abcam

Product datasheet

Recombinant human Aurora B protein ab51435

4 References 画像数 5

製品の詳細

製品名 Recombinant human Aurora B protein

精製度 > 70 % Densitometry.

Affinity purified.

発現系 Baculovirus infected Sf9 cells

タンパク質長 Full length protein

Animal free No

由来 Recombinant

生物種 Human

タグ GST tag N-Terminus

特性

Our **Abpromise guarantee** covers the use of **ab51435** in the following tested applications.

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

アプリケーション Functional Studies

SDS-PAGE Western blot

製品の状態 Liquid

備考 ab51435 was expressed in Sf9 insect cells.

ab43614 (Human Myelin Basic Protein full length protein) can be utilized as a substrate for

assessing Kinase activity

前処理および保存

保存方法および安定性 Shipped on dry ice. Upon delivery aliquot and store at -80°C. Avoid freeze / thaw cycles.

pH: 7.50

Constituents: 0.0038% EGTA, 0.00174% PMSF, 0.00385% DTT, 0.79% Tris HCl, 0.00292%

EDTA, 25% Glycerol (glycerin, glycerine), 0.87% Sodium chloride

This product is an active protein and may elicit a biological response in vivo, handle with caution.

1

関連情報

機能

May be directly involved in regulating the cleavage of polar spindle microtubules and is a key regulator for the onset of cytokinesis during mitosis. Component of the chromosomal passenger complex (CPC), a complex that acts as a key regulator of mitosis. The CPC complex has essential functions at the centromere in ensuring correct chromosome alignment and segregation and is required for chromatin-induced microtubule stabilization and spindle assembly. Phosphorylates 'Ser-10' and 'Ser-28' of histone H3 during mitosis. Required for kinetochore localization of BUB1 and SGOL1. Interacts with INCENP.

組織特異性

High level expression seen in the thymus. It is also expressed in the spleen, lung, testis, colon, placenta and fetal liver. Expressed during S and G2/M phase and expression is up-regulated in cancer cells during M phase.

関連疾患

Note=Disruptive regulation of expression is a possibile mechanism of the perturbation of chromosomal integrity in cancer cells through its dominant-negative effect on cytokinesis.

配列類似性

Belongs to the protein kinase superfamily. Ser/Thr protein kinase family. Aurora subfamily. Contains 1 protein kinase domain.

翻訳後修飾

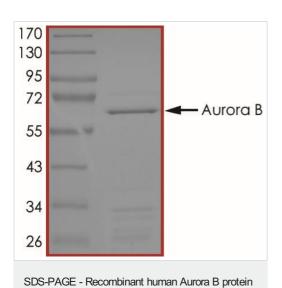
Ubiquitinated by different BCR (BTB-CUL3-RBX1) E3 ubiquitin ligase complexes. Ubiquitinated by the BCR(KLHL9-KLHL13) E3 ubiquitin ligase complex, ubiquitination leads to removal from mitotic chromosomes and is required for cytokinesis. During anaphase, the BCR(KLHL21) E3 ubiquitin ligase complex recruits the CPC complex from chromosomes to the spindle midzone and mediates the ubiquitination of AURKB. Ubiquitination of AURKB by BCR(KLHL21) E3 ubiquitin ligase complex may not lead to its degradation by the proteasome.

細胞内局在

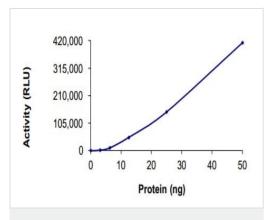
Nucleus. Chromosome. Chromosome > centromere. Cytoplasm > cytoskeleton > spindle. Localizes on chromosome arms and inner centromeres from prophase through metaphase and then transferring to the spindle midzone and midbody from anaphase through cytokinesis. Colocalized with gamma tubulin in the mid-body.

画像

(ab51435)

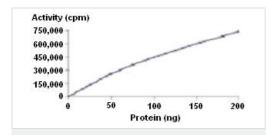


SDS PAGE analysis of ab51435



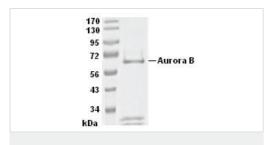
Functional Studies - Recombinant human Aurora B protein (ab51435)

The specific activity of Aurora B (ab51435) was determined to be 19.6 nmol/min/mg as per activity assay protocol and was equivalent to 189.2 nmol/min/mg as per radiometric assay.



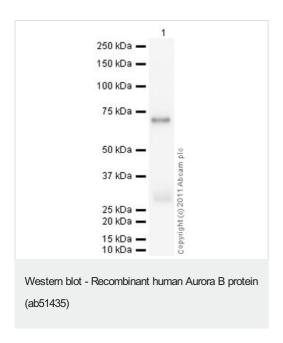
Functional Studies - Recombinant human Aurora B protein (ab51435)

Kinase activity assay - specific activity 190nmol/min/mg



SDS-PAGE - Recombinant human Aurora B protein (ab51435)

Recombinant human Aurora B (tagged). Molecular weight 68 kDa.



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.co.jp/abpromise or contact our technical team.

Terms and conditions

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