

# Keystone Homebrew Supply Newsletter

May 2003

## Sulfites Are Your Friends

Many of our customers hesitate to use sulfites in their wine because they have heard negative things. They've heard that sulfites in wine, particularly red wine, can cause headaches and allergic reactions. Here's an article from Brew King's newsletter, *From the Vine*, that sets the record straight.

Sulfites are present in both wine made from kits and in commercial bottled wines. In wine kits, they take the form of metabisulphite. Home winemaking also dictates the use of a sulfite solution to sanitize equipment and bottles. And that's not a bad thing. In fact, it's essentially harmless, even necessary. Potassium metabisulphite is a source of sulfur dioxide, which inhibits yeast, mold and bacteria. It does this in two ways: it kills or stuns some of the organisms, and it blocks the ability of the surviving organisms to reproduce. Both of these come into play at the end of the fermentation process, stopping fermentation activity and protecting the wine. The reproduction-blocking action is also what makes sulfite effective as a sanitizing agent--if your winemaking equipment is physically clean and you've rinsed it with a sulfite solution, nothing will grow on it.

Sulfites are also added directly to wine after fermentation, to help prevent oxidation. Oxidation in wine follows the same pattern that you see when you cut open an apple and expose it to air--the wine turns brown and takes on a flat, "cardboard" taste. Sulfur binds with the oxygen in the wine and prevents this damage.

The use of sulfur compounds is not new to wine-making. The Dutch popularized the use of sulfur to treat wine in the 16th century by refusing to ship any wines not treated, insisting that wines treated with sulfur were the only ones that could survive a long sea voyage without turning into vinegar.

Some people worry that they may be allergic to sulfites. True sulfite allergies are very rare. It's more likely that they have had a histamine reaction to red wine. What most people describe as a sulfite headache is a reaction to bio-amines, compounds formed in wines for various reasons, one of which is malolactic fermentation (the addition of special bacteria for a secondary fermentation) in the presence of sugar. Some wineries start malolactic inoculation before the end of alcohol fermentation, guaranteeing formation of bio-amines. Since wine kits don't go through malolactic treatment, they do not form bio-amines and consequently do not provoke allergic reactions.

Some facts about sulfites:

Sulfites are a recognized food additive. The federal government controls their use.

All commercial wines contain sulfites, even those labeled "Kosher" or "Organic"!

Nearly all dried fruits and meats contain sulfites. For example, raisins have up to 250 PPM. Food products such as bacon, orange juice, potato chips, candied fruits, sausages and even pancake syrup contain sulfite--many at levels higher than wines.

All grape-based wines produce sulfite naturally during fermentation, up to a level of about 10 PPM. Even with no sulfite additions, wine still contains them.

The human body produces sulfite as a by-product of its metabolic activity. The sulfite is excreted through the kidneys.

This is not to say that sulfites are totally benign. People with breathing problems should avoid inhaling sulfite powder or the gas that comes off the prepared solution. It can act as an irritant, aggravating any breathing problems. Also, adding too much extra sulfite to wine is of no benefit, as it can spoil the flavor, giving it a "burnt match" smell. It's important to follow directions for sulfite additions.

The upshot of sulfite use is that without them, you'd have to be very careful to keep all of your equipment sanitary (with chlorine- or iodine-based sanitizers) and you'd have to drink your wine quickly, before it spoiled, probably within 1 or 2 months. The legal sulfite limit in commercial bottled dry table wines is 70 PPM. The amount of sulfite provided in Brew King wine kits will result in a level of between 16 and 25 PPM in a finished wine. Our instructions specifically allow for the option of adding sulfites in should you wish to age your wines for an extended time, giving you some degree of flexibility in the amount of sulfites present.

Keystone Homebrew Supply recommends the use of sulfites in all homemade wines. Adding sulfites to your wine is easy. A good rule of thumb is to add ¼ teaspoon per 5-6 gallons each time you: first start your wine (not in kit wines because they already contain your initial dose), rack/transfer it (wine kits provide this dose), and bottle the wine (the sulfites are not included in wine kits). Sulfites have a limited shelf life and we recommend using fresh sulfite crystals (\$1.19 per 2 oz.) each year. A more detailed discussion on sulfites can be found on *Winemaker* magazine's Website, [www.winemakermag.com](http://www.winemakermag.com).

## Award-Winning Recipe Southern Brown Ale

This fantastic beer, brewed by Keith Seguire of Woodbridge, New Jersey, captured Best of Show in this year's War of the Worts. As promised in last month's newsletter, here is his all-grain recipe.

- 8 lbs. pale ale malt
- 1/2 lb. crystal malt 60°L
- 1/2 lb. Carapils malt
- 1/2 lb. Victory malt
- 1/2 lb. Briess Special Roast
- 3 oz. roasted barley
- 3/4 oz. Centennial hop pellets (9% AA) 60 min.
- 1/2 oz. Williamette whole hops (5.5 % AA) 45 min.
- 1/2 oz. Williamette whole hops (5.5 % AA) 30 min.
- 1/2 oz. Williamette whole hops (5.5 % AA) 15 min.

