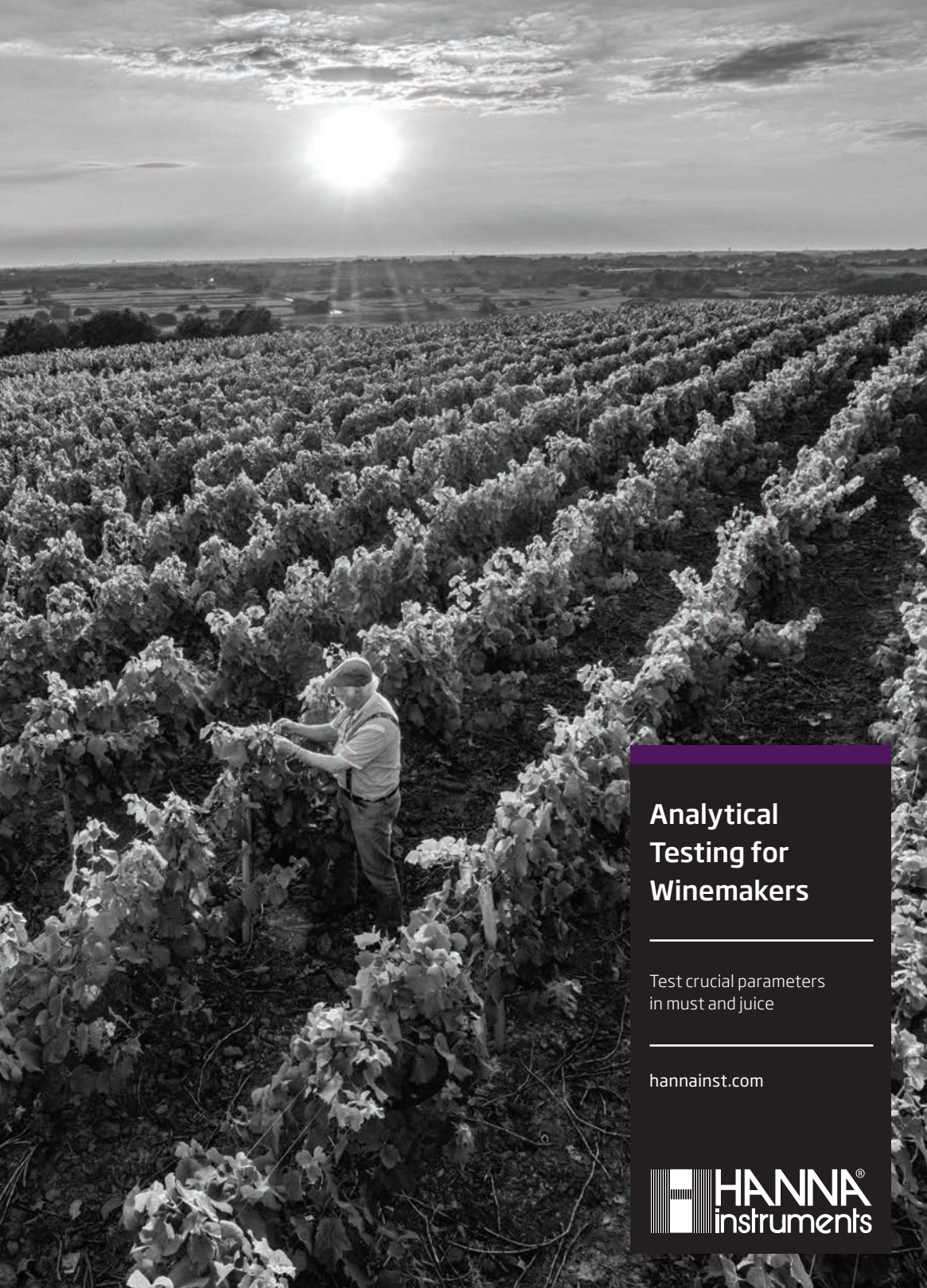

Analytical Testing for Winemakers

Test crucial parameters in must and juice

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HANNA® instruments

Automatic Titration System for Wine

The HI901W Wine Titrator complements our wide range of products dedicated to efficient and accurate laboratory analysis. The HI901W potentiometric titrator can perform acid/base, redox (ORP), complexometric, precipitation, non-aqueous, argentometric, and ion selective titrations. This powerful titrator dispenses the titrant, detects the endpoint, and performs all necessary calculations and graphs automatically. In addition to titration mode, the HI901W also operates as a fully functional pH, mV/ORP, and ion selective electrode (ISE) meter.

