Product Information

Anti-CACYBP Antibody, Mouse Monoclonal

Clone CABP7, Purified from Hybridoma Cell Culture

SAB4200187

Product Description

Monoclonal Anti-CACYBP (mouse IgG1 isotype) is derived from the hybridoma CABP7 produced by the fusion of mouse myeloma cells and splenocytes from BALB/c mice immunized with a recombinant fusion protein corresponding to a fragment of human CACYBP (GeneID 27101). The isotype is determined by ELISA using Mouse Monoclonal Antibody Isotyping Reagents, Product Number ISO2. The antibody is purified from culture supernatant of hybridoma cells grown in a bioreactor.

Monoclonal Anti-CACYBP recognizes human, dog, bovine, and monkey CACYBP. The product may be used in several immunochemical techniques including immunoblotting (~ 27 kDa).

Calcyclin-binding protein (CACYBP), a 30 kDa protein, was identified on the basis of its ability to interact with S100 proteins, including S100A6, S100A1, S100A12, S100B, and S100P, in a calcium-dependent manner.[1-3]

The human analog of mouse CACYBP was found to interact with Siah-1, and therefore was named CACYBP/SIP (Siah-1 interacting protein).[4] In humans it has been shown to be a component of the ubiquitin ligase complex responsible for ubiquitination and degradation of β-catenin, which is known to be an oncogene participating in tumorigenesis in many different types of cancers.[4-5] This suggests that CACYBP/SIP may play a role in tumorigenesis by participating in the degradation of cancer related proteins. Indeed, overexpressed CACYBP/SIP was found to inhibit proliferation, tumorigenicity, and invasion of gastric cancer cells, at least in part, via the downregulation of β-catenin and the consequent transcriptional activation of Tcf/LEF.[6] Furthermore, immunohistochemical analysis of the CACYBP/SIP protein expression profile, showed CACYBP/SIP to be ubiquitously detected in all kinds of tumor tissues and was highly expressed in nasopharyngeal carcinoma, osteogenic sarcoma, and pancreatic cancer.[7]

Reagent

Supplied as a solution in 0.01 M phosphate buffered saline, pH 7.4, containing 15 mM sodium azide.

Antibody concentration: ~ 1.0 mg/mL

Precautions and Disclaimer

This product is for R&D use only, not for drug, household, or other uses.

Storage/Stability

Store at −20 °C. For continuous use, store at 2–8 °C for up to one month. For extended storage, freeze at −20 °C in working aliquots. Repeated freezing and thawing, or storage in "frost-free" freezers, is not recommended. If slight turbidity occurs upon prolonged storage, clarify the solution by centrifugation before use. Working dilution samples should be discarded if not used within 12 hours.

Product Profile

Immunoblotting: a working dilution of 2-4 µg/mL is recommended using SH-SY5Y, HeLa, COS-7, and MDCK total cell extracts.

Note: In order to obtain best results in various techniques and preparations, it is recommended to determine optimal working dilutions by titration.

References

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4. Matsuzawa, S.I., and Reed, J.C., *Mol. Cell*, **7**, 915-926 (2001).
5. Filipek, A., *Chemotherapy*, **52**, 32-34 (2006).
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7. Zhai, H., et al., *J. Histochem*., **56**, 765-772 (2008).

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SAB4200187dat Rev 05/21