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Product Information

Anti-MLKL (58-70)

produced in rabbit, IgG fraction of antiserum

Catalog Number M6697

Synonym: Anti-mixed lineage kinase domain-like (*Homo sapiens*)

Product Description

Anti-MLKL (58-70) is produced in rabbit using as immunogen a synthetic peptide corresponding to amino acids 58-70 of human MLKL (GeneID 197259), conjugated to KLH. Whole antiserum is purified using protein A immobilized on agarose to provide the IgG fraction of antiserum.

Anti-MLKL (58-70) specifically recognizes human MLKL (not tested with other species). The antibody can be used in several immunochemical techniques including immunoblotting. Detection of the MLKL band by immunoblotting is specifically inhibited by the immunizing peptide.

Necrosis used to be viewed as an unregulated cellular event. However, it has been found that necrosis, like apoptosis, can be a regulated and programmed mechanism. One specific form of programmed necrosis that depends on the serine/threonine kinase activity of RIP kinase proteins was termed necroptosis. RIP3 has been identified as a key protein in TNF-induced necroptosis and MLKL (mixed lineage kinase domain-like protein) has been found to be an interacting target. MLKL was phosphorylated by RIP3 at Thr and Ser had ser hosphorylation events were critical for necrosis. This suggests that MLKL is a key component of TNF-induced necrotic cell death.

Reagent

Supplied as a solution in 0.01 M phosphate buffered saline, pH 7.4, containing 15 mM sodium azide as a preservative.

Precautions and Disclaimer

This product is for R&D use only, not for drug, household, or other uses. Please consult the Material Safety Data Sheet for information regarding hazards and safe handling practices.

Storage/Stability

For continuous use, store at 2-8 °C for up to one month. For extended storage, freeze in working aliquots. Repeated freezing and thawing, or storage in "frost-free" freezers, is not recommended. If slight turbidity occurs upon prolonged storage, clarify the solution by centrifugation before use. Working dilutions should be discarded if not used within 12 hours.

Product Profile

Immunoblotting: a working dilution of 1:250-1:500 is recommended using lysates of HEK-293T cells over-expressing human recombinant MLKL protein.

Note: In order to obtain the best results using various techniques and preparations, we recommend determining the optimal working dilutions by titration.

References

- 1. Hitomi, J., et al., Cell, 135, 1311-23 (2008).
- 2. Kroemer, G., et al., *Physiol. Rev.,* **87**, 99–163 (2007).
- 3. Sun, L., et al., Cell, 148, 213-27 (2012).

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