This titrator is supplied with standard wine methods or you can create your own. Methods (standard or user) can be easily transferred between titrators via USB flash drive or PC application.

Methods of analysis

- Customizable methods
  - The HI901W can store up to 100 user-defined or standard titration methods. Each method may be customized and optimized for performance based on application and user requirements.
- Titration method support
  - Onsite installation, training, and customization is available from one of our Applications or Service experts. Hanna offers continued support via phone or webinar for any questions you might have along the way.

Wine Analysis

Titratable Acidity	Acid/Base Titration (pH)
Free SO_2 (Ripper)	Redox Titration (ORP)
Total SO_2 (Ripper)	Redox Titration (ORP)
Free SO_2 (AO)	Acid/Base Titration (pH)

Total SO_2 (AO)	Acid/Base Titration (pH)
Volatile Acid	Acid/Base Titration (pH)
YAN (Formal Number)	Acid/Base Titration (pH)
Reducing Sugar	Redox Titration (ORP)

Titrator capabilities

- Dynamic titrant Dosing
  - Dynamic dosing allows for timely and accurate titration results by relating the titrant volume dosed to the mV response from the titration reaction. This provides for larger doses near the beginning of a titration and smaller, more precise doses near the titration endpoint.
- Equivalence endpoint detection
  - Equivalence endpoint detection is critical in applications where fixed endpoints are not specified in standard methods. This endpoint indicates where the mV response from the titration is greatest with respect to the volume of titrant dosed.
- Multiple titration types
  - Paired with the right electrode from our sensor line, our potentiometric titrator can perform acid/base, redox (ORP), complexometric, precipitation, non-aqueous, argentometric, and titrations with an ion selective electrode.
- Signal stability timing
  - The signal stability feature monitors when the mV response of the titration reaction stabilizes before providing the next titrant dose. This ensures reliable measurement values throughout the length of a titration.

Burettes and dosing system

- Exchangeable burette system
  - With Hanna's Clip-Lock burette, it only takes a few seconds to exchange titrants and reagents, preventing cross-contamination and saving time.
- Multiple burette sizes
  - The HI901W comes standard with a 25 mL burette but may be equipped with a 5 mL, 10 mL, or 50 mL burette.
- Precision dosing pump
  - Our unmatched 40,000 step piston driven pump is capable of dosing extremely small and precise volumes of titrant or reagent.

Data and storage

- Customizable titration reports
  - Each titration report is fully customizable so users can ensure they are storing and filing the appropriate data required for their application and procedures.
- Effortless data transfer
  - Data can easily be transferred to a USB flash drive or PC with the Hanna HI900PC application software.

Connectivity and functionality

- Multifunctional with four working modes
  - The HI901W functions as a titrator, pH meter, mV/ORP meter, and ISE meter.
- Multiple connections (HI901C2 only)
  - The titrator offers device support for two analog boards, which allows two electrodes and two stirrers to be simultaneously connected to one unit.
- Multiple peripherals
  - Users can print reports directly from the titrator using a standard parallel printer. An external monitor and keyboard may be attached for added versatility, as well as an analytical balance for automatic sample mass entry for titrations.

Yeast Available Nitrogen (YAN) titration solution

Reagent Code	Description
HI70456	sodium hydroxide solution (0.1 N), 1 L
HI70457	sodium hydroxide solution (1 N), 1 L

Titratable acidity titration solution

Reagent Code	Description
HI70456	sodium hydroxide solution (0.1 N), 1 L

Volatile acidity (VA)

Acetic acid is commonly formed during yeast growth in the early stages of fermentation. The rate and amount of acetic acid formed is partially dependent on the pH, sugar levels, available nitrogen, and temperature of the system. Typical VA levels post-fermentation range from 0.2–0.4 g/L. Any level higher could indicate microbial involvement and potential spoilage.

Volatile acidity titration solution

Reagent Code	Description
HI70456	sodium hydroxide solution (0.1 N), 1 L
HI70432	hydrogen peroxide solution (3%), 25 mL