Keith mashed at 154°F and fermented with a large quantity of Wyeast's American Ale yeast (1056).

Extract brewers should be able to make a reasonable approximation of this recipe by substituting a 4 lb. can of Alexander's pale malt extract and 2 lbs. of Muntions light dry malt extract for the 8 lbs. of pale ale malt.

## Wine Tastings Everyone Is Invited!

YOU WON'T WANT  
TO MISS THIS ONE!

**Sunday, May 18, 3-6 P.M. & Sunday, June 22, 3-6 P.M.**

Home vintners: come share your wine with other wine makers. All wines made from grapes, juices, fruits, kits, meads, and ciders are welcome. Everyone who brings wine gets a \$5.00 coupon to Keystone Homebrew Supply. We'll hold the event rain or shine.

We'll provide cheese and crackers! Haven't made your own yet? Come anyway and see what great wine kits can produce.

## Brew King Products

I (Jason) recently had the pleasure of attending an event sponsored by Brew King. They had great information about their wine kits and I got to ask a lot of questions of their technical quality control person, Tim Vandergrif. Here are a few of the most important facts I gleaned from these talks.

**1. Always make six gallons.** The kits are designed to make six gallons, and if you make less than this you will find that your wines are overly acidic and may not complete fermentation. Tim makes the analogy that if you were making frozen orange juice and the instructions said add three cans of water, would you make better orange juice if you added only two? No, you would end up with overly sweet orange juice with so much acid that you might get heartburn before finishing your glass.

In order to make six gallons of wine, you will need a primary fermenter that holds at least seven and one-half gallons (25 liter), and a six gallon (23 liter) carboy for secondary fermentation. Six gallons is two finger widths below the bottom of the stopper in a six gallon carboy.

**2. Always follow the instructions.** Even if you think you know better, for example, when instructed to stir the wine while the sediment is still on the bottom, *stir up the sediment!* Brew King has planned for everything; when the instructions say to top up with water, they planned for that event and made sure that the final product would be the correct strength and not watery. Brew King constantly refines their kits and the instructions, so be sure to follow the instructions that come with each kit.

**3. Stir the wine.** One of the best ways to ensure that your wine comes out great is to follow the instructions and vigorously stir. In the first steps, when mixing the grape juice concentrate with water, it is important to thoroughly mix the wine to ensure complete fermentation. If you neglect stirring, the concentrate may separate from the water, just as oil and vinegar will separate in salad dressings. If unstirred, your wine will have excess sugar at the bottom of the fermenter which will prevent the yeast from finishing their job.

Vigorously stirring the wine when adding the fining agents will both drive off carbon dioxide and help the wine clear. A lot of stirring is required at this point to remove the carbon dioxide from solution. Getting the carbon dioxide out of your wine is important to avoid a carbonated effect which is perceived as tingly or a slight coarseness to the flavor. The other benefit of thorough stirring is that it helps the finings and the yeast work together to make the wine settle clear.

In order help you stir your wine, we carry a spoon and paddle which will fit into the top of your carboy, as well as two types of stirrers that fit into your electric drill for easy and highly effective stirring.

## Keystone Homebrew's Annual Family Picnic Saturday, July 19

Judy (you'll recognize her from the store) and Jim kindly welcome the Keystone Hops Homebrew Club to throw a big Summer Picnic at their house. This July, we invite home brewers, wine-, cider-, and mead-makers to bring their families and celebrate the summer with their homemade liquid creations.

Judy and Jim have a great house located on ten acres just 25 minutes from the homebrew shop. The party starts at 4 P.M. and everyone is invited to camp out overnight for safety! DJ Peter will play all kinds of music from African to Zydeco, with plenty in between.

Kids (including the grown-up ones) can play volleyball, horseshoes, croquet, boules, and even go for a jump on the trampoline. Soda, cups, plates, napkins, burgers, hot dogs, and a gas grill are provided. Picnickers should bring a tasty dish, dessert, or snack in addition to their much-loved homemade beer, wine, cider or mead.

If you are interested in this year's picnic, please e-mail for info and directions or call John, Judy, or Jason at Keystone Homebrew Supply (215) 855-0100. Let us know how many people are coming and what food you will be bringing. See you there!

## Island Mist Wine Kits

What does summertime mean to you? For many of you it's a time to get out have picnics, go down to the shore, or escape to the mountains. Brew King's Island Mist Wine Kits add to the thrill of all your "warm" time of the year activities. These distinctive new beverages match a varietal wine base (like merlot) with a splash of natural fruit flavors for a light (6.5% alc./vol) and fruity drink. It's lighter and fruitier than table wines, while less sweet and more subtle than wine coolers. Best of all, it's ready in just four weeks and can be consumed immediately upon bottling. The Green Apple Riesling even won a gold medal in *Winemaker* magazine's competition!

