

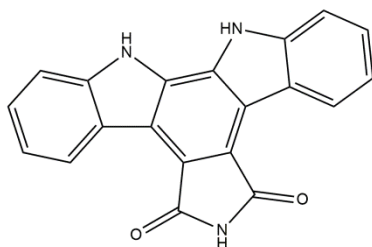
Arcyriaflavin A

08/19

ALTERNATE NAMES: 12,13-Dihydro-5H-indolo[2,3-a]pyrrolo[3,4-c]carbazole-5,7(6H)-dione; 6,7,12,13-Tetrahydro-5,7-dioxo-5H-indolo[2,3-a]pyrrolo[3,4-c]carbazole; 3,13,23-triazahexacyclo[14.7.0.0^{2,10}.0^{4,9}.0^{11,15}.0^{17,22}]tricoso-1,4,6,8,10,15,17,19,21-nonaene-12,14-dione

CATALOG #: B2902-1 1 mg
B2902-5 5 mg

STRUCTURE:



MOLECULAR FORMULA: C₂₀H₁₁N₃O₂

MOLECULAR WEIGHT: 325.32

CAS NUMBER: 118458-54-1

APPEARANCE: A crystalline solid

PURITY: ≥95%

SOLUBILITY: ~1 mg/ml in DMSO
~5 mg/ml in DMF

DESCRIPTION: Arcyriaflavin A inhibits cyclin-dependent kinase 4 (CDK4) with an IC₅₀ of 140 nM. It inhibits calcium/calmodulin-dependent protein kinase II (CaMKII) with an IC₅₀ of 25 nM. It inhibits the replication of human cytomegalovirus (HCMV) in vitro, with an IC₅₀ of 200 nM. It also inhibits proliferation and induces apoptosis of endometriotic stromal cells.

STORAGE TEMPERATURE: -20°C

HANDLING: Do not take internally. Wear gloves and mask when handling the product! Avoid contact by all modes of exposure.

REFERENCES:

- Slater, M.J., Cockerill, S., Baxter, R., et al. Indolocarbazoles: Potent, selective inhibitors of human cytomegalovirus replication. *Bioorg. Med. Chem.* 7(6), 1067-1074 (1999).
- Sanchez-Martinez, C., Shih, C., Faul, M.M., et al. Aryl[a]pyrrolo[3,4-c]carbazoles as selective cyclin D1-CDK4 inhibitors. *Bioorg. Med. Chem. Lett.* 13(21), 3835-3839 (2003).
- Hirakawa, T., Nasu, K., Aoyagi, Y., et al. Arcyriaflavin a, a cyclin D1-cyclin-dependent kinase4 inhibitor, induces apoptosis and inhibits proliferation of human endometriotic stromal cells: A potential therapeutic agent in endometriosis. *Reprod. Biol. Endocrinol.* 15(1), 53 (2017).

RELATED PRODUCTS:

Riviciclib hydrochloride (Cat. No. B2567)
 Roscovitine (Cat. No. 1950)
 LY-2835219 (Cat. No. B1039)
 AMG-925 (Cat. No. B1959)
 Ribociclib (LEE011) (9481)

DISCLAIMER: *FOR RESEARCH USE ONLY! Not to be used on humans.*