

JIB-04

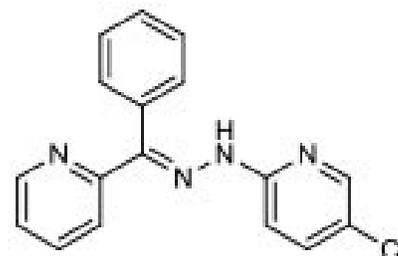
**Catalog No:** 14134, 14135**Format:** 25 mg, 5 mg**Chemical Properties:**

MW = 308.8

C<sub>17</sub>H<sub>13</sub>ClN<sub>4</sub>

CAS 199596-05-9

Physical Properties: Yellow powder

**Names:** JIB-04, JHDM Inhibitor VII, (E)-5-chloro-2-(2-(phenyl(pyridin-2-yl)methylene)hydrazinyl)pyridine

Structure of JIB-04.

**Pharmacology:** A novel specific inhibitor of the Jumonji family of histone demethylases *in vitro*, in cancer cells and in tumors *in vivo*. IC<sub>50</sub> = 230, 340, 435, 445, 855 and 1100 nM for JARID1A, JMJD2E, JMJD2B, JMJD2A, JMJD3 and JMJD2C respectively. Reduces tumor burden and prolongs life in a mouse model (ref 1). Suppresses translation initiation and enhances mTOR inhibitor sensitivity (ref 2). Inhibits the growth of temozolomide-resistant glioblastoma cells and crosses the blood brain barrier (ref 3).

**Solubilization:** May be dissolved in DMSO (30 mg/ml)**Fluorescent Properties:** N/A**Quality Control:**

&gt;98% (TLC); NMR (Conforms)

## References:

1. L Wang *et al. Nature Commun.* 2013, 4:2035
2. C Can Rechem *et al. Cancer Discov.* 2015, 5:255
3. B Banelli *et al. Oncotarget* 2017, 8:34896

**Storage and Guarantee:** Store desiccated as supplied at -20°C for up to 2 years. Store solutions at -20°C for up to 2 months.

This product is for research use only and is not for use in diagnostic procedures. This product is guaranteed for 6 months from date of arrival.