

Product Information

MemDX™ Membrane Protein Human TNFSF11 (TNF superfamily member 11) Expressed in vitro E.coli expression system, Full Length

Cat. No.: MPX3823K

This product is for research use only and is not intended for diagnostic use.

This product is a Human TNFSF11 membrane protein expressed *in vitro E.coli* expression system. The protein is for research use only and is not approved for use in humans or in clinical diagnosis.

Product Specifications

Host Species

Human

Target Protein

TNFSF11

Protein Length

Full Length

Protein Class

Receptor

TMD

1

Sequence

MRRASRDYTKYLRGSEEMGGGPGAPHEGPLHAPPPPAPHQPPAASRSMFVALLGLGLGQVVCSVALFFYFRAQMDPNRISEDGT

Product Description

Expression Systems

in vitro E.coli expression system

Tag

10xHis tag at the N-terminus

Protein Format

Soluble

Form

Liquid or Lyophilized powder

Buffer

Tris/PBS-based buffer, 6% Trehalose, pH 8.0

Storage

Aliquot and store at -20°C or lower. For long term storage, we recommend to store at -70°C or lower. Avoid freeze/thaw cycles.

Target

Target Protein

TNFSF11

Full Name

TNF superfamily member 11

Introduction

This gene encodes a member of the tumor necrosis factor (TNF) cytokine family which is a ligand for osteoprotegerin and functions as a key factor for osteoclast differentiation and activation. This protein was shown to be a dentritic cell survival factor and is involved in the regulation of T cell-dependent immune response. T cell activation was reported to induce expression of this gene and lead to an increase of osteoclastogenesis and bone loss. This protein was shown to activate antiapoptotic kinase AKT/PKB through a signaling complex involving SRC kinase and tumor necrosis factor receptor-associated factor (TRAF) 6, which indicated this protein may have a role in the regulation of cell apoptosis. Targeted disruption of the related gene in mice led to severe osteopetrosis and a lack of osteoclasts. The deficient mice exhibited defects in early differentiation of T and B lymphocytes, and failed to form lobulo-alveolar mammary structures during pregnancy. Two alternatively spliced transcript variants have been found.

Alternative Names

TNFSF11; ODF; OPGL; sOdf; CD254; OPTB2; RANKL; TNLG6B; TRANCE; hRANKL2; tumor necrosis factor ligand superfamily member 11; TNF-related activation-induced cytokine; osteoclast differentiation factor; osteoprotegerin ligand; receptor activator of nuclear factor kappa B ligand; tumor necrosis factor (ligand) superfamily, member 11; tumor necrosis factor ligand 6B; tumor necrosis factor superfamily member 11; TNF superfamily member 11

Gene ID

<u>8600</u>

UniProt ID

O14788