



Hortus Analytical Price List

Prices valid from 1 February 2020
 Version 2



Analytical Services



SOIL ANALYSIS

Nutrient	Soil S31	Soil S32	Soil S33	Soil S34	Super Soil S35	Sugar Soil S42	Sugar Soil S43
Texture & Soil Colour	✓	✓	✓	✓	✓	✓	✓
Nitrate-N	✓	✓	✓	✓	✓		✓
Phosphorus (Colwell)	✓	✓	✓	✓	✓	✓	✓
Phosphorus (BSES)		✓	✓	✓	✓	✓	✓
Exchangeable Cations (Ca, Mg, Na, K)	✓	✓	✓	✓	✓	✓	✓
Sulphate-S (MCP)		✓	✓	✓	✓	✓	✓
pH (1:5 water)	✓	✓	✓	✓	✓	✓	✓
EC (1:5 water)	✓	✓	✓	✓	✓	✓	✓
Chloride	✓	✓	✓	✓	✓		✓
Phosphorus Buffer Index (PBI)		✓	✓	✓	✓	✓	✓
Organic Carbon (W&B)		✓	✓	✓	✓	✓	✓
Organic Matter		✓	✓	✓	✓	✓	✓
Ammonium-N		✓	✓	✓	✓		✓
Cu, Fe, Mn, Zn (DTPA)			✓	✓	✓	✓	✓
Boron (hot CaCl ₂)				✓	✓		
Aluminium (if pH is < 5.5)					✓		
Solvita Respiration Test (Microbial Population Indicator)					✓		
Silicon (BSES + CaCl ₂)					✓	✓	✓
Potassium (Nitric)						✓	✓
Calculations: Ca Cat %, K Cat %, Mg Cat %, ESP, CEC	✓	✓	✓	✓	✓	✓	✓
Optimal Levels and Traffic Light Charts on Report	✓	✓	✓	✓	✓	✓	✓
Price (excl. GST)	61.81	77.28	100.00	122.73	163.64	110.91	131.82
Price (incl. GST)	68.00	85.00	110.00	135.00	180.00	122.00	145.00
Minimum sample volume required	500g	500g	500g	500g	500g	500g	500g

ADDITIONAL SINGLE ELEMENT (ASE) TESTS

Nutrient	Method Code	Sample Volume	Price excl. GST	Price incl. GST
Exchangeable Aluminium (KCl)	15G1	100g	14.55	16.00
Exchangeable cations (Ca, Mg, Na, K)	15D3	200g	31.82	35.00
Organic Carbon (W&B)	6A1	100g	31.82	35.00
Micros: Cu, Fe, Mn, Zn (DTPA)	12A1	200g	31.82	35.00
Phosphorus Buffer Index, PBI (requires P Colwell test)	9I2	200g	14.55	16.00
pH (1:5 water)	4A1	100g	14.55	16.00
Electrical Conductivity (1:5 water)	3A1	100g	14.55	16.00
pH (CaCl ₂)	4B2	100g	14.55	16.00
Phosphorus (BSES)	9G2	100g	14.55	16.00
Phosphorus (Colwell)	9B1	100g	14.55	16.00
Phosphorus (Olsen)	9C2	100g	14.55	16.00
Potassium (Nitric)	18C1	100g	31.82	35.00
Silicon (CaCl ₂)	CaCl ₂	100g	14.55	16.00
Silicon (BSES)	13D1	100g	14.55	16.00
Sulphate (MCP)	10B	100g	14.55	16.00
Total Nitrogen & Total Carbon (Combustion)	7A5, 6B2	100g	29.09	32.00
Labile Carbon	6E1	100g	31.82	35.00
N1: Nematode Count	Whitehead tray	500g	113.64	125.00
Solvita Respiration Test (Microbial Population Indicator)	SOL	200g	31.82	35.00
Soil Salinity (SS1) : pH, E.C., Na & Cl	4A1, 3A1, 15D3, 5A1	200g	43.18	47.50
CS1: Carbon Suite – Organic Carbon, Total Carbon, Labile Carbon, Total Nitrogen	6A1, 6B2, 6E1, 7A5	200g	79.09	87.00
Soil CMP: Compost / Manure / Peat / Potting Mix: pH, EC, Nitrate, OC, Colwell-P, K, Ca, Mg, Na, Cl, OM, CEC (Optimal levels NOT AVAILABLE)	4A1, 3A1, 10B1, 6A1, 9B1, 15D3, 5A1	500g	119.19	131.00

