PhytoTechnology Laboratories®



"Helping To Build A Better Tomorrow Through Plant Science"™

Product Information Sheet

СІ - ОСН₂ - С - ОН

C213

ρ-Chlorophenoxyacetic Acid

Synonym: CPA; 4-Chlorophenoxyacetic Acid

CAS: 122-88-3Formula: $C_8H_7CIO_3$ Molecular Wt: 186.59

Properties

Form: Powder

Appearance: Cream to Tan Powder

Application: Auxin Solubility: KOH

Typical Working

Concentration: Varies by application, should be determined by end user.

Storage Temp: Room Temperature

Storage Temp of

Stock Solution: 2 to 6° C

Other Notes: Plant Tissue Culture Tested

Application Notes

4-chlorophenoxy acetic acid (4-CPA), a chlorine derivative of phenoxyacetic acid (PA), is a synthetic plant growth regulator.

It is an auxin-like plant growth regulator, absorbed by plant via root, stem, leaf, bloom and fruit. It is used to prevent abscission of bloom and fruit, inhibit rooting of beans, promote fruit set, induce formation of seedless fruit. Also used for ripening and fruit thinning. It performs better when used in combination with 0.1% monopotassium phosphate. It also has herbicidal effect at high dosage.

Has been shown to increase fruit size in tomatoes, moreso than other common plant growth regulators such as BA & GA_{4+7} (van Tonder & Combrink, 2003).

References

van Tonder, CSM & NJJ Combrink (2003) The effect of plant-growth regulators on the production of out-of-season greenhouse tomatoes (*Lycopersicum esculentum*), S. Afr. J. Plant Soil, 20:4, 165-168, DOI: 10.1080/02571862.2003.10634929.

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