

AMID (E-1): sc-376987

BACKGROUND

AMID (apoptosis-inducing factor (AIF)-like mitochondrion-associated inducer of death), also called p53-responsive gene 3 (PRG3), is a member of the FAD-dependent oxidoreductase family. AMID is a caspase independent pro-apoptotic flavoprotein with NAD(P)H oxidase activity localizing to the cytosol and associated with the outer mitochondrial membrane. AMID shares significant homology with AIF and NADH-oxidoreductases. It is expressed in most normal tissues and its expression is upregulated by p53. Two AMID isoforms exist due to alternative splicing. Isoform 1 is the full length protein and isoform 2 is missing amino acids 99-138. Isoform 2 also has an additional three amino acids inserted after residue 206. Overexpression of AMID leads to apoptosis.

REFERENCES

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3. Jan, Y., et al. 2004. A mitochondrial protein, Bit1, mediates apoptosis regulated by integrins and Groucho/TLE corepressors. *Cell* 116: 751-762.
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7. Li, W., et al. 2006. Yeast AMID homologue Ndi1p displays respiration-restricted apoptotic activity and is involved in chronological aging. *Mol. Biol. Cell* 17: 1802-1811.
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9. Varecha, M., et al. 2007. Bioinformatic and image analyses of the cellular localization of the apoptotic proteins endonuclease G, AIF, and AMID during apoptosis in human cells. *Apoptosis* 12: 1155-1171.

CHROMOSOMAL LOCATION

Genetic locus: AIFM2 (human) mapping to 10q22.1; Aifm2 (mouse) mapping to 10 B4.

SOURCE

AMID (E-1) is a mouse monoclonal antibody raised against amino acids 1-300 mapping at the N-terminus of AMID of human origin.

RESEARCH USE

For research use only, not for use in diagnostic procedures.

PRODUCT

Each vial contains 200 µg IgG₁ kappa light chain in 1.0 ml of PBS with < 0.1% sodium azide and 0.1% gelatin.

APPLICATIONS

AMID (E-1) is recommended for detection of AMID of mouse, rat and human origin by Western Blotting (starting dilution 1:100, dilution range 1:100-1:1000), immunoprecipitation [1-2 µg per 100-500 µg of total protein (1 ml of cell lysate)], immunofluorescence (starting dilution 1:50, dilution range 1:50-1:500) and solid phase ELISA (starting dilution 1:30, dilution range 1:30-1:3000).

Suitable for use as control antibody for AMID siRNA (h): sc-72339, AMID siRNA (m): sc-72340, AMID shRNA Plasmid (h): sc-72339-SH, AMID shRNA Plasmid (m): sc-72340-SH, AMID shRNA (h) Lentiviral Particles: sc-72339-V and AMID shRNA (m) Lentiviral Particles: sc-72340-V.

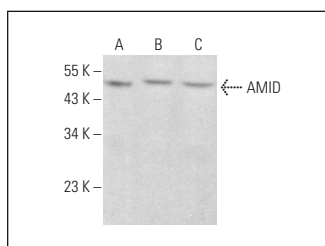
Molecular Weight of AMID: 41 kDa.

Positive Controls: Hep G2 cell lysate: sc-2227, Sol8 cell lysate: sc-2249 or A-10 cell lysate: sc-3806.

RECOMMENDED SUPPORT REAGENTS

To ensure optimal results, the following support reagents are recommended: 1) Western Blotting: use m-IgGκ BP-HRP: sc-516102 or m-IgGκ BP-HRP (Cruz Marker): sc-516102-CM (dilution range: 1:1000-1:10000), Cruz Marker™ Molecular Weight Standards: sc-2035, UltraCruz® Blocking Reagent: sc-516214 and Western Blotting Luminol Reagent: sc-2048. 2) Immunoprecipitation: use Protein A/G PLUS-Agarose: sc-2003 (0.5 ml agarose/2.0 ml). 3) Immunofluorescence: use m-IgGκ BP-FITC: sc-516140 or m-IgGκ BP-PE: sc-516141 (dilution range: 1:50-1:200) with UltraCruz® Mounting Medium: sc-24941 or UltraCruz® Hard-set Mounting Medium: sc-359850.

DATA



AMID (E-1): sc-376987. Western blot analysis of AMID expression in Hep G2 (A), Sol8 (B) and A-10 (C) whole cell lysates.

STORAGE

Store at 4° C, **DO NOT FREEZE**. Stable for one year from the date of shipment. Non-hazardous. No MSDS required.

PROTOCOLS

See our web site at www.scbt.com for detailed protocols and support products.