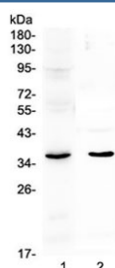


SPARC Antibody (RQ4611)

Catalog No.	Formulation	Size
RQ4611	0.5mg/ml if reconstituted with 0.2ml sterile DI water	100 ug

Bulk quote request

Availability	1-3 business days
Species Reactivity	Mouse, Rat
Format	Antigen affinity purified
Host	Rabbit
Clonality	Polyclonal (rabbit origin)
Isotype	Rabbit IgG
Purity	Antigen affinity purified
Buffer	Lyophilized from 1X PBS with 2% Trehalose and 0.025% sodium azide
UniProt	P07214
Applications	Western Blot : 0.5-1ug/ml Direct ELISA : 0.1-0.5ug/ml (recombinant mouse protein)



Western blot testing of 1) rat lung and 2) mouse lung lysate with SPARC antibody at 0.5ug/ml. Expected molecular weight: 35-43 kDa depending on glycosylation level.

Description

SPARC, secreted protein acidic and rich in cysteine, also known as Osteonectin is a protein that in humans is encoded by the SPARC gene. The human SPARC gene is 26.5 kb long, and contains 10 exons and 9 introns and is located on chromosome 5q31-q33. SPARC is a glycoprotein of 40 kD. SPARC is an acidic, cysteine-rich glycoprotein consisting of a single polypeptide chain that can be broken into 4 domains: 1) an Ca^{++} binding domains near the glutamic acidic-rich region at the amino terminus (domain I), 2) a cysteine-rich (domain II), 3) a hydrophilic region (domain III) and 4) an EF hand motif at the carboxy terminus region (domain IV). Osteonectin is a glycoprotein in the bone that binds sodium. It is secreted by osteoblasts during bone formation, initiating mineralization and promoting mineral crystal formation.

Osteonectin also shows affinity for collagen in addition to bone mineral calcium. A correlation between osteonectin over expression and ampullary cancers and chronic pancreatitis has been found.

Application Notes

Optimal dilution of the SPARC antibody should be determined by the researcher.

Immunogen

Amino acids H123-L300 from the mouse protein were used as the immunogen for the SPARC antibody.

Storage

After reconstitution, the SPARC antibody can be stored for up to one month at 4oC. For long-term, aliquot and store at -20oC. Avoid repeated freezing and thawing.