

FAST - G R O W

WATER SOLUBLE FERTILIZERS
FOR INTEGRATED NUTRITION

Complete series of fertilizers
for the cover of the plant needs
in all their growth stages

Produced by

HUMOFERT



1 Ermou & Theotokopoulou str., 144 52 Metamorphosis, Greece
Tel.+30 210 284 5891, Fax. +30 210 281 7971 Web Site: www.humofert.gr E-mail: info@humofert.gr

NITROGEN (N)

Nitrogen is a structural component of the nucleic acids (DNA, RNA) and the proteins. These biological megamolecules are part of all the living tissues and therefore they render nitrogen an essential element for the plant growth.

PHOSPHORUS (P)

Phosphorus is a structural component of the genetic material (DNA) of the plants. It is involved in the synthesis of the cellular membranes and the energy molecules of the plants as well as in the photosynthesis, in the cellular respiration and in the storage and transport of energy inside the plant.

POTASSIUM (K)

Potassium assists plants in resisting drought, frost and high temperatures since it regulates the opening of the leaf stomata. It also elongates the shelf life of fruits. Furthermore, it assists flowers to form more vivid colors. Finally, it improves the size and the quality of the fruits.

MAGNESIUM (Mg)

Magnesium is required for the main function of plants, photosynthesis since it is the central ion of the chlorophyll molecule. Additionally, magnesium stimulates the protein synthesis and assists in the utilization and transport of phosphorus inside the plant while it is a component of many enzymes.

IRON (Fe)

Iron promotes the formation of chlorophyll and that is the reason young tissues have high needs in iron. It acts as an oxygen carrier and as a result it is involved in the cellular respiration of plant cells.

MANGANESE (Mn)

Manganese is a part of the enzymic systems which are vital for the cellular respiration of plants and photosynthesis. It increases the availability of iron, phosphorus and calcium.

ZINC (Zn)

The presence of zinc is necessary for the synthesis of auxins which promote the growth and development of plants.

BORON (B)

Boron is essential for the transport of sugars inside the plants and also for the formation of the cell wall. Furthermore, it regulates cell divisions.

COPPER (Cu)

Copper is a catalyst in the procedures of photosynthesis and respiration.

MOLYBDENUM (Mo)

Molybdenum is essential for the formation of the enzyme that converts nitrate ions into ammonium ions inside the plant, ensuring the utilization of nitrogen by plants.



20 - 20 - 20

The type 20-20-20 is the most famous balanced fertilizer. It contains the main nutrients (nitrogen, phosphorus and potassium) in the same proportion. It can be used throughout the whole growing season of the plants and it can be applied on a variety of crops.

10 - 50 - 10

The type 10-50-10 is a high phosphate fertilizer. It is recommended for the improvement of rooting and therefore its application is recommended on seedlings and during transplanting. The use of 10-50-10 produces a very healthy and vigorous root system and also enhances blooming.

5 - 10 - 40 + 1.5%MgO

The type 5-10-40 is a high potassium fertilizer. It improves the coloring and the flavor of fruits while elongating their shelf life. Its application in ornamental plants offers more vivid colors and intense scents.

30 - 10 - 10 + 2%MgO

The fertilizer 30-10-10 + 2% MgO is a nitrogen fertilizer that contains magnesium. Since it is a nitrogen fertilizer it is recommended to be applied in the initial growth stages. Furthermore due to the contained magnesium it can also be applied in the latter growth stages.

6 - 12 - 36 + 3%MgO

This type represents a high potassium fertilizer which contains magnesium. Potassium improves the quality of the yield while magnesium fortifies the photosynthetic rhythm and as a result healthier and higher yielding plants are produced.

15 - 10 - 29 + 2.5%MgO

The type 15-10-29 + 2.5% MgO assists crops during the stage of blooming. Since it is rich in nitrogen it promotes plant growth during harvest. The contained magnesium contributes to the maintenance of the plant vigour.