Island Mist wines are delicious thirst-quenchers that are best served chilled to a frost. We have the following flavors in stock, \$43.50 each:

- Blackberry Cabernet
- Black Raspberry Merlot
- Exotic Fruits White Zinfandel
- Green Apple Riesling
- Peach Apricot Chardonnay
- Strawberry White Merlot
- Tropical Fruits Gewurztraminer (New)
- Wildberry Shiraz

Detailed descriptions available at [www.keystonehomebrew.com](http://www.keystonehomebrew.com). Be the hero of your summertime parties: have plenty of Island Mist on hand all summer. Island Mists also make a great carbonated drink, as Judy demonstrated at last year's picnic where she served a sparkling Island Mist using one of our homebrew keggung set-ups.

## Special Merlot Stag's Leap District, Napa Valley

I have great news for those of you who love Merlot. The Brew King Estate Series' newest release is a merlot from the Stag's Leap district of Napa Valley. The best wines are made from the best grapes, and the Stag's Leap district in Napa is world-renowned for its vineyards. It's hard to find a good Napa Merlot for less than \$15 a bottle, and even rarer to find a Stag's Leap District Merlot for less than \$30.

If you make this kit, not only will you have unbelievably good wine to share with your friends, but you will have saved yourself at least \$800 dollars over the cost of 30 bottles of commercial Stag's Leap merlot. Although Brew King assures us that they will have this wine year round, I'm not taking any chances, I'm starting my kit as soon as they come in (around May 15). An Estate Series merlot made in May or June will be aged well enough by Christmas to amaze your house guests. This one may be too good to give away as presents. Reserve yours today. Kits cost \$108.30.

## On-Line Sales Coming Along . . .

Slowly, but surely, we are adding items for sale on-line, as well as adding articles, news, and homebrew links. Check us out at [www.keystonehomebrew.com](http://www.keystonehomebrew.com) to see how we are progressing.

## Don't Mow Your Lawn, Brew Instead!

Don't waste another perfectly good Saturday mowing the lawn when you could be stocking up on tasty homebrew. When your green-thumbed, manicured-grass-loving neighbors look disapprovingly at your lawn, remind them that taller grass is healthier grass. Or tell them you're boycotting unnecessary usage of gasoline, or that your mower is broken, whatever, just don't squander this beautiful spring inhaling gas fumes when you could be enjoying the aromatics of a thirst-quenching pale ale or sipping the subtle smoothness of a brown ale.

## Summer Hours

This a reminder to all our customers that in order to maintain our sanity and have some fun, Keystone Homebrew Supply will not be open on Mondays throughout the summer. The last Monday that we will be open is May 19. We will resume Monday hours starting September 8. We are sorry for any inconvenience.

## Don't Get Left in the Dark, Sign Up for E-Mail Updates

While we try to be timely about our newsletter releases, some events, like the arrival of hop rhizomes (still in stock) or the Big Brew slip by before they are announced in our newsletter.

So, e-mail us your address and you'll receive irregularly scheduled e-mail updates, about once every five weeks, keeping you up-to-date on beer and wine events, as well as special store offers.

We hate SPAM too, so we do not share your address and will remove you from our list if for some crazy reason you don't want to be well informed.



## Big Brew, 2003

Here's a photo from this year's Big Brew, held on May 3, at Keystone. A bunch of brewers got together to celebrate National Homebrew Day, as

brewers around the country gathered for a simultaneous day of brewing. The weather was perfect and so was the beer. Check out AHA's Website, [www.aob.org](http://www.aob.org), for nationwide results.

The next chance to participate in a big brew event at Keystone is our annual Bourbon Barrel Brew. This year's group brew will be a barley wine and will be held on Saturday, October 18, 2003.

## In the next mailer . . .

The long anticipated article on mead, including how to make your own honey wine.

We'll announce the anticipated arrival dates of fresh grapes and juice.

Keystone announces our pre-season wine equipment sale.

We'll offer frozen grapes from premier growing regions such as Napa and Sonoma.

### FREE CASE OF BOTTLES

with any **Island Mist Kit** at  
Keystone Homebrew Supply

Not valid with other offers, coupons, or previous purchases  
and limited to certain styles of bottles.

Expires 06/30/03

code: KMM03

### SAVE \$5

on any \$50 Purchase at  
Keystone Homebrew Supply

Not valid with other offers, coupons, or previous purchases  
Expires 06/30/03

code: KMM03

### SAVE \$10

on any \$100 Purchase at  
Keystone Homebrew Supply

Not valid with other offers, coupons, or previous purchases  
Expires 06/30/03

code: KMM03

*Coupons must be presented at time of purchase*