SAP ANALYSIS

Nutrient	P1	P2	P3	P9	
Nitrate (NO ₃)	✓	✓	✓	✓	
Phosphate (PO ₄ -P)	✓	✓	✓	✓	
Potassium (k)	✓	✓	✓	✓	
Calcium (Ca)	✓	✓	✓	✓	
Magnesium (Mg)	✓	✓	✓	✓	
Zinc (Zn)	✓	✓	✓	✓	
Sulfate (SO ₄ -S)		✓	✓	✓	
Copper (Cu)		✓	✓	✓	
Manganese (Mn)		✓	✓	✓	
Iron (Fe)		✓	✓	✓	
Boron (B)		✓	✓	✓	
Sodium (Na)			✓	✓	
Chloride (Cl)			✓	✓	
Silicon (Si)			✓		
pH			✓		
Brix			✓		
Electrical Conductivity (EC)			✓		
Optimal levels and Traffic Light Charts on Report	✓	✓	✓	✓	
	Price (excl. GST)	55.45	71.82	100.00	87.73
	Price (incl. GST)	61.00	79.00	110.00	96.50

Sample volumes required for this testing vary according to crop type and testing performed.
Please contact us on (07) 4132 500 for advice or refer to our website for the Hortus Sap Sampling Manual:

<http://public.hortus.net.au/Services/Analytical/PlantSapandDryTissue.aspx>

QUICKSOIL ANALYSIS (Soil solution test)

Nutrient	S6	S7	
pH	✓	✓	
Electrical Conductivity (EC)	✓	✓	
Nitrate-N	✓	✓	
K, Ca, Mg, Na	✓	✓	
Chloride (Cl)	✓	✓	
Ammonium-N (NH ₄ -N)		✓	
Optimal Levels and Traffic Light Charts on Reports	✓	✓	
	Price (excl. GST)	68.18	92.73
	Price (incl. GST)	75.00	102.00
	Minimum sample volume required	300g	300g

IRRIGATION WATER ANALYSIS

Nutrient	IW2	IW3 (Hydroponic Solutions only)	IW5 (Salinity)	
pH, Electrical Conductivity, Sodium, Chloride	✓	✓	✓	
Nitrate, Phosphorus, Potassium, Calcium, Magnesium, Sulfate, Copper, Zinc, Boron, Manganese, Iron	✓	✓		
Ammonium-N		✓		
Calculations: Sodium Adsorption Ratio, Total Dissolved Solids, Hardness	✓	✓		
Optimal Levels and Traffic Light Charts on Reports	✓	✓	✓	
	Price (excl. GST)	61.82	72.73	33.64
	Price (incl. GST)	68.00	80.00	37.00
	Minimum sample volume required	500mL	500mL	200mL

DRY TISSUE ANALYSIS

Nutrient	P4	P5	
Nitrate, Chloride	✓	✓	
Total Boron, Phosphorus, K, Ca, Mg, Na, Sulfur, Zn, Cu, Mn, Fe	✓	✓	
Total Carbon, Total Nitrogen	✓		
Optimal Levels and Traffic Light Charts on Reports	✓	✓	
	Price (excl. GST)	90.00	75.00
	Price (incl. GST)	99.00	82.50

Sample volumes required for this testing vary according to crop type and testing performed. Please contact us for advice or refer to our website for the Novum DT Sampling Guide:

<http://public.hortus.net.au/Services/Analytical/PlantSapandDryTissue.aspx>

FRUIT ANALYSIS

Element	FT1	FT2	FT3 (21%)	FT4 (23%)	FT5 (22%)	
pH, EC, Brix, K, Ca, Mg, Na, Si, Cl	✓	✓				
NO ₃ -N, PO ₄ -P, Zn, Fe, Mn, Cu, B, SO ₄ -S		✓				
Avocado Maturity Indicator 21% (e.g. Shepherd)			✓			
Avocado Maturity Indicator 23% (e.g. Hass)				✓		
Avocado Maturity Indicator 22% (e.g. Maluma)					✓	
Optimal Levels and Traffic Light Charts	✓	✓				
	Price (excl. GST)	62.27	100.00	62.27	62.27	62.27
	Price (incl. GST)	68.50	110.00	68.50	68.50	68.50

A minimum juice content of 200mL is required for the FT1 & FT2 fruit tests. Please contact the Novum Office on (07) 4132 5000 for details on fruit sample number requirements.

For Avocado Maturity samples – please provide a minimum of 5 whole avocado for testing.

