Datasheet for ABIN6719807

BMP4 ELISA Kit

1 Image

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Overview

Quantity:	1 kit
Target:	BMP4
Reactivity:	Human
Method Type:	Sandwich ELISA
Detection Range:	62.5 pg/mL - 4000 pg/mL
Minimum Detection Limit:	62.5 pg/mL
Application:	ELISA

Product Details

Purpose:	Human BMP-4 Sandwich ELISA Kit for Quantitative Detection
Brand:	AccuSignal™
Sample Type:	Bone, Cell Culture Supernatant
Analytical Method:	Quantitative
Detection Method:	Colorimetric
Specificity:	Production: Natural and recombinant human BMP-4. There is no detectable cross-reactivity with other relevant proteins.
Sensitivity:	< 4 pg/mL
Components:	• Antibody-coated 96-well plate • Target Protein Standard • Detection antibody

Product Details

- Detection reagent
- Diluent buffers
- Wash buffers
- Substrate Solution
- Stop solutions
- Adhesive covers

Target Details

Target:	BMP4
Alternative Name:	BMP-4 (BMP4 Products)
Background:	Synonyms: BMP 2B, BMP 4, BMP2B, BMP2B1, BOMPR4A, Bone morphogenetic protein 2B, Bone morphogenetic protein 4, DVR4, OTTMUSP00000021065, OTTMUSP00000021066, ZYME Background: Bone morphogenetic protein 4 is a protein that in humans is encoded by the BMP4 gene which is located to 14q22-q23.1, The protein encoded by this gene is a member of the bone morphogenetic protein family which is part of the transforming growth factor-beta superfamily. BMP4 is a polypeptide belonging to the TGF-beta superfamily of proteins. It, like other bone morphogenetic proteins, is involved in bone and cartilage development, specifically tooth and limb development and fracture repair. It has been shown to be involved in muscle development, bone mineralization, and uteric bud development. BMP4 has also been implicated in Fibrodysplasia Ossificans Progressiva in which it is underexpressed. In human embryonic development, BMP4 is a critical signaling molecule required for the early differentiation of the embryo and establishing of a dorsal-ventral axis. BMP4 is secreted from the dorsal portion of the notochord, and it acts in concert with sonic hedgehog(released from the ventral portion of the notochord) to establish a dorsal-ventral axis for the differentiation of later structures. BMP4 stimulates differentiation of overlying ectodermal tissue. Inhibition of the BMP4 signal(by chordin, noggin, or follistatin) causes the ectoderm to differentiate into the neural plate. The standard product used in this kit is recombinant BMP-4 with the molecular mass of 26KDa.
Gene ID:	652
NCBI Accession:	NP_001193
UniProt:	P12644
Pathways:	Steroid Hormone Mediated Signaling Pathway, Regulation of Muscle Cell Differentiation, Tube Formation, Skeletal Muscle Fiber Development

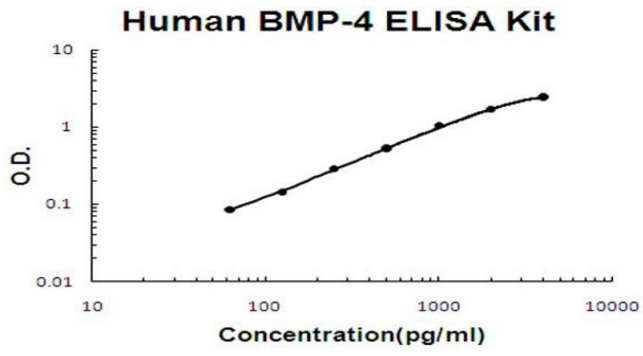
Application Details

Application Notes:	Useful in Sandwich ELISA for Quantitative Detection of Antigen. Aliquot 0.1 mL per well of the 4000pg/mL, 2000pg/mL,1000pg/mL, 500pg/mL, 250pg/mL, 125pg/mL, 62.5pg/mL human BMP-4 standard solutions into the precoated 96-well plate. Add 0.1 mL of the sample diluent buffer into the control well (Zero well). Add 0.1 mL of each properly diluted sample of human bone tissue or cell culture supernates to each empty well. It is recommended that each human BMP-4 standard solution and each sample be measured in duplicate.
Comment:	Standard: Expression system for standard: NSO, Immunogen sequence: S293-R408
Sample Volume:	100 µL
Plate:	Pre-coated
Restrictions:	For Research Use only

Handling

Storage:	4 °C,-20 °C
Storage Comment:	Store vials at 4°C prior to opening. Centrifuge product if not completely clear after standing at room temperature. This product is stable for 6 months at 4°C as an undiluted liquid. Dilute only prior to immediate use. For extended storage freeze at -20°C or below for 12 months. Avoid cycles of freezing and thawing.
Expiry Date:	12 months

Images



ELISA

Image 1. Human BMP-4 Accusignal ELISA Kit Human BMP-4 AccuSignal ELISA Kit standard curve. Assay Range: 62.5pg/ml-4000pg/ml. Sensitivity: <4pg/ml.