

Animal-Free Recombinant Human BMP-4
Catalog # PBG10504**Specification**

Animal-Free Recombinant Human BMP-4 - Product Information**Animal-Free Recombinant Human BMP-4 - Additional Information****Description**

Bone morphogenetic proteins (BMPs) constitute a subfamily within the TGF- β superfamily of structurally related signaling proteins. Members of this superfamily are widely distributed throughout the body and are involved in diverse physiological processes during both pre- and postnatal life. Like BMP-7, BMP-4 is involved in the development and maintenance of bone and cartilage. Reduced expression of BMP-4 is associated with a number of bone diseases, including the heritable disorder Fibrodysplasia Ossificans Progressiva. PeproTech's *E.coli* derived BMP-4 is a fully active homodimeric protein consisting of two 106 amino acid subunits which correspond to amino acids 303-408 of the full length BMP-4 precursor.

Biological Activity

Determined by its ability to induce alkaline phosphatase production by ATDC-5 cells. The expected ED_{50} for this effect is 5-10 ng/ml.

Authenticity

Verified by N-terminal and Mass Spectrometry analyses (when applicable).

Endotoxin

Endotoxin level is $<0.1 \text{ ng/}\mu\text{g}$ of protein ($<1\text{EU/}\mu\text{g}$).

Protein Content

Verified by UV Spectroscopy and/or SDS-PAGE gel.

Storage

-20°C

Precautions

Animal-Free Recombinant Human BMP-4 is for research use only and not for use in diagnostic or therapeutic procedures.

Animal-Free Recombinant Human BMP-4 - Protocols

Provided below are standard protocols that you may find useful for product applications.

- [Western Blot](#)
- [Blocking Peptides](#)
- [Dot Blot](#)
- [Immunohistochemistry](#)
- [Immunofluorescence](#)
- [Immunoprecipitation](#)

- [Flow Cytometry](#)
- [Cell Culture](#)

Animal-Free Recombinant Human BMP-4 - Images