

Rev03
Update: Dec,14,2021

DATASHEET

THE™ cAMP Antibody, mAb, Mouse

Cat. No.: A01509

Overview

Specificity	The specificity of the antibody is defined as the ratio of antigen concentration to cross-reactant concentration at 50% inhibition of maximum binding.
Host Species	Mouse
Immunogen	3', 5'-cyclic AMP-8-KLH
Conjugate	Unconjugated

Applications

Working concentrations for specific applications should be determined by the investigator. The appropriate concentrations may be affected by secondary antibody affinity, antigen concentration, the sensitivity of the method of detection, temperature, the length of the incubations, and other factors. The suitability of this antibody for applications other than those listed below has not been determined. The following concentration ranges are recommended starting points for this product.

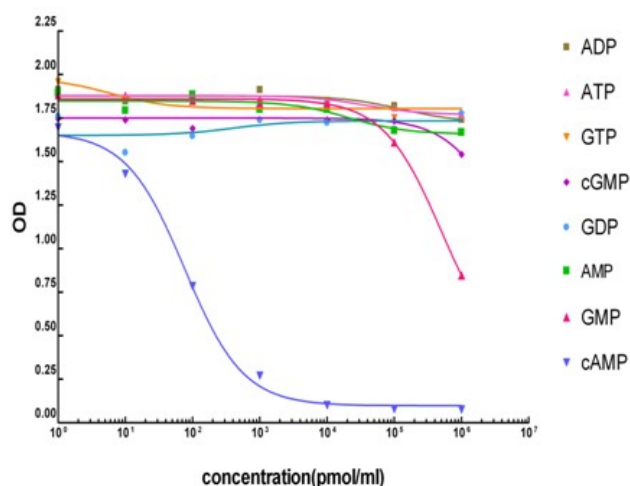
Application	Recommended Usage
ELISA	0.04-0.1 µg/ml
Other applications	User-optimized

Properties

Form	Lyophilized
Storage Buffer	lyophilized with PBS, pH 7.4, containing 0.02% sodium azide
Reconstitution	Reconstitute the lyophilized powder with deionized water (or equivalent) to an final concentration of 0.5 mg/mL.
Storage Instructions	The antibody is stable in lyophilized form if stored at -20°C or below. The reconstituted antibody can be stored for 2-3 weeks at 2-8°C. For long term storage, aliquot and store at -20°C or below. Avoid repeated freezing and thawing cycles.
Purification	Protein A affinity column
Isotype	Mouse IgG2a,k

Clonality	Monoclonal
Clone Id	4H2B6
Note	GenScript can offer this product according to your requirement, including product size, buffer components, etc.

Examples



cAMP Competitive ELISA

1. ELISA plate was coated with goat anti mouse IgG antibody
2. Anti-cAMP monoclonal antibody (Cat. No. A01509) at appropriate dilution and cAMP standards or testing compounds were added into appropriate reaction wells.
3. After a period of incubation, cAMP-HRP conjugate (Cat. No. M01059) was added followed by proper period of incubation.
4. ELISA plate was washed with ELISA washing buffer, then TMB substrate was added and developed at room temperature.
5. Stop the reaction with 1.0 N HCl and read the plate at 450nm.

Background

Target Background : Adenosine 3, 5-cyclic monophosphate (cyclic AMP; cAMP) is one of the most important intracellular secondary messengers for transduction events. cAMP is also involved in regulating neuronal, glandular, cardiovascular, immune, and other functions and actions. A number of hormones, such as ACTH, TSH, FSH, and LH, are known to activate cAMP through the action of the enzyme adenylate cyclase, which converts ATP to cAMP. There remains considerable interest in the measurement of intracellular cAMP in tissues and cell cultures, and this may help to provide an understanding of the physiology and pathology of many disease states. Due to the involvement of cAMP in amplifying the response of ligand binding, the second messenger cAMP has been largely employed to monitor the activation of GPCR to facilitate therapeutic drug discovery. GenScript THE™ cAMP Antibody, mAb, Mouse is developed using 3, 5-cyclic AMP-8-KLH as immunogen.

Synonyms : THE™ Anti-cAMP Monoclonal Antibody (Mouse);

For laboratory research use only. Direct human use, including taking orally and injection and clinical use are forbidden.