



Portland Winemakers Club

November 2021
"Bill's Meanderings"



Monthly Events

January 2021

Annual Gala **CANCELLED**

January 20th, 2021

Speaker, Mike Smolak, Port

VIRTUAL MEETING

February 17th, 2021

Speaker, Syncline, James Mantone, Rhone varietals

VIRTUAL MEETING

March 17th

Speaker: Tyson Crowley from Crowley Winery, Pinot & Chardonnay

VIRTUAL MEETING

April 21st, 2021

Speaker: Bobby Rowett winemaker for Mellen Meyer Sparkling Winery

VIRTUAL MEETING

May 19th, 2021

To be determined

VIRTUAL MEETING

June 16th, 2021

To be determined

VIRTUAL MEETING

July 24th, 2021

Outdoor, contact meeting at Paul Natale's home; 2:00 to 5:00

August 21st, 2021, Annual Picnic, At the home of Craig & Mindy Bush. **CANCELLED**

August, no meeting

September 15th, 2021

Speaker: Jim Jamison, vineyards & winery owner from Tri-Cities.

VIRTUAL MEETING

October 20th, 2021

2021 crush & harvest

VIRTUAL MEETING

November 17th, 2021

Crush Talk

VIRTUAL MEETING

December 15th, 2021

Elections, Planning for Next Year, More Crush Talk

Greetings To All

This years' holiday season is here. With one down and two of the biggest looming I suspect we will all be busy shopping, eating, and merrymaking, hopefully with some of our own libations, safely. Speaking of shopping it's being suggested to shop early to be able to find that treasure with the shortages and skimpy shelves, but I see there is no shortage of decorations as I witnessed in one big box store last week.

I hope that all those that participated in last weeks online meeting found the use of Windows Team instead of Zoom to their liking. I think it worked well and would like to thank Rob Marr for suggesting it and monitoring the meeting. This month we will try something a little different. We have a speaker/presenter in Michael Lundeen of Lundeen Wines and Walnut City Urban Wineworks. Besides being an outstanding winemaker Mike is a third generation viticulturist. He would like to do a Q & A format so I'm asking participating members to submit written questions to him, and we will answer them accordingly. So, get your ideas of what you would like him to discuss written down and we will have a very informative meeting.

I'm very encouraged about the enrollment of new members in Portland Winemakers Club, most of which have found us through looking online and finding our website. We also have a presence on Facebook with our own group site. Regardless of how you may feel about using Facebook I think it could be a benefit to club members who want to post a question, discussion, or maybe sell or look for equipment. There are about 10 or 12 of us that now use the site and we have had some good discussions.

Cheers,

And to everyone have a festive and safe holiday season

Bill Brown



Upcoming events / Save the date

The next PWC meeting is scheduled for November 17th, This will be a “Microsoft Teams” meeting starting at 7:00 pm, sign in about 6:45 pm. This will be a general discussion about our problems and successes of the crush so far. A reminder with sign in procedure will follow by e-mail prior to the meeting.

PWC Website: <http://portlandwinemakersclub/>

Minutes from the October Meeting

Present: 18

- Prospective new members present were; Israel & Lori Garcia & Eric Mireiter.
- Ken received an e-mail from the Newport Seafood and Wine Festival. They plan to hold their event in January 2022 and will resume the amateur wine competition.
- The meeting was general discussion of the major winemaking steps completed or nearly completed so far. Starting with experiences obtaining grapes, quality of grapes, crushing, ferment, pressing and malolactic. A few people hung around until nearly 10:00 pm.
- Eric Mireiter said he obtained grapes from a vineyard in The Dalles that had a few obscure varieties called “Bright Light Vineyards”. Forwarded to Bob Hatt.



Newport Seafood & Wine Festival 2022 Amateur Wine Competition - On again

If you deliver your wine to a drop-off site, please deliver NO LATER THAN JANUARY 30, 2022.

All applications and payment must be to the Greater Newport Chamber of Commerce office at that time.

Limit is 4 entries per winemaker. Please fill out a separate application for each wine.

