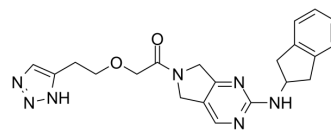


## Autotaxin-IN-1

<b>Cat. No.:</b>	HY-123637
<b>CAS No.:</b>	1619971-30-0
<b>Molecular Formula:</b>	C <sub>21</sub> H <sub>23</sub> N <sub>7</sub> O <sub>2</sub>
<b>Molecular Weight:</b>	405.45
<b>Target:</b>	Phosphodiesterase (PDE)
<b>Pathway:</b>	Metabolic Enzyme/Protease
<b>Storage:</b>	Please store the product under the recommended conditions in the Certificate of Analysis.



### BIOLOGICAL ACTIVITY

<b>Description</b>	Autotaxin-IN-1 is a potent autotaxin inhibitor, which has favorable potency (IC <sub>50</sub> =2.2 nM), PK properties, and a robust PK/PD relationship. Autotaxin-IN-1 is used in treatment of osteoarthritis pain <sup>[1]</sup> .									
<b>IC<sub>50</sub> &amp; Target</b>	Autotaxin 2 nM (IC <sub>50</sub> )									
<b>In Vivo</b>	<p>Autotaxin-IN-1 (i.v.; 1.0mg/kg) has T<sub>1/2</sub> of 1.14 hours<sup>[1]</sup>.</p> <p>Autotaxin-IN-1 (p.o.; 10 mg/kg) has C<sub>max</sub> of 660 nM and AUC of 3440 nM•h<sup>[1]</sup>.</p> <p>MCE has not independently confirmed the accuracy of these methods. They are for reference only.</p> <table border="1"> <tr> <td>Animal Model:</td> <td>Normal rat<sup>[1]</sup></td> </tr> <tr> <td>Dosage:</td> <td>1.0 mg/kg, 10 mg/kg (Pharmacokinetic Study)</td> </tr> <tr> <td>Administration:</td> <td>I.v. (1.0 mg/kg); p.o. (10 mg/kg)</td> </tr> <tr> <td>Result:</td> <td>Has T<sub>1/2</sub> of 1.14 hours (i.v.; 1.0mg/kg). Has C<sub>max</sub> of 660 nM and AUC of 3440 nM•h (p.o.; 10 mg/kg).</td> </tr> </table>		Animal Model:	Normal rat <sup>[1]</sup>	Dosage:	1.0 mg/kg, 10 mg/kg (Pharmacokinetic Study)	Administration:	I.v. (1.0 mg/kg); p.o. (10 mg/kg)	Result:	Has T <sub>1/2</sub> of 1.14 hours (i.v.; 1.0mg/kg). Has C <sub>max</sub> of 660 nM and AUC of 3440 nM•h (p.o.; 10 mg/kg).
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### REFERENCES

[1]. Jones SB, et al. Novel Autotaxin Inhibitors for the Treatment of Osteoarthritis Pain: Lead Optimization via Structure-Based Drug Design. ACS Med Chem Lett. 2016 Aug 2;7(9):857-61.

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

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