Vonoprazan Fumarate

Cat. No.: HY-15295
CAS No.: 881681-01-2
Molecular Formula: C₂₁H₂₀FN₃O₆S
Molecular Weight: 461.46
Target: Proton Pump
Pathway: Membrane Transporter/Ion Channel
Storage:
- Powder: -20°C 3 years
- 4°C 2 years
- In solvent: -80°C 6 months
- -20°C 1 month

SOLVENT & SOLUBILITY

In Vitro
DMSO: 50 mg/mL (108.35 mM; Need ultrasonic)

<table>
<thead>
<tr>
<th>Preparing Stock Solutions</th>
<th>Solvent Concentration</th>
<th>Mass (mL)</th>
</tr>
</thead>
<tbody>
<tr>
<td></td>
<td>1 mg</td>
<td>5 mg</td>
</tr>
<tr>
<td>1 mM</td>
<td>2.1670 mL</td>
<td>10.8352 mL</td>
</tr>
<tr>
<td>5 mM</td>
<td>0.4334 mL</td>
<td>2.1670 mL</td>
</tr>
<tr>
<td>10 mM</td>
<td>0.2167 mL</td>
<td>1.0835 mL</td>
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</tbody>
</table>

Please refer to the solubility information to select the appropriate solvent.

In Vivo
1. Add each solvent one by one: 10% DMSO >> 40% PEG300 >> 5% Tween-80 >> 45% saline
   Solubility: ≥ 2.5 mg/mL (5.42 mM); Clear solution
2. Add each solvent one by one: 10% DMSO >> 90% (20% SBE-β-CD in saline)
   Solubility: ≥ 2.5 mg/mL (5.42 mM); Clear solution
3. Add each solvent one by one: 10% DMSO >> 90% corn oil
   Solubility: ≥ 2.5 mg/mL (5.42 mM); Clear solution

BIOLOGICAL ACTIVITY

Description
Vonoprazan Fumarate (TAK-438) is an orally active potassium-competitive acid blocker which inhibits H⁺, K⁺-ATPase activity with an IC₅₀ of 19 nM.

CUSTOMER VALIDATION
REFERENCES

