

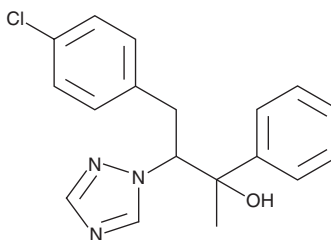
# PRODUCT INFORMATION



## Brassinazole

Item No. 16804

CAS Registry No.: 224047-41-0  
Formal Name:  $\beta$ -[[4-chlorophenyl)methyl]- $\alpha$ -methyl- $\alpha$ -phenyl-1H-1,2,4-triazole-1-ethanol  
MF:  $C_{18}H_{18}ClN_3O$   
FW: 327.8  
Purity:  $\geq 98\%$   
Supplied as: A crystalline solid  
Storage:  $-20^{\circ}\text{C}$   
Stability:  $\geq 4$  years



Information represents the product specifications. Batch specific analytical results are provided on each certificate of analysis.

### Laboratory Procedures

Brassinazole is supplied as a crystalline solid. A stock solution may be made by dissolving the brassinazole in the solvent of choice, which should be purged with an inert gas. Brassinazole is soluble in organic solvents such as ethanol, DMSO, and dimethyl formamide (DMF). The solubility of brassinazole in these solvents is approximately 25, 50, and 100 mg/ml, respectively.

Brassinazole is sparingly soluble in aqueous buffers. For maximum solubility in aqueous buffers, brassinazole should first be dissolved in DMF and then diluted with the aqueous buffer of choice. Brassinazole has a solubility of approximately 0.5 mg/ml in a 1:1 solution of DMF:PBS (pH 7.2) using this method. We do not recommend storing the aqueous solution for more than one day.

### Description

Brassinosteroids are a class of phytohormones with essential roles in plant growth and development, including the promotion of stem elongation and cell division. Brassinazole, a triazole derivative, is an inhibitor of brassinosteroid biosynthesis that has been developed in order to probe the myriad functions of brassinosteroids. At 1  $\mu\text{M}$ , it can induce morphological changes, including dwarfism and altered leaf color and curling, in dark-grown *Arabidopsis* and light-grown cress that are rescued by co-application of a brassinosteroid.<sup>1</sup>

### Reference

1. Asami, T., Min, Y.K., Nagata, N., *et al.* Characterization of brassinazole, a triazole-type brassinosteroid biosynthesis inhibitor. *Plant Physiol.* **123**(1), 93-100 (2000).

#### WARNING

THIS PRODUCT IS FOR RESEARCH ONLY - NOT FOR HUMAN OR VETERINARY DIAGNOSTIC OR THERAPEUTIC USE.

#### SAFETY DATA

This material should be considered hazardous until further information becomes available. Do not ingest, inhale, get in eyes, on skin, or on clothing. Wash thoroughly after handling. Before use, the user must review the complete Safety Data Sheet, which has been sent via email to your institution.

#### WARRANTY AND LIMITATION OF REMEDY

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#### CAYMAN CHEMICAL

1180 EAST ELLSWORTH RD  
ANN ARBOR, MI 48108 · USA

PHONE: [800] 364-9897  
[734] 971-3335

FAX: [734] 971-3640

CUSTSERV@CAYMANCHEM.COM  
WWW.CAYMANCHEM.COM