This wine competition is open to amateur winemakers only and offers an opportunity for these individuals to have their wines independently evaluated by a panel of judges. Wines are scored on a 20 - point system based on sight, smell, taste and overall quality.

Categories include - Dry Fruit, Sweet Fruit, Dry Berry, Sweet Berry, White Vinifera, White Non-Vinifera, Red Vinifera, Red Non-Vinifera and Specialty, a category which includes all wines not found in other specified divisions.

For more info go to <http://newportchamber.org/>



Restart Stuck Fermentations

Written by Bob Peak

All home winemakers wish — and strive — for fermentations that go smoothly and completely to the desired finish, usually dry wine. When things go wrong, a frequent problem is a stuck or sluggish fermentation. In his classic *Knowing and Making Wine*, Emile Peynaud refers to these conditions as “fermentation stoppage” and calls that a sign of “stoppage in the growth and the death of yeasts.” There you have it. If there is still fermentable sugar left, but your yeast stops growing or dies, you have a stuck fermentation.

The signs of stuck fermentation depend upon the kind of wine being made. For red wine from fresh or frozen grapes fermenting on the skins, normal fermentation produces a “cap” of floating inflated skins that needs to be punched down or pumped over two or three times a day. At the end of a good fermentation, the cap will come up more slowly, it will be softer, and you can see puddles of wine among the skins when punch-down time comes around. When those conditions prevail, a hydrometer check should show a sugar level of 0.0 °Brix or below. If the remaining gravity is much higher than that, you do not have a finished fermentation but instead a stuck one.

In white wine fermenting in a tank or carboy (or rosé wine or red wine made from juice or concentrate) there is no cap. Instead, you should monitor the fermentation airlock for activity, as well as frequently checking the gravity. If bubbles stop escaping the lock and the hydrometer shows above 0 °Brix, you are stuck.

This article is about restarting a stuck fermentation. If yours seems very sluggish, but you are still seeing activity or a daily drop in Brix, aerating and agitating the wine may get it going again without a full restart protocol as described later. Use a small fan to blow the carbon dioxide off the top of a red must and vigorously splash it as you punch down. If the cap comes up strongly again, you may have successfully invigorated the yeast. In a carboy fermentation, remove the airlock and swirl the carboy or stir with a sanitized stainless-steel spoon or rod to try for a similar effect. If those steps do not work, try to figure out the cause of your problem to apply the corrections that I will get into in this article. Most stuck fermentations occur near the end of the cycle as residual sugar reaches low levels and alcohol rises. Some, however, occur in the form of failure to start (or a very weak start) or midway through the fermentation. There are many possible causes and some of them have relatively simple solutions. Others are more complex, requiring significantly more labor (and supplies) to successfully restart. The following causes are grouped by the required treatments for correction.

Group 1: Temperature Correction

Yeast strains have optimal temperature ranges in which they grow and ferment well. Those ranges are provided by the yeast producer or by your yeast vendor. In fermenting a white wine at a cool temperature, it may be difficult to get started. A temperature around 50 °F (10 °C) may work for a few strains, but some require a temperature as warm as 68 °F (20 °C) to thrive.

At the other end of the scale, in a tank or vat without cooling, a red wine fermentation may get too warm. Peynaud notes the ideal range as between 79 and 86 °F (26 and 30 °C). Temperatures above that range may cause the yeast to slow and stop, possibly to die.

Corrective action: If your fermentation is cold and fails to start (or stops), warm it up a few degrees. If it does not start again on its own, re-inoculate with a fresh pack of yeast. If it is too warm, cool it off. For open tanks, you can freeze plastic water bottles, then place a few in the must and stir. Do not cool or warm rapidly as that may further damage whatever yeast remains viable. Consider reinoculation. In these cases, it is usually safe to use the same yeast strain as you started with. If fermentation does not resume within about two days, go to the full restart protocol described later.

