



**Philippine  
Accreditation  
Bureau**

# **CERTIFICATE OF ACCREDITATION**

The Philippine Accreditation Bureau, Department of Trade and Industry, grants accreditation to

## **Bureau of Soils and Water Management Laboratory Services Division**

**SRDC Bldg., Elliptical Road corner Visayas Avenue, Diliman, Quezon City**

having been assessed and found conforming to the requirements of **PNS ISO/IEC 17025:2017** and the PAB conditions for laboratory accreditation in the field of **Chemical Testing** as specified in the Scope of Accreditation.

Accreditation Number:	<b>LA-2016-299B</b>
Scope Reference:	<b>ATEL-1-1021-299B</b>
Accreditation Validity:	<b>June 14, 2026</b>
Certificate Validity:	<b>July 14, 2023</b>
Date Issued:	<b>October 14, 2021</b>

Validity of accreditation and this certificate is effective subject to continuing conformity with the criteria and PAB conditions for accreditation.



**JAMES E. EMPEÑO**  
Director IV

Philippine Accreditation Bureau



**PAB ACCREDITED  
TESTING LABORATORY  
PNS ISO/IEC 17025:2017  
LA-2016-299B**

*This accreditation demonstrates technical competence for the specified scope reference and operates generally in accordance with the principles of ISO 9001 (refer to joint ISO-ILAC-IAF Communiqué).*



ATEL-1-1021-299B

## SCOPE OF ACCREDITATION

### Bureau of Soils and Water Management Laboratory Services Division

SRDC Bldg., Elliptical Road corner Visayas Avenue, Diliman, Quezon City

#### Chemical Testing

Classification of Scopes	Specific tests or Measurements	Standard Method / Reference Standard
Agricultural Products and Materials		
Soils	pH	Soil pH Measurement, SSSA, 1996
	Electrical Conductivity	Electrical Conductivity of Waters and Aqueous Extracts SSSA, 1996
	Organic Carbon / Organic Matter	Walkley Black Method (Colorimetric Method), FAO
	Total Nitrogen	Kjeldahl Method, SSSA, 1996
	Available Phosphorus	(Extraction according to Olsen et. al), ISRIC; FAO, 2002
	Available Phosphorus	(Extraction according to Bray and Kurtz, No. 1), ISRIC; FAO, 2002
	Exchangeable Potassium	Ammonium Acetate Method (Ammonium Acetate Extraction – Atomic Absorption/ Emission Method), SSSA, 1996
	Exchangeable Calcium	
	Exchangeable Sodium	
	Exchangeable Magnesium	
	Cation Exchange Capacity	Ammonium Acetate Method (Ammonium Acetate Extraction– Distillation and Titration), SSSA, 1996
	Available Zinc	DTPA-TEA Extraction/AAS SSSA, 1996
	Available Iron	
	Available Copper	
	Available Manganese	
Particle Size Analysis	Plant, Soil and Water Reference Method for the Western Region. 4 <sup>th</sup> ed. 2013 (Hydrometer Method)	
Fertilizers	Total Nitrogen Determination	Kjeldahl Method (AOAC 955.04) Official Methods of Analysis of AOAC International, 20 <sup>th</sup> ed., 2016
	Total Phosphorus	Vanadomolybdate Method (AOAC 958.01)



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Classification of Scopes	Specific tests or Measurements	Standard Method / Reference Standard
		Official Methods of Analysis of AOAC International 20 <sup>th</sup> ed., 2016
	Total Potassium	Flame Atomic Emission Spectroscopy Method Testing methods for fertilizer, FAMIC 2019
Waters		
Water for Irrigation and stocks	pH	4500-H+, pH Value, Electrometric Method, SMEWW 23 <sup>rd</sup> ed., 2017
	Electrical Conductivity	2510 B, Conductivity, SMEWW 23 <sup>rd</sup> ed., 2017
	Phosphorus	4500-P C, Vanado-Molybdo- Phosphoric Acid Colorimetric Method, SMEWW 23 <sup>rd</sup> ed., 2017
	Potassium	3500 K B, Photometric Method, SMEWW 23 <sup>rd</sup> ed., 2017
	Sodium	3500 Na B Flame AAS, SMEWW 23 <sup>rd</sup> ed., 2017
	Nitrate Nitrogen	4500-NO <sub>3</sub> <sup>-</sup> , SMEWW 23 <sup>rd</sup> ed., 2017

Legend to Reference Standards:

AOAC - Association of Official Analytical Chemists

SMEWW - Standard Methods for the Examination of Water and Wastewater



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