Product Datasheet

beta-Actin Antibody
NB600-503

Unit Size: 0.05 ml

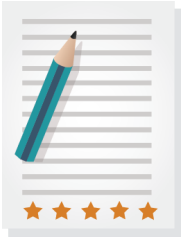
Store at 4C. Do not freeze.

www.novusbio.com technical@novusbio.com

Reviews: 4 Publications: 123

Protocols, Publications, Related Products, Reviews, Research Tools and Images at:
www.novusbio.com/NB600-503

Updated 12/20/2023 v.20.1



NB600-503

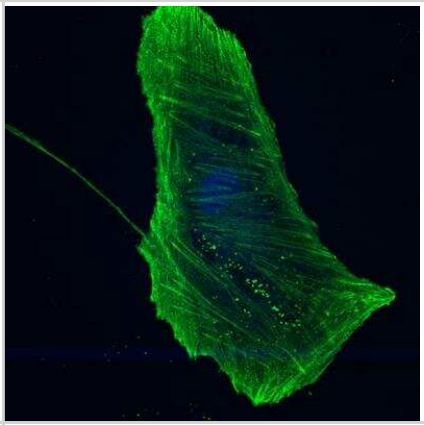
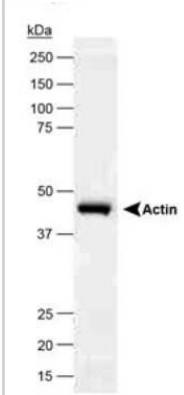
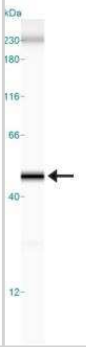
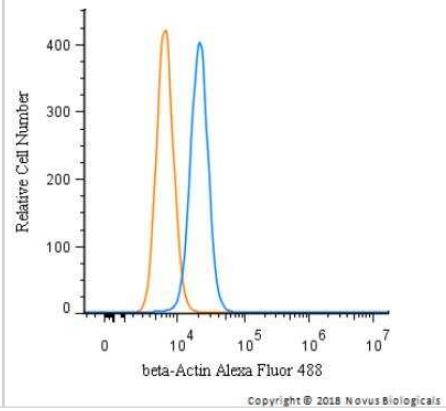
beta-Actin Antibody

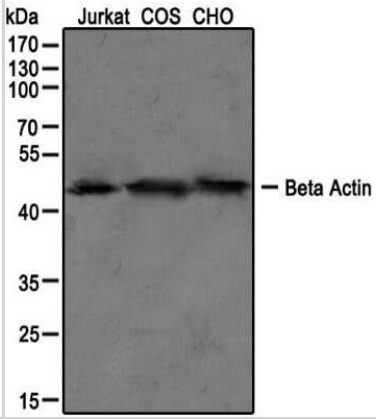
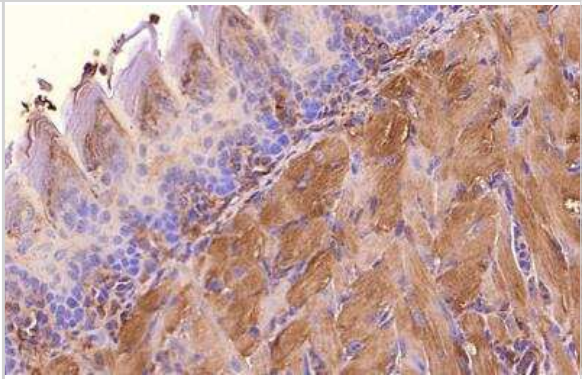
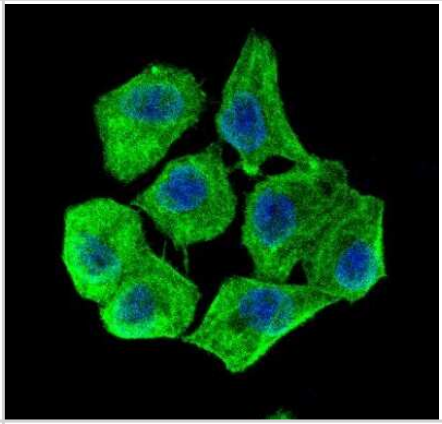
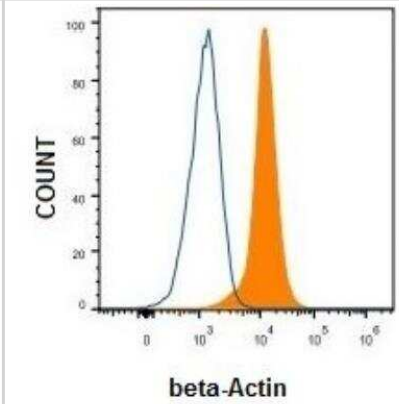
Product Information	
Unit Size	0.05 ml
Concentration	1.0 mg/ml
Storage	Store at 4C. Do not freeze.
Clonality	Polyclonal
Preservative	0.09% Sodium Azide
Isotype	IgG
Purity	Immunogen affinity purified
Buffer	Tris-Citrate/Phosphate (pH 7.0 - 8.0)
Target Molecular Weight	42 kDa