Group 2: Nutrient Additions

If must or juice is deficient in critical nutrients, fermentation may slow or stop. The most common problem is a shortage of nitrogen in forms useable by the yeast. The most likely need for additional nutrients will come about if the grapes exhibit poor quality conditions such as moldiness. In addition, if you have the opportunity to have testing done by a wine laboratory, you can find out exactly what you need to add. If not, it is best to check with your yeast supplier and determine the likely nutrient demand for the strain you are using. If you have not added nutrients and your fermentation slows, consider this a possibility. The condition is often manifested by a “rotten egg” smell of hydrogen

sulfide produced by the stressed yeast.

Corrective action: Adding simple diammonium phosphate at the rate of 1 g/gallon (26 g/hL) may do the trick. For more insurance, use a complete nutrient product like Superfood, Fermaid K, or Fermaid O. Those products are generally applied at 1 or 2 g/gallon (26–52 g/hL). Fermentation should restart within a day and, with a light aeration, off odors should disappear within a few days. If it is not corrected, once again move to full restart.

Group 3: Aeration

Two conditions merit the addition of air to your fermentation. The first is if you happen to have over-sulfited at crush. Adding 50 ppm of sulfur dioxide is common and even 75 ppm should be low enough to allow fermentation to start. If you realize you have added a great deal more than that, aerating the must may clear it up and allow a start. In addition, yeast needs oxygen for growth and reproduction, especially early in the fermentation. If activity seems to be slowing in the first few days, try adding some air and watch for improvement.

Group 4: Adding Water

The most likely condition that will need a water addition is directed at preventing (rather than correcting) a stuck fermentation. If you have a must or juice above about 24 °Brix, check your choice of yeast strain to make sure it will be sufficiently alcohol-tolerant to finish dry. Otherwise, add non-chlorinated (preferably distilled) water to reduce the Brix level to a manageable number before pitching yeast. If you failed to do this with a high-sugar must and alcohol gets too high, you can still add water but it may negatively impact the wine's flavor and leave it seeming "watered down." Still, that may be your only choice if alcohol is at or beyond the highest level listed for yeast strains you have access to. A full restart may be needed as well.

Group 5: Full Restart

This is the last resort in any sluggish or stuck fermentation (and you can try it a second time if it fails once). Several conditions can give rise to problems requiring this solution; the most common is high alcohol. Particularly if you started with yeast not capable of high alcohol fermentation but you had high sugar, a restart with a stronger yeast can be very effective. "Wild" or indigenous yeasts are particularly prone to giving up at relatively lower alcohol levels and a restart with a strong commercial yeast strain may finish the job.

Problems other than high alcohol might also make it difficult or impossible for your fermentation to finish. Sometimes a must/wine develops a high population of yeast that carries the so-called "killer factor" that eliminates most other yeasts. If the "killer" strain cannot tolerate the final alcohol level, the fermentation will stick. Similarly, various lactic acid bacteria strains can start growing in a must/wine and produce conditions that inhibit yeast. Finally, yeast growth itself may produce an excess of fatty acids that are toxic and inhibitory to yeast fermentation.

Fortunately, you do not need to know exactly what is wrong for this restart protocol to work. The process is the same for each of the conditions noted here. It is also the procedure to follow if a simpler restart attempt, as described earlier, has failed to take hold. (This version of a full restart is adapted from a Scott Laboratories flyer on the subject.)

Corrective action:

1. Add 1 g/gallon (26 g/hL) of yeast hulls to the stuck wine 24 to 48 hours before your restart attempt.
2. After 24 to 48 hours, rack the wine off of the yeast hulls (they should have removed toxic fatty acids by then).
3. Add another 0.5 g/gallon (13 g/hL) of yeast hulls to the racked wine.
4. Add a complete yeast nutrient such as Fermaid K directly to the stuck wine. If the wine is above 3 °Brix, use 0.5 g/gallon (13 g/hL). If the sugar is between 1 and 3 °Brix, use only 0.25 g/gallon (6.5 g/hL). Below 1 °Brix, add none.
5. In another clean container (the Restart Container), mix 5 percent of your must/wine volume with an equal amount of clean, unchlorinated water. (For instance, if you are restarting 20 gallons, use $20 \times 0.05 = 1$ gallon or $76 \text{ L} \times 0.05 = 3.8 \text{ L}$ of each, water and stuck wine).
6. Measuring for the entire stuck wine volume, weigh out 1.25 g/gallon (32 g/hL) Go-Ferm or other yeast rehydration nutrient. Dissolve that in 20 times its weight of clean, chlorine-free water at 110 °F (43 °C). Mix the solution and cool to 104 °F (40 °C). For our 20 gallon (76 L) example, $20 \text{ gallons} \times 1.25 \text{ g/gallon} = 25 \text{ g}$ ($0.76 \text{ hL} \times 32 \text{ g/hL} = 25 \text{ g}$). Then

