Recombinant Human S100A1 Protein (Fc Tag)

Catalog Number: PKSH031793

Note: *Centrifuge before opening to ensure complete recovery of vial contents.*

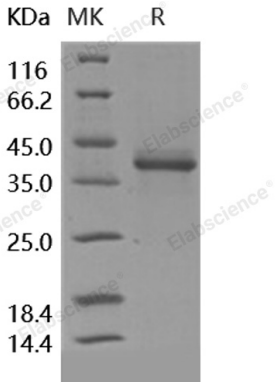
Description

Species	Human
Source	HEK293 Cells-derived Human S100A1 protein Gly 2-Ser94, with an N-terminal hFc
Calculated MW	37.1 kDa
Observed MW	40 kDa
Accession	NP_006262.1
Bio-activity	Measured by its ability to bind biotinylated Human Fc-S100B in functional Elisa.

Properties

Purity	> 95 % as determined by reducing SDS-PAGE.
Endotoxin	< 1.0 EU per μg of the protein as determined by the LAL method.
Storage	Generally, lyophilized proteins are stable for up to 12 months when stored at -20 to -80 ℃. Reconstituted protein solution can be stored at 4-8℃ for 2-7 days. Aliquots of reconstituted samples are stable at < -20℃ for 3 months.
Shipping	This product is provided as lyophilized powder which is shipped with ice packs.
Formulation	Lyophilized from sterile 100mM Glycine, 10mM NaCl, 50mM Tris, pH 7.5 Normally 5% - 8% trehalose, mannitol and 0.01% Tween 80 are added as protectants before lyophilization. Please refer to the specific buffer information in the printed manual.
Reconstitution	Please refer to the printed manual for detailed information.

Data



> 95 % as determined by reducing SDS-PAGE.

Background

S100A1 is a Ca2+binding protein of the EF-hand type that belongs to the S100 protein family. S100 proteins consisting of at least 19 members exist as dimers in the cytoplasm and/or nucleus of a wide range of cells; and are involved in the regulation of a number of cellular processes such as cell-cycle progression and cell differentiation.This protein has been shown to function in the processes including stimulation of Ca2+-induced Ca2+ release; inhibition of microtubule assembly; and inhibition of PKC-mediated phosphorylation.. Phosphoglucomutase is a target protein whose activity is antagonistically regulated by S100A1; and recently; S100A1 is also identified as a potent molecular chaperone and a new member of the Hsp70/Hsp90 multichaperone complex. S100A1 displays a tissue-specific expression pattern with highest levels in myocardium and is considered to be an important regulator of cardiac contractility. Accordingly; reduced expression or mutations of S100A1 gene have been implicated in cardiomyopathies.

Toll-free: 1-888-852-8623
Tel: 1-832-243-6086
Fax: 1-832-243-6017
Web:www.elabscience.com
Email:techsupport@elabscience.com