Recombinant Human Interleukin-36G (rh IL-36G/IL1F9)

Synonyms: interleukin 1 family member 9, interleukin-1 epsilon, IL-1H1, IL-1RP2

Introduction: IL-36gamma belongs to the IL-1 family which includes IL-1b, IL-1a, IL-1ra, IL-18, IL-36 Ra (IL-1F5), IL-36a (IL-1F6), IL-36b (IL-1F8), IL-37 (IL-1F7) and IL-1F10.). The IL-1 family members display a 12 b-strand, b-trefoil configuration, and are thought to have ascended from a mutual ancestral gene. IL-36G is an 18-22 kDa, 169aa intracellular and secreted protein which holds no signal sequence, no prosegment and no potential N-linked glycosylation sites. Human IL-36G shares 58%- 69% aa sequence homology with mouse, rat, bovine and equine IL-36G, and 23 - 57% aa sequence homology with other family members. The IL-36G receptor is a mixture of IL-1 Rrp2, mostly located in epithelia and keratinocytes, and the extensively expressed IL-1 RAcP. All IL-36 (a, b and g) activate NF-κB and MAPK pathways in an IL-1 Rrp2 dependent reaction. Additionally, IL-36G induces production of inflammatory cytokines and chemokines like CXCL8/IL-8.

Description:

Source: Escherichia Coli

Physical Appearance: Sterile filtered white lyophilized (freeze-dried) powder.

Formulation: Lyophilized from a 0.2µm filtered concentrated solution in 1x PBS, pH 7.4 and 5% Trehalose.

Solubility: It is recommended to reconstitute the lyophilized rh IL-36G in sterile water not less than 100 μ g/ml, which can then be further diluted to other aqueous solutions.

Stability: Lyophilized rh IL-36G although stable at room temperature for 3 weeks, should be stored desiccated below -18°C. Upon reconstitution rh IL-36G should be stored at 4°C between 2-7days, for future use below -18°C. Please prevent freeze-thaw cycles.

Amino Acid Sequence: MRGTPGDADG GGRAVYQSMC KPITGTINDL NQQVWTLQGQ NLVAVPRSDS VTPVTVAVIT CKYPEALEQG RGDPIYLGIQ NPEMCLYCEK VGEQPTLQLK EQKIMDLYGQ PEPVKPFLFY RAKTGRTSTL ESVAFPDWFI ASSKRDQPII LTSELGKSYN TAFELNIND

Purity: Greater than 95.0% as determined by SDS-PAGE

Biological Activity: Measured by its binding ability in a functional ELISA to bind recombinant human IL-1 Rrp2 Fc Chimera.

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| small | 2 µg | Cat.N° | 11348362 |
|--------|-------|--------|----------|
| medium | 10 µg | Cat.N° | 11348363 |