

Anti-AIFM1 (Ser-116), Phosphospecific Antibody
Catalog # AN1622**Specification****Anti-AIFM1 (Ser-116), Phosphospecific Antibody - Product Information**

Primary Accession	O95831
Host	Rabbit
Clonality	Rabbit Polyclonal
Isotype	IgG
Calculated MW	66901

Anti-AIFM1 (Ser-116), Phosphospecific Antibody - Additional InformationGene ID **9131****Other Names**

PDCD8, AIF1, Apoptosis inducing factor 1, mitochondrial; Program cell death protein 8; striatal AIF

Target/Specificity

Apoptosis-inducing factor (AIFM1, AIF, PDCD8) is a ubiquitously expressed flavoprotein that plays a critical role in caspase-independent apoptosis. AIFM1 is expressed as a 66 kDa precursor protein before being N-terminally cleaved to 62 kDa and localized to the mitochondrial intermembrane space. In response to apoptotic stimuli, AIFM1 is released from the mitochondrial intermembrane as a 57 kDa fragment that can translocate to the nucleus. Treatment of isolated nuclei with recombinant AIFM1 leads to early apoptotic events, such as chromatin condensation and large-scale DNA fragmentation. Studies of AIFM1 knockout mice have shown that the apoptotic activity of AIFM1 is cell type and stimuli-dependent. AIFM1 has been implicated in oxeiptosis, a non-inflammatory, caspase independent cell death pathway caused by oxidative stress. During oxeiptosis, increased reactive oxygen species cause the release of the phosphatase PGAM5 from KEAP1 leading to dephosphorylation of AIFM1 (Ser-116) and subsequent cell death. Thus, AIFM1 phosphorylation status at Ser-116 may be an important marker for cell death involving oxeiptosis.

Format

Antigen Affinity Purified

Storage

Maintain refrigerated at 2-8°C for up to 6 months. For long term storage store at -20°C in small aliquots to prevent freeze-thaw cycles.

Precautions

Anti-AIFM1 (Ser-116), Phosphospecific Antibody is for research use only and not for use in diagnostic or therapeutic procedures.

Shipping

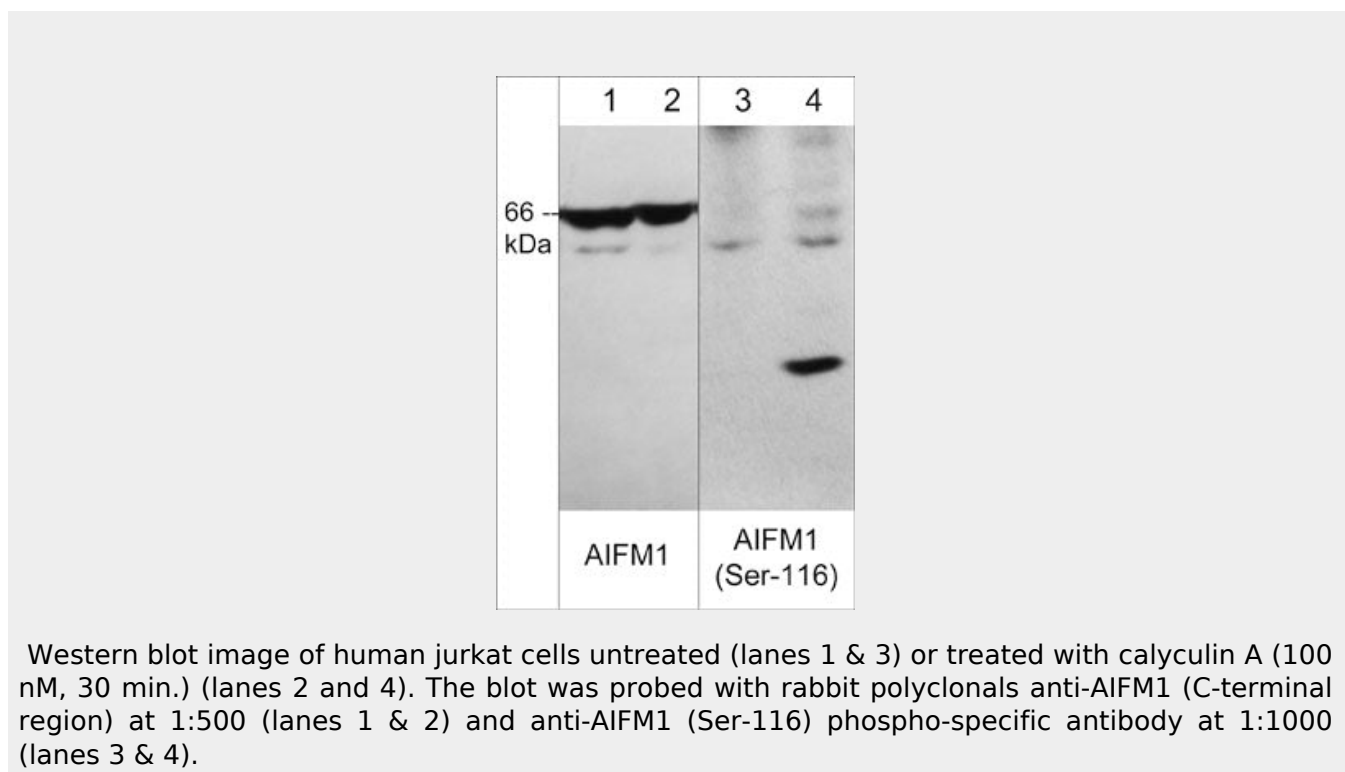
Blue Ice

Anti-AIFM1 (Ser-116), Phosphospecific Antibody - Protocols

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

- [Western Blot](#)
- [Blocking Peptides](#)
- [Dot Blot](#)
- [Immunohistochemistry](#)
- [Immunofluorescence](#)
- [Immunoprecipitation](#)
- [Flow Cytometry](#)
- [Cell Culture](#)

Anti-AIFM1 (Ser-116), Phosphospecific Antibody - Images



Anti-AIFM1 (Ser-116), Phosphospecific Antibody - Background

Apoptosis-inducing factor (AIFM1, AIF, PDCD8) is a ubiquitously expressed flavoprotein that plays a critical role in caspase-independent apoptosis. AIFM1 is expressed as a 66 kDa precursor protein before being N-terminally cleaved to 62 kDa and localized to the mitochondrial intermembrane space. In response to apoptotic stimuli, AIFM1 is released from the mitochondrial intermembrane as a 57 kDa fragment that can translocate to the nucleus. Treatment of isolated nuclei with recombinant AIFM1 leads to early apoptotic events, such as chromatin condensation and large-scale DNA fragmentation. Studies of AIFM1 knockout mice have shown that the apoptotic activity of AIFM1 is cell type and stimuli-dependent. AIFM1 has been implicated in oxeiptosis, a non-inflammatory, caspase independent cell death pathway caused by oxidative stress. During oxeiptosis, increased reactive oxygen species cause the release of the phosphatase PGAM5 from KEAP1 leading to dephosphorylation of AIFM1 (Ser-116) and subsequent cell death. Thus, AIFM1 phosphorylation status at Ser-116 may be an important marker for cell death involving oxeiptosis.