




## Product datasheet

### Anti-Twist antibody [10E4E6] ab175430

★★★★★ **3 Abreviews** **77 References** **7 Images**

#### Overview

<b>Product name</b>	Anti-Twist antibody [10E4E6]
<b>Description</b>	Mouse monoclonal [10E4E6] to Twist
<b>Host species</b>	Mouse
<b>Tested applications</b>	<b>Suitable for:</b> Flow Cyt, IHC-P, WB, ICC/IF
<b>Species reactivity</b>	<b>Reacts with:</b> Mouse, Human, Recombinant fragment <b>Predicted to work with:</b> Chimpanzee, Gorilla, Common marmoset 
<b>Immunogen</b>	Recombinant fragment corresponding to Human Twist aa 9-74. (Expressed in E.coli). Sequence:  PVSPADDSLSNSEEEPPDRQQPPSGKRGGRKRRSSRSA GGGAGPGGAAGG GVGGGDEPGSPAQGKR  Database link: <a href="#">Q15672</a>   <a href="#">Run BLAST with</a>  <a href="#">Run BLAST with</a>
<b>Positive control</b>	Twist recombinant protein; Twist (aa9-74) - hlgF <sub>c</sub> transfected Hek293 cell lysate; NIH3T3, Jurkat, HeLa, A549, Raji and OCM-1 cell lysates; HeLa cells; cervical cancer tissue; colon cancer tissue.
<b>General notes</b>	<p>This product was changed from ascites to supernatant. Lot no's high than GR313044-1 are from Tissue Culture Supernatant</p> <p>The Life Science industry has been in the grips of a reproducibility crisis for a number of years. Abcam is leading the way in addressing this with our range of recombinant monoclonal antibodies and knockout edited cell lines for gold-standard validation. Please check that this product meets your needs before purchasing.</p> <p>If you have any questions, special requirements or concerns, please send us an inquiry and/or contact our Support team ahead of purchase. Recommended alternatives for this product can be found below, along with publications, customer reviews and Q&amp;As</p>

#### Properties

<b>Form</b>	Liquid
<b>Storage instructions</b>	Shipped at 4°C. Store at +4°C short term (1-2 weeks). Upon delivery aliquot. Store at -20°C long term. Avoid freeze / thaw cycle.

<b>Storage buffer</b>	Preservative: 0.05% Sodium azide Constituent: 99% PBS  Contains 0.5% protein stabiliser.
<b>Purity</b>	Protein G purified
<b>Purification notes</b>	Purified from tissue culture supernatant.
<b>Clonality</b>	Monoclonal
<b>Clone number</b>	10E4E6
<b>Isotype</b>	IgG1

## Applications

**The Abpromise guarantee** Our **Abpromise guarantee** covers the use of ab175430 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
Flow Cyt		1/200 - 1/400. <b>ab170190</b> - Mouse monoclonal IgG1, is suitable for use as an isotype control with this antibody.
IHC-P		1/200 - 1/1000.
WB	★★★★★ (1)	1/500 - 1/2000. Predicted molecular weight: 21 kDa. Abcam recommends using BSA as the blocking agent.
ICC/IF		1/200 - 1/1000.

## Target

<b>Function</b>	Acts as a transcriptional regulator. Inhibits myogenesis by sequestering E proteins, inhibiting trans-activation by MEF2, and inhibiting DNA-binding by MYOD1 through physical interaction. This interaction probably involves the basic domains of both proteins. Also represses expression of proinflammatory cytokines such as TNFA and IL1B. Regulates cranial suture patterning and fusion. Activates transcription as a heterodimer with E proteins. Regulates gene expression differentially, depending on dimer composition. Homodimers induce expression of FGFR2 and POSTN while heterodimers repress FGFR2 and POSTN expression and induce THBS1 expression. Heterodimerization is also required for osteoblast differentiation.
<b>Tissue specificity</b>	Subset of mesodermal cells.
<b>Involvement in disease</b>	Defects in TWIST1 are a cause of Saethre-Chotzen syndrome (SCS) [MIM:101400]; also known as acrocephalosyndactyly type 3 (ACS3). SCS is a craniosynostosis syndrome characterized by coronal synostosis, brachycephaly, low frontal hairline, facial asymmetry, hypertelorism, broad halluces, and clinodactyly. Defects in TWIST1 are the cause of Robinow-Sorauf syndrome (RSS) [MIM:180750]; also known as craniosynostosis-bifid hallux syndrome. RSS is an autosomal dominant defect characterized by minor skull and limb anomalies which is very similar to Saethre-Chotzen syndrome. Defects in TWIST1 are the cause of craniosynostosis type 1 (CRS1) [MIM:123100].

Craniosynostosis consists of premature fusion of one or more cranial sutures, resulting in an abnormal head shape.

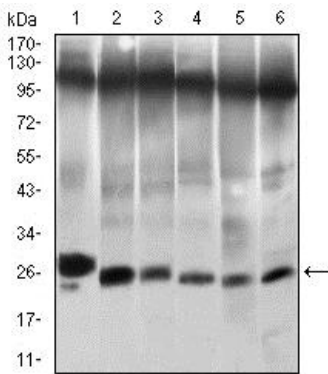
#### Sequence similarities

Contains 1 basic helix-loop-helix (bHLH) domain.

#### Cellular localization

Nucleus.

