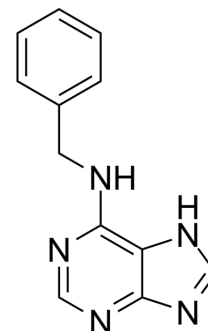


## 6-Benzylaminopurine

<b>Cat. No.:</b>	HY-B0941		
<b>CAS No.:</b>	1214-39-7		
<b>Molecular Formula:</b>	C <sub>12</sub> H <sub>11</sub> N <sub>5</sub>		
<b>Molecular Weight:</b>	225.25		
<b>Target:</b>	Endogenous Metabolite		
<b>Pathway:</b>	Metabolic Enzyme/Protease		
<b>Storage:</b>	Powder	-20°C	3 years
		4°C	2 years
	In solvent	-80°C	2 years
		-20°C	1 year



### SOLVENT & SOLUBILITY

<b>In Vitro</b>	DMSO : 50 mg/mL (221.98 mM; Need ultrasonic)					
		Solvent Concentration	Mass	1 mg	5 mg	10 mg
	<b>Preparing Stock Solutions</b>	1 mM		4.4395 mL	22.1976 mL	44.3951 mL
		5 mM		0.8879 mL	4.4395 mL	8.8790 mL
10 mM			0.4440 mL	2.2198 mL	4.4395 mL	
Please refer to the solubility information to select the appropriate solvent.						
<b>In Vivo</b>	<ol style="list-style-type: none"> <li>Add each solvent one by one: 10% DMSO &gt;&gt; 40% PEG300 &gt;&gt; 5% Tween-80 &gt;&gt; 45% saline Solubility: ≥ 2.5 mg/mL (11.10 mM); Clear solution</li> <li>Add each solvent one by one: 10% DMSO &gt;&gt; 90% (20% SBE-β-CD in saline) Solubility: ≥ 2.5 mg/mL (11.10 mM); Clear solution</li> <li>Add each solvent one by one: 10% DMSO &gt;&gt; 90% corn oil Solubility: ≥ 2.5 mg/mL (11.10 mM); Clear solution</li> </ol>					

### BIOLOGICAL ACTIVITY

<b>Description</b>	6-Benzylaminopurine (Benzyladenine) is the first cytokinin that causes plant growth and development by stimulating cell division and inhibiting respiratory kinases, thereby prolonging the preservation of green vegetables <sup>[1]</sup> .
<b>In Vivo</b>	6-Benzylaminopurine (100 μM, when the cotyledons were fully expanded and the first true leaf was just emerged, each seedling was sprayed every other day until it reached 5-true-leaf stage. Then, each plant was sprayed twice per week until fruit set) results in an increase in wart density by 107.8% in Cshc2 knockout fruits of cucumber <sup>[1]</sup> . MCE has not independently confirmed the accuracy of these methods. They are for reference only.

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## CUSTOMER VALIDATION

- Autophagy. 2022 Nov 30.
- Plant Physiol. 02 August 2021.

See more customer validations on [www.MedChemExpress.com](http://www.MedChemExpress.com)

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## REFERENCES

[1]. Wang Z, et al. HECATE2 acts with GLABROUS3 and Tu to boost cytokinin biosynthesis and regulate cucumber fruit wart formation. Plant Physiol. 2021 Nov 3;187(3):1619-1635.

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**Caution: Product has not been fully validated for medical applications. For research use only.**

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