Maple Syruping 2019

The syrup in the first photo is especially dark.

it is the first maple syrup that Gail refined this spring. Normally the first syrup is light amber. As the season progresses the color usually becomes darker. The last syrup is the darkest. Not this year.

The dark color in maple syrup is a function of microbial life in the sap before it is boiled down to syrup. In any normal year, the syrup gets darker as the season progresses because the outdoor temperature increases enabling more microbe activity.

By the way, these natural microbes are a normal part of life on earth. They are not bad for us, they are almost certainly good for us, and they do not harm the syrup.

The activity of maple sap microbes is analogous to what happens in wine, cheese, yogurt, aged steak or countless other earthly life forms.

Increased microbe life imparts a dark color and a more robust taste to maple syrup.

Gail's first syrup this year is dark because Janelle collected the sap and stored it in clean five-gallon buckets while we were visiting a new great-grandson in Florida.

The sap was stored at 45 degrees for an average of eight days.

The dark color and robust maple taste are a result of the extra time that microbes had to work on the stored sap.

Nothing bad.

Just different.

This sap run this spring has been terrific. The best I have seen.

I collected 50 gallons from 20 trees in the past two days.

It requires over 40 gallons of sap to produce one gallon of syrup.

I use open, five-gallon plastic buckets.

I have tried other containers. Seamless plastic buckets are simple, cheap, high volume and easy to use. I have tried several commercial and homemade taps.

The taps I prefer are simply a short section of PVC pipe, slit from end to end with a band saw.

Those taps are cleanable, easily removable, extremely cheap and easy to use.

I use a portable drill motor with a spade bit to bore a hole at a slightly upward angle.

The split tap is easy to drive in for a snug fit.

I use a 16-penny spike as a hanger. An 8-penny nail will bend under the weight of a near-full, 5-gallon pail.

At the end of the season, it is a simple task to remove the taps and nails.

I collect sap at least every other day.

As soon as the sap is collected, I strain it through a dish cloth to remove, chunks of bark, fallen leaves and bugs.

We do the bulk of the boiling and reduction outside over a propane fire. A turkey cooker works well. When the run is slow Gail can keep up by heating sap over the wood stove in the house.

Both methods work well. We use both simultaneously to keep up with a heavy run.

Gail finishes the syrup in open pans in the kitchen.

In the three photos of the open pans, you can follow the near complete sap from early boil to rapid boil to finishing.

Notice that the bubbles get smaller as the sap approaches syrup.

That is because of increasing viscosity, (thickening) of the liquid.

When tiny bubbles fill the pan, it is done. Another minute of boiling will produce sugar crystals. In pioneer days, the sap was often intentionally reduced to crystals.

In the final photo, you see the lighter colored syrup that Gail is now getting because we have caught up and the time between collecting and reducing is short. Hence less time for microbes to prosper.

The syrup will get darker again as the weather warms in the coming days.

Have a good spring. You deserve it. Tom







