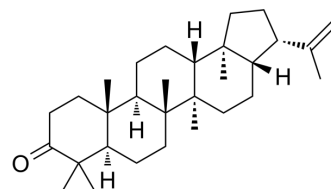


3-Oxo-hop-22(29)-ene

Cat. No.:	HY-N10440
CAS No.:	25615-11-6
Molecular Formula:	C ₃₀ H ₄₈ O
Molecular Weight:	424.7
Target:	Glucosidase
Pathway:	Metabolic Enzyme/Protease
Storage:	Please store the product under the recommended conditions in the Certificate of Analysis.



BIOLOGICAL ACTIVITY

Description	3-Oxo-hop-22(29)-ene is a yeast α -glucosidase inhibitor. 3-Oxo-hop-22(29)-ene shows a moderate effect on the viability of <i>T. cruzi</i> and <i>L. mexicana</i> . 3-Oxo-hop-22(29)-ene shows marginal activity of anti-inflammatory ^[1] .								
In Vitro	<p>3-Oxo-hop-22(29)-ene (compound 2) (50 μM; 24 hours) reduces the viability of <i>T. cruzi</i> by more than 20%, and has a moderate effect on <i>T. rangeli</i> and <i>L. mexicana</i>^[1].</p> <p>3-Oxo-hop-22(29)-ene (10, 100 μM; 48 hours) causes 1.51% and 7.39% inhibition activity to yeast α-glucosidase respectively^[1].</p> <p>MCE has not independently confirmed the accuracy of these methods. They are for reference only.</p> <p>Cell Viability Assay^[1]</p> <table border="1"> <tr> <td>Cell Line:</td> <td>Saccharomyces cerevisiae (type 1) and mammalian yeast (type 2) α-glucosidases, <i>T. cruzi</i>, <i>T. rangeli</i>, <i>L. mexicana</i></td> </tr> <tr> <td>Concentration:</td> <td>10 μM, 50 μM, 100 μM</td> </tr> <tr> <td>Incubation Time:</td> <td>24 hours, 48 hours</td> </tr> <tr> <td>Result:</td> <td>Reduced the viability of <i>T. cruzi</i> by more than 20%, and had a moderate effect on <i>T. rangeli</i> and <i>L. mexicana</i> Inhibited Yeast α-glucosidase.</td> </tr> </table>	Cell Line:	Saccharomyces cerevisiae (type 1) and mammalian yeast (type 2) α -glucosidases, <i>T. cruzi</i> , <i>T. rangeli</i> , <i>L. mexicana</i>	Concentration:	10 μ M, 50 μ M, 100 μ M	Incubation Time:	24 hours, 48 hours	Result:	Reduced the viability of <i>T. cruzi</i> by more than 20%, and had a moderate effect on <i>T. rangeli</i> and <i>L. mexicana</i> Inhibited Yeast α -glucosidase.
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In Vivo	<p>3-Oxo-hop-22(29)-ene (0.31 μmol/ear; application; once) decreases 17.50 % the inflammation of mouse ear edema model^[1].</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>Adult male CD-1 mice (25-30 g) (Mouse ear edema model induced by 12-O-tetradecanoylphorbol acetate (TPA))^[1]</td> </tr> <tr> <td>Dosage:</td> <td>0.31 μmol/ear</td> </tr> <tr> <td>Administration:</td> <td>Apply to both faces of the right ear; once</td> </tr> <tr> <td>Result:</td> <td>Decreased 17.50% the inflammation of mouse ear edema model.</td> </tr> </table>	Animal Model:	Adult male CD-1 mice (25-30 g) (Mouse ear edema model induced by 12-O-tetradecanoylphorbol acetate (TPA)) ^[1]	Dosage:	0.31 μ mol/ear	Administration:	Apply to both faces of the right ear; once	Result:	Decreased 17.50% the inflammation of mouse ear edema model.
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REFERENCES

[1]. López-Huerta FA, et al. Hopane-type triterpenes from *Cnidoscopus spinosus* and their bioactivities. *Bioorg Chem.* 2020 Jul;100:103919.

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

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