



## When Your Wine Does Not Finish

A question was recently received from a customer who was having problems with his wine not *finishing*. What we are talking about here is that his wine was not reaching the target *specific gravity*. Both WinExpert and Cellar Craft wine ingredient kits will have three specific gravity (SG) readings that will be mentioned in the instructions.

These are:

1. The Starting SG
2. The SG to attain prior to transfer from primary fermenter to secondary fermenter (your carboy)
3. The Final (or finishing) SG

My customer's question was why his wine was not going all the way down to the final SG reading but was stopping instead at 0.996 or 0.998 instead of attaining a final SG of 0.992 or 0.994.

When making wine, the wine is usually fermented down to a specific gravity of 1.000 or slightly less and then it is transferred from the primary fermenter (usually a plastic bucket) to the secondary fermenter (usually a 6-gallon glass carboy).

In this case, the wine would ferment down to the 1.000 mark and the wine would be racked (transferred) to the carboy where it would ferment down to 0.996 to 0.998 and then stop. It would not *finish*.

The first (or most common) reason is temperature. Fermentation temperatures should be maintained in the upper 60 degree F. to lower 70 degree F. range.

In addition, the ambient temperature where the wine is being fermented should also be consistent. Fluctuations in ambient temperature (as little as 5 degrees F.) can put wine yeast into shock and poor performance (a stuck fermentation) can result.

The yeast type being used can also be a factor. There are numerous types of wine yeast available and each has its own fermentation characteristics. Cellar Craft typically uses Champagne yeast because it is very forgiving and is very neutral. Champagne yeast can also tolerate wider temperature ranges, high alcohol levels (excessive amounts of alcohol present can also cause a yeast to stop fermenting) and produces smaller amounts of unwanted by-products.

Timing is important. Home winemaking enthusiasts should rack their wine at the right time. Different wines have different points at which the movement is more advantageous. Most kits that I am familiar with will have a target SG of either 1.040 (or less) or 1.000 (or less) which should be attained and then the wine should be racked to the secondary fermenter. Try to make this move as close as possible to 1.000 or 1.400 (not over but under). Above can result in excessive foaming. Too far below can result in a stuck fermentation right at the end of fermentation.

Besides racking the wine at the most optimum time as described above, another thing that can be done is to not be *too careful* when racking the wine. In other words, do not try to totally avoid racking all of the sediment present in your primary fermenter into the secondary fermenter. Let some of this sludge (sediment) siphon over into your carboy. This small amount of sediment will help provide nutrients for the yeast during this final fermentation stage.