**α-synuclein (211): sc-12767**

**BACKGROUND**

The synuclein family members, including α-synuclein (also designated NACP for non-β amyloid component) and β-synuclein, are predominantly expressed in the brain and are speculated to be involved in synaptic regulation and neuronal plasticity. α-synuclein is localized to neuronal cell bodies and synapses. α-synuclein was first identified as a component of Alzheimer’s disease amyloid plaques. Abnormal platelet function in Alzheimer’s disease has been demonstrated. During megakaryocytic differentiation, α-synuclein has been found to be upregulated, while β-synuclein is downregulated, indicating that coordinate expression of synucleins may be important during hematopoetic cell differentiation. A mutant form of α-synuclein has been found in patients with early onset Parkinson’s disease.

**CHROMOSOMAL LOCATION**

Genetic locus: SNCA (human) mapping to 4q22.1.

**SOURCE**

α-synuclein (211) is a mouse monoclonal antibody raised against amino acids 121-125 of α-synuclein of human origin.

**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.

α-synuclein (211) is available conjugated to agarose (sc-12767 AC), 500 μg/0.25 ml agarose in 1 ml, for IP; to HRP (sc-12767 HRP), 200 μg/ml, for WB, IHC(P) and ELISA; to either phycoerythrin (sc-12767 PE), fluorescein (sc-12767 FITC), Alexa Fluor® 488 (sc-12767 AF488), Alexa Fluor® 546 (sc-12767 AF546), Alexa Fluor® 594 (sc-12767 AF594) or Alexa Fluor® 647 (sc-12767 AF647), 200 μg/ml, for WB (RGB), IF, IHC(P) and FCM; and to either Alexa Fluor® 680 (sc-12767 AF680) or Alexa Fluor® 790 (sc-12767 AF790), 200 μg/ml, for Near-Infrared (NIR) WB, IF and FCM.

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**APPLICATIONS**

α-synuclein (211) is recommended for detection of α-synuclein of human origin by Western Blotting (starting dilution 1:200, 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 immunohistochemistry (including paraffin-embedded sections) (starting dilution 1:50, dilution range 1:50-1:500).

Suitable for use as control antibody for α-synuclein siRNA (h): sc-29619, α-synuclein shRNA Plasmid (h): sc-29619-SH and α-synuclein shRNA (h) Lentiviral Particles: sc-29619-V.

Molecular Weight of α-synuclein: 19 kDa.

Positive Controls: HEL 92.1.7 cell lysate: sc-2270, TF-1 cell lysate: sc-2412 or SK-N-SH cell lysate: sc-2410.

**RESEARCH USE**

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

**STORAGE**

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

**DATA**

α-synuclein (211): sc-12767. Western blot analysis of α-synuclein expression in HEL 92.1.7 (A) and TF-1 (B) whole cell lysates and human brain (C) and human cerebellum (D) tissue extracts.

α-synuclein (211) HRP: sc-12767 HRP. Direct immunoperoxidase staining of formalin fixed, paraffin-embedded human cerebral cortex tissue showing neuronal staining (A). Direct immunoperoxidase staining of formalin fixed, paraffin-embedded, human bone marrow tissue showing cytoplasmic staining of subset of hematopoetic cells (B).

**SELECT PRODUCT CITATIONS**


**PROTOCOLS**

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