Product Datasheet

S5a/Angiocidin Antibody - BSA Free
NBP2-19952

Unit Size: 0.1 ml

Aliquot and store at -20C or -80C. Avoid freeze-thaw cycles.

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Publications: 2

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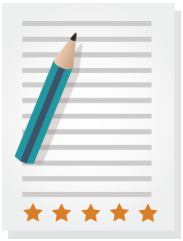
Updated 10/19/2025 v.20.1



NBP2-19952

S5a/Angiocidin Antibody - BSA Free

Product Information

Unit Size	0.1 ml
Concentration	Concentrations vary lot to lot. See vial label for concentration. If unlisted please contact technical services.
Storage	Aliquot and store at -20C or -80C. Avoid freeze-thaw cycles.
Clonality	Polyclonal
Preservative	0.01% Thimerosal
Isotype	IgG
Purity	Antigen Affinity-purified
Buffer	0.1M Tris, 0.1M Glycine, 20% Glycerol
Target Molecular Weight	41 kDa

Product Description

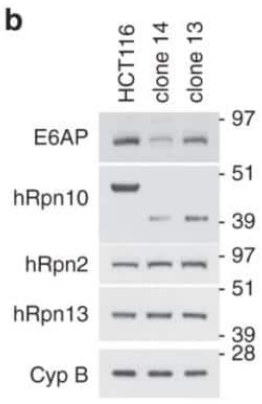
Description	Novus Biologicals Rabbit S5a/Angiocidin Antibody - BSA Free (NBP2-19952) is a polyclonal antibody validated for use in WB and ICC/IF. Anti-S5a/Angiocidin Antibody: Cited in 2 publications. All Novus Biologicals antibodies are covered by our 100% guarantee.
Host	Rabbit
Gene ID	5710
Gene Symbol	PSMD4
Species	Human
Reactivity Notes	Xenopus laevis (90%).
Immunogen	Recombinant protein encompassing a sequence within the center region of human S5a/Angiocidin. The exact sequence is proprietary.

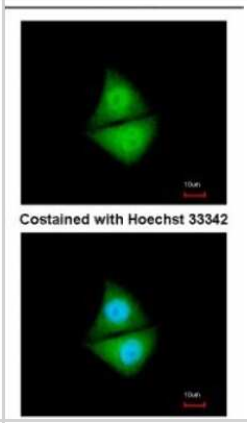
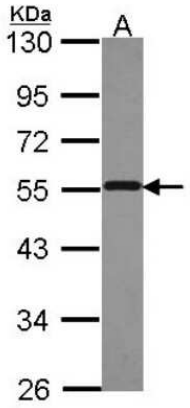
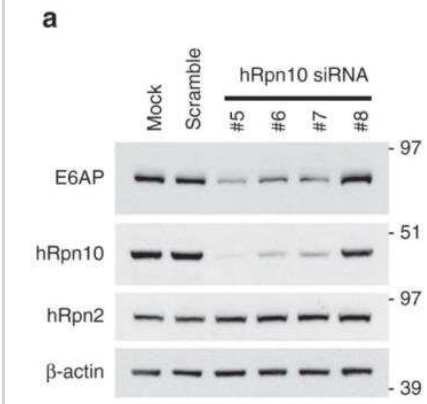
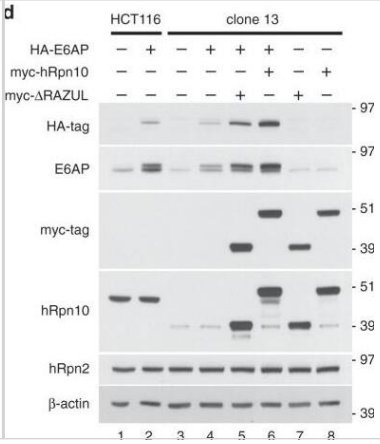
Product Application Details

Applications	Western Blot, Immunocytochemistry/ Immunofluorescence, Knockdown Validated
Recommended Dilutions	Western Blot 1:500-1:3000, Immunocytochemistry/ Immunofluorescence 1:100-1:1000, Knockdown Validated

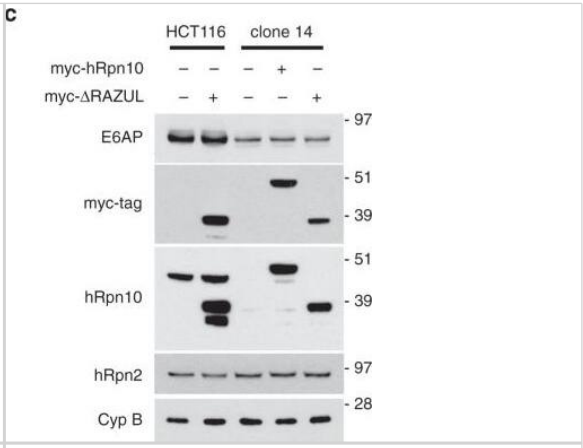
Images

Western Blot: S5a/Angiocidin Antibody [NBP2-19952] - Immunoblots of parental HCT116 cells and two clonal cell lines (clone 14 and clone 13) generated by CRISPR-mediated truncation of hRpn10. Image collected and cropped by CiteAb from the following publication (nature.com/articles/s41467-020-15073-7), licensed under a CC-BY license.

