

PF-04929113 (SNX-5422)

Kinase Inhibitor

Kinase Inhibitor Name: PF-04929113 (SNX-5422)

Catalog Number: E1KS2656

Quantity: 5mg

1. PHYSICAL AND CHEMICAL PROPERTIES

M.Wt: 521.53

Formula: $C_{25}H_{30}F_3N_5O_4$

Solubility: DMSO ≥104 mg/mL Water <1 mg/mL Ethanol ≥5 mg/mL

Stability: 2 years -20℃ Powder

1 week -4° C in DMSO 1 month -80° C in DMSO

CAS No.: 908115-27-5

Molecular Structure:

2. Biological Activity

PF-04929113 (SNX-5422) is a potent and selective Hsp90 inhibitor with an IC50 of median 50 nM. [1] Hsp90 is a molecular chaperone that plays a key role in the conformational maturation of oncogenic signaling proteins, such as HER2/ERBB2, AKT, RAF1, BCR-ABL, and mutated p53, as well as many other molecules that are important in cell cycle regulation or immune responses. PF-04929113 (SNX-5422) is a synthetic prodrug targeting the human heat-shock protein 90 (Hsp90) with potential antineoplastic activity. Although the mechanism of action remains to be fully elucidated, PF-04929113 (SNX-5422) is rapidly converted to SNX-2112, which accumulates in tumors relative to normal tissues. Inhibition of Hsp90 by SNX-2112 may result in the proteasomal degradation of oncogenic client proteins, including HER2/ERBB2, and the inhibition of tumor cell proliferation. [2] PF-04929113 (SNX-5422) is originally developed by Pfizer and Serenex, Inc., and the phase I clinical trials for PF-04929113 (SNX-5422) has been completed in the treatment of solid tumors.

3. References:

Discovery of novel 2-aminobenzamide inhibitors of heat shock protein 90 as potent, selective and orally active antitumor agents. Huang KH et al. J Med Chem. 2009 Jul 23;52(14):4288-305

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.