you want 20 times that much water, so $25 \text{ g} \times 20 = 500 \text{ g}$ (or, close enough, 500 mL, which is 17 ounces. But trust me, go metric on this kind of calculation!)

7. Using a vigorous yeast strain that is highly alcohol-tolerant like Uvaferm 43 or EC-1118, weigh out 1 g/gallon (26 g/hL) for the entire restart volume and stir it into the Go-Ferm suspension. Do this slowly, over a period of five minutes, stirring gently to avoid clumping. Let stand 15–20 minutes.

8. Check the temperature of the stuck wine and of the yeast suspension. They should be no more than 18 °F (10 °C) apart. If the temperature difference is greater, mix a small amount of your wine-and-water mixture from your Restart container into the suspension and stir again.

9. With successive additions if necessary to adjust the temperature, when the gap is small enough stir the yeast suspension into the Restart Container. Wait 20–30 minutes.

10. Add 10% of your stuck wine volume into the Restart Container. Wait 20–30 minutes.

11. Add 20% of your stuck wine to the Restart Container and wait another 20–30 minutes.

12. Repeat step 11 three more times.

13. Add remaining stuck wine. Increasing the room temperature may also help.

As you can see, this last procedure is much more complicated and time consuming than the simple processes described earlier. If you can avoid a full restart, then you should! That means paying attention to sugar levels and adding water before fermentation if needed, using proper yeast nutrients, and avoiding contamination or the presence of yeast toxins.

Unfortunately, despite our best efforts, it is often nearly impossible to restart a stuck fermentation, particularly at very low Brix. I have been successful on occasion with the “full restart” but have also had failures with it. If you apply it twice without success, you probably need a different plan for your wine.

If it is tolerable as a sweet wine, you may want to stabilize it with sulfite and sorbate and bottle it as-is. Or add more sugar (or grape concentrate) and alcohol to simulate a Port-style wine. If those ideas will not work, you may be able to blend it down to a stable residual sugar level using another dry wine. In the final analysis, you may need to consider it a lesson learned and pour it out.



Post-Fermentation Wine Adjustments

Written by Bob Peak

Our job isn't finished when fermentation is over. With many wines, especially reds, you may want to go ahead and do a malolactic (ML) fermentation as well. And during cellaring you need to keep your sulfite program up to avoid oxidation and spoilage. Along the way, though, you may want to make some other significant changes to your wine prior to bottling. These are deliberate, planned adjustments to the taste in pursuit of specific objectives. Possible changes cover a broad range from simple sweetening to use of special-purpose products like finishing tannins. Throughout the process of flavor adjustment, some key principles prevail. You need to choose the desired outcome, plan how to achieve it, make a timing decision, and finally apply the flavor change.

First, develop a concept. Do you think your wine might be better if a little sweeter? Possibly improved with some oakiness? Want to do something unusual like add fruit flavors or spices? Whatever you have in mind, taste the wine and think creatively about what you experience. Have other people whose palates you trust taste it. Describe your vision for the wine and see what kind of feedback you get.

Depending on the type of adjustment you will undertake, you will choose different times of action. Some additions take place very slowly, like the oak flavor that is imparted to wine through months of barrel aging. Other taste adjustments may need to be made a few weeks before bottling to assure that the wine is stable. When blending two or more wines, for instance, Daniel Pambianchi (in *Techniques in Home Winemaking*) recommends holding the blend at least four weeks prior to bottling. There are other flavor adjustments that can be made directly in the bottling tank.



