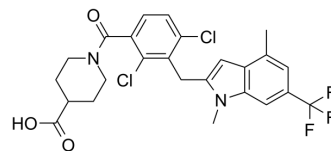


## A-9758

<b>Cat. No.:</b>	HY-126252
<b>CAS No.:</b>	2055271-22-0
<b>Molecular Formula:</b>	C <sub>25</sub> H <sub>23</sub> Cl <sub>2</sub> F <sub>3</sub> N <sub>2</sub> O <sub>3</sub>
<b>Molecular Weight:</b>	527.36
<b>Target:</b>	ROR; Interleukin Related
<b>Pathway:</b>	Metabolic Enzyme/Protease; Immunology/Inflammation
<b>Storage:</b>	Please store the product under the recommended conditions in the Certificate of Analysis.



### BIOLOGICAL ACTIVITY

<b>Description</b>	A-9758 is a ROR $\gamma$ ligand and a potent, selective ROR $\gamma$ t inverse agonist (IC <sub>50</sub> =5 nM), and exhibits robust potency against IL-17A release. A-9758 is effective in suppressing both Th17 differentiation and Th17 effector function. A-9758 significantly attenuates IL-23 driven psoriasiform dermatitis and is effective in blocking skin and joint inflammation <sup>[1]</sup> .		
<b>IC<sub>50</sub> &amp; Target</b>	ROR $\gamma$ t 5 nM (IC <sub>50</sub> )	IL-17A	IL-23
<b>In Vitro</b>	<p>A-9758 inhibits human, mouse, dog and rat ROR<math>\gamma</math> transactivation (IC<sub>50</sub>=38 nM, 20 nM, 25 nM and 64 nM, respectively)<sup>[1]</sup>.</p> <p>A-9758 displays a cofactor profile in recruiting co-repressors (NCoR1: EC<sub>50</sub>=60 nM, NCoR2: EC<sub>50</sub>=43 nM) and derecruiting co-activators (NCoA1: IC<sub>50</sub>=110 nM, PGC1<math>\alpha</math>: IC<sub>50</sub>=49 nM)<sup>[1]</sup>.</p> <p>A-9758 inhibits TCR-mediated IL-17A secretion with an IC<sub>50</sub> of 100 and 38 nM for human CD4<sup>+</sup> T cells and in vitro differentiated mouse Th17 cells, respectively. A-9758 attenuates the differentiation of ROR<math>\gamma</math>t expressing Th17 cells and/or their effector function<sup>[1]</sup>.</p> <p>MCE has not independently confirmed the accuracy of these methods. They are for reference only.</p>		

### REFERENCES

[1]. Gauld S, et al. Inhibition of IL-23 mediated inflammation with a novel small molecule inverse agonist of ROR $\gamma$ t. J Pharmacol Exp Ther. 2019 Aug 2. pii: jpet.119.258046.

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

Tel: 609-228-6898

Fax: 609-228-5909

E-mail: tech@MedChemExpress.com

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