

## 32-8480: Recombinant Mouse BMP Receptor IA/ALK-3/CD292 (C-Fc-6His)

**Gene :** Bmpr1a

**Gene ID :** 12166

**Uniprot ID :** P36895

### Description

Source: Human Cells.

MW :42.2kD.

Recombinant Mouse BMP Receptor IA is produced by our Mammalian expression system and the target gene encoding Gln24-Arg152 is expressed with a Fc, 6His tag at the C-terminus. ALK-3 is a type I receptor for bone morphogenetic proteins (BMPs) which belong to the protein kinase superfamily, TKL Ser/Thr protein kinase family and TGFβ receptor subfamily. The BMP receptors consists of the type I receptors BMPR1A and BMPR1B and the type II receptor BMPR2. Seven known type I serine/threonine kinases and five mammalian type II serine/threonine kinase receptors function in TGF-β superfamily signal transduction. The downstream molecules of the type I BMP receptors include the Smad (Smad1, 5 and 8) proteins that are phosphorylated in a ligand-dependent manner, and relay the BMP signal from the receptors to target genes in the nucleus. Type II receptors phosphorylate and activate type I receptors which autophosphorylate, then bind and activate SMAD transcriptional regulators. ALK-3 contains a GS domain and a protein kinase domain. ALK-3 is widely expressed. Defects in BMPR1A gene are a cause of a significant proportion of cases of Juvenile polyposis syndrome (JPS).

### Product Info

**Amount :** 10 µg / 50 µg

**Content :** Lyophilized from a 0.2 µm filtered solution of 20mM PB,150mM NaCl,pH7.4.

**Storage condition :** 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.

**Amino Acid :** QNLDMSLHGTGMKSDLQKPKPENGVTLPEDTLPFLKCYCSGHCPDDAINNTCITNGHCFIIEEDDQGETTLLT  
SGCMKYEGSDFQCKDSPKAQLRRTIECCRTNLCNQYLQPTLPPVVIGPFFDGSIRVDDIEGRMDEPKSCDKTHT  
CPPCPAPELLGGPSVFLFPPKPKDTLMISRTPEVTCVVVDVSHEDPEVKFNWYVDGVEVHNAKTKPREEQYNST  
YRVVSVLTVLHQDWLNGKEYKCKVSNKALPAPIEKTISKAKGQPREPQVYTLPPSREEMTKNQVSLTCLVKGFYP  
SDIAVEWESNGQPENNYKTTTPVLDSDGSFFLYSKLTVDKSRWQQGNVFCFSVMHEALHNHYTQKSLSLSPG  
KHHHHHH

### Application Note

**Endotoxin :** Less than 0.1 ng/µg (1 IEU/µg) as determined by LAL test.