

#### **GluN2A/NR2A Antibody**

GluN2A/NR2A Antibody, Clone S327-95 Catalog # ASM10263

## **Specification**

#### **GluN2A/NR2A Antibody - Product Information**

Application	ICC/IF, WB
Primary Accession	<u>Q00959</u>
Other Accession	<u>NP_036705.3</u>
Host	Mouse
Isotype	lgG2A
Reactivity	Human, Mouse,
	Rat
Clonality	Monoclonal

Description Mouse Anti-Rat GluN2A/NR2A Monoclonal lgG2A

# **Target/Specificity**

Detects ~170kDa. Does not react with NR2B.

### **Other Names**

NMDA 2A Antibody, NMDAR2A Antibody, NMDAR 2A Antibody, NMDA Receptor 2A Antibody, Glutamate Receptor Antibody, GRIN2A Antibody, Glutamate [NMDA] Receptor subunit epsilon-1 Antibody, Glutamate receptor ionotropic N methyl D aspartate 2A Antibody, HNR2A Antibody, N methyl D aspartate receptor channel Antibody, subunit epsilon 1 Antibody, N Methyl D Aspartate Receptor Subtype 2A Antibody, N methyl D aspartate receptor subunit 2A Antibody, NMDA receptor subtype 2A Antibody, NMDA Receptor Type 2A Antibody, OTTHUMP00000160135 Antibody, OTTHUMP00000174531 Antibody

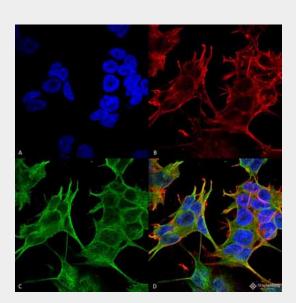
#### Immunogen

Fusion protein amino acids 75-325 (extracellular N-terminus) of rat GluN2A/NR2A

#### Purification Protein G Purified

-20ºC

Storage **Storage Buffer** PBS pH7.4, 50% glycerol, 0.09% sodium azide



Immunocytochemistry/Immunofluorescence analysis using Mouse Anti-GluN2A/NR2A Monoclonal Antibody, Clone S327-95 (ASM10263). Tissue: Neuroblastoma cell line (SK-N-BE). Species: Human. Fixation: 4% Formaldehyde for 15 min at RT. Primary Antibody: Mouse Anti-GluN2A/NR2A Monoclonal Antibody (ASM10263) at 1:100 for 60 min at RT. Secondary Antibody: Goat Anti-Mouse ATTO 488 at 1:100 for 60 min at RT. Counterstain: Phalloidin Texas Red F-Actin stain; DAPI (blue) nuclear stain at 1:1000, 1:5000 for 60min RT, 5min RT. Localization: Cell Membrane, Cell Junction. Magnification: 60X. (A) DAPI (blue) nuclear stain (B) Phalloidin Texas Red F-Actin stain (C) GluN2A/NR2A Antibody (D) Composite.



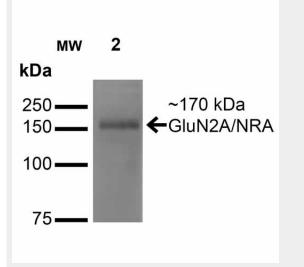
Shipping Blue Ice or 4<sup>o</sup>C Temperature Certificate of Analysis 1 μg/ml of SMC-429 was sufficient for detection o GluN2A/NR2A in 20 μg of rat brain lysate by colorimetric immunoblot analysis using Goat anti-mouse IgG:HRP as the secondary antibody.

Cellular Localization Cell Membrane | Cell Junction

# **GluN2A/NR2A Antibody - Protocols**

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

- <u>Western Blot</u>
- Blocking Peptides
- Dot Blot
- Immunohistochemistry
- Immunofluorescence
- Immunoprecipitation
- Flow Cytomety
- <u>Cell Culture</u>



Western Blot analysis of Monkey COS cells transfected with GFP-tagged NR2A showing detection of ~170 kDa GluN2A/NR2A protein using Mouse Anti-GluN2A/NR2A Monoclonal Antibody, Clone S327-95 (ASM10263). Lane 1: Molecular Weight Ladder. Lane 2: Monkey COS cells transfected with GFP-tagged NR2A. Load: 15 µg. Block: 2% BSA and 2% Skim Milk in 1X TBST. Primary Antibody: Mouse Anti-GluN2A/NR2A Monoclonal Antibody (ASM10263) at 1:200 for 16 hours at 4°C. Secondary Antibody: Goat Anti-Mouse IgG: HRP at 1:1000 for 1 hour RT. Color Development: ECL solution for 6 min in RT. Predicted/Observed Size: ~170 kDa. Other Band(s): 100 kDa.

# GluN2A/NR2A Antibody - Background

N-methyl-D-aspartate (NMDA) receptors are a class of ionotropic glutamate-gated ion channels. These receptors have been shown to be involved in long-term potentiation, an activity-dependent increase in the efficiency of synaptic transmission thought to underlie certain kinds of memory and learning. NMDA receptor channels are heteromers composed of the key receptor subunit NMDAR1 (GRIN1) and 1 or more of the 4 NMDAR2 subunits: NMDAR2A (GRIN2A), NMDAR2B (GRIN2B), NMDAR2C (GRIN2C) and NMDAR2D (GRIN2D).

### GluN2A/NR2A Antibody - References

1. Teng H.J., et al. (2010) PLoS ONE. 5: e13342.