

Going Organic: Use of Organic Ingredients in Craft Beverages

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Ask any young woman 18–to–34 if she buys organic products, and she’ll list off everything from baby lotion to shampoo, juice boxes to pastured chicken, bed linen to yoga mats. According to data from the Organic Trade Association, many people in this demographic are focused on living organically—particularly parents, who intend to create more healthful environments for their children.

But when these parents have a date night, are they drinking organic adult beverages? In Jeremy Kempter’s experience, people sometimes forget the importance of purity in what he calls “sin” products.

“Distillation and fermentation intensify the potency of ingredients. So it stands to reason the concentration of chemicals in non-organic ingredients will increase, too,” Kempter told *Beverage Master Magazine*. “We want a clean product. In our trials and tests, organic simply tasted better and didn’t produce any ill effects. We choose organic because we’re striving for superior quality and smoothness.”

Kempter is the founder and chief distiller of Old Town Distilling Company (OTD) in Fort Collins, Colorado (oldtowndistilling.com). He and business partner Patrick Saul call themselves “crafters of distinctive creations,” all of which are certified organic and distributed in Colorado, New York and New Jersey.

OTD's Old Standard whiskey, bourbon, and a new spirit, Native Nectar maize vodka, contain organic sweet corn and spicy winter rye from Motherlove Legacy Farm in the Colorado foothills. Motherlove is owned by agronomist R.J. Ottaviano, who reached out to OTD with an offer to try his grains.

Previously, Kempter imported organic rye malt from Germany, "which was very expensive," he said. "We experimented with Motherlove grains in a few batches, and ultimately switched our recipes to use them. We've never looked back."

What the Organic Designation Means

It's important to know what's behind the certified organic label. According to the standards established by the United States Department of Agriculture (USDA), an organic label on a food, beverage or other agricultural product indicates production through approved methods. A USDA-accredited certifying agent verifies that growers and crafters follow specific requirements before labeling products USDA Organic.

Some guidelines organic operations must adhere to include preserving biodiversity, protecting natural resources and using only approved substances. For agricultural commodity producers pursuing certification for the first time, the process begins with soil quality—a transition that can take up to three years. During this time, crop farmers must follow all USDA National Organic Program mandates monitored by a third-party agent. Producer can't label anything organic until they're fully certified.

A business choosing to create organic products must be "protected from prohibited substances and methods from the field to the final point of sale." This includes multi-ingredient processed products. However, there are some variances. In adult beverage production, water and salt are usually exempt from this requirement, and guidelines also differ on sulfite amounts. Permitted organic ingredient percentages range from 70-to-95 percent in the majority of beer, wine, hard cider and spirits.

By the numbers, the efforts seem to pay off. The USDA's 2017 statistics indicate there are nearly 25,000 certified organic consumable operations in the US—a 13 percent increase between 2015 and 2016, and the highest rate of growth since 2008. Consumers are responding, too. A 2017 Organic Trade Association report reveals that in the US, organic sales totaled approximately 47 billion—an increase of nearly 4 billion from the previous year.

Not Trend, But Tradition

When growers and producers choose organic methods, it's often because the practice is rooted in a more holistic philosophy that fosters a business mission. Since the 1850s, members of the Koan family in Flushing, Michigan, have owned a three-point operation: a farm, Almar Orchards and an organic cider facility. Current patriarch Jim Koan, now in his 70s, manages the farm and orchards. His son, Zach, controls estate cider production.

JK's Farmhouse Ciders (jksfarmhouseciders.com) is the Koan's organic hard cider line. Small batch varieties are sold by keg, bottle and can in more than 30 U.S. states, and through international outlets in Canada, Scotland and Japan. The company's original estate cider, JK's Scrumpy, is considered entirely organic, produced with apples from the family's 150-year-old orchards and fermented with wild yeast.

The Koan's business partner and sales manager, Bruce Wright, believes the family's primary purpose is ethical sustainability. "Making a wholesome beverage from apples we grow and know are safe is important. We could produce a lot of cider cheap with imported concentrate, but that's not us," he said.

There's more risk in growing organically, and coaxing productive yields is difficult. "It would be much easier and less expensive to spray chemicals," said Wright. "But Jim is a steward of more than 500 acres of organic orchards and farmland. He wants to leave his land in better shape than when he started. He also wants to be secure in the knowledge that fruit he sells to his neighbors and makes into cider is clean and healthy."

The Koans incorporate a variety of effective traditional best practices. Instead of insecticides, a flock of guinea fowl patrol the property. Heritage breed pigs scour the orchards and fields, providing pest control while making a meal from the refuse.

"I don't think you could reproduce what we do," Wright said. "It's our land that affords us flavorful fruit to make unique ciders."

Emerging Options for Brewers

For craft brewers, sourcing organic ingredients is often more challenging if brewers aren't also growers. The USDA's 2015 estimate for conventional barley production indicates only 25 percent is used for malting. Organic barley production is an extensive process, as it's highly prone to disease and crop proximity challenges. Consequently, organic farming appeals to a select few, and costs reflect the effort.

Before 2010, organic brewers weren't required by the USDA to use organic hops. Then regulations changed, specifying beer could only be certified organic if the hops were too. This increased demand, but at press time, there are less than a dozen organic hop growers in the US that can offer both small- and large-scale brewers a consistent supply with a reasonable price point.