COMBO PACKAGES

TEST CODES	C1	C2	C3	C4	C5	C6	C9	C10
IW3			✓					
S33				✓				
S6	✓	✓				✓	✓	
S7					✓			✓
P1	✓							
P2		✓	✓		✓			
P3						✓		
P4				✓				
P9							✓	✓
Price (excl. GST)	109.09	130.91	130.91	187.00	162.73	160.00	146.82	177.27
Price (incl. GST)	120.00	144.00	144.00	205.70	179.00	176.00	161.50	195.00

MAIN ROAD & TRANSPORT SOILS (MRTS 16 Landscape and Revegetation Works)

	MRTS 1	MRTS 2	MRTS 3	
Form C – Topsoil Testing	✓			
Form E – Subsoil Testing		✓		
Form D – Manufactured Site Topsoil Compliance Testing			✓	
	Price (excl. GST)	525.45	472.73	409.09
	Price (incl. GST)	578.00	520.00	450.00
Form B – Soil Assessment Report	Price (excl. GST)	130.00	130.00	130.00
	Price (incl. GST)	143.00	143.00	143.00
Minimum sample volume required	5kg	3kg	2kg	

ENVIRONMENTAL & FOOD SAFETY

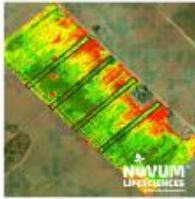
	Soil				Water			Produce		
	HMS1	HMS2	HMS3	CR006	HMW1	HMW2	CRO06	HMP1	CR006	CR007
Heavy Metal – 2 elements (Pb & Cd)								✓		
Heavy Metals – 3 elements (Pb, Hg & Cd)	✓									
Heavy Metals – 7 element screen		✓			✓					
Heavy Metals – 15 element screen			✓			✓				
Standard residue screen (OC & OP)				✓			✓		✓	
Extended residue test (C6 Screen)										✓
Price (excl. GST)	94.55	154.55	236.36	272.73	100.00	152.73	272.73	94.55	272.73	345.45
Price (incl. GST)	104.00	170.00	260.00	300.00	110.00	168.00	300.00	104.00	300.00	380.00
Minimum sample volume required	500g	500g	500g	500g	500mL	500mL	500mL	500g	1 kg	1 kg

HOUSEHOLD (DOMESTIC) WATER ANALYSIS

Nutrient	W2	W8	MA1	MA2
pH, Electrical Conductivity, Sodium, Chloride	✓	✓		
Nitrate, Phosphorus, Potassium, Calcium, Magnesium, Sulfate, Copper, Zinc, Boron, Manganese, Iron, SAR, Hardness, TDS	✓	✓		
Total Alkalinity, Temperature, Langelier Saturation Index		✓		
E.coli, Total Coliforms, Thermotolerant Coliforms and Heterotrophic Plate Count (22°C & 36°C)			✓	✓
Listeria spp. + Salmonella spp.				✓
Optimal Levels based on Aust. Drinking Water Guidelines	✓	✓		
Price (excl. GST)	100.00	131.82	145.45	187.73
Price (incl. GST)	110.00	145.00	160.00	206.50
Minimum sample volume required	500mL	500mL	500mL	500mL

ADDITIONAL FEES AND SERVICES

	Price (excl. GST)	Price (incl. GST)
Complete fertiliser recommendation - including Total element requirement, product selection and rates	34.55	38.00
Elemental Recommendation – proportional and total elemental requirement, including predicted nutrient removal for the target yield (available on Soil & Quicksoil samples only)	24.09	26.50
Sample Preparation – charged on samples outside the regular testing suites	14.55	16.00
Water interpretation – Comments regarding suitability / water quality	20.00	22.00
Sample Handling – charged on samples that require extended preparation (e.g. > 1 hr prep. Example Rocket, Lychee, Herbs)	50.00	55.00
Data Entry (Single) – charged on samples that are submitted without an electronic ARF (per sample)	5.45	6.00
Data Entry (Bulk) – charged on multiple samples that are submitted without an electronic ARF (multiple samples greater than 5)	22.72	25.00
Sample Washing – charged on samples that are submitted and need to be washed prior to preparation (per sample) - only on request	2.00	2.20
Admin Fee - charged on sample(s) submitted without an existing Hortus test code (covers submission & preparation fee)	10.00	11.00
Sample collection per block (not including travel)	42.95	47.25
Sample collection per hour	94.55	104.00
Consulting/ Monitoring by agronomist (per hour) including travel	120.00	132.00
Travel – return travel from Hortus office (per hour)	90.00	99.00
Stainless Steel Soil Corer with pusher (90cm)	340.00	374.00
Hand lenses	34.10	37.50
Digital LCD Meter pH Pen	24.00	26.40
Freight cost for postage of a box of sampling bags / bottles	25.00	27.50