19 - 19 - 19

The fertilizer 19-19-19 is also a balanced fertilizer and is an economical solution in this category of fertilizers. It contains 19% nitrogen, 19% phosphorus and 19% potassium. Due to its balanced synthesis, it can be applied in all growth stages of the plants.

30 - 10 - 10

This type is a nitrogen fertilizer. The requirements of a plant in nitrogen increase as the plant grows. Nitrogen stimulates the early growth of seedlings, increases the germination of plants, enhances their vigour and also fortifies their resistance against frost.

15 - 30 - 15

This type is a phosphate fertilizer. It is applied mainly when we desire good growth and establishment of the root system in the soil. It is also recommended to be applied just prior or during blooming since phosphorus promotes the formation and growth of flowers.

10 - 20 - 30

The type 10-20-30 is a phosphorus potassium fertilizer. Phosphorus increases the size of fruits while potassium increases the content of fruits in sugars enhancing therefore their qualitative characteristics. As a consequence its application is recommended before fruiting and during harvest.

SYNTHESIS	20-20-20	19-19-19	30-10-10	10-50-10	15-30-15	10-20-30	5-10-40+ 1.5%MgO	30-10-10+ 2%MgO	6-12-36+ 3%MgO	15-10-29+ 2.5%MgO
Nitrogen	20.0%	19.0%	30.0%	10.0%	15.0%	10.0%	5.0%	30.0%	6.0%	15.0%
Nitrate nitrogen	5.7%	5.4%	2.8%	0.7%	4.3%	5.2%	3.0%	2.8%	4.3%	8.2%
Ammonium nitrogen	4.0%	8.2%	5.7%	9.3%	8.4%	4.6%	2.0%	4.2%	1.7%	3.3%
Urea nitrogen	10.3%	5.4%	21.2%	0.0%	2.3%	0.2%	0.0%	23.0%	0.0%	3.5%
Phosphorus	20.0%	19.0%	10.0%	50.0%	30.0%	20.0%	10.0%	10.0%	12.0%	10.0%
Potassium	20.0%	19.0%	10.0%	10.0%	15.0%	30.0%	40.0%	10.0%	36.0%	29.0%
Magnesium	0.0%	0.0%	0.0%	0.0%	0.0%	0.0%	1.5%	2.0%	3.0%	2.5%
Sulphur	0.0%	3.0%	2.6%	1.9%	2.9%	4.8%	10.1%	1.6%	8.4%	2.3%

All the types of Fast Grow water soluble fertilizers contain the following trace elements:

Iron	(EDTA)	500 ppm	Copper	(EDTA)	250 ppm
Manganese	(EDTA)	250 ppm	Boron	(soluble)	100 ppm
Zinc	(EDTA)	250 ppm	Molybdenum	(soluble)	10 ppm

Note: Additional types of fertilizers are available upon request





***For every growth stage and every crop,
there is the appropriate type of Fast Grow
fertilizer that will cover the needs of your plants***

General Application Rates
Fertigation: 10-30 kg per ha
Foliar spray: 2 kg per 500 l of water

PACKAGES		
25 kg PE bag	2 kg Al Foil Bag	1 kg Al Foil Bag
Pallet of 40 bags	Box of 10 bags	Box of 20 bags

		20-20-20	19-19-19	30-10-10	10-50-10	15-30-15	10-20-30	5-10-40+ 1.5% MgO	6-12-36+ 3% MgO	15-10-29+ 2.5% MgO	30-10-10+ 2% MgO
pH	1 %	5.17	6.78	5.18	4.58	4.87	5.10	4.05	4.00	6.75	4.55
	10 %	4.62	6.50	4.80	4.13	4.41	4.64	3.79	3.80	5.95	3.89
Conductivity	1.0 g/l	0.98	1.35	0.96	1.16	1.26	1.41	1.34	1.38	1.60	1.00
	10.0 g/l	8.04	10.91	9.89	9.94	9.79	11.18	11.09	11.87	12.10	6.26