

Product datasheet

Anti-STIL/SIL antibody ab89314

18 References 4 Images

Overview

<b>Product name</b>	Anti-STIL/SIL antibody
<b>Description</b>	Rabbit polyclonal to STIL/SIL
<b>Host species</b>	Rabbit
<b>Tested applications</b>	<b>Suitable for:</b> ICC/IF, WB, IP
<b>Species reactivity</b>	<b>Reacts with:</b> Mouse, Human <b>Predicted to work with:</b> Rat, Rabbit, Horse, Guinea pig, Cow, Pig, Chimpanzee, Gorilla, Opossum, Orangutan, Elephant 
<b>Immunogen</b>	Synthetic peptide corresponding to Human STIL/SIL aa 1237-1287. Database link: <a href="#">NP_003026.2</a>
<b>Positive control</b>	WB: HeLa whole cell lysate ( <a href="#">ab150035</a> ). IP: HeLa whole cell lysate ( <a href="#">ab150035</a> ). ICC/IF: T24/83 cell line.
<b>General notes</b>	This product was previously labelled as STIL

Properties

<b>Form</b>	Liquid
<b>Storage instructions</b>	Shipped at 4°C. Upon delivery aliquot and store at -20°C. Avoid freeze / thaw cycles.
<b>Storage buffer</b>	Preservative: 0.09% Sodium azide Constituents: 0.1% BSA, Tris buffered saline
<b>Purity</b>	Immunogen affinity purified
<b>Clonality</b>	Polyclonal
<b>Isotype</b>	IgG

Applications

Our [Abpromise guarantee](#) covers the use of **ab89314** in the following tested applications.

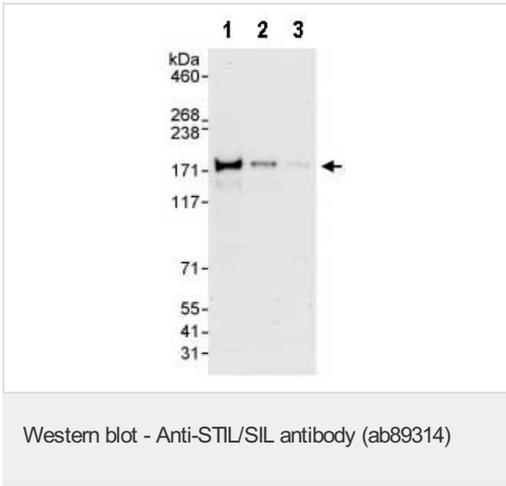
The application notes include recommended starting dilutions; optimal dilutions/concentrations should be determined by the end user.

Application	Abreviews	Notes
ICC/IF		Use a concentration of 5 µg/ml.
WB		1/2000 - 1/10000. Predicted molecular weight: 143 kDa.
IP		Use at 2-5 µg/mg of lysate.

## Target

<b>Function</b>	Immediate-early gene. Plays an important role in embryonic development as well as in cellular growth and proliferation; its long-term silencing affects cell survival and cell cycle distribution as well as decreases CDK1 activity correlated with reduced phosphorylation of CDK1. Play a role as a positive regulator of the sonic hedgehog pathway, acting downstream of PTCH1.
<b>Tissue specificity</b>	Expressed in all hematopoietic tissues and cell lines. Highly expressed in a variety of tumors characterized by increased mitotic activity with highest expression in lung cancer.
<b>Involvement in disease</b>	<p>Note=A chromosomal aberration involving STIL may be a cause of some T-cell acute lymphoblastic leukemias (T-ALL). A deletion at 1p32 between STIL and TAL1 genes leads to STIL/TAL1 fusion mRNA with STIL exon 1 slicing to TAL1 exon 3. As both STIL exon 1 and TAL1 exon 3 are 5'-untranslated exons, STIL/TAL1 fusion mRNA predicts a full length TAL1 protein under the control of the STIL promoter, leading to inappropriate TAL1 expression. In childhood T-cell malignancies (T-ALL), a type of defect such as STIL/TAL1 fusion is associated with a good prognosis. In cultured lymphocytes from healthy adults, STIL/TAL1 fusion mRNA may be detected after 7 days of culture.</p> <p>Defects in STIL are the cause of microcephaly primary type 7 (MCPH7) [MIM:612703]. Microcephaly is defined as a head circumference more than 3 standard deviations below the age-related mean. Brain weight is markedly reduced and the cerebral cortex is disproportionately small. Despite this marked reduction in size, the gyral pattern is relatively well preserved, with no major abnormality in cortical architecture. Primary microcephaly is further defined by the absence of other syndromic features or significant neurological deficits.</p>
<b>Post-translational modifications</b>	Phosphorylated following the activation of the mitotic checkpoint.
<b>Cellular localization</b>	Cytoplasm > cytosol.