Biofilm Crop Protection Price List

Prices valid from 1 February 2020
 Version 2



Regenerative Ag



Item Code	Description	RRP ex GST & ex Freight	Comparison Product	Function
Loli-Pepta™ 2L	Bacillus amyloliquefaciens 1x10 ⁹ cfu/ml	\$ 30.00	Bactoguard	Foliar diseases; Pre-emptive colonisation competitively excludes pathogens by forming a Biofilm Disease Shield. Multiple modes of action, inducing salicylic acid immune response.
Loli-Pepta™ 20L	Bacillus amyloliquefaciens 1x10 ⁹ cfu/ml	\$ 174.00		
Loli-Pepta™ 1000L	Bacillus amyloliquefaciens 1x10 ⁹ cfu/ml	\$ 8,500.00		
Rhizo-Max™ 2L	Bacillus Subtilis 1x10 ⁹ cfu/ml	\$ 30.00	Serenade	Nutrition; Rebuilds soil microflora, improving nutrient release and uptake and utilisation by the plant. Defends plant roots and acts as an immunostimulant.
Rhizo-Max™ 20L	Bacillus Subtilis 1x10 ⁹ cfu/ml	\$ 174.00		
Rhizo-Max™ 1000L	Bacillus Subtilis 1x10 ⁹ cfu/ml	\$ 8,500.00		
Squadron™ 20L	Pseudomonas Fluorescens 1x10 ⁹ cfu/ml	\$ 174.00	none	Plant growth promoting Rhizo-Bacterium (PGPRB). Competitive exclusion of broad range of pathogens, and production of secondary metabolites.
Squadron™ 1000L	Pseudomonas Fluorescens 1x10 ⁹ cfu/ml	\$ 8,500.00		
Nematafix™/Nematamax™ Duo 2L	Paecilomyces lilanicus /Verticillium chlamydosporum 1x10 ⁹ cfu/ml	\$ 36.00	none	Entomopathogenic fungi that infects and parasitises eggs, juveniles and young adults of most phytophagous nematode species. No resistance build up, good for IPM programmes.
Nematafix™/Nematamax™ Duo 20L	Paecilomyces lilanicus /Verticillium chlamydosporum 1x10 ⁹ cfu/ml	\$ 240.00		
Nematafix™/Nematamax™ Duo 1000L	Paecilomyces lilanicus /Verticillium chlamydosporum 1x10 ⁹ cfu/ml	\$ 9,000.00		
AspeN™ 2L	Azospirillum brasilense 1x10 ⁹ cfu/ml	\$ 30.00	Biostart N	Nitrogen fixing rhizosphere bacteria and PGPRB, increasing plant available Nitrogen. Produces healthier more vigorous plants and roots, and increases tolerance to abiotic and biotic stress.
AspeN™ 20L	Azospirillum brasilense 1x10 ⁹ cfu/ml	\$ 174.00		
AspeN™ 1000L	Azospirillum brasilense 1x10 ⁹ cfu/ml	\$ 8,500.00		

Item Code	Description	RRP ex GST & ex Freight	Comparison Product	Function
Endo-Grow™ 20kg	20kg 100 micron Wettable Powder with Silica, AspeN™ & Rhizomax™	\$ 180.00	none	A wettable powder formulation for crop establishment and mine site rehabilitation
Ento-Fix™ 20L	Lecanicillium lecanii 1x10 ⁹ cfu/ml	\$ 190.00	none	An entomopathogenic fungus or Mycoinsecticide, known to parasitise aphids, mealybug, thrips, whitefly (sucking insect pests)
Endo-Fight™ 2L	3-in-1 pre-mixed formulation	\$ 35.00	Microplus	3-in-1 post fermentation comprehensive blend of beneficial biology
Endo-Fight™ 20L	3-in-1 pre-mixed formulation	\$ 190.00		3-in-1 post fermentation comprehensive blend of beneficial biology
Endo-Fight™ 20L	5-in-1 pre-mixed formulation	\$ 190.00		5-in-1 post fermentation comprehensive blend of beneficial biology
Mycorrhiza™ 1kg	Vesicular Arbuscular Mycorrhizae	\$ 55.00		(VAM) grow as minute hyphae attaching to plant roots, increases nutrient uptake and drought tolerance; help with liquid carbon pathway resulting in improved soil structure and diversity.
Mycorrhiza™ 20kg	Vesicular Arbuscular Mycorrhizae	\$ 1,000.00		
Trichomight™ 1kg	Trichoderma harzanium	\$ 78.00		Rhizosphere, fuzarium, phytopthera, potent biocontrol agent and used extensively for soil born diseases.
DiaSil™ Ultra Fine 4kg Bag	Diatamaceous Earth Amorphous Silica Powder 10 micron -26% Si	\$ 24.00		Organic diatamaceous earth micronised to 10 micron. Lacerates exoskeleton of crawling insects, whilst silica fortifies cell walls from the inside out. Silica can help with bigger stalks and stems, and increased resistance to environmental stress.
DiaSil™ Ultra Fine 12.5kg Bag	Diatamaceous Earth Amorphous Silica Powder 10 micron -26% Si	\$ 72.00		
DiaSil™ Fine 20kg Bag	Diatamaceous Earth Amorphous Silica Powder 100 micron 26% Si	\$ 104.00		