

SF3B3 Antibody

Rabbit mAb Catalog # AP91824

Product Information

Application WB, IHC, IF, FC, ICC, IHF

Primary Accession Q15393

Reactivity Rat, Human, Mouse

Clonality Monoclonal

Other Names RSE1; SAP130; SF3b130; STAF130;

IsotypeRabbit IgGHostRabbitCalculated MW135577

Additional Information

Dilution WB 1:500~1:2000 IHC 1:100~1:500 ICC/IF 1:50~1:200 FC 1:100

Purification Affinity-chromatography

Immunogen A synthesized peptide derived from human SF3B3

Description Subunit of the splicing factor SF3B required for 'A' complex assembly formed

by the stable binding of U2 snRNP to the branchpoint sequence (BPS) in pre-mRNA. Sequence independent binding of SF3A/SF3B complex upstream of the branch site is essential, it may anchor U2 snRNP to the pre-mRNA.

Storage Condition and Buffer

Rabbit IgG in phosphate buffered saline, pH 7.4, 150mM NaCl, 0.02% sodium azide and 50% glycerol. Store at +4°C short term. Store at -20°C long term.

Avoid freeze / thaw cycle.

Protein Information

Name SF3B3

Synonyms KIAA0017, SAP130 {ECO:0000303 | PubMed:104

Function Component of the 17S U2 SnRNP complex of the spliceosome, a large

ribonucleoprotein complex that removes introns from transcribed pre-mRNAs

(PubMed: <u>10490618</u>, PubMed: <u>10882114</u>, PubMed: <u>12234937</u>, PubMed: <u>27720643</u>, PubMed: <u>28781166</u>, PubMed: <u>32494006</u>,

PubMed:34822310). The 17S U2 SnRNP complex (1) directly participates in early spliceosome assembly and (2) mediates recognition of the intron branch site during pre-mRNA splicing by promoting the selection of the pre-mRNA

branch- site adenosine, the nucleophile for the first step of splicing

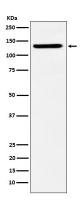
(PubMed: 12234937, PubMed: 32494006, PubMed: 34822310). Within the 17S U2 SnRNP complex, SF3B3 is part of the SF3B subcomplex, which is required for 'A' complex assembly formed by the stable binding of U2 snRNP to the branchpoint sequence in pre-mRNA (PubMed: 12234937, PubMed: 27720643). Sequence independent binding of SF3A and SF3B subcomplexes upstream of

the branch site is essential, it may anchor U2 snRNP to the pre-mRNA (PubMed:12234937). May also be involved in the assembly of the 'E' complex (PubMed:10882114). Also acts as a component of the minor spliceosome, which is involved in the splicing of U12-type introns in pre-mRNAs (PubMed:15146077, PubMed:33509932).

Cellular Location

Nucleus

Images



Western blot analysis of SF3B3 expression in HeLa cell lysate.

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