eIF2a(Ab-51) Antibody

Catalog No: #AB21271

Package Size: #AB21271-1 50ul #AB21271-2 100ul

Orders: order@abscitech.com
Support: tech@abscitech.com

Description

Product Name	eIF2a(Ab-51) Antibody
Host Species	Rabbit
Clonality	Polyclonal
Purification	Antibodies were produced by immunizing rabbits with synthetic peptide and KLH conjugates. Antibodies were purified by affinity-chromatography using epitope-specific peptide.
Applications	WB IHC IF
Species Reactivity	Hu Ms Rt
Specificity	The antibody detects endogenous level of total eIF2a protein.
Immunogen Type	Peptide-KLH
Immunogen Description	Peptide sequence around aa.49~53 (E-L-S-R-R) derived from Human eIF2a.
Target Name	eIF2a
Other Names	Eukaryotic translation initiation factor 2 subunit alpha; EIF-2A;
Accession No.	Swiss-Prot: P05198NCBI Protein: NP_004085.1
Concentration	1.0mg/ml
Formulation	Supplied at 1.0mg/mL in phosphate buffered saline (without Mg2+ and Ca2+), pH 7.4, 150mM NaCl, 0.02% sodium azide and 50% glycerol.
Storage	Store at -20°C for long term preservation (recommended). Store at 4°C for short term use.

Application Details

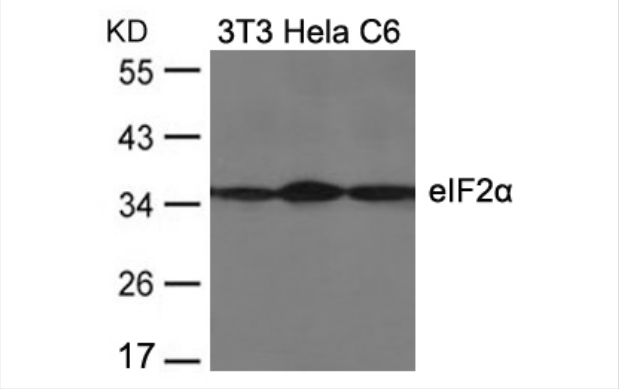
Predicted MW: 38kd

Western blotting: 1:500~1:1000

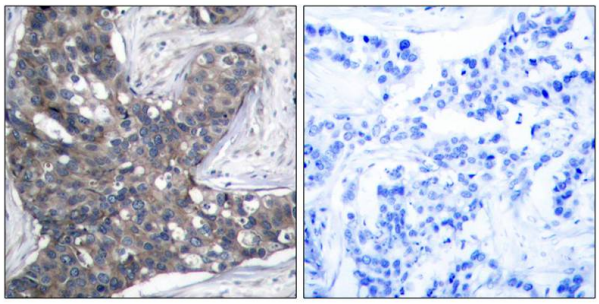
Immunohistochemistry: 1:50~1:100

Immunofluorescence: 1:100~1:200

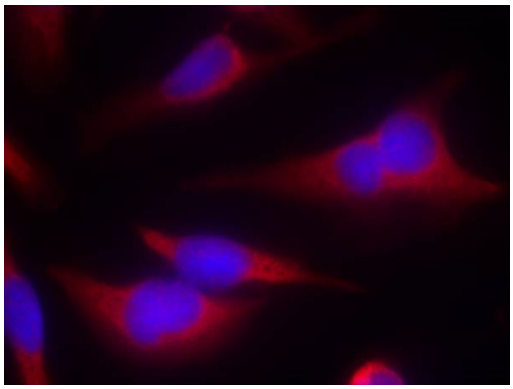
Images



Western blot analysis of extracts from 3T3, Hela and C6 cells using eIF2a(Ab-51) Antibody #AB21271.



Immunohistochemical analysis of paraffin-embedded human breast carcinoma tissue using eIF2a(Ab-51) Antibody #AB21271(left) or the same antibody preincubated with blocking peptide(right).



Immunofluorescence staining of methanol-fixed Hela cells using eIF2a(Ab-51) Antibody #AB21271.

Background

Functions in the early steps of protein synthesis by forming a ternary complex with GTP and initiator tRNA. This complex binds to a 40S ribosomal subunit, followed by mRNA binding to form a 43S preinitiation complex. Junction of the 60S ribosomal subunit to form the 80S initiation complex is preceded by hydrolysis of the GTP bound to eIF-2 and release of an eIF-2-GDP binary complex. In order for eIF-2 to recycle and catalyze another round of initiation, the GDP bound to eIF-2 must exchange with GTP by way of a reaction catalyzed by eIF-2B.

Xavier Saelens, et,al. (2001) J. Biol. Chem; 276: 41620 - 41628.

Hong-Li Wu, Yu-Hua Li, Yan-Hua Lin, et al. (2008) Salvianolic acid B protects human endothelial cells from oxidative stress damage: a possible protective role of glucose-regulated protein 78 induction Cardiovasc Res doi:10.1093/cvr/cvn262

This article references the use of the #21271.

Note: This product is for in vitro research use only and is not intended for use in humans or animals.