

Anti-DRD1 Antibody
Catalog # ABO10886**Specification**

Anti-DRD1 Antibody - Product Information

| | |
|-------------------|------------------------|
| Application | WB, IHC-P |
| Primary Accession | P21728 |
| Host | Rabbit |
| Reactivity | Human, Mouse, Rat |
| Clonality | Polyclonal |
| Format | Lyophilized |

Description

Rabbit IgG polyclonal antibody for D(1A) dopamine receptor(DRD1) detection. Tested with WB, IHC-P in Human;Mouse;Rat.

Reconstitution

Add 0.2ml of distilled water will yield a concentration of 500ug/ml.

Anti-DRD1 Antibody - Additional Information

Gene ID 1812

Other Names

D(1A) dopamine receptor, Dopamine D1 receptor, DRD1

Calculated MW

49293 MW KDa

Application Details

Immunohistochemistry(Paraffin-embedded Section), 0.5-1 µg/ml, Human, Rat, Mouse, By Heat
Western blot, 0.1-0.5 µg/ml, Human, Rat, Mouse

Subcellular Localization

Cell membrane ; Multi-pass membrane protein . Endoplasmic reticulum membrane ; Multi-pass membrane protein . Transport from the endoplasmic reticulum to the cell surface is regulated by interaction with DNAJC14. .

Tissue Specificity

Detected in caudate, nucleus accumbens and in the olfactory tubercle. .

Protein Name

D(1A) dopamine receptor

Contents

Each vial contains 5mg BSA, 0.9mg NaCl, 0.2mg Na₂HPO₄, 0.05mg Thimerosal, 0.05mg NaN₃.

Immunogen

A synthetic peptide corresponding to a sequence in the middle region of human DRD1 (221-242aa AQKQIRRIAALERA AVHAKNCQ), different from the related rat and mouse sequences by one amino

acid.

Purification

Immunogen affinity purified.

Cross Reactivity

No cross reactivity with other proteins

Storage

At -20°C for one year. After reconstitution, at 4°C for one month. It can also be aliquotted and stored frozen at -20°C for a longer time. Avoid repeated freezing and thawing.

Anti-DRD1 Antibody - Protein Information**Name** DRD1**Function**

Dopamine receptor whose activity is mediated by G proteins which activate adenylyl cyclase.

Cellular Location

Cell membrane {ECO:0000250|UniProtKB:P18901}; Multi-pass membrane protein {ECO:0000250|UniProtKB:P18901}. Endoplasmic reticulum membrane {ECO:0000250|UniProtKB:P18901}; Multi-pass membrane protein {ECO:0000250|UniProtKB:P18901}. Cell projection, cilium membrane; Multi-pass membrane protein. Cell projection, dendrite {ECO:0000250|UniProtKB:Q61616}. Cell projection, dendritic spine {ECO:0000250|UniProtKB:Q61616}. Note=Transport from the endoplasmic reticulum to the cell surface is regulated by interaction with DNAJC14 {ECO:0000250|UniProtKB:P18901}

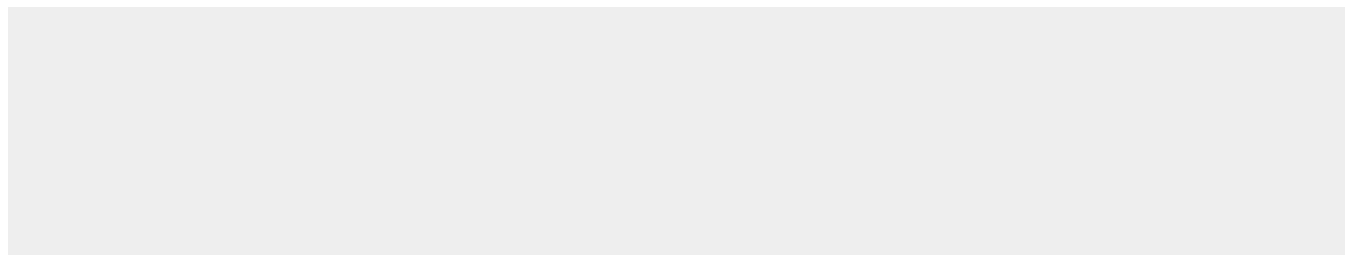
Tissue Location

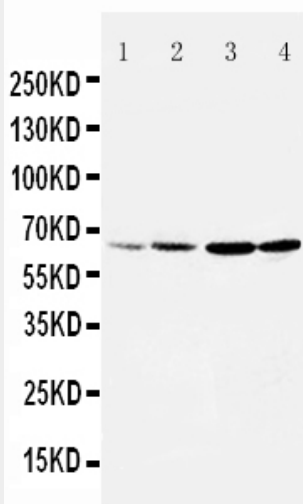
Detected in caudate, nucleus accumbens and in the olfactory tubercle.

Anti-DRD1 Antibody - Protocols

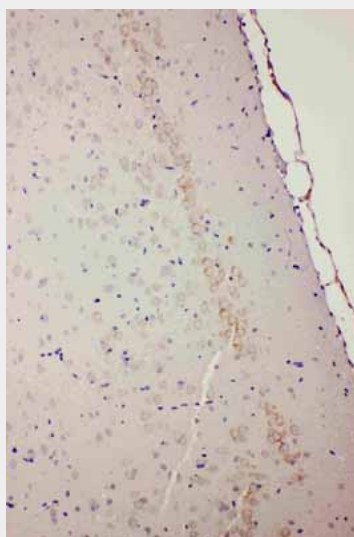
Provided below are standard protocols that you may find useful for product applications.

- [Western Blot](#)
- [Blocking Peptides](#)
- [Dot Blot](#)
- [Immunohistochemistry](#)
- [Immunofluorescence](#)
- [Immunoprecipitation](#)
- [Flow Cytometry](#)
- [Cell Culture](#)

Anti-DRD1 Antibody - Images



Anti-DRD1 antibody, ABO10886, Western blotting
Lane 1: Rat Testis Tissue Lysate
Lane 2: Rat Brain Tissue Lysate
Lane 3: U87 Cell Lysate
Lane 4: HELA Cell Lysate



Anti-DRD1 antibody, ABO10886, IHC(P)
IHC(P): Rat Brain Tissue

Anti-DRD1 Antibody - Background

Dopamine receptor D1, also known as DRD1, is a human gene. It is the most highly expressed DA receptor subtype among the DA receptor family. Receptors for dopamine have been classified into two functional types, D1 and D2. They belong to the family of receptors acting through G (or guanine nucleotide-binding) proteins. D2 receptors inhibit adenylyl cyclase, but D1 receptors stimulate adenylyl cyclase and activate cyclic AMP-dependent protein kinases. Dopamine D1 and D2 receptors are targets of drug therapy in many psychomotor disorders, including Parkinson's disease and schizophrenia, and may also have a role in drug addiction and alcoholism. D1 receptors regulate neuron growth and differentiation, influence behaviour and modify dopamine D2 receptor-mediated events. And the presence of a D1 receptor gene restriction fragment length polymorphism will be helpful for future disease linkage studies. DRD1 also regulates the neurochemical architecture of the striatum and is critical for the normal expression of motor activity.