Once you have determined what you want to adjust and when you will do it, run a bench trial to confirm your expectations. A trial may not show you exactly how your wine will turn out, but it can help fine-tune your process and prevent a mistake. For your trial, choose two or three possible levels of treatment. Thief out a 100-mL sample for each condition, plus a control. Apply the adjustments, let them stand over night, and taste. In your first trial, you may just be answering the question, “Is my wine better with this adjustment, or without it?” If you decide it is better, you may want to run another trial with more addition levels to fine-tune your plan. However you decide, write down the small-scale result and calculate the needed addition for your full-scale batch.

Sweetness

One of the most straightforward flavor improvements for some wines is sweetening. For either a young rosé or a bright, high-acid white wine, a low but noticeable sweetness can be very enjoyable. Even for “dry” red wine or full-bodied white, a sweetening near taste threshold levels may enhance fruitiness without seeming too sweet. How much sugar is needed will be influenced by the acid level of the wine, as well as other flavor components. High-acid wines can seem dry even at significant sugar concentrations. Typically, sugar levels below about 0.2% (or g/100 mL) are considered “dry.” From about 0.5% to 1.0%, wines are often referred to as “off dry.” From 1% to 2%, they may be called “medium sweet” and above 2% they will usually be designated as sweet.

The natural sugars of grapes are a roughly 50/50 balance of glucose and fructose. With most wine yeasts being glucophilic — preferentially consuming glucose — the low amount of natural sugar that may be left after fermentation is mostly fructose. Fructose is much sweeter in human perception than is glucose, with table sugar (sucrose) somewhere in between. Invert sugar starts as sucrose, which is “inverted” to its component sugars, equal parts fructose and glucose. It tastes somewhat sweeter than sucrose itself. When I sweeten wines, I usually use sucrose. After a trial at perhaps 1%, 2%, and 3%, calculate the amount for your whole batch. Boil the sugar in an equal weight of distilled water to sanitize it and stir into the finished wine. To prevent refermentation, you will also need to add potassium sorbate at a rate of 10 to 20 g/hL (0.4 to 0.8 g/gallon). There are “wine conditioner” products on the market that are already prepared as solutions, making them very easy to use. Made from sucrose, invert sugar, or high-fructose corn syrup, they also contain potassium sorbate or sorbic acid already in solution. While sugar additions can be done just before bottling, better stability is likely if you hold the wine in bulk for a month so any resulting sediment can settle out.

If you want just a slight impression of sweetness, there is a product that does not need a preservative: Gum Arabic. It is most convenient as a liquid preparation that is about 25% gum Arabic, such as Flashgum R Liquide from Scott Laboratories, Stabivin SP from Laffort, or Liqui-Gum from Keller. It is used at rates from about 40 to 150 mL/hL (1.5 to 4 mL/gallon). After determining a suitable amount for your desired flavor in a trial, calculate for the whole batch. Stir directly into the wine in the bottling tank or bucket and bottle. Gum Arabic also helps improve mouthfeel and retards precipitation of colloidal particles in the bottled wine. It should always be the last product addition (along with any needed sulfite) at bottling if it is employed.

Another taste modification that mimics sweetening is reduction of bitterness. Reducing astringency, which is a physical phenomenon rather than a flavor, may also make a wine seem fruitier and rounder. For reducing bitterness or astringency in wine, you can fine it with a protein fining agent. Most commonly, your choices will be natural protein products such as egg whites, gelatin, isinglass, skim milk, and whole milk, plus the synthetic polymer PVPP (polyvinylpolypyrrolidone). All of these reduce astringency (for more details on their use, refer to my February-March 2014 “Techniques” column at <http://winemakermag.com/story1360>). It is worth noting that the two milk alternatives have a taste advantage over the other proteins for this purpose. In addition to the reduction of tannic astringency, a milk addition will dissolve into the wine a small amount of lactose — milk sugar. Lactose tastes sweet, but is not fermentable by *Saccharomyces* yeast, so the sugar introduced by the milk fining will not make the wine unstable to refermentation. Reduced astringency and slight sweetening might be just what your wine needs. As with other finings, you will want to leave the wine for a few days to a couple of weeks and then rack off, leaving the protein precipitates behind.

