

# AminoElite®

## LIQUID NUTRIENT FERTILISER

A microbial digested blend of amino acids with macro/micro nutrients



## INTRODUCTION

**AminoElite®** is a foliar fertiliser produced by a unique microbial digestion process, which involves the breakdown of sea fish and crustaceans, into a form in which plants can rapidly absorb the available nutrients through their foliage or through their root system.

This unique process used to manufacture AminoElite® and developed through 30 years of R&D, allows us to preserve beneficial microbes and creates nutrients in the form of absorbable amino acids.

Plants will rapidly absorb these nutrients in a noticeably shorter time frame than with conventional fertilisers.

### WHY AMINOELITE® WORKS SO WELL

Unlike most other liquid protein sources AminoElite® is produced via a unique ambient (room) temperature process. This process involves bacterial digestion, which preserves the protein molecules.

In doing so beneficial microbes are unharmed and continue to increase over time. Microbes will improve your soil biology as well as your plant nutrition.

### IMPORTANCE OF AMINO ACIDS & TRACE ELEMENTS

Amino Acids are the essential building blocks for protein formation. AminoElite® has a series of L shaped Amino Acids. These Amino Acids are good chelating agents, which facilitates nutrient absorption through the foliar surface and through the root system, transporting nutrients more efficiently throughout the plant.

Most soils have deficiencies of trace elements. Through chelation, the Amino acids in AminoElite® will help plants with the absorption of these micronutrients. It will provide organic nitrogen to your plant and soil and beneficial microbes to your soil.

### INCLUSION OF CRUSTACEANS

Deep sea crustaceans are a good source of Chitin. The presence of Chitin and the enzyme Chitinase, enhance the immune system of the plant.

### AMINO ACID (AA) ANALYSIS (MG/L) AND BENEFITS

AminoElite® contains minimum 3.5% (w/v) Amino Acids with the approximate composition of:

AA		Metabolic functions of AA
Aspartic Acid	5%:	Seed germination
Threonine	2.5%:	Improve drought tolerance
Serine	4.5%:	Chlorophyll production, Stomata regulation, Improve Pollination
Glutamic Acid	10%:	Chlorophyll production, stomata regulation, pollination, seed germination
Proline	9%:	Heat, Salt and Drought tolerance
Glycine	27.5%:	Chelation, Heat tolerance, Chlorophyll production
Alanine	12.5%:	Chlorophyll production, seed germination
Valine	4.5%:	Drought tolerance, seed germination
Methionine	0.2%:	Ripening, stomata regulation
Isoleucine	3%:	Salt and Drought tolerance, Pollination
Leucine	5.5%:	Salt and Drought tolerance, Pollination
Phenylalanine	0.8%:	Plant reproduction, development, and defence against stresses
Histidine	1%:	Aids fruit ripening
Lysine	5.7%:	Chlorophyll production, seed germination
Arginine	4.8%:	Root development, induces Flowering and Fruiting Hormones
Hydroxyproline	5%:	Defence against Pathogens attack Water movement through the plant

• Being a microbial product the concentration of the different amino acids may vary.

## BENEFITS OF USING AMINOELITE

- Healthy plants are better able to resist environmental stresses such as pests, disease and extreme weather conditions.
- The current balance of Micro and Macro nutrients will aid the plants ability to produce uniformity in fruit size, colour and shape.
- Microbes including bacteria help supply organic nitrogen to the plant and soil.
- AminoElite® can enhance the uptake and assimilation of trace minerals to rapidly correct minor micronutrient deficiencies.
- Improving soil microbial activity can aid the reduction of bulk fertilisers use and assist with unlocking built up nutrients.
- AminoElite® has a Nil withholding period.

## OPTIMISING RESULTS

Use with GrowGreen's Xtend® plant oil adjuvant for optimum results. Xtend® will maximise the result by reducing drift and increasing adherence to the sprayed surface.

## SHELF LIFE & STORAGE

- 12 months from the manufacturing date.
- AminoElite® should be stored at ambient temperature.
- Should be stored in a well lit area so the microbial process continues.

## COMPATIBILITY & USE

AminoElite® can be mixed and applied with most commonly used pesticides.

We strongly recommend checking labels for compatibility as well as pre testing in a small area prior to widespread application.

AminoElite® is rainfast in 15 minutes. We suggest not applying if rain is expected shortly after application.

## PACKAGING

AminoElite® is available in the following containers:

- 20L and 1000L

## GrowGreen Pty Ltd

6089 Cunningham Hwy, Kalbar, Qld 4309

GrowGreen Pty Ltd makes no express or implied warranty regarding the storage, handling, use or results obtained from using this product (excluding statutory warranties).

## ANALYSIS (W/V)

Nutrient	Form	Analysis (W/V)
Nitrogen (N)	as protein	1.10%
	as nitrate	0.20%
	as urea	1.80%
	as ammonium	0.20%
	TOTAL	3.30%
Phosphorus (P)	as water soluble	0.70%
Potassium (K)	as protein	0.30%
	as phosphate	0.20%
	TOTAL	0.50%
Sulphur (S)	as sulphate	0.55%
Calcium (Ca)	as nitrate	0.20%
Magnesium (Mg)	as sulphate	0.02%
Zinc (Zn)	as sulphate	0.10%
Manganese (Mn)	as sulphate	0.025%
Iron (Fe)	as sulphate	0.005%
Boron (B)	as sodium borate	0.04%
Molybdenum (Mo)	as sodium molybdate	0.01%
Cobalt (Co)	as sulphate	0.0025%

## APPLICATION RATES

AminoElite® is suitable to use on a wide range of horticultural crops - for example tomatoes, grapes, almonds, walnuts, citrus, bananas, mangoes, apples and many other vegetables.

Crop	App. Rate/ha	No. of applications
Horticultural crops	1.5 - 2ltrs	3-4 foliar applications; pre flowering, post flowering & fruit enlargement stage
Broad acre winter crops	1.5 - 2ltrs	Liquid injection at seed sowing stage, 2 foliar applications (mid tillering & booting - grain filling stage)
Broad acre summer crops	1.5 - 2ltrs	2-3 foliar applications; pre flowering, post flowering & grain filling stage
Annual & perennial pasture	2 - 3ltrs	3-4 foliar applications post grazing

### To be diluted in a minimum of 100L of water/ha

- We recommend to foliar spray to point of run off. Application rates may vary depending on soil and leaf analysis. The above should be used as a guide only.

### Avoid spraying in high temperatures and high UV.

For information about specific application rates, please contact our technical staff.

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Email: sales@growgreen.com.au | [www.growgreenfertiliser.com](http://www.growgreenfertiliser.com)