

# STAG1 / SA1 Antibody (clone 2E9)

Mouse Monoclonal Antibody Catalog # ALS14079

# **Specification**

### STAG1 / SA1 Antibody (clone 2E9) - Product Information

Application WB, IF, IHC
Primary Accession O8WVM7
Reactivity Human
Host Mouse
Clonality Monoclonal
Calculated MW 144kDa KDa

# STAG1 / SA1 Antibody (clone 2E9) - Additional Information

**Gene ID** 10274

#### **Other Names**

Cohesin subunit SA-1, SCC3 homolog 1, Stromal antigen 1, STAG1, SA1

# Target/Specificity

Human Stromal Antigen 1

### **Reconstitution & Storage**

Short term 4°C, long term aliquot and store at -20°C, avoid freeze thaw cycles.

#### **Precautions**

STAG1 / SA1 Antibody (clone 2E9) is for research use only and not for use in diagnostic or therapeutic procedures.

# STAG1 / SA1 Antibody (clone 2E9) - 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



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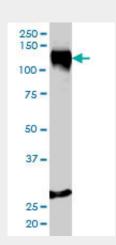
to the dissociation of the complex from chromosomes, allowing chromosome separation

# STAG1 / SA1 Antibody (clone 2E9) - Protocols

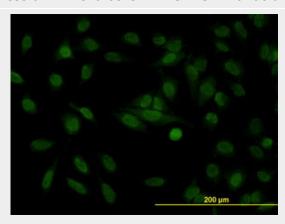
Provided below are standard protocols that you may find useful for product applications.

- Western Blot
- Blocking Peptides
- Dot Blot
- <u>Immunohistochemistry</u>
- Immunofluorescence
- Immunoprecipitation
- Flow Cytomety
- Cell Culture

# STAG1 / SA1 Antibody (clone 2E9) - Images

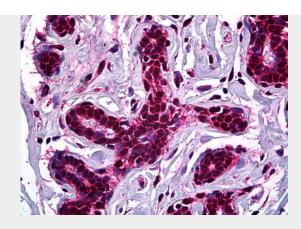


Western blot of STAG1 expression in HeLa cells with STAG1 monoclonal antibody, clone 2E9.



Immunofluorescence of monoclonal antibody to STAG1 on HeLa cell. [antibody concentration 10 ug/ml]





Anti-STAG1 antibody IHC of human breast.

# STAG1 / SA1 Antibody (clone 2E9) - Background

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.

# STAG1 / SA1 Antibody (clone 2E9) - References

Carramolino L.,et al.Gene 195:151-159(1997).
Carramolino L.,et al.Gene 206:283-286(1998).
Muzny D.M.,et al.Nature 440:1194-1198(2006).
Sumara I.,et al.J. Cell Biol. 151:749-762(2000).
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