Acid

Pambianchi notes that normal acid levels for dry white wines are usually in the range of 5.0 to 7.5 g/L (0.5 to 0.75 g/100 mL or percent) and 4.0 to 5.5 g/L (0.4 to 0.55 g/100 mL or percent) for dry red wines. If your finished wine has an acid level much higher or lower than these levels, you may want to adjust the taste by adjusting the acid. Even within these ranges, sometimes a wine can taste unusually “sharp” and might benefit from an acid reduction. On the other hand, a wine may taste “flabby” or flat and benefit from an acid increase.

Increasing acid is very easy — just add tartaric acid. For your 100 mL trial samples, adding 0.1 g will give you a 1 g/L

equivalent boost. If your wine tastes flat, you might try something like 0.5, 1, and 2 g/L additions to see if you can brighten the taste without making the wine seem too sharp. (For more details on acid adjustment, see Daniel Pambianchi's "Advanced Winemaking" column in the February-March 2016 issue of WineMaker.) If you do an acid trial and like it, you can scale it up and dissolve the required amount in a small amount of distilled water. Add to the wine a few weeks before bottling. Note that if you add acid to white wine, it may need to undergo another cold stabilization before bottling. Otherwise, tartrate crystals may precipitate later when bottles are chilled. (Red wine carries the same risk, but it is not usually chilled for serving and therefore less likely to present a problem. It may, however, still throw tartrate crystals at cellar temperature — 55 °F or 13 °C — when aged for extended periods of time.)

If you think your wine is too high in acid, there are ways to reduce the level. A good choice for red wines (and a few whites) would be to put the wine through malolactic fermentation if you have not already done so. If that choice is not viable, there are chemical neutralizers that you can employ. The addition of potassium bicarbonate at a rate of 0.66 g/L will reduce tartaric acid by 1 g/L. Adjustment of more than 2 g/L of TA should be avoided due to risk of bitter flavors from excess potassium ion. Potassium carbonate may be used in place of bicarbonate, requiring 0.92 g/L to decrease TA by 1 g/L. For either of these, you should run a trial and make sure no unexpected flavors occur. Then, do the overall adjustment in time to leave a few weeks before bottling. Carbon dioxide gas will be produced in the chemical reaction and other wine components may precipitate and need settling.

Oak

To add oak flavor to your wine, aging in a barrel is most traditional. That requires planning and barrels are expensive. Instead, you may wish to use an "oak alternative" like sticks, staves, spirals, cubes, beans, or chips. Those products usually complete their delivery of oak flavor and aroma in just a few weeks. Even faster is adding a liquid oak extract that has immediate effect. Some prepared tannin products, like Tannin Riche from Scott Laboratories, can also contribute toasty oak flavors. Scott Laboratories recommends allowing at least three weeks after addition to give time for any insoluble material to settle out before bottling. It is difficult to do small-scale trials with wood pieces, but oak extract or finishing tannin can give you quick information on whether or not oak addition improves your wine. If it does, you may choose one of the slower wood products to make the actual addition.

Other flavors

All of the modifications discussed so far are common and conventional ways to adjust the taste of wine. But you are a home winemaker — you don't have to be conventional! A few years ago, when my brother, John Peak, complained that my estate Pinot Noir lacked "oomph," I made a special wine just for him. To 5 gallons (19 L) of finished Pinot Noir in a 6-gallon (23-L) carboy, I added a 46-ounce (1.4-L) can of Petite Sirah concentrate at 68 °Brix and refermented with a strong yeast. Not only did the alcohol level go up, but color, flavor, and aroma all became more intense as well. If you would like to achieve the flavor and aroma boost without refermenting, you can find natural fruit extracts from sources like blackberries and raspberries at your local home winemaking shop (or online). A 2–4 ounce (29–58 mL) bottle is usually recommended for 5 gallons (19 L) of wine. Once again, do trials to make sure you like the results. Going even further afield, you may want to consider adding chocolate extract or instant coffee powder to a rich red wine to make a very special dessert-type beverage. A wine like that would probably benefit from sweetening (and sorbate) as well. Spices can be used too. A couple of years ago, my then-colleague at The Beverage People Joe Hanson-Hirt made Christmas presents for the rest of us by turning some homemade Zinfandel into Glüwein or German-style mulled wine. He sweetened the wine, spiced it with orange peel, cinnamon, cloves, and other spices, then filtered it and bottled it. Heated up on a cold winter night it was a real treat and a very different flavor from conventional homemade wine!

