Product Datasheet

DOPEXAMINE

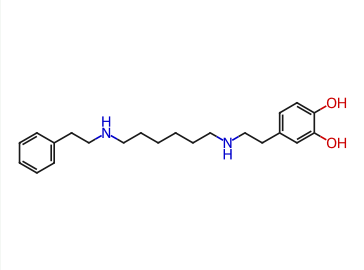
Catalog No. **BP-00009** · CAS **86197-47-9** · Form **free base** · Physical state **solid** · Version **1.0** · Revision **2026-09-24**

FOR RESEARCH USE ONLY. NOT FOR HUMAN OR VETERINARY USE.

Target	Research area
Adrenergic Receptor	**Cardiovascular Disease; Endocrinology**

Molecular formula	$C_{22}H_{32}N_2O_2$
Molecular weight	**356.5017**

STRUCTURE



DESCRIPTION

Dopexamine is a β2 adrenergic receptor agonist.

BIOLOGICAL ACTIVITY

In Vitro

Dopexamine is a dopamine analogue with agonist activity at β2 and dopaminergic receptors. Dopexamine can attenuate the systemic inflammatory response, reduce tissue leukocyte infiltration, and protect against organ injury at doses that do not alter global hemodynamics or regional microvascular flow[1]. Dopexamine is a dopamine analog that stimulates β-adrenergic and dopamine 1 and 2 receptors, conferring some vasodilatory effects. Dopexamine reduces the systemic inflammatory response to endotoxin, including cytokine release, endothelial adhesion molecules, and oxidative stress, without substantially changing systemic hemodynamics, either blood pressure or stroke volume.

REFERENCES

[1]. Bangash MN, et al. Dopexamine can attenuate the inflammatory response and protect against organ injury in the absence of significant effects on hemodynamics or regional microvascular flow. Crit Care. 2013 Mar 28;17(2):R57.

[2]. Hollenberg SM. Dopexamine: immunomodulatory, hemodynamic, or both? Crit Care. 2013 May 13;17(3):143.