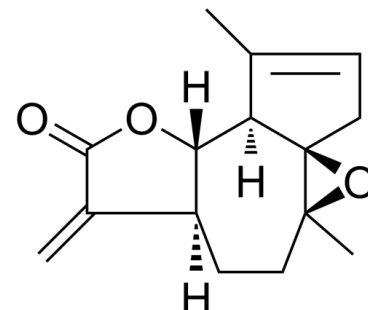


## Data Sheet

<b>Product Name:</b>	Arglabin
<b>Cat. No.:</b>	CS-3012
<b>CAS No.:</b>	84692-91-1
<b>Molecular Formula:</b>	C <sub>15</sub> H <sub>18</sub> O <sub>3</sub>
<b>Molecular Weight:</b>	246.30
<b>Target:</b>	Autophagy; Farnesyl Transferase; NOD-like Receptor (NLR)
<b>Pathway:</b>	Autophagy; Immunology/Inflammation; Metabolic Enzyme/Protease
<b>Solubility:</b>	DMSO : ≥ 100 mg/mL (406.01 mM)



### BIOLOGICAL ACTIVITY:

Arglabin ((+)-Arglabin), a natural product isolated from *Artemisia glabella*, is a **NLRP3 inflammasome** inhibitor. Arglabin shows anti-inflammatory and antitumor activities<sup>[1]</sup>. The antitumor activity of Arglabin proceeds through its inhibition of farnesyl transferase which leads to the activation of RAS proto-oncogene<sup>[2]</sup>. **In Vitro:** The antitumor activity of arglabin proceeds through its inhibition of farnesyl transferase which leads to the activation of RAS proto-oncogene, a process that is believed to play a pivotal role in 20-30% of all human tumors. It actually inhibits the incorporation of farnesyl pyrophosphate into human H-ras proteins by the enzyme farnesyl transferase (FTase)<sup>[2]</sup>. **In Vivo:** Arglabin reduces inflammation and plasma lipids, increases autophagy, and orients tissue macrophages into an anti-inflammatory phenotype in ApoE2.Ki mice fed a high-fat diet<sup>[1]</sup>.

### References:

[1]. Abderrazak A, et al. Anti-inflammatory and antiatherogenic effects of the NLRP3 inflammasome inhibitor arglabin in ApoE2.Ki mice fed a high-fat diet. *Circulation*. 2015;131(12):1061-1070.

[2]. Lone SH, et al. Arglabin: From isolation to antitumor evaluation. *Chem Biol Interact*. 2015;240:180-198.

### CAIndexNames:

3H-Oxireno[8,8a]azuleno[4,5-b]furan-8(4aH)-one, 5,6,6a,7,9a,9b-hexahydro-1,4a-dimethyl-7-methylene-, (3aR,4aS,6aS,9aS,9bR)-

### SMILES:

C[C@]1(CC[C@](C2=C)([H])[C@@](OC2=O)([H])[C@@]3([H])C(C)=CC4)[C@]34O1

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

Tel: 610-426-3128

Fax: 888-484-5008

E-mail: sales@ChemScene.com

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