One producer, 100-year-old Roy Farms (RF) in Moxee, Washington, strives to be a change agent. A diversified, family-owned farm in the heart of the fertile Yakima Valley—home to nearly 75 percent of the US hop production—Roy Farms (royfarms.com) grows 5 million pounds of hops on 3,200 acres.

In 2006, the organization started the organic hop certification process with 25 acres. "There was a lot of trial and error," said Andy Roy, RF's accounts and contracts manager for hop sales. "We were making sure crops had the right nutrients to grow and ensuring yields were where we

needed them, given the limited amount of fertilizers (organic fertilizers with organic pesticides) and pesticides we were allowed to use.”

RF experimented with varieties throughout the years to find the right ones that “agronomically lend themselves to organic growing,” Roy said. “We currently have 130 acres in active production—yielding 200,000 pounds—and a significant amount of land ready for trellis/planting.” Varieties in its direct farm-to-brewer channel include, but aren’t limited to, Organic Cascade, Organic Centennial, Organic Chinook and Organic El Dorado. “We’re currently one of the largest organic hop growers in the country,” said Roy.

As Roy evaluates the pros and cons of organic production, sustainability is the clear winner. “Like many hop growers in the region, we’re multi-generational. It’s up to all of us growers to ensure the land we’ve harvested these past 100+ years will be harvestable for future generations,” Roy said. “That’s one of the primary reasons 100 percent of our hops are Salmon-Safe certified, which limits crop applicants to protect potential run-off.” A con is “having a drastically-reduced ‘tool chest’ of applicants to combat viruses and pests.”

In 2013, RF’s hops were the first in the nation to be certified GLOBALG.A.P. Roy explained this critical designation. “GLOBALG.A.P. is a Global Food Safety Initiative compliant on-farm standard that covers certification of the entire crop process from planting and harvesting to transportation and storage,” he said. “GLOBALG.A.P. seeks to achieve a universal standard for product safety, environmental impact and the health, safety and welfare of workers worldwide. The certification reduces food safety risks and provides traceability, conserves natural resources and increases worker health and safety. This ensures craft beverage makers and end-consumers have the highest quality products in their favorite beers.”

A connection to quality sourcing is what the majority of growers and crafters believe differentiates their products as more enthusiasts make a conscious choice.

Wright with JK’s Farmhouse Ciders pointed out, “It seems a greater number of people are more cognizant of what they consume. For example, we have a lot of people reviewing our ciders, with many making a pilgrimage to the farm,” he said. “To many, organic is important; to some, it’s the lack of sulfites. But to all, it’s the flavor.”

Local Focus, Cost-Conscious

In an urban garden behind Mystery Brewing Company in Hillsborough, North Carolina, there’s a small assortment of hops, vegetables and herbs. These homegrown elements provide distinctive characteristics not only for Mystery’s rotating palette of beers but also for the diversity of its public house restaurant menu.

Eric Lars Myers, Mystery’s founder, CEO and head brewer (mysterybrewing.com), doesn’t produce all the ingredients for his tap list. He does embrace a perspective many growers and makers do: from ground to glass. “We enjoy producing our own ingredients. It significantly reduces cost and puts us in ultimate control of flavor, usage and how those ingredients are grown. It tells a great story about how involved we are in our beer,” Myers said. He creates a

different saison, sessionable ale, hoppy beer and dark beer each season, which Mystery distributes throughout North Carolina in kegs and cans.

Myers believes locality matters. “I proudly display on my packaging that I use local vendors. It’s really a part of our ethos. We’re asking people to buy local and to prioritize a local business, and so we do our best to embody that,” Myers said. “However, local for local’s sake doesn’t work. It has to be the right ingredient for the beer, it has to taste good, and it has to not be an enormous amount more expensive than the normal cost of goods.”

Even with such a strong ethos, logic still governs his business practices. From the importance of supply consistency to the power of consumer choice, Myers’ view of the organic marketplace makes him hesitant to convert his processes. “Organic often means ‘more expensive,’ and that’s not something I can sign on to. I need people to be able to afford my beer. For organic grain alone, we’re seeing a 10–to–25 percent upcharge,” he told *Beer & Beverage Master Magazine*. “If organic ingredients were always the same price as regular ingredients, maintained quality and were just as plentiful—I would see no reason to not switch.”

Roy understands this conflict. “We’ve seen a flattening of organic brewers entering/staying in the market. This is due to the higher cost to procure organic raw materials and the never-ending battle for tap/shelf space,” he said. “But a significant amount of current organic brewers are finding consistent, sustainable growth in their markets. It’s our job to ensure they have organic hops readily available and consistent in quality for their demand.”

Even though he’s successfully established a small batch organic spirits line, Kempter’s wish is that all American farmers and craft beverages would be organic. “The challenges come from the fact we don’t have quite as many choices. Our hope is, as organic agriculture grows and becomes increasingly profitable, the selection will match that of non-organic ingredients,” Kempter said.

“The paperwork to apply and comply as certified organic can be fairly intensive,” he continued. “However, if you’re used to the cumbersome record keeping required by the TTB (Alcohol and Tobacco Trade Bureau), you’re capable of adhering to the USDA.”

