

Hydrocortisone

Catalog No: tcsc2226



Available Sizes

Size: 1g

Size: 5g



Specifications

CAS No:

50-23-7

Formula:

$C_{21}H_{30}O_5$

Pathway:

GPCR/G Protein;Metabolic Enzyme/Protease

Target:

Glucocorticoid Receptor;Endogenous Metabolite

Purity / Grade:

>98%

Solubility:

DMSO : ≥ 31 mg/mL (85.53 mM)

Alternative Names:

Cortisol

Observed Molecular Weight:

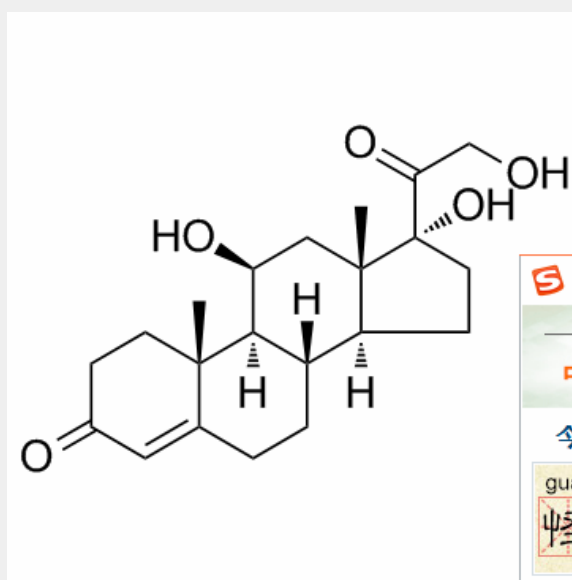
362.46

Product Description

Hydrocortisone is a steroid hormone or glucocorticoid secreted by the adrenal cortex.

In Vitro:

Hydrocortisone (50 nM) shows a dose-dependent down-regulation of GR transcript in hCMEC/D3 cells. Hydrocortisone supplementation of the serum-reduced cell differentiation medium leads to a significant increase in TER across the hCMEC/D3 monolayer^[1]. Hydrocortisone-treated Dendritic cells (DCs) show a decreased expression of MHC II molecules, the costimulatory molecule CD86, and the DC-specific marker CD83, as well as a strongly reduced IL-12 secretion. Hydrocortisone-treated DCs inhibit production of IFN- γ but induce an increased release of IL-4 and no change in IL-5^[2]. Hydrocortisone reduces postischemic oxidative stress, perfusion pressure, and transudate formation. Hydrocortisone inhibits postischemic shedding of syndecan-1, heparan sulfate, and hyaluronan as is release of histamine from resident mast cells^[3].



All products are for RESEARCH USE ONLY. Not for diagnostic & therapeutic purposes!