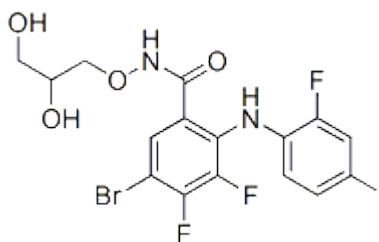




PD318088

Kinase Inhibitor

E1KS1568

Kinase Inhibitor Name: PD318088**Catalog Number:** E1KS1568**Quantity:** 10mg**1. PHYSICAL AND CHEMICAL PROPERTIES****M.Wt:** 561.09**Formula:** C₁₆H₁₃BrF₃IN₂O₄**Solubility:** DMSO ≥112mg/mL Water <1mg/mL Ethanol ≥14mg/mL**Purity:** >99%**Storage:** at -20°C 2 years**CAS No.:** 391210-00-7**Molecular Structure:****2. Biological Activity**

PD318088 is a non-ATP competitive allosteric MEK1/2 inhibitor. It is a small-molecule inhibitor bound within the allosteric site. The binding modes of two kinase inhibitors are shown in relation to the binding site of ATP in the kinase active site. The MEK1 inhibitor PD318088 binds simultaneously with ATP in a region of the kinase active site that is adjacent to the ATP-binding site. Birb796 binding to p38 extends into the ATP site, but also accesses this back pocket, partly overlapping the region where PD318088 binds in MEK1. ^{[1][2]}

3. References:

Structures of human MAP kinase kinase 1 (MEK1) and MEK2 describe novel noncompetitive kinase inhibition Jeffrey F Ohren, Hui-fen Chen, et al. Nature Structural & Molecular Biology December 2004;11:1192-1197

Mechanisms of drug inhibition of signalling molecules Judith S. Sebolt-Leopold & Jessie M. English. NATURE 25 May 2006;441:457-462

The pharmacological and toxicological properties of this product have not been fully investigated. Exercise caution in use and handling. This product must not be used in humans.

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