

# Deltamethrin, Calcineurin inhibitor; Displays neurotrophic activity

Catalog	Unit
TBI3103-5MG	5 mg
TBI3103-25MG	25 mg

## **Product Details**

Formal Name: (S)-α-Cyano-3-phenoxybenzyl (1R, 3R)-3-(2,2-dibromovinyl)-2,2-dimethylcyclopropanecarboxylate

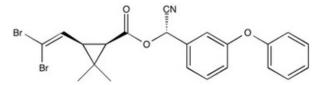
**Alternate Names:** Decamethrin **Molecular Formula:** C<sub>22</sub>H<sub>19</sub>Br<sub>2</sub>NO<sub>3</sub>

Formula Weight: 505.20 CAS Number: 52918-63-5

**Purity:** >98% **Formulation:** powder

**Solubility:** Soluble in DSMO (up to 50 mg/ml)

**Storage:**  $-20^{\circ}$ C **Stability:**  $\geq 1$  year.



### **Applications**

Calcineurin inhibitor; Displays neurotrophic activity

#### **Functions**

Deltamethrin is reported to be an inhibitor of calcineurin (PP2B), IC50~100 pM but this activity has been disputed. Markedly enhances the expression of BDNF in cultured rat cortical neurons and displays neurotrophic effects. Produces antidepressant-like effects in mice. Blocks the spontaneous down-regulation of Nav1.8 sodium channels expressed in Xenopus oocytes.

#### **Application Procedures**

First dissolved in DSMO (up to 50 mg/ml), then diluted to aqueous buffer. Solutions in DMSO may be stored at -20°C for up to 1 month.

For research use only.