### Images



Western blot - Anti-Twist antibody [10E4E6] (ab175430)

**All lanes :** Anti-Twist antibody [10E4E6] (ab175430) at 1/500 dilution

**Lane 1 :** NIH/3T3 cell lysate

**Lane 2 :** Jurkat cell lysate

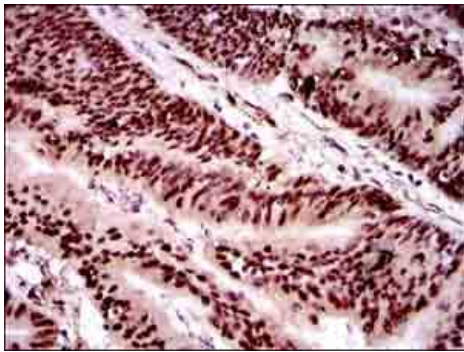
**Lane 3 :** HeLa cell lysate

**Lane 4 :** A549 cell lysate

**Lane 5 :** Raji cell lysate

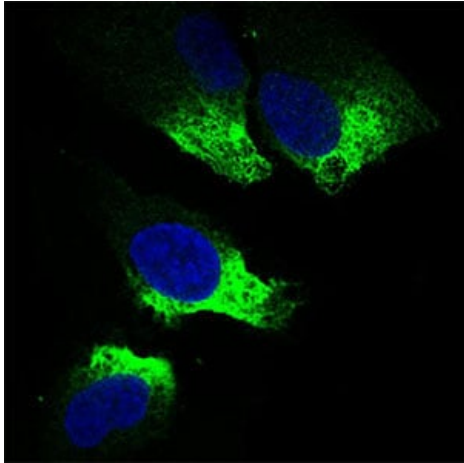
**Lane 6 :** OCM-1 cell lysate

**Predicted band size:** 21 kDa



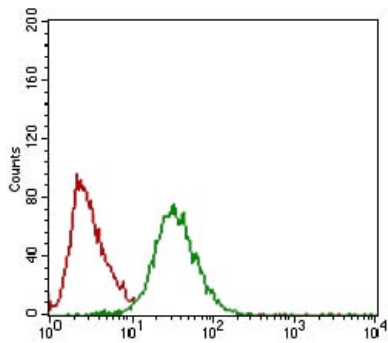
Immunohistochemistry (Formalin/PFA-fixed paraffin-embedded sections) - Anti-Twist antibody [10E4E6] (ab175430)

Immunohistochemical analysis of paraffin-embedded human colon cancer tissue labeling Twist with ab175430 at 1/200 dilution, with DAB staining.



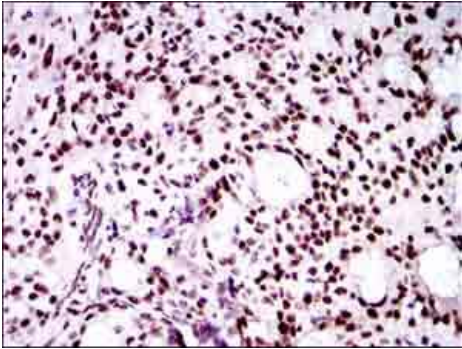
Immunofluorescent analysis of HeLa cells labeling Twist with ab175430 at 1/200 dilution (green). Blue: DRAQ5 fluorescent DNA dye.

Immunocytochemistry/ Immunofluorescence - Anti-Twist antibody [10E4E6] (ab175430)



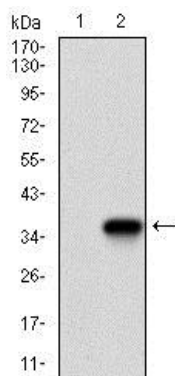
Flow cytometric analysis of HeLa cells labeling Twist with ab175430 at 1/200 dilution (green) compared to a negative control (red).

Flow Cytometry - Anti-Twist antibody [10E4E6] (ab175430)



Immunohistochemical analysis of paraffin-embedded human cervical cancer tissue labeling Twist with ab175430 at 1/200 dilution, with DAB staining.

Immunohistochemistry (Formalin/PFA-fixed paraffin-embedded sections) - Anti-Twist antibody [10E4E6] (ab175430)



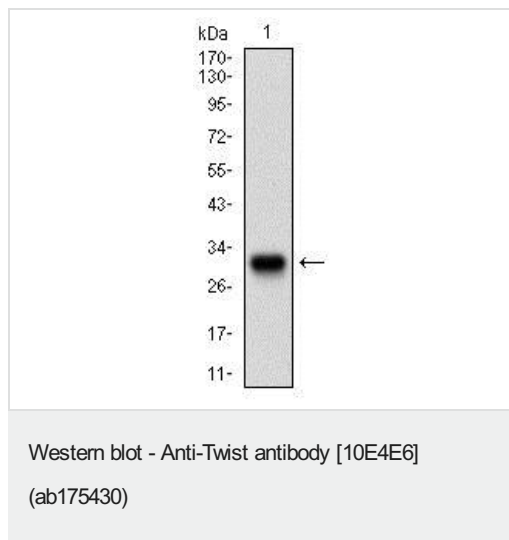
**All lanes :** Anti-Twist antibody [10E4E6] (ab175430) at 1/500 dilution

**Lane 1 :** HEK293 cell lysate

**Lane 2 :** Twist (aa9-74) - hlgGfc transfected HEK293 cell lysate

**Predicted band size:** 21 kDa

Western blot - Anti-Twist antibody [10E4E6] (ab175430)



Anti-Twist antibody [10E4E6] (ab175430) at 1/500 dilution + Twist recombinant protein

**Predicted band size:** 21 kDa

Expected MW is 31.9 kDa.

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

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