## Images



**All lanes :** Anti-STIL/SIL antibody (ab89314) at 0.04 µg/ml

**Lane 1 :** HeLa whole cell lysate at 50 µg

**Lane 2 :** HeLa whole cell lysate at 15 µg

**Lane 3 :** HeLa whole cell lysate at 5 µg

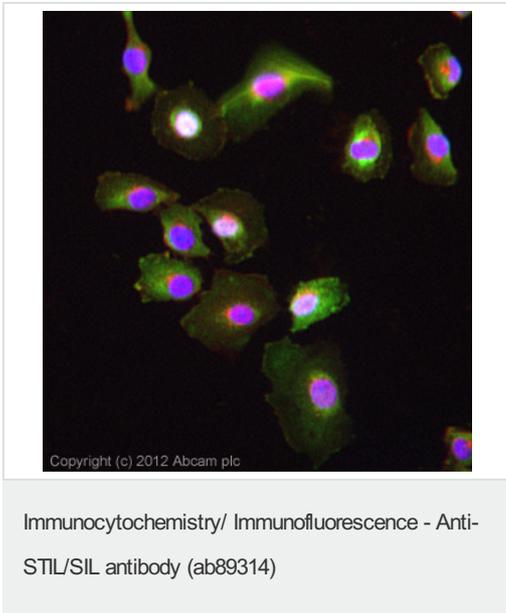
Developed using the ECL technique.

**Predicted band size:** 143 kDa

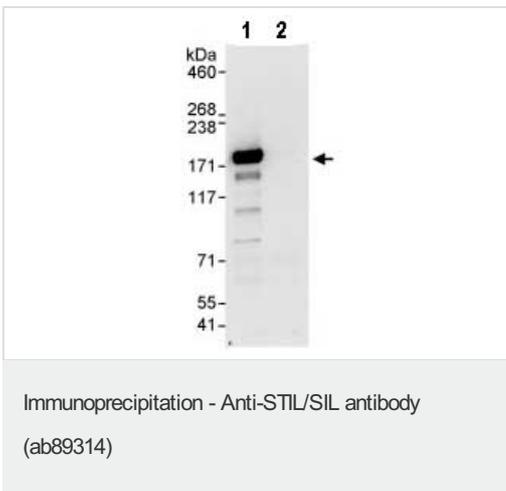
**Observed band size:** 175 kDa

[why is the actual band size different from the predicted?](#)

**Exposure time:** 30 seconds

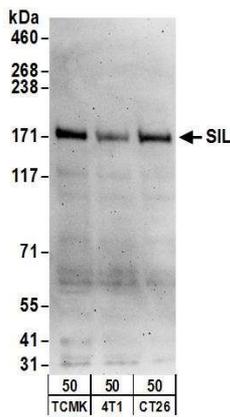


ICC/IF image of ab89314 stained T24/83 cells. The cells were 4% paraformaldehyde fixed (10 minutes) and then incubated in 1% BSA / 10% normal goat serum / 0.3 M glycine in 0.1% PBS-Tween for 1 hour to permeabilize the cells and block non-specific protein-protein interactions. The cells were then incubated with the antibody (ab89314, 5 µg/ml) overnight at +4°C. The secondary antibody (green) was [ab96899](#), DyLight® 488 goat anti-rabbit IgG (H+L) used at a 1/250 dilution for 1 hour. Alexa Fluor® 594 WGA was used to label plasma membranes (red) at a 1/200 dilution for 1 hour. DAPI was used to stain the cell nuclei (blue) at a concentration of 1.43 µM.



Detection of STIL/SIL in Immunoprecipitates of HeLa whole cell lysates (1 mg for IP, 20% of IP loaded) using ab89314 at 3 µg/mg lysate for IP (Lane 1) and at 1 µg/ml for subsequent Western blot detection. Lane 2 represents control IgG IP.

Detection: Chemiluminescence with exposure time of 30 seconds.



Western blot - Anti-STIL/SIL antibody (ab89314)

**All lanes :** Anti-STIL/SIL antibody (ab89314) at 0.1 µg/ml

**Lane 1 :** TCMK-1 cell lysate

**Lane 2 :** 4T1 cell lysate

**Lane 3 :** CT26.WT cell lysate

Lysates/proteins at 50 µg per lane.

**Predicted band size:** 143 kDa

**Exposure time:** 3 minutes

**Please note:** All products are "FOR RESEARCH USE ONLY. NOT FOR USE IN DIAGNOSTIC PROCEDURES"

### Our Abpromise to you: Quality guaranteed and expert technical support

- Replacement or refund for products not performing as stated on the datasheet
- Valid for 12 months from date of delivery
- Response to your inquiry within 24 hours
- We provide support in Chinese, English, French, German, Japanese and Spanish
- Extensive multi-media technical resources to help you
- We investigate all quality concerns to ensure our products perform to the highest standards

If the product does not perform as described on this datasheet, we will offer a refund or replacement. For full details of the Abpromise, please visit <https://www.abcam.com/abpromise> or contact our technical team.

### Terms and conditions

- Guarantee only valid for products bought direct from Abcam or one of our authorized distributors