

# **Soil Testing and Analysis**

#### Understanding the health and function of your soil.

Informed by over 10 years of research conducted in a range of managed landscapes, Vineland's Soil Testing and Analysis provides the key information needed to build soil function that supports plant survival, establishment and growth. Moving beyond basic measurements of micro and macro nutrient content, Vineland's new analysis service provides a comprehensive overview of the soil's current and prospective health. With an understanding of soil health, our clients have implemented best practices to:

- 1. Maximize the successful establishment and growth of newly planted trees and shrubs
- 2. Make informed species selections toward building climate-ready landscapes
- 3. Integrate low impact development strategies into landscape planning and expansion
- 4. Minimize tree failure, reducing long-term costs of tree replacement

**Soil health** refers to the measure of a soil's capacity to provide ecosystem services and is measured through the characterization of soil physical, chemical, biological and hydrological features. Unlike basic chemistry, which refers to the static measure of soil chemical features at the time of sampling, Vineland's testing and analysis seek to capture the **dynamic and interactive** system according to which soil's function.

Physical

Soil texture, compaction and bulk density influence where and how your roots can grow.

#### **Hydrological**

Saturated hydraulic conductivity and water holding capacity influence how readily available water and nutrients are for plant uptake.

#### Chemical

pH, electrical conductivity and macro and micro nutrients serve as measures of environmental suitability and stress as it relates to the selection and growth of plants in the landscape.



#### **Biological**

Organic matter, particulate organic matter, mineral associated organic matter and respiration let you know if your soil is alive and whether soil microbial and fungal communities have the resources they need to thrive.



### Soil Health Report

Vineland's Soil Testing and Analysis is presented in the form of a Soil Health Report which provides the data and information needed to understand soil function with clear characterization of soil physical, chemical, biological and hydrological features and detailed management recommendations to help build and maintain soil health.

- Diagnostic look at soil health and identify short-term management goals:
  - Soil texture, respiration, pH, electrical conductivity, organic matter (OM), particulate OM
- Moderate learn about soil function and develop strategies for long-term management:
  - Diagnostic package + bulk density, saturated hydraulic conductivity
- Comprehensive build a soil management approach that maximizes plant performance:
  - Moderate package + soil water potential

## Soil Testing and Analysis Packages Pricing

	Diagnostic**	Moderate**	Comprehensive***
10 - 50 samples*	\$125/sample	\$165/sample	\$850/sample
51 - 100 samples	\$105/sample	\$145/sample	\$850/sample

- \* Minimum sample requirement of 10 samples.
- \*\* Prices subject to change. For more than 100 samples, please contact our soil health team to discuss a specialized quote.
- \*\*\* Interested in the comprehensive package? Please contact the soil health team to discuss your needs.

# Looking for more information or a service quote?

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