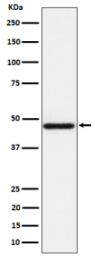
AZI2 Antibody / 5-Azacytidine-induced protein 2 [clone 30A13] (FY12327)

Catalog No.	Formulation	Size
FY12327	Rabbit IgG in phosphate buffered saline, pH 7.4, 150mM NaCl, 0.02% sodium azide and 50% glycerol, 0.4-0.5mg/ml BSA	100 ul

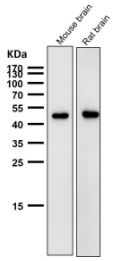
Recombinant RABBIT MONOCLONAL

Bulk quote request

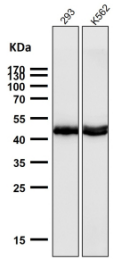
Availability	2-3 weeks
Species Reactivity	Human, Mouse, Rat
Format	Liquid
Host	Rabbit
Clonality	Recombinant Rabbit Monoclonal
Isotype	Rabbit IgG
Clone Name	30A13
Purity	Affinity-chromatography
Buffer	Rabbit IgG in phosphate buffered saline, pH 7.4, 150mM NaCl, 0.02% sodium azide and 50% glycerol, 0.4-0.5mg/ml BSA.
UniProt	Q9H6S1
Applications	Western blot: 1:500-1:2000 Immunocytochemistry/Immunofluorescence: 1:50-1:200
Limitations	This AZI2 antibody is available for research use only.



Western blot analysis of AZI2 expression in HeLa cell lysate using AZI2 antibody. Predicted molecular weight ~45 kDa.



All lanes use the AZI2 antibody at 1:1K dilution for 1 hour at room temperature. Predicted molecular weight ~45 kDa.



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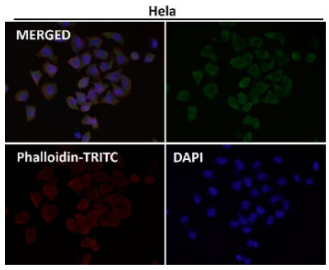

Immunofluorescent analysis using the AZI2 antibody (green) at 1:50 dilution.

Description

AZI2 antibody is designed to detect 5-azacytidine-induced protein 2, also known as NAP1 or TBK1-binding protein 1. AZI2 is a cytoplasmic protein that plays a significant role in innate immunity by regulating signaling pathways that activate interferon regulatory factors (IRFs) and nuclear factor kappa B (NF-kB). Through its interactions with kinases such as TBK1 and IKKe, AZI2 contributes to the activation of interferon-stimulated genes and inflammatory mediators that defend the host against viral and bacterial infections.

AZI2 antibody has become a valuable reagent for immunology and virology research. The protein is induced in response to 5-azacytidine and is involved in noncanonical NF-kB signaling. It is known to function in concert with NAP1, facilitating the recruitment of kinases that phosphorylate IRF3 and IRF7, leading to interferon beta production. Detecting AZI2 expression and localization provides insight into how innate immune responses are initiated and regulated at the molecular level.

Applications of AZI2 antibody include western blotting, immunohistochemistry, immunofluorescence, and flow cytometry. In western blot assays, AZI2 antibody identifies the protein with specificity, allowing researchers to monitor expression in cells exposed to pathogens or immune modulators. In immunohistochemistry, it reveals tissue-specific distribution patterns, while immunofluorescence highlights cytoplasmic localization and colocalization with signaling proteins. These applications make AZI2 antibody versatile for dissecting immune signaling pathways in diverse research contexts.

AZI2 is particularly important in antiviral defense. Studies have demonstrated that AZI2 participates in signaling cascades activated by Toll-like receptors (TLRs) and RIG-I-like receptors (RLRs), key components of pathogen recognition. Altered AZI2 expression can impair interferon responses, contributing to viral persistence or inadequate immune control. By using AZI2 antibody, researchers can track changes in expression that correlate with immune activation and disease outcomes.

In addition to innate immunity, AZI2 has been implicated in cancer biology and inflammation. Dysregulation of NF-kB and interferon pathways is common in tumor microenvironments, where chronic inflammation promotes cancer progression.

Monitoring AZI2 expression with specific antibodies supports studies aimed at understanding how immune signaling intersects with oncogenesis.

AZI2 antibody from NSJ Bioreagents provides researchers with a dependable reagent to study innate immunity, viral infection, and NF-kB signaling. Its proven specificity across assay platforms ensures accurate detection, supporting investigations into host defense and immune regulation.

Application Notes

Optimal dilution of the AZI2 antibody should be determined by the researcher.

Immunogen

A synthesized peptide derived from human TAF3 was used as the immunogen for the AZI2 antibody.

Storage

Store the AZI2 antibody at -20oC.

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