

**TECHNICAL DATA SHEET**

**Recombinant Human BMP-13/CDMP-2 (Carrier-Free)**

Catalog Number: 21-9063

**RPx-Pro™ Recombinant Protein**

**PRODUCT INFORMATION**

**CONTENTS**

Recombinant Human BMP-13/CDMP-2 (Carrier-Free)

**DESCRIPTION**

BMP-13 is expressed in hypertrophic chondrocytes during embryonic development of long bones. Continued postnatal expression of BMP-13 in articular cartilage suggests that it plays a regulatory role in the growth and maintenance of articular cartilage. Adenovirus-mediated BMP-13 gene transfer to rabbit bone marrow stem cells have been reported to augment periosteal repair of osteochondral defects.

**MOLECULAR MASS**

Recombinant Human BMP-13/CDMP-2 is a 27.0 kDa homodimeric disulfide-linked protein consisting of two 120 amino acid polypeptide chains.

**AMINO ACID SEQUENCE**

TAFASRHGKR HGKKSRLRCS KKPLHVNFK E LGWDDWIIAP LEYEAYHCEG VCDFPLRSHL EPTNHAIQT LMNSMDPGST PPSCCVPTKL TPISILYIDA GNNVVYKQYE DMVVESCGCR

**SOURCE**

E.coli

**APPLICATIONS**

Bioassay

**PURITY**

95 %

**STORAGE**

-20°C

**PROTEIN CONTENT**

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

**ENDOTOXIN LEVEL**

Endotoxin level is <0.1 ng/µg of protein (<1EU/µg).

**AUTHENTICITY**

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

**CROSS REACTIVITY**

Human, Mouse

**BIOACTIVITY**

The ED50 was determined by its ability to induce alkaline phosphatase production by ATDC-5 chondrogenic cells in the range of 2.0-3.0 µg/ml.

**RESEARCH AREAS**

Proliferation, Angiogenesis/Cardiovascular, Bones, Skeletal, Cartilage, Stem Cells & Differentiation, TGF-beta superfamily, Apoptosis

**RECONSTITUTION**

See Certificate of Analysis (COA) for lot specific reconstitution information.

**REFERENCES**

Shen, B. BMP-13 emerges as a potential inhibitor of bone formation. 2009. International Journal of Biological Sciences; 5(2):192-200.

Citations are provided as a resource for additional applications that have not been validated by Tonbo Biosciences. Please choose the appropriate format for each application and consult Materials and Methods sections for additional details about the use of any product in these publications.

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