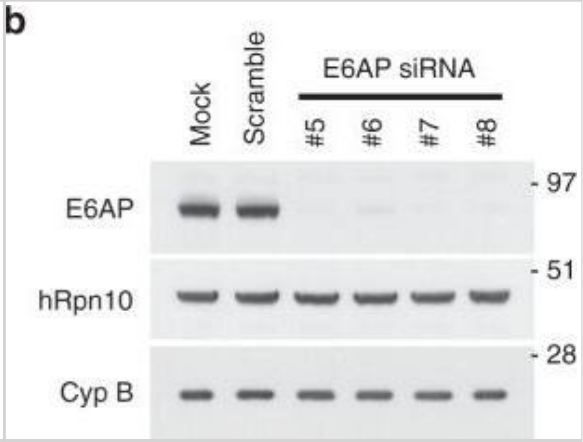


Immunocytochemistry/Immunofluorescence: Proteasome 19S S5A Antibody [NBP2-19952] - Immunofluorescence analysis of paraformaldehyde-fixed A549, using antibody at 1:200 dilution.	
Western Blot: Proteasome 19S S5A Antibody [NBP2-19952] - Sample (30 ug of whole cell lysate) A: Hela 10% SDS PAGE gel, diluted at 1:1000.	
Western Blot: S5a/Angiocidin Antibody [NBP2-19952] - hRpn10 was knocked down in HCT116 cells by four different siRNAs and the cell lysates immunoprobed as indicated. Mock and scrambled control samples are included. b-actin is used as a loading control. Image collected and cropped by CiteAb from the following publication (nature.com/articles/s41467-020-15073-7), licensed under a CC-BY license.	
Western Blot: S5a/Angiocidin Antibody [NBP2-19952] - E6AP levels depend on hRpn10.hRpn10 (a) or E6AP (b) was knocked down in HCT116 cells by four different siRNAs & the cell lysates immunoprobed as indicated. Mock & scrambled control samples are included. β-actin is used as a loading control in a & d. c Lysates from HCT116 or clone 14 cells expressing myc-hRpn10 constructs were immunoprobed as indicated. d Lysates from HCT116 or clone 13 cells expressing HA-E6AP and/or myc-hRpn10 constructs were immunoprobed as indicated. a–d Antibodies used for immunoprobing are indicated to the left of each panel. Source data are provided as a Source Data file. Image collected & cropped by CiteAb from the following publication (https://pubmed.ncbi.nlm.nih.gov/32157086), licensed under a CC-BY license. Not internally tested by Novus Biologicals.	

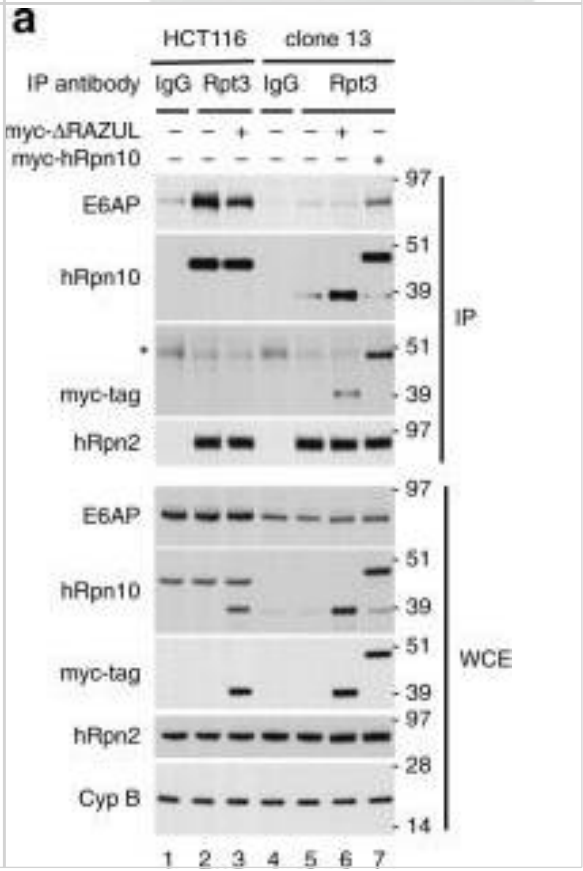
Western Blot: S5a/Angiocidin Antibody [NBP2-19952] - E6AP levels depend on hRpn10.hRpn10 (a) or E6AP (b) was knocked down in HCT116 cells by four different siRNAs & the cell lysates immunoprobed as indicated. Mock & scrambled control samples are included. β-actin is used as a loading control in a & d. c Lysates from HCT116 or clone 14 cells expressing myc-hRpn10 constructs were immunoprobed as indicated. d Lysates from HCT116 or clone 13 cells expressing HA-E6AP and/or myc-hRpn10 constructs were immunoprobed as indicated. a–d Antibodies used for immunoprobing are indicated to the left of each panel. Source data are provided as a Source Data file. Image collected & cropped by CiteAb from the following publication (https://pubmed.ncbi.nlm.nih.gov/32157086), licensed under a CC-BY license. Not internally tested by Novus Biologicals.



