

CD44 Protein, Human (242a.a, HEK293, His)

Cat. No.:	HY-P700967
Synonyms:	CD44; CDw44; Epican; ECMR-III; LHR; MDU2; MDU3; MIC4; PGP-I; CSPG8; HCELL; HUTCH-I; IN; MC56
Species:	Human
Source:	HEK293
Accession:	P16070-1 (Q21-P220 & Q386-A427)
Gene ID:	960
Molecular Weight:	45-68 kDa

PROPERTIES

Biological Activity	Immobilized Human CD44, His Tag at 0.5µg/ml (100µl/well) on the plate. Dose response curve for Anti-CD44 Antibody, hFc Tag with the EC ₅₀ of 11.8ng/ml determined by ELISA.
Appearance	Solution.
Formulation	Supplied as a 0.22µm filtered solution of PBS, pH 7.4.
Endotoxin Level	<1 EU/µg, determined by LAL method.
Reconstitution	N/A.
Storage & Stability	Stored at -80°C for 1 year. It is stable at -20°C for 3 months after opening. It is recommended to freeze aliquots at -80°C for extended storage. Avoid repeated freeze-thaw cycles.
Shipping	Shipping with dry ice.

DESCRIPTION

Background	<p>CD44, a cell-surface receptor, plays a pivotal role in cell-cell interactions, adhesion, and migration, enabling cells to sense and respond to alterations in the tissue microenvironment. Its involvement extends to diverse cellular functions, including the activation, recirculation, and homing of T-lymphocytes, hematopoiesis, inflammation, and response to bacterial infection. CD44 engages various extracellular matrix components, such as hyaluronan/HA, collagen, growth factors, cytokines, or proteases through its ectodomain, serving as a platform for signal transduction. This involves the assembly of protein complexes via its cytoplasmic domain, containing receptor kinases and membrane proteases. Effectors like PKN2, RAC1, RHOA, Rho-kinases, and phospholipase C coordinate signaling pathways with CD44, leading to calcium mobilization and actin-mediated cytoskeleton reorganization, crucial for cell migration and adhesion. CD44 interacts with a spectrum of molecules, including PKN2, TIAM1, TIAM2, hyaluronan, collagen, laminin, fibronectin, UNC119, PDPN, RDX, EZR, MSN, EGFR, and CD74, forming a complex network essential for its diverse cellular functions.</p>
-------------------	--

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

Tel: 609-228-6898

Fax: 609-228-5909

E-mail: tech@MedChemExpress.com

Address: 1 Deer Park Dr, Suite Q, Monmouth Junction, NJ 08852, USA