PhytoTechnology Laboratories®



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

Product Information Sheet

CH₃(CH₂)₂₈CH₂OH

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T818 1-Triacontanol

Synonym:	1-Hydroxytriacontane; Melissyl Alcohol
CAS:	593-50-0
Formula:	C ₃₀ H ₆₂ O
Molecular Wt:	438.82

Properties	
Form:	Powder
Appearance:	Off-white to Beige
Application:	Plant Growth Regulator
Solubility:	Soluble in Hot EtOH at 1 mg/mL
Typical Working Concentration:	Varies with application. Consult the scientific literature.
Storage Temp:	2 to 6° C
Storage Temp of Stock Solution:	0 to -20° C; little long-term solution stability information is available.
Other Notes:	Plant Tissue Culture Tested

Application Notes

Triacontanol (TRIA) is a naturally occurring plant growth promotor that can be found in the epicuticular waxes of many types of plants (Malabadi et al., 2005). TRIA has been reported to increase the growth, yield and photosynthesis of plants (Naeem et al., 2012).

Please Note: While *Phyto*Technology Laboratories[™] tests each lot of this product with two or more plant cell/ tissue culture lines, it is the sole responsibility of the purchaser to determine the appropriateness of this product for the specific plants that are being cultured and applications that are being used.

References

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- Naeem M., M. Masroor A. Khan, Moinuddin, M. Idrees and T. Aftab (2011) Triacontanolmediated regulation of growth and other physiological attributes, active constituents and yield of *Mentha arvensis* L. *Plant Growth Regulation* 65(1), Pp.195-206. DOI: 10.1007/s10725-011-9588-8.

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- Naeem M., M.M.A. Khan & Moinuddin (2012) Triacontanol: a potent plant growth regulator in agriculture. *Journal of Plant Interactions* 7(2), Pp. 129-142. DOI:10.1080/17429145.2011.619281.
- Rakesh K., Saravanan S., Bakshi Parshant, Srivastava J.N. (2011) Influence of plant growth regulators on growth, yield and quality of strawberry (*Fragaria x ananassa Duch*) cv. Sweet Charlie. *Progressive Horticulture*, 43(2), pp. 264-267.
- Singh M., M.M.A. Khan, Moinuddin & M. Naeem (2012) Augmentation of nutraceuticals, productivity and quality of ginger (*Zingiber officinale* Rosc.) through triacontanol application. *Plant Biosystems*, 146(1).
- Verma A., C.P. Malik, V.K. Gupta and B.K. Bajaj (2012) Effects of in vitro triacontanol on growth, antioxidant enzymes, and photosynthetic characteristics in *Arachis hypogaea* L. *Braz. J. Plant Physiol.*, 23(4): 271-277.

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