

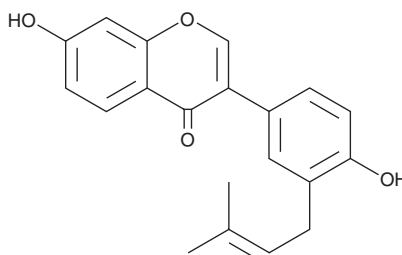
PRODUCT INFORMATION



Neobavaisoflavone

Item No. 19852

CAS Registry No.: 41060-15-5
Formal Name: 7-hydroxy-3-[4-hydroxy-3-(3-methyl-2-buten-1-yl)phenyl]-4H-1-benzopyran-4-one
MF: C₂₀H₁₈O₄
FW: 322.4
Purity: ≥98%
UV/Vis.: λ_{max}: 249 nm
Supplied as: A crystalline solid
Storage: -20°C
Stability: ≥4 years



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

Laboratory Procedures

Neobavaisoflavone is supplied as a crystalline solid. A stock solution may be made by dissolving the neobavaisoflavone in the solvent of choice, which should be purged with an inert gas. Neobavaisoflavone is soluble in organic solvents such as ethanol, DMSO, and dimethyl formamide (DMF). The solubility of neobavaisoflavone in these solvents is approximately 1, 10, and 20 mg/ml, respectively.

Neobavaisoflavone is sparingly soluble in aqueous buffers. For maximum solubility in aqueous buffers, neobavaisoflavone should first be dissolved in DMF and then diluted with the aqueous buffer of choice. Neobavaisoflavone has a solubility of approximately 0.1 mg/ml in a 1:4 solution of DMF:PBS (pH 7.2) using this method. We do not recommend storing the aqueous solution for more than one day.

Description

Neobavaisoflavone is a natural isoflavone that was first isolated from seeds of *P. corylifolia*, which are used in traditional herbal medicine to treat various skin diseases. Neobavaisoflavone has been found to have diverse effects in isolated mammalian cells, including inhibiting DNA polymerase and carboxylesterase 1 (K_i = 5.3 μM).^{1,2} It also displays antibiotic activity against Gram-negative multidrug resistant bacteria.³

References

1. Sun, N. J., Woo, S. H., Cassady, J. M., et al. DNA polymerase and topoisomerase II inhibitors from *Psoralea corylifolia*. *Journal of Natural Products* **61**, 362-366 (1998).
2. Sun, D. X., Ge, G. B., Dong, P. P., et al. Inhibition behavior of fructus psoraleae's ingredients towards human carboxylesterase 1 (hCES1). *Xenobiotica* **46**(6), 503-510 (2016).
3. Mbaveng, A. T., Sandjo, L. P., Tankeo, S. B., et al. Antibacterial activity of nineteen selected natural products against multi-drug resistant Gram-negative phenotypes. *SpringerPlus* **4**:823 (2015).

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

Buyer agrees to purchase the material subject to Cayman's Terms and Conditions. Complete Terms and Conditions including Warranty and Limitation of Liability information can be found on our website.

Copyright Cayman Chemical Company, 10/28/2022

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