The take-home lesson: Keep in mind that your wine is not necessarily finished just because you have completed fermentation. Smell it, taste it, and discuss it with others. If there is improvement to be made — conventional or outlandish — go ahead and do a trial on it. If it works, adjust the flavor of your whole batch. As baseball great Yogi Berra once said, "It ain't over till it's over."



References

Here is a list of hobby winemaking manuals and other materials in the Secretary's digital file. They are available for downloading by e-mail or via an internet transfer service. All are PDF format, E-mail Ken Stinger at kbstinger@frontier.com

Scott Labs 2021 Winemaking Handbook - 21 mb - 119 pages

Scott Labs 2018 Cider Handbook - 24 mb - 49 pages

Scott Labs 2018-2019 Sparkling Handbook - 8 mb - 58 pages

Anchor 2021 – 2022 Enology Harvest Guide 15.7 MB - 16 pages

A guide to Fining Wine, WA State University - 314 kb - 10 pages

Barrel Care Procedures - 100 kb - 2 pages

Enartis Handbook - 4.8 mb - 108 pages

A Review Of Méthode Champenoise Production - 570 kb – 69 pages

Sacramento Winemakers Winemaking Manual - 300 kb - 34 pages

Sparkling Wine brief instructions - 20 kb - 3 pages

The Home Winemakers Manual - Lum Eisenman - 14 mb - 178 pages

MoreWine Guide to red winemaking - 1 mb - 74 pages

MoreWine Guide to white Winemaking - 985 kb - 92 pages

MoreWine Yeast and grape pairing - 258 kb - 9 pages

Wine Flavors, Faults & Taints – 600 kb, 11 pages



Portland Winemakers Club

Leadership Team – 2021

President: **Bill Brown** bbgoldieguy@gmail.com

- Establish leadership team
- Assure that objectives for the year are met
- Set up agenda and run meetings

Treasurer: **Barb Thomson / Jim Ourada** bt.grapevine@frontier.com
jmourada57@gmail.com

- Collect dues and fees, update membership list with secretary.
- Pay bills

Secretary: **Ken Stinger** kbstinger@frontier.com

- Communicate regularly about club activities and issues
- Monthly newsletter
- Keep updated list of members, name tags and other data

Chair of Education / Speakers: **Rufus Knapp** Rufus.Knapp@fei.com

- Arrange for speakers & educational content for our meetings

Chair for Tastings: **Paul Sowray / Barb Stinger** davids1898@aol.com
kbstinger@frontier.com

- Conduct club tastings
- Review and improve club tasting procedures

Chair of Winery / Vineyard Tours: **Damon Lopez.** dlopez5011@yahoo.com

- Select wineries, vineyards etc. to visit
- Arrange tours
- Cover logistics (food and money)

Chair of Group Purchases: **Bob Hatt / Al Glasby.** bobhatt2000@yahoo.com
alglasby@gmail.com

- Makes the arrangements to purchase, collect, and distribute
- Grape purchases
- Supplies – These should be passed to the President for distribution.

Chair of Competitions: **Paul Boyechko / Michael Harvey** labmanpaul@hotmail.com
mharvey767@gmail.com

- Encourage club participation in all amateur competitions available. Make information known through Newsletter, e-mail and Facebook.

Chairs for Social Events : **Marilyn Brown & Mindy Bush** brown.marilynjean@gmail.com
* Gala / Picnic / parties mindybush@hotmail.com

Web Design Editor: **Alice Bonham** alice@alicedesigns.org

Digital Meeting Moderator: Rob Marr mdbmarr@live.com