

Nuclear protein stromal antigen 1 Polyclonal Antibody
Purified Rabbit Polyclonal Antibody (Pab)
Catalog # AP58731**Specification**

Nuclear protein stromal antigen 1 Polyclonal Antibody - Product Information

Application	WB, IHC-P, IHC-F, IF, ICC, E
Primary Accession	Q8WVM7
Reactivity	Rat, Pig, Dog, Bovine
Host	Rabbit
Clonality	Polyclonal
Calculated MW	138 KDa
Physical State	Liquid
Immunogen	KLH conjugated synthetic peptide derived from human Nuclear protein stromal antigen 1
Epitope Specificity	901-1000/1258
Isotype	IgG
Purity	
affinity purified by Protein A	
Buffer	0.01M TBS (pH7.4) with 1% BSA, 0.02% Proclin300 and 50% Glycerol.
SUBCELLULAR LOCATION	Nucleus. Chromosome. Chromosome, centromere. Note=Associates with chromatin. Before prophase it is scattered along chromosome arms. During prophase, most of cohesin complexes dissociate from chromatin probably because of phosphorylation by PLK1, except at centromeres, where cohesin complexes remain. At anaphase, the RAD21 subunit of cohesin is cleaved, leading to the dissociation of the complex from chromosomes, allowing chromosome separation.
SIMILARITY	Belongs to the SCC3 family.Contains 1 SCD (stromalin conservative) domain.
SUBUNIT	Interacts directly with RAD21 in cohesin complex. Cohesin complexes are composed of a heterodimer between a SMC1 protein (SMC1A or SMC1B) and SMC3, which are attached via their hinge domain, and RAD21 which link them at their heads, and one STAG protein (STAG1, STAG2 or STAG3). In cohesin complexes, STAG1 is mutually exclusive with STAG2 and STAG3. Phosphorylated by PLK1. The large dissociation of cohesion from chromosome arms during prophase is partly due to its phosphorylation.
Post-translational modifications	

Important Note

This product as supplied is intended for research use only, not for use in human, therapeutic or diagnostic applications.

Background Descriptions

This gene is a member of the SCC3 family and is expressed in the nucleus. It encodes a component of cohesin, a multisubunit protein complex that provides sister chromatid cohesion along the length of a chromosome from DNA replication through prophase and prometaphase, after which it is dissociated in preparation for segregation during anaphase. [provided by RefSeq, Jul 2008].

Nuclear protein stromal antigen 1 Polyclonal Antibody - Additional Information

Gene ID 10274

Other Names

Cohesin subunit SA-1, SCC3 homolog 1, Stromal antigen 1, STAG1, SA1, SCC3
{ECO:0000303|PubMed:22628566}

Dilution

WB~~1:1000<br \>IHC-P~~N/A<br \>IHC-F~~N/A<br \>IF~~1:50~200<br \>ICC~~N/A<br \>E~~N/A

Format

0.01M TBS(pH7.4), 0.09% (W/V) sodium azide and 50% Glyce

Storage

Store at -20 °C for one year. Avoid repeated freeze/thaw cycles. When reconstituted in sterile pH 7.4 0.01M PBS or diluent of antibody the antibody is stable for at least two weeks at 2-4 °C.

Nuclear protein stromal antigen 1 Polyclonal Antibody - Protein Information

Name STAG1

Synonyms SA1, SCC3 {ECO:0000303|PubMed:22628566}

Function

Component of cohesin complex, a complex required for the cohesion of sister chromatids after DNA replication. The cohesin complex apparently forms a large proteinaceous ring within which sister chromatids can be trapped. At anaphase, the complex is cleaved and dissociates from chromatin, allowing sister chromatids to segregate. The cohesin complex may also play a role in spindle pole assembly during mitosis.

Cellular Location

Nucleus. Chromosome. Chromosome, centromere. Note=Associates with chromatin. Before prophase it is scattered along chromosome arms. During prophase, most of cohesin complexes dissociate from chromatin probably because of phosphorylation by PLK1, except at centromeres, where cohesin complexes remain. At anaphase, the RAD21 subunit of cohesin is cleaved, leading to the dissociation of the complex from chromosomes, allowing chromosome separation

Nuclear protein stromal antigen 1 Polyclonal Antibody - Protocols

Provided below are standard protocols that you may find useful for product applications.

- [Western Blot](#)
- [Blocking Peptides](#)
- [Dot Blot](#)
- [Immunohistochemistry](#)
- [Immunofluorescence](#)
- [Immunoprecipitation](#)
- [Flow Cytometry](#)
- [Cell Culture](#)

Nuclear protein stromal antigen 1 Polyclonal Antibody - Images