distribution of a batch or lot of syrup can be determined.

Agr 904:04 Grades Established

- (a) Grade A **Golden Color/Delicate Taste** shall have the following characteristics:
- (1) The syrup shall be pure maple syrup that is clean and practically clear or better;
 - (2) The color shall be as light or lighter in color than the **golden color** as represented by the United States Department of Agriculture **golden color** standard, **and have a delicate or mild taste;**

Agr 904:04 Grades Established

- (3) The syrup shall be practically free from damage caused by objectionable odor or flavor, such as but not limited to scorching, buddiness or bitterness; and
- (4) The syrup shall be free from serious damage.

Agr 904:04 Grades Established

- (b) Grade A **Amber Color/Rich Taste** syrup shall have the following characteristics:
- (1) The syrup shall be pure maple syrup that is clean and practically clear or better;
 - (2) The color shall be darker in color than **golden**, but shall be no darker than the **amber** color as represented by the USDA amber color standard **and have a rich or full-bodied taste**;

Agr 904:04 Grades Established

- (3) The syrup shall be practically free from damage caused by objectionable odor or flavor, such as but not limited to scorching, buddiness, or bitterness; and
- (4) The syrup shall be free from serious damage.

Agr 904:04 Grades Established

(c) Grade A **Dark/Robust Taste** syrup shall have the following characteristics:

- (1) The syrup shall be pure maple syrup that is clean and practically clear or better;
- (2) The color shall be darker in color than **amber**, but shall be no darker than the **dark color** as represented by the USDA **dark color** standard **and have a robust or strong taste**;

Agr 904:04 Grades Established

- (3) The syrup shall be practically free from damage caused by objectionable odor or flavor, such as but not limited to scorching, buddiness, or bitterness; and
- (4) The syrup shall be free from serious damage.

Agr 904:04 Grades Established

- (d) Grade **A Very Dark/Strong Taste** syrup shall have the following characteristics:
- (1) The syrup shall be pure maple syrup that is clean and practically clear or better;
 - (2) The color shall be darker in color than dark as represented by the USDA dark color standard and have a very strong taste;

Agr 904:04 Grades Established

- (3) The syrup shall be practically free from damage caused by objectionable odor or flavor, such as but not limited to scorching, buddiness, or bitterness; and
- (4) The syrup shall be free from serious damage.

Agr 904:04 Grades Established

(e) “Processing Grade” shall have the following characteristics:

(1) The syrup may have objectionable odors or flavors;

(2) The syrup shall not be graded as grade A;

(3) The syrup shall not be placed in packaged maple syrup containers and may not be sold, offered for sale, or exposed for sale as packaged maple syrup; and

(4) The syrup shall be designated or labeled as Processing Grade.

Agr 904:04 Grades Established

(f) Substandard classification syrup shall have the following characteristics:

(1) The syrup shall be from maple syrup that fails to meet the requirements of U.S. Grade A or Processing Grade maple syrup;

(2) The syrup shall not be graded above substandard classification; and

(3) The syrup shall not be packaged in consumer sized containers.

Agr 904.05 Tolerances for Established Grades

- (a) In order to allow for variations incident to proper grading and handling, not more than 10 percent by count of **packaged maple syrup** in any lot shall have syrup below the requirements for the grade, provided:

Agr 904.05 Tolerances for Established Grades

- (1) That no part of this tolerance shall be allowed for defects causing serious damage,
- (2) That no tolerance shall be allowed for syrup that is **darker** than the color standard than that which is required of the next darker grade; and
- (3) That no tolerance shall be allowed for syrup that is **lighter** than the color standard than that which is required of the next lighter grade.

Agr 904.05 Tolerances for Established Grades

(b) Not more than 10 percent by count of the **packaged maple syrup** in any lot shall be as light in density as 35.5 points Baume or 65.9 Brix at 60 degrees F.

Delete

and not more than 10 percent by count heavier in density than 37 points Baume or 68.9 Brix at 60 degrees F.

