

Recombinant Canine ACVRL1 Protein, C-hFc-tagged

Product Information

Cat IMP-1794

Official Symbol ACVRL1

Product Overview Recombinant canine ACVRL1(E2R174) (Met1-Gln119) was expressed with

the Fc region of human IgG1 at the C-terminus.

Description Activin A receptor, type II-like 1 (ACVRL1), also known as ALK-1 (activin

receptor-like kinase 1), is an endothelial-specific type I receptor of the TGF-beta (transforming growth factor beta) receptor family of ligands. On ligand binding, a heteromeric receptor complex forms consisting of two type II and two type I transmembrane serine/threonine kinases. ACVRL1 protein is expressed in certain blood vessels of kidney, spleen, heart and intestine, serving as an important role during vascular development. Mutations in ACVRL1 gene are associated with hemorrhagic telangiectasia type 2, also

known as Rendu-Osler-Weber syndrome 2 and vascular disease.

Expression System HEK293

Species Canine

Tag C-hFc

Predicted N Terminal Gly 22

Form Lyophilized from sterile PBS, pH 7.4, 5 % trehalose, 5% mannitol and

0.01% Tween80.

Molecular Mass The recombinant canine ACVRL1/Fc is a disulfide-linked homodimer. The

reduced monomer comprises 339 amino acids and has a predicted

molecular mass of 37.9 kDa. The apparent molecular mass of the protein is

approximately 43-47 kDa in SDS-PAGE under reducing conditions.

Protein length Met1-Gln119

Endotoxin < 1.0 EU/μg of the protein as determined by the LAL method

Purity > 95 % as determined by SDS-PAGE

Storage Samples are stable for up to twelve months from date of receipt at -20 to

-80 centigrade. Store it under sterile conditions at -20 to -80 centigrade. It is recommended that the protein be aliquoted for optimal storage. Avoid

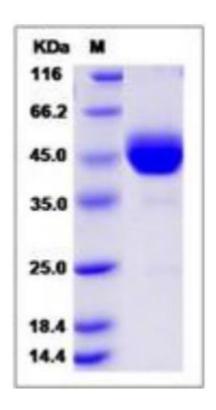
repeated freeze-thaw cycles.

ReconstitutionA hardcopy of COA with reconstitution instruction is sent along with the

products. Please refer to it for detailed information.

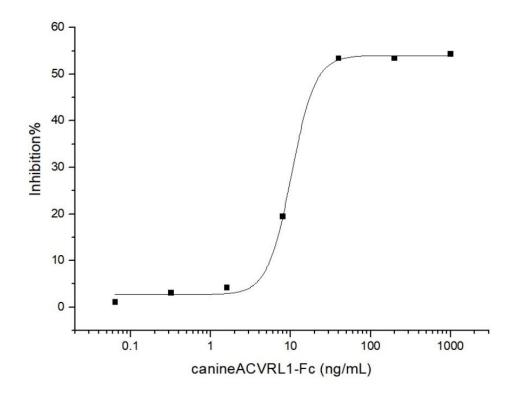
SDS-PAGE





Bioactivity-Cell based assay 1





Measured by its ability to inhibit BMP9-induced alkaline phosphatase production by MC3T3-E1 cells. The ED50 for this effect is typically 5-15 ng/mL in the presence of 2 ng/mL of recombinant human BMP-9.