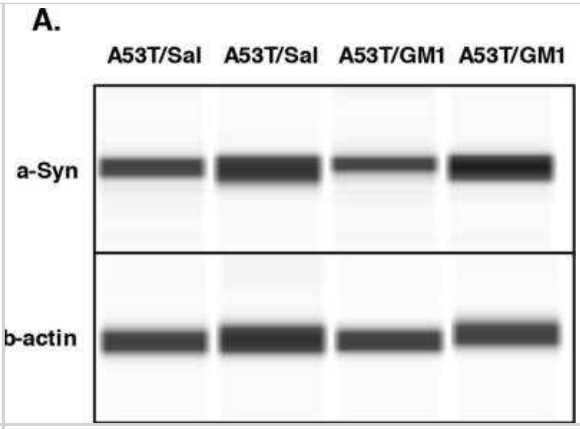
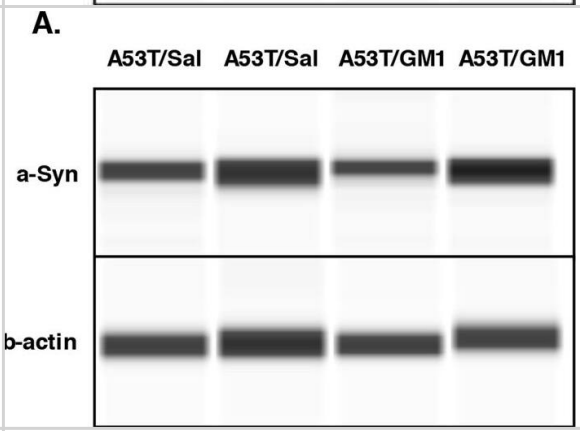
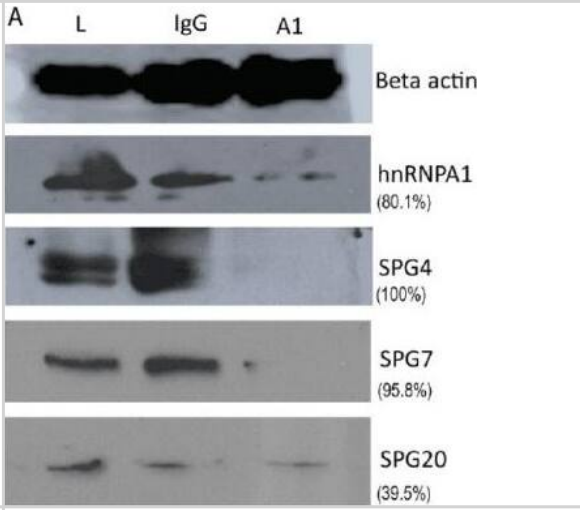
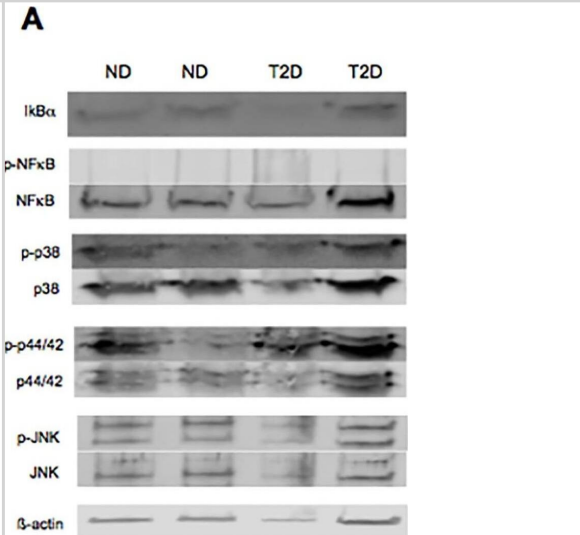
Product Description	
Host	Rabbit
Gene ID	60
Gene Symbol	ACTB
Species	Human, Mouse, Rat, Porcine, Avian, Bovine, Chinese Hamster, Fish, Primate, Rabbit
Reactivity Notes	Rabbit reactivity and Fish reactivity reported in scientific literature (PMID: 23813946 and 25842206 respectively). Expected to cross-react with a wide range of species due to sequence identity. Bovine reactivity reported in scientific literature (PMID:33066332).
Immunogen	This beta-Actin Antibody was made from a synthetic peptide made to an N-terminal region of human Beta Actin. [UniProt P60709]