Agr 904.06 Labeling

- No anticipated changes to the current labeling regulations.
- We do anticipate a grace period to allow for labels in inventory with the current grading system to be utilized before new labels will be required.

Agr 904.07 Containers

- (a) All containers of **packaged maple syrup** shall:
- (1) Be hot packed at a temperature of 180-**190** degrees F **or higher**;
 - (2) Be packed in containers made from food grade material;
 - (3) Have tamper evident seals placed over the container openings, which means it would be readily apparent if it was previously opened; and
 - (4) **Include a batch code**

Agr 904.07 Containers

(b) All maple syrup containers, caps and closures shall:

(1) Be clean;

(2) Be sanitary;

(3) Be free from rust;

(4) Not contain, or be constructed of, any substance which could tend to damage the color, flavor, marketability, purity, or safety of the maple syrup;
and

(5) Be stored, prior to use, in a manner that prevents contamination.

Agr 904.07 Containers

(c) Maple syrup shall not be packed in or found to be in cracked, punctured, bulged, rusty, or unsanitary containers which are unsealed or improperly sealed.

Add

- Plastic containers used for sap and syrup shall be of food grade quality; and
- Plastic containers shall be made with virgin plastic resin.

Agr 904.08 Bulk Maple Syrup

- (a) Bulk maple syrup sold directly to consumers, restaurants, or any other market where the syrup is not further processed before purchase by the consumer shall meet the same density standards as packaged maple syrup.
- (b) Bulk maple syrup sold directly to consumers, restaurants, or any other market where the syrup is not further processed before purchase by the consumer shall be labeled with the same information required by RSA 429:14.

Agr 904.08 Bulk Maple Syrup

(c) The density of bulk maple syrup may range from the equivalent of 35.5 points Baume (65.9 degrees Brix) to 37 points Baume (68.9 degrees Brix) when the syrup temperature is 60 degrees Fahrenheit. When the density of bulk maple syrup does not fall within this range the container shall be clearly marked "Notice- The syrup contained herein fails to meet state density standards. The density is _____points Baume at 60 degrees Fahrenheit." The accurate density for the syrup within the bulk container shall be stated.

Something to think about...

- Plastic containers used for sap and syrup must be food grade
 - Never used for non-food products
 - Made from virgin plastic resin (why? Next slide)
 - No post-consumer recycled plastic content
 - Any colorants used (i.e. Home Depot orange bucket) tested to ensure no migration into food in container
 - No galvanized sap and syrup containers (potential lead contamination)

Why Virgin Resin?

- Plastic is porous
- Pores in plastic can harbor previous contents of the container (esp. liquids)
- Previous contents can leach out of pores contaminating sap/syrup
- Such maple syrup would be considered adulterated according to RSA 429:15 III
- Significant concern for potential allergens

Repurposing Plastic Containers

- If previously held a CHEMICAL, a few concerns:
 - Chemical likely lodged in pores of plastic
 - Scrub and may look and smell clean, but residues remain in plastic
 - Chemical companies reuse rigid plastic drums/totes; not always the same chemical
 - Multiple chemicals may become lodged in plastic over lifetime of container
 - If used for sap storage chemicals can leach into sap, further concentrated when sap is reduced to syrup

Repurposing Plastic Containers

- If previously held a FOOD PRODUCT, a few concerns:
- Food allergen residues lodged in plastic can leach into sap or syrup
- FDA regulated food allergens: peanuts, tree nuts, dairy, eggs, wheat, soy, fish, crustacean shellfish

Repurposing Plastic Containers

- Was the previous food in the container strong flavored such as vinegar, cherry syrup, or coffee extract?
- Strong flavored foods can cause off-flavor in sap that is further concentrated in syrup

Purchasing New Plastic Containers

- Good Rule of Thumb

Ask, “Is the container approved for drinking water?”

If approved for drinking then also safe for a food product.

Note: Livestock water tanks are not necessarily approved for drinking water

Rulemaking Process

- Please note, the current NH Maple Laws and Rules are in effect for the 2014 season.
- The impending changes will not go into effect until the proposed rules have been adopted.

Thank You!

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