

## DESCRIPTION

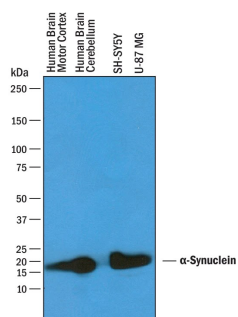
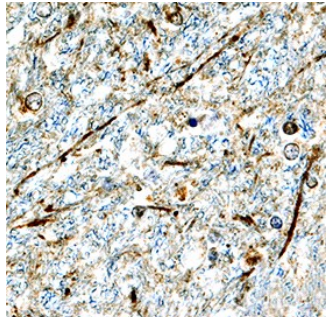
<b>Species Reactivity</b>	Human
<b>Specificity</b>	Detects human $\alpha$ -Synuclein in direct ELISAs and Western blots. In direct ELISAs, less than 3% cross-reactivity with recombinant human (rh) $\beta$ -Synuclein and rhy-Synuclein is observed.
<b>Source</b>	Polyclonal Goat IgG
<b>Purification</b>	Antigen Affinity-purified
<b>Immunogen</b>	E. coli-derived recombinant human $\alpha$ -Synuclein Met1-Ala140 Accession # P37840
<b>Formulation</b>	Lyophilized from a 0.2 $\mu$ m filtered solution in PBS with Trehalose. See Certificate of Analysis for details. *Small pack size (-SP) is supplied as a 0.2 $\mu$ m filtered solution in PBS.

## APPLICATIONS

**Please Note:** Optimal dilutions should be determined by each laboratory for each application. *General Protocols* are available in the *Technical Information* section on our website.

	Recommended Concentration	Sample
<b>Western Blot</b>	1 $\mu$ g/mL	See Below
<b>Immunohistochemistry</b>	5-15 $\mu$ g/mL	See Below

## DATA

<p><b>Western Blot</b></p>  <p><b>Detection of Human <math>\alpha</math>-Synuclein by Western Blot.</b> Western blot shows lysates of human brain (motor cortex) tissue, human brain (cerebellum) tissue, SH-SY5Y human neuroblastoma cell line, and U-87 MG human glioblastoma/astrocytoma cell line. PVDF membrane was probed with 1 <math>\mu</math>g/mL of Goat Anti-Human <math>\alpha</math>-Synuclein Antigen Affinity-purified Polyclonal Antibody (Catalog # AF1338) followed by HRP-conjugated Anti-Goat IgG Secondary Antibody (Catalog # HAF019). A specific band was detected for <math>\alpha</math>-Synuclein at approximately 18 kDa (as indicated). This experiment was conducted under reducing conditions and using Immunoblot Buffer Group 1.</p>	<p><b>Immunohistochemistry</b></p>  <p><b><math>\alpha</math>-Synuclein in Human Brain.</b> <math>\alpha</math>-Synuclein was detected in immersion fixed paraffin-embedded sections of human brain (hypothalamus) using Goat Anti-Human <math>\alpha</math>-Synuclein Antigen Affinity-purified Polyclonal Antibody (Catalog # AF1338) at 15 <math>\mu</math>g/mL overnight at 4 <math>^{\circ}</math>C. Tissue was stained using the Anti-Goat HRP-DAB Cell &amp; Tissue Staining Kit (brown; Catalog # CTS008) and counterstained with hematoxylin (blue). Specific staining was localized to neuronal processes. View our protocol for <a href="#">Chromogenic IHC Staining of Paraffin-embedded Tissue Sections</a>.</p>
---	--

## PREPARATION AND STORAGE

<b>Reconstitution</b>	Reconstitute at 0.2 mg/mL in sterile PBS.
<b>Shipping</b>	The product is shipped at ambient temperature. Upon receipt, store it immediately at the temperature recommended below. *Small pack size (-SP) is shipped with polar packs. Upon receipt, store it immediately at -20 to -70 $^{\circ}$ C
<b>Stability &amp; Storage</b>	<b>Use a manual defrost freezer and avoid repeated freeze-thaw cycles.</b> <ul style="list-style-type: none"> <li>● 12 months from date of receipt, -20 to -70 <math>^{\circ}</math>C as supplied.</li> <li>● 1 month, 2 to 8 <math>^{\circ}</math>C under sterile conditions after reconstitution.</li> <li>● 6 months, -20 to -70 <math>^{\circ}</math>C under sterile conditions after reconstitution.</li> </ul>

## BACKGROUND

$\alpha$ -Synuclein is a cytoplasmic protein that is predominantly expressed in the central nervous system. It is a minor protein found in amyloid deposition that is a hallmark of Alzheimer's disease. Defects in SNCA are associated with familial Parkinson's disease.