

# PRODUCT INFORMATION

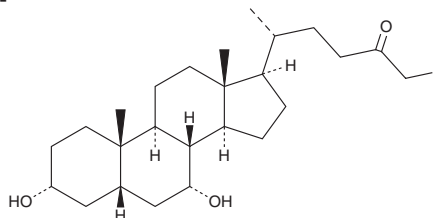


## BSH-IN-1

Item No. 30311

**CAS Registry No.:** 2553217-91-5  
**Formal Name:** (R)-5-((3R,5S,7R,8R,9S,10S,13R,14S,17R)-3,7-dihydroxy-10,13-dimethylhexadecahydro-1H-cyclopenta[a]phenanthren-17-yl)-1-fluorohexan-2-one

**MF:** C<sub>25</sub>H<sub>41</sub>FO<sub>3</sub>  
**FW:** 408.6  
**Purity:** ≥98%  
**Supplied as:** A 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

BSH-IN-1 is supplied as a solid. A stock solution may be made by dissolving the BSH-IN-1 in the solvent of choice, which should be purged with an inert gas. BSH-IN-1 is soluble in the organic solvent DMSO at a concentration of approximately 10 mM.

### Description

BSH-IN-1 is a covalent inhibitor of bile salt hydrolases.<sup>1</sup> It is selective for bile salt hydrolases over the farnesoid X receptor (FXR) and G protein-coupled bile acid activated receptor (GP-BAR) at 100 μM. BSH-IN-1 inhibits the bile salt hydrolases of the Gram-negative bacterium *B. theta* and the Gram-positive bacterium *B. longum* (IC<sub>50</sub>s = 427 and 108 nM, respectively). It also inhibits deconjugation of bile acids in a variety of bacteria and in resuspended mouse feces. Oral administration of BSH-IN-1 (10 mg/kg) decreases bile salt hydrolase activity and deconjugated bile acid levels in feces in mice.

### Reference

1. Adhikari, A.A., Seegar, T.C., Ficarro, S.B., *et al.* Development of a covalent inhibitor of gut bacterial bile salt hydrolases. *Nat. Chem. Biol.* **16**(3), 318-326 (2020).

#### 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

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