Recombinant Protein Technical Manual

Recombinant Human S100A16/S100F Protein

RPES0210

Product Data:

Product SKU: RPES0210

Size: 10µg

Species: Human

Expression host: E. coli

Uniprot: Q96FQ6

Protein Information:

Molecular Mass: 11.8 kDa

AP Molecular Mass: 22 kDa

Tag:

Bio-activity:

Purity: > 95% as determined by reducing SDS-PAGE.

Endotoxin: < 1.0 EU per µg as determined by the LAL method.

Storage: Lyophilized protein should be stored at < -20°C, though stable at room temperature for 3 weeks. Reconstituted protein solution can be stored at 4-7°C for 2-7 days. Aliquots of reconstituted samples are stable at < -20°C for 3 months.

Shipping: This product is provided as lyophilized powder which is shipped with ice packs.

Formulation: Lyophilized from a 0.2 µm filtered solution of 20mM Tris, 500mM NaCl, pH8.0.

Reconstitution: Please refer to the printed manual for detailed information.

Application:

Synonyms: SLAM Family Member 6; Activating NK Receptor; NK-T-B-Antigen; NTB-A; CD352; SLAMF6; KALI; Ly108; NTBA; SF2000

Immunogen Information:

Sequence: Met1-Ser103

Background:

S100A16 is a member of S100 protein superfamily that carries calcium-binding EF-handmotifs. S100 proteins are cell-and tissue-specific and are involved in many intra-and extracellular processes hrough interacting with specific target proteins. S100A16 expression was found to be astrocyte-specific. The S100A16 protein was found to accumulate within nucleoli and to translocate to the cytoplasm in response to Ca(2+) stimulation. The homodimeric structure of human S100A16 in the apo state has been obtained both in the solid state and insolution, resulting in good agreement between the structures with the exception of two loop regions. The homodimeric solution structure of human S100A16 was also calculated in the calcium(II)-bound form. Immunoprecipitation analysis revealed that S100A16 could physically interact with tumor suppress or protein p53, also a known inhibitor of adipogenesis. Overexpression or RNA interference-initiated reduction of S100A16 led to the inhibition or activation of the expression of p53-responsivegenes, respectively. S100A16 protein is a novel adipogenesis-promoting factor.