

**ETS**

LABORATORIES®

APPLICATION NOTE

RAPID PHENOLIC ANALYSIS AS AN  
EVALUATION TOOL FOR GRAPES AND WINE

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**RAPID PHENOLIC PANEL FOR GRAPES**

A measurement of the phenolic content of grapes at harvest gives winemakers a snapshot of the raw material coming into the winery. The rapid phenolic analysis describes grape potential. It characterizes block to block variation and variation between vintages. It often the first indication that a wine lot may have high or low tannin, unripe seeds or potential color problems.

Clients have had the best results sampling directly from the vineyard rather than from picking bins. A 20 to 40 cluster sample is recommended. All the berries should be removed, the berries mixed, and a 350 g (0.75 lbs) sample sent to ETS. The panel includes tannin, polymeric anthocyanins, total anthocyanins and catechin. Results are available within 48 hours.

**RAPID PHENOLIC PANEL FOR WINE**

The extraction of phenolic compounds in wine can be monitored with the ETS Rapid Phenolic Panel for Wine. The panel measures the same four components as the Rapid Grape Panel with next day results. Wine lots can be sampled at key points in the fermentation/maceration process to provide a basis for adjusting the fermentation variables. Typical sampling points are at the end of a cold soak, at the start of fermentation around fifteen °Brix, at dryness, before pressing and free run at pressing.

Information on tannin, seed extraction and potential color can help guide decisions on adjusting fermentation temperatures, oxygenation regimes to fix color, rack and returns to increase extraction, tannin or enzyme additions, extended maceration and many other winemaking techniques that influence phenolic content.

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**IMPLEMENTING A PHENOLIC PROGRAM FOR EVALUATION  
OF GRAPES AND WINE**

A phenolic evaluation program can be initiated at the time of harvest. Additional sampling during fermentation provides information that can be used to adjust fermentation conditions, and will serve as an important historical record to guide future vintages.

The cost of a simple phenolic program is moderate considering the value of the product, the financial implications of problems and the profit potential of upgrading wine quality.