Product Application Details	
Applications	Western Blot, Simple Western, ELISA, Flow Cytometry, Immunocytochemistry/ Immunofluorescence, Immunohistochemistry, Immunohistochemistry-Paraffin, Immunoprecipitation, Proximity Ligation Assay, Block/Neutralize
Recommended Dilutions	Western Blot 1:100-1:2000, Simple Western 1:12.5, Flow Cytometry 1:10-1:1000, ELISA, Immunohistochemistry 1:100, Immunocytochemistry/ Immunofluorescence, Immunoprecipitation 1:10-1:500, Immunohistochemistry-Paraffin 1:100, Proximity Ligation Assay, Block/Neutralize
Application Notes	Simple Western reported by an internal validation. Separated by Size- Wes/Sally Sue/Peggy Sue, antibody dilution of 1:50. Apparent MW in kDa on Simple Western was 47 kDa; matrix was 12-230.

Images

Immunocytochemistry/Immunofluorescence: beta-Actin Antibody [NB600-503] - Cultured pig trabecular meshwork cells stained with beta-Actin antibody at a dilution of 1:500 followed by an anti-rabbit Alexa Fluor488 at 1:1000 dilution (green). Image from verified customer review.	
Western Blot: beta-Actin Antibody [NB600-503] - Rabbit polyclonal at 1/5000.	
Simple Western: beta-Actin Antibody [NB600-503] - Simple Western lane view shows a specific band for Beta Actin in 0.1 mg/ml of HeLa lysate. This experiment was performed under reducing conditions using the 12-230 kDa separation system.	
Flow Cytometry: beta-Actin Antibody [NB600-503] - An intracellular stain was performed on HeLa cells with beta-actin Antibody NB600-503AF488 (blue) and a matched isotype control (orange). Cells were fixed with 4% PFA and then permeabilized with 0.1% saponin. Cells were incubated in an antibody dilution of 5 ug/mL for 30 minutes at room temperature. Both antibodies were conjugated to Alexa Fluor 488.	

Western Blot: beta-Actin Antibody [NB600-503] - Western blot analysis of Jurkat, COS, and CHO cell lysate using beta actin antibody at 1:100.	
Immunohistochemistry-Paraffin: beta-Actin Antibody [NB600-503] - Analysis of Beta Actin in mouse epidermis using DAB with hematoxylin counterstain.	
Immunocytochemistry/Immunofluorescence: beta-Actin Antibody [NB600-503] - IF Confocal analysis of HeLa cells using Beta Actin antibody (NB600-503, 1:5). An Alexa Fluor 488-conjugated Goat to rabbit IgG was used as secondary antibody (green). DAPI was used to stain the cell nuclei (blue).	
Flow Cytometry: beta-Actin Antibody [NB600-503] - Analysis of HeLa cells using mouse Monoclonal beta-Actin antibody (Orange) and Isotype control Antibody (Blue).	

Simple Western: beta-Actin Antibody [NB600-503] - Early start GM1 administration did not affect alpha-synuclein expression or transport to the striatum. When assessed 1 week following AAV-A53T alpha-synuclein injection, levels of striatal alpha-synuclein were no different in saline (N=6) vs. GM1-treated animals (N=6), suggesting no influence of GM1 on A53T alpha -synuclein transduction or transport to the striatum. Representative Wes Simple Western blots are shown after cropping (full length images of blots are presented as Supplementary Fig. 2. Image collected and cropped by CiteAb from the following publication (https://www.nature.com/articles/s41598-019-42847-x), licensed under a CC-BY license.	
Early start GM1 administration did not affect alpha-synuclein expression or transport to the striatum. (A,B) When assessed 1 week following AAV-A53T alpha-synuclein injection, levels of striatal alpha-synuclein were no different in saline (N = 6) vs. GM1-treated animals (N = 6), suggesting no influence of GM1 on A53T alpha -synuclein transduction or transport to the striatum. Representative Wes Western blots are shown after cropping (full length images of blots are presented as Supplementary Fig. 2. Image collected and cropped by CiteAb from the following publication (https://pubmed.ncbi.nlm.nih.gov/31182727), licensed under a CC-BY licence.	
Anti-hnRNP A1 antibodies alter protein levels as measured by Western blot. SK-N-SH cells were cultured and treated with anti-hnRNP A1 antibodies or control IgG. Following a 48 hour incubation, cells were lysed and protein lysate was run on 10% Tris-glycine gels for Western blot analysis and probed for Beta-actin (A) or GAPDH (B)) (control), hnRNP A1, SPG4, SPG7, and SPG20. Results revealed that there was a marked reduction of SPG 4 and SPG 7 protein levels in anti-hnRNP A1 antibody compared to control isotype IgG treated cells. There was a variable response to hnRNP A1 protein and a modest reduction of SPG 20. Parentheses show relative percent reduction of signal comparing anti-hnRNP A1 antibody to control isotype IgG treatment of cells. (L=lysate, IgG=control isotype IgG, A1=anti-hnRNP A1-M9 antibody treatment of cells). Image collected and cropped by CiteAb from the following publication (https://pubmed.ncbi.nlm.nih.gov/27375925), licensed under a CC-BY licence.	
SPOP expression in gastric cancer. (A) The representative photos of SPOP expression in gastric cancer tissues and adjacent gastric tissues by using immunohistochemical staining (DAB staining, scale bar, 40 μm). Magnified local images reflecting detailed information were shown on the bottom. (B, C) SPOP expression was plotted using the immunochemical scores as described in the Methods. B, plot of SPOP scores in each gastric carcinoma and adjacent tissues. C, scores of SPOP expression are shown as box plots. The horizontal lines represent the median. The bottom and top edges of the boxes represent the 25th and 75th percentiles, respectively. And the vertical bars represent the range of the data. n = 88. (D) Representative immunoblotting of SPOP protein in gastric cancer samples. C refers to gastric cancer tissue and A refers to paired adjacent non-tumor gastric tissue from the same patient. Image collected and cropped by CiteAb from the following open publication (https://pubmed.ncbi.nlm.nih.gov/25204354), licensed under a CC-BY license. Not internally tested by Novus Biologicals.	

