

Human ACVR2A Protein; hFc Tag (Sotatercept)

Product Information

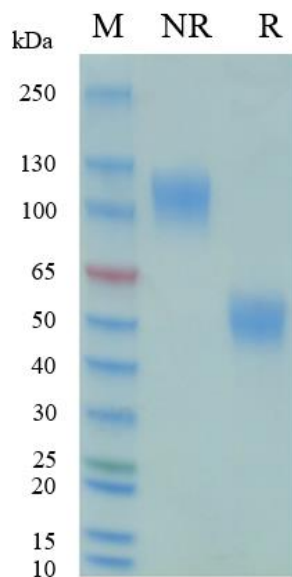
Product Name	Human ACVR2A Protein; hFc Tag (Sotatercept)
Storage temp.	Store at $\leq -70^{\circ}\text{C}$, stable for 6 months after receipt. Recommend to aliquot the protein into smaller quantities for optimal storage. Please minimize freeze-thaw cycles.
Catalog# / Size	GM-88034RP-100 / 100 μg GM-88034RP-1000 / 1 mg

Protein Information

Alternative Names	Activin receptor type IIA, ACTRIIA, ACVR2A, ACVR2, ACTR-IIA
Source	Human ACVR2A Protein; hFc Tag (Sotatercept) (GM-88034RP) is expressed from Chinese hamster ovary cells (CHO). It contains AA Ala 20 - Pro 135 (Accession # P27037-1). This protein carries a hFc tag at the C-terminus.
Purity	> 95% as determined by SDS-PAGE
Endotoxin	< 1 EU/ μg , determined by LAL gel clotting assay
Predicted Mol Mass	39.9 KDa
Formulation	Supplied as a 0.2 μm filtered solution of PBS, pH7.2-7.4.
Description	<p>The ACVR2A protein is a receptor-type serine/threonine kinase and belongs to the bone morphogenetic protein receptor family. The ACVR2A protein plays an important role in cell signaling and regulates biological processes such as cell proliferation, differentiation, and apoptosis.</p> <p>The ACVR2A protein is a transmembrane protein that contains an extracellular domain, a transmembrane domain, and an intracellular kinase domain. During signal transduction, the ACVR2A protein binds to its ligand, activates its kinase activity, phosphorylates downstream signaling molecules, and triggers a series of signaling pathways that affect cell function.</p> <p>The ACVR2A protein plays an important role in embryonic development, organ formation, bone growth and repair, immune regulation, and other physiological processes. It is also associated with the occurrence and development of various diseases such as cancer, inflammatory diseases, and autoimmune diseases. Therefore, the ACVR2A protein is considered an important therapeutic target and can be used to develop drugs for related diseases.</p>

Version:4.0

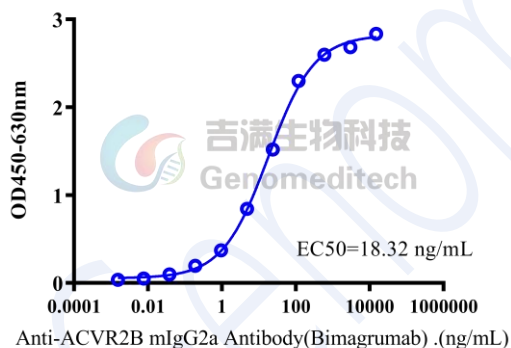
SDS-PAGE



On SDS-PAGE under non-reducing (NR) condition and reducing (R) condition. The gel was stained overnight with Coomassie Blue. The purity of the protein is greater than 95%.

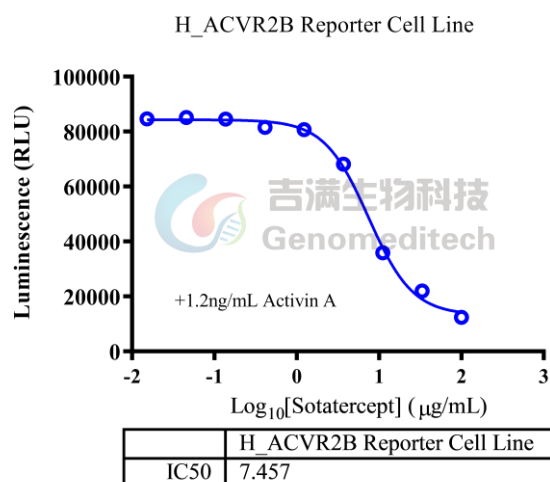
Bioactivity-ELISA

Bioactivity-ELISA
0.5 µg Human ACVR2A Protein; hFc Tag (Sotatercept) of per well



Human ACVR2A Protein; hFc Tag (Sotatercept) (Catalog # GM-88034RP) was immobilized at 5 µg/ml (100 µL/well). Increasing concentrations of Anti-ACVR2B mIgG2a Antibody (Bimagrumab) (Catalog # GM-87700AB) were added.

Bioactivity-CELL BASE



The stimulatory effect of Human Activin A Protein, His Tag (Catalog # GM-87616RP), on the H_ACVR2B Reporter Cell Line (Catalog # GM-C26076), was inhibited by increasing concentrations of Human ACVR2A Protein, hFc Tag (Sotatercept) (Catalog # GM-88034RP).