Polyclonal Olig2 Antibody, Rabbit IgG

Catalog # OL2-S456

Source

Polyclonal Olig2 Antibody, Rabbit IgG is a polyclonal antibody purified from rabbit serum.
Gene Synonyms: Oligo2, bHLHe19, oligodendrocyte transcription factor 2.

Species

Rabbit polyclonal antibodies

Isotype

Rabbit IgG

Antibody Type

Polyclonal Antibody

Immunogen

Mouse Olig2 peptide fused to GST.

Specificity

Usually, it is easier to get a positive signal in sections of juvenile animals than that of adults. This antibody does not recognize Olig1 and Olig3.

Application

Application	Recommended Usage
IF	1:200

Purification

Protein A purified / Protein G purified

Formulation

Supplied as 0.2 μm filtered solution in PBS, 50 mM Glycine, 50 mM Tris with 40% glycerol as protectant.

Contact us for customized product form or formulation.

Shipping

This product is supplied and shipped with blue ice, please inquire the shipping cost.

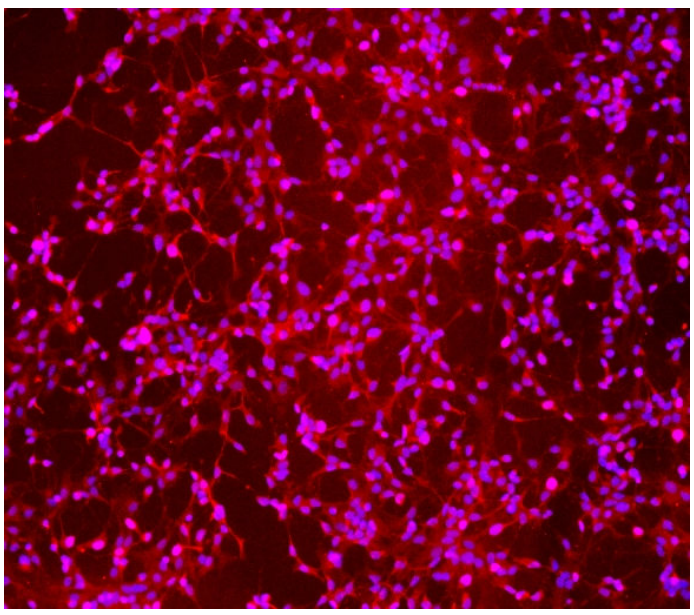
Storage

Please avoid repeated freeze-thaw cycles.

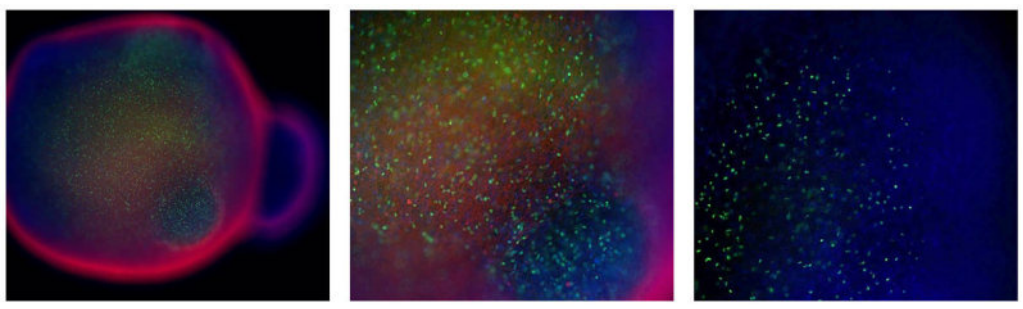
This product is stable after storage at:

- Shipped at -20°C. Store at -20°C for 20 months;
- Shipped at -20°C. Store at -70°C for 3 years.

Immunostaining



2D cell staining: Immunofluorescent staining (10X) of cerebral organoid-derived neurons (CIPO-BWL001K) labeling Olig2 (Red) with purified OL2-S456 at 1:200 dilution. DAPI (blue) was used as nuclear counterstain.



3D organoid staining: Immunofluorescent staining (4x or 10X) of cerebral organoid-(CIPO-BWL001K) labeling Olig2 (Green) with purified OL2-S456 at 1:200 dilution. DAPI (blue) was used as nuclear counterstain. TUJ1 (red) is a neural differentiation marker commonly used to label neural processes.

Background

The oligodendrocyte transcription factor 2 (Olig2) is a basic helix-loop-helix transcription factor which is highly expressed in the oligodendrocyte-lineage cells and in oligodendroglial tumors of the brain as well. Olig2 is an essential regulator of ventral neuroectodermal progenitor cell fate, especially regulating key stages of early oligodendrocyte development. Olig2 has also been reported to act as a gene repressor to determine the cell fate of motor neurons in the spinal cord. Olig2 is a useful marker for primary and mature oligodendrocytes as well as a marker of malignant glioma.

Zhang K, et al. Nat Commun. 2022;13(1):1423. doi: 10.1038/s41467-022-29068-z.

Ono K, et al. Mol Cells. 2009;27(4):397-401. doi: 10.1007/s10059-009-0067-2.

General Notes: FOR RESEARCH USE ONLY.

Clinical and Translational Updates