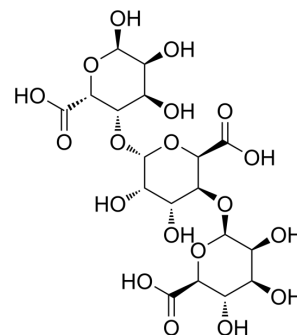


Alginate acid

Cat. No.:	HY-W127758
CAS No.:	9005-32-7
Molecular Formula:	C ₁₈ H ₂₆ O ₁₉
Molecular Weight:	546.39
Target:	Apoptosis; Autophagy; Histamine Receptor; Endogenous Metabolite
Pathway:	Apoptosis; Autophagy; GPCR/G Protein; Immunology/Inflammation; Neuronal Signaling; Metabolic Enzyme/Protease
Storage:	Powder -20°C 3 years 4°C 2 years In solvent -80°C 6 months -20°C 1 month



SOLVENT & SOLUBILITY

In Vitro

H₂O : 3.03 mg/mL (5.55 mM; ultrasonic and adjust pH to 12 with 1M NaOH)

	Solvent Concentration	Mass	1 mg	5 mg	10 mg
Preparing Stock Solutions	1 mM		1.8302 mL	9.1510 mL	18.3019 mL
	5 mM		0.3660 mL	1.8302 mL	3.6604 mL
	10 mM		---	---	---

Please refer to the solubility information to select the appropriate solvent.

BIOLOGICAL ACTIVITY

Description	Alginate acid is a natural polysaccharide, which has been widely concerned and applied due to its excellent water solubility, film formation, biodegradability and biocompatibility. Alginate acid induces oxidative stress-mediated hormone secretion disorder, apoptosis and autophagy in mouse granulosa cells and ovaries. Alginate acid has an inhibitory effect on histamine release. Anti-anaphylactic and anti-inflammatory properties ^{[1][2][3]} .
IC ₅₀ & Target	Human Endogenous Metabolite
In Vitro	Alginate acid (AA) is a kind of polysaccharide extracted from brown seaweeds and has been widely used in food industry ^[2] . MCE has not independently confirmed the accuracy of these methods. They are for reference only.

REFERENCES

[1]. Guo X, et al. Structures, properties and application of alginate acid: A review. Int J Biol Macromol. 2020;162:618-628.

[2]. Cui J, et al. Alginic acid induces oxidative stress-mediated hormone secretion disorder, apoptosis and autophagy in mouse granulosa cells and ovaries. Toxicology. 2022;467:153099.

[3]. Jeong HJ, et al. Alginic acid has anti-anaphylactic effects and inhibits inflammatory cytokine expression via suppression of nuclear factor-kappaB activation. Clin Exp Allergy. 2006;36(6):785-794.

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

Tel: 609-228-6898

Fax: 609-228-5909

E-mail: tech@MedChemExpress.com

Address: 1 Deer Park Dr, Suite Q, Monmouth Junction, NJ 08852, USA