

Tyro3 Antibody

Purified Mouse Monoclonal Antibody (Mab) Catalog # AM8451b

Specification

Tyro3 Antibody - Product Information

Application Primary Accession Reactivity Host Clonality Isotype Calculated MW

WB,E <u>P55144</u> Mouse Mouse Monoclonal IgG1,k 96208

Tyro3 Antibody - Additional Information

Gene ID 22174

Other Names

Tyrosine-protein kinase receptor TYRO3, Etk2/tyro3, TK19-2, Tyrosine-protein kinase DTK, Tyrosine-protein kinase RSE, Tyrosine-protein kinase TIF, Tyro3, Dtk, Rse, Tif

Target/Specificity

This Tyro3 antibody is generated from a mouse immunized with a recombinant protein.

Dilution WB~~1:2000

Format

Purified monoclonal antibody supplied in PBS with 0.09% (W/V) sodium azide. This antibody is purified through a protein G column, followed by dialysis against PBS.

Storage

Maintain refrigerated at 2-8°C for up to 2 weeks. For long term storage store at -20°C in small aliquots to prevent freeze-thaw cycles.

Precautions

Tyro3 Antibody is for research use only and not for use in diagnostic or therapeutic procedures.

Tyro3 Antibody - Protein Information

Name Tyro3

Synonyms Dtk, Rse, Tif

Function Receptor tyrosine kinase that transduces signals from the extracellular matrix into the cytoplasm by binding to several ligands including TULP1 or GAS6. Regulates many physiological processes including cell survival, migration and differentiation. Ligand binding at the cell surface



induces dimerization and autophosphorylation of TYRO3 on its intracellular domain that provides docking sites for downstream signaling molecules. Following activation by ligand, interacts with PIK3R1 and thereby enhances PI3-kinase activity. Activates the AKT survival pathway, including nuclear translocation of NF-kappa-B and up-regulation of transcription of NF-kappa-B-regulated genes. TYRO3 signaling plays a role in various processes such as neuron protection from excitotoxic injury, platelet aggregation and cytoskeleton reorganization. Also plays an important role in inhibition of Toll-like receptors (TLRs)-mediated innate immune response by activating STAT1, which selectively induces production of suppressors of cytokine signaling SOCS1 and SOCS3.

Cellular Location Cell membrane; Single-pass type I membrane protein

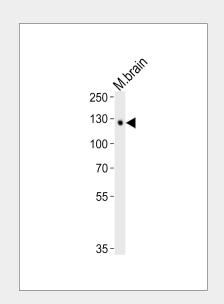
Tissue Location Abundant in the brain and lower levels in other tissues

Tyro3 Antibody - Protocols

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

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

Tyro3 Antibody - Images



Western blot analysis of lysate from mouse brain tissue lysate, using Tyro3 Antibody(Cat. #AM8451b). AM8451b was diluted at 1:2000. A goat anti-mouse IgG H&L(HRP) at 1:3000 dilution was used as the secondary antibody. Lysate at $20\mu g$.

Tyro3 Antibody - Background



Receptor tyrosine kinase that transduces signals from the extracellular matrix into the cytoplasm by binding to several ligands including TULP1 or GAS6. Regulates many physiological processes including cell survival, migration and differentiation. Ligand binding at the cell surface induces dimerization and autophosphorylation of TYRO3 on its intracellular domain that provides docking sites for downstream signaling molecules. Following activation by ligand, interacts with PIK3R1 and thereby enhances PI3-kinase activity. Activates the AKT survival pathway, including nuclear translocation of NF-kappa-B and up-regulation of transcription of NF-kappa-B-regulated genes. TYRO3 signaling plays a role in various processes such as neuron protection from excitotoxic injury, platelet aggregation and cytoskeleton reorganization. Plays also an important role in inhibition of Toll-like receptors (TLRs)-mediated innate immune response by activating STAT1, which selectively induces production of suppressors of cytokine signaling SOCS1 and SOCS3.

Tyro3 Antibody - References

Mark M.R., et al.J. Biol. Chem. 269:10720-10728(1994). Crosier P.S., et al.Growth Factors 11:125-136(1994). Lai C., et al.Oncogene 9:2567-2578(1994). Fujimoto J., et al.Oncogene 9:693-698(1994). Ohashi K., et al.Oncogene 9:699-705(1994).