

WHAT'S A SUGAR MAPLE WORTH?

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What is a sugar maple worth? This is an interesting question and not one which is easy to answer. I have some thoughts on this subject to share with you. Many of these have been discussed with county and district foresters, sugarmakers and people from the community who appreciate the maple tree very much.

Wood Products

Firewood. One use for the sugar maple is firewood, though it may not be the highest priority. Sugar maple is one of the finest firewoods, burning very cleanly when dry. Based on figures compiled by the district foresters of the Vermont Division of Forestry, a 12-inch (30.48 cm) diameter tree could yield one-fourth of a cord¹ of wood; a 20-inch (50.8 cm) diameter tree, up to one cord. If we consider it's value in the woods as stumpage, \$10.00 per cord is a reasonable figure. Therefore, the value of a 12-inch tree just for firewood stumpage is \$2.50, and on a retail basis firewood from a 12-inch tree would sell for around \$20-\$25.

Timber. This is another valuable source of income from the sugar maple. A 12-inch diameter tree should yield about 75 board feet (22.86 m); a 20-inch tree about 200 board feet (60.96 m). The current stumpage price for maple wood, the price a landowner will receive for sawn timber prior to manufacturing, is about \$200/1,000 board feet (304.8 m), or \$15.00 for a 12-inch tree and \$40.00 for a 20-inch tree. Maple lumber is preferred by many crafts people, and is used for a wide range of products, including fine furniture, gun stocks, bobbins and toys.

¹A cord of firewood measures 4 ft x 4 ft x 8 ft, and sells for about \$80-100.

Maple Syrup Production

Maple syrup is the most familiar product associated with the sugar maple tree. Let us consider the value of an individual tree in terms of the syrup it produces. A maple tree is "tapped" by drilling a hole, (7/16 in. diameter [1.1 cm], 2.5-3 in. [6.4 - 7.6 cm] deep) in the bole of the tree, into which is placed a spout to collect the sap for making syrup. Only trees with a diameter of more than 12 inches should be tapped. We recommend one tap hole for a 12-inch diameter tree, and two for a 20-inch tree, though this may be more conservative than is commonly practiced. In an average year, one quart of syrup can be produced per tap from the 12-inch tree, or around \$10.00 per "tap" at current syrup prices (Fig. 1). Syrup provides revenue annually whereas timber products give only a one-time income.

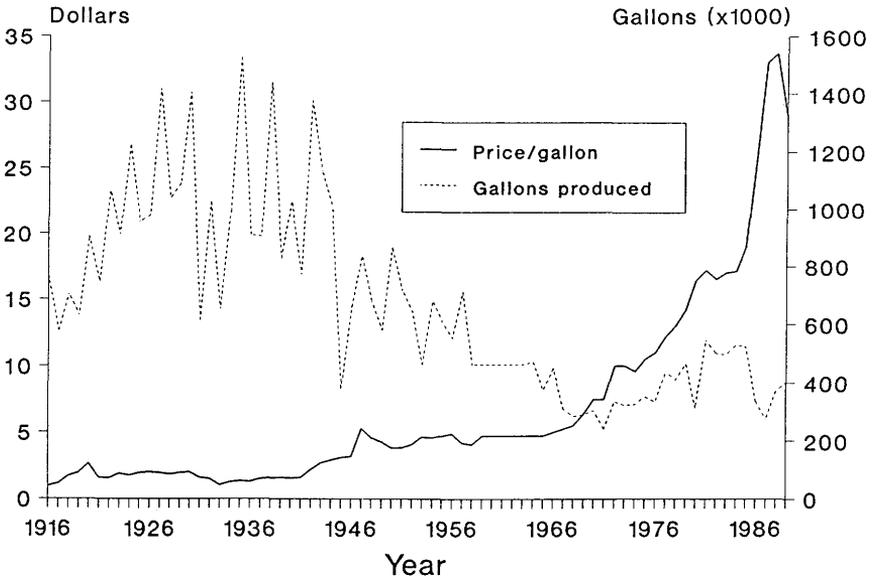


Figure 1. Average price per gallon of maple syrup and the number of gallons produced in Vermont from 1916 - 1989 (from VT Department of Agriculture).

In 1988 Vermont produced approximately 370,000 gallons of maple syrup, which at \$35.00/gallon, amounts to approximately 12.5 million dollars (Department of Agriculture 1989). It is interesting to note that whereas the price of syrup has risen markedly since 1916, syrup production has declined (Fig. 1). Despite the drop in production, Vermont still produces more syrup than other states. Actually the value of maple syrup to Vermont is even more than 12.5 million dollars when one adds in the revenue from other products that are made from the syrup and income generated from industries related to syrup production, such as evaporating equipment and syrup containers.

Who are the sugarmakers? There are all kinds, from the backyard sugarmaker working under the stars late into the night, to the large, commercial operators who put in over 25,000 taps and make more than 3,000 gallons of syrup a year. In Vermont alone there are over 2,500 sugarmakers based on current VT Department of Agriculture estimates (E. Willard, personal communication). That the University of Vermont maintains one of the oldest on-going maple research stations in the country attests to the importance of this industry to the people of Vermont.

Aesthetics and Tourism

The aesthetic value of the sugar maple is more difficult to assess than syrup or timber production, yet this is an important factor to which almost every speaker here has referred. Maples make the Green Mountains of Vermont green, which is one reason the sugar maple is our state tree. In the fall, they also provide a beautiful backdrop of color for which Vermont is famous and which attracts many tourists annually. If you look around, most photographs and paintings of scenic Vermont include the beautiful sugar maple. In a national survey when asked "What do you think of when you think of Vermont?," the overwhelming majority said, "We think of maple."

Tourism is a primary source of revenue in Vermont and the sugar maple plays an important role in attracting tourists here. In 1987, according to the Vermont Tourist Industry Travel Bureau, 8.4 million visitors came to Vermont. Between mid-September and mid-October tourist facilities are booked to capacity. While here, tourists spend over 1.2 billion dollars annually on goods and services of all types. We must consider the impact on the tourist industry when we assess the worth of our maples.

The overall environmental value of a maple must also not be forgotten. A healthy canopy shades the forest floor, providing suitable habitat for many other species that live in the forest. It keeps the soil cool and protects our groundwater supply.

All of the sources of income provided by the sugar maple that I have mentioned ultimately provide jobs for Vermonters--jobs for foresters, loggers, sugarmakers, restaurant owners and many more. Even the occasional entomologist may benefit from the sugar maple!

So what is that sugar maple worth? Many things to many people. As Ken Campbell of Morrisville, VT put it, "How do you place a value on something like that? Maples are part of our heritage." We've got to do everything we can to make sure they are here for our children and our children's children. I just can't imagine what it would be like without our maples. We have a important challenge and responsibility at this conference to put to work what we learn here to protect our heritage.

References Cited

Department of Agriculture. 1989. New England Agricultural Statistics.
USDA.