

Heat Stability

Four Feathers Wine Estates

Principal

Heat stability is measured to reduce the chance of haze caused from proteins in wine that denature over time or to exposure to high temperatures. Bentonite fining is used to remove these proteins from the wine. Four Feathers Wine Estates heats wine samples and runs turbidity after the wine has been exposed to high heat to test for heat unstable proteins. A heat stable wine at Four Feathers Wine Estates has a turbidity of less than 6 NTU after heat treatment.

Procedure:

1. Filter 50 mL of wine sample.
2. Place sample in a test tube and heat the wine in a 49°C water bath overnight. In the morning, pull sample from the water bath and place in refrigerator for 2 hours.
3. Run turbidity on the sample.
 - a. If the sample is over 3 NTU, the sample is not heat stable and more bentonite must be added.