## BENCH TRIALS SET-UP

A bench trial is a small-scale test that simulates the effect of a treatment will have on a large volume of wine. Bench trials are essential to evaluate the efficacy of treatments, determine proper dose rate and validate a treatment before going on large volume.

To best decide and have the appropriate treatment for the wine, we recommend performing bench trials with many of our products such as tannins, polysaccharides, and fining agents.

To set-up bench trials, follow these steps:

- Prepare $1 \%$ ( 1 g in 100 mL ), $2 \%$ ( 2 g in 100 mL ), $5 \% ~(5 \mathrm{~g}$ in 100 mL ) or $10 \%(10 \mathrm{~g}$ in 100 mL ) treatment solutions of the product to be tested:
- For fining agents: prepare $5 \%$ or $10 \%$ solution in water as recommended in the Technical Data Sheet
- For tannins: prepare $1 \%$ or $2 \%$ solution in neutral alcohol-water solution ( $\sim 13 \%$ )
- For polysaccharides: prepare $10 \%$ solution in warm water.
- Label each sample bottle. Keep one untreated sample as a control.
- Fill samples with wine up to $80 \%$ of final volume, leaving space for the addition.
- Add the treatment solution. Refer to Table 1 for volume of solution to add into wine.
- Mix after addition, top each bottle with wine and mix again.
- Evaluate with tasting
- For fining agents: Store in refrigerator for settling (usually 1-2 days). Let come to room temperature before evaluating.
- For tannins, and polysaccharides: wines can be tasted immediately after addition.

Tableau 1: Bench Trial Treatment Solution Addition

| Dosage | Solutions | In 50 mL of wine | In 750 mL of wine |
| :---: | :---: | :---: | :---: |
| $1 \mathrm{~g} / \mathrm{hL}$ | 1\% solution | 1 drop or 0.05 mL | 15 drops or 0.75 mL |
|  | 2\% solution | 0.5 drops or 0.025 mL | 7.5 drops or 0.375 mL |
| $5 \mathrm{~g} / \mathrm{hL}$ | 1\% solution | 5 drops or 0.25 mL | 75 drops or 3.75 mL |
|  | 2\% solution | 2.5 drops or 0.125 mL | 37.5 drops or 1.875 mL |
| $7 \mathrm{~g} / \mathrm{hL}$ | $1 \%$ solution | 7 drops or 0.35 mL | 105 drops or 5.25 mL |
|  | 2\% solution | 3.5 drops or 0.175 mL | 52.5 drops or 2.625 mL |
| $10 \mathrm{~g} / \mathrm{hL}$ | 1\% solution | 10 drops or 0.5 mL | 150 drops or 7.5 mL |
|  | 2\% solution | 5 drops or 0.25 mL | 75 drops or 3.75 mL |
|  | 5\% solution | 2 drops or 0.1 mL | 30 drops or 1.5 mL |
| $20 \mathrm{~g} / \mathrm{hL}$ | 2\% solution | 10 drops or 0.5 mL | 75 drops or 3.75 mL |
|  | 5\% solution | 4 drops or 0.2 mL | 60 drops of 3 mL |
|  | 10\% solution | 2 drops or 0.1 mL | 30 drops or 1.5 mL |
| $50 \mathrm{~g} / \mathrm{hL}$ | 5\% solution | 10 drops or 0.5 mL | 150 drops or 7.5 mL |
|  | 10\% solution | 5 drops or 0.25 mL | 75 drops or 3.75 mL |
| $70 \mathrm{~g} / \mathrm{hL}$ | 10\% solution | 7 drops or 0.35 mL | 105 drops or 5.25 mL |
| $100 \mathrm{~g} / \mathrm{hL}$ | 10\% solution | 10 drops or 0.5 mL | 150 drops or 7.5 mL |