Publications

Kirkpatrick LT, Gómez JFM, Beline M et al. Muscle of dark and normal beef differs metabolically Meat Science 2023-09-01 [PMID: 37778129] (WB, Bovine)

Shastri S, Shinde T, Woolley KL et al. Short-Chain Naphthoquinone Protects Against Both Acute and Spontaneous Chronic Murine Colitis by Alleviating Inflammatory Responses Frontiers in Pharmacology 2021-08-23 [PMID: 34497514]

Miroshnikova VV, Panteleeva AA, Bazhenova EA et al. [Regulation of ABCA1 and ABCG1 gene expression in the intraabdominal adipose tissue] Biomeditsinskaya Khimiya 2016-07-16 [PMID: 27420620]

Krysa SJ, Allen LH. Metabolic Reprogramming Mediates Delayed Apoptosis of Human Neutrophils Infected With Francisella tularensis Frontiers in Immunology 2022-05-25 [PMID: 35693822] (WB, B/N)

Kang B, Mottamal M, Zhong Q et al. Design, Synthesis, and Evaluation of Niclosamide Analogs as Therapeutic Agents for Enzalutamide-Resistant Prostate Cancer Pharmaceuticals (Basel, Switzerland) 2023-05-12 [PMID: 37242518] (WB)

Torun YM, Delen E, Doganlar O et al. Effects of Expression of Matrix Metalloproteinases and Discoidin Domain Receptors in Ligamentum Flavum Fibrosis in Patients with Degenerative Lumbar Canal Stenosis Asian spine journal 2022-09-27 [PMID: 36163678] (WB, Human)

Elgin JM Determining the underlying factors of fresh ham color variation Meat Sci 2017-02-19 [PMID: 28214148]

Kinkead LC, Krysa SJ, Allen LH Neutrophil Survival Signaling During Francisella tularensis Infection Frontiers in cellular and infection microbiology 2022-07-06 [PMID: 35873156]

Paul PK, Das R, Drow TJ et al. Pancreatic Stellate Cells Prolong Ex Vivo Islet Viability and Function and Improve Engraftment Stem cells translational medicine 2022-04-19 [PMID: 35438788] (WB)

Song W, Beigneux AP, Winther AL et al. Electrostatic sheathing of lipoprotein lipase is essential for its movement across capillary endothelial cells The Journal of clinical investigation 2022-03-01 [PMID: 35229724] (WB, Mouse)

Ali FF, Mohammed HH, Elroby Ali DM Protective effect of hydrogen sulfide against stress-induced lung injury: involvement of Nrf2, NF kappa B/iNOS, and HIF-1 alpha signaling pathways Cell stress & chaperones 2021-12-08 [PMID: 34881408]

Kirkpatrick LT, Elgin JM, Matarneh SK et al. Inherent factors influence color variations in semimembranosus muscle of pigs Meat science 2021-12-10 [PMID: 34923395] (WB, Porcine)

More publications at http://www.novusbio.com/NB600-503

Novus Biologicals USA
10730 E. Briarwood Avenue
Centennial, CO 80112
USA
Phone: 303.730.1950
Toll Free: 1.888.506.6887
Fax: 303.730.1966
nb-customerservice@bio-techne.com

Bio-Techne Canada
21 Canmotor Ave
Toronto, ON M8Z 4E6
Canada
Phone: 905.827.6400
Toll Free: 855.668.8722
Fax: 905.827.6402
canada.inquires@bio-techne.com

Bio-Techne Ltd
19 Barton Lane
Abingdon Science Park
Abingdon, OX14 3NB, United Kingdom
Phone: (44) (0) 1235 529449
Free Phone: 0800 37 34 15
Fax: (44) (0) 1235 533420
info.EMEA@bio-techne.com

General Contact Information
www.novusbio.com
Technical Support: nb-technical@bio-techne.com
Orders: nb-customerservice@bio-techne.com
General: novus@novusbio.com

Products Related to NB600-503

NB800-PC1	HeLa Whole Cell Lysate
HAF008	Goat anti-Rabbit IgG Secondary Antibody [HRP]
NB7160	Goat anti-Rabbit IgG (H+L) Secondary Antibody [HRP]
NBP2-24891	Rabbit IgG Isotype Control

Limitations
This product is for research use only and is not approved for use in humans or in clinical diagnosis. Primary Antibodies are guaranteed for 1 year from date of receipt.

For more information on our 100% guarantee, please visit www.novusbio.com/guarantee

Earn gift cards/discounts by submitting a review: www.novusbio.com/reviews/submit/NB600-503

Earn gift cards/discounts by submitting a publication using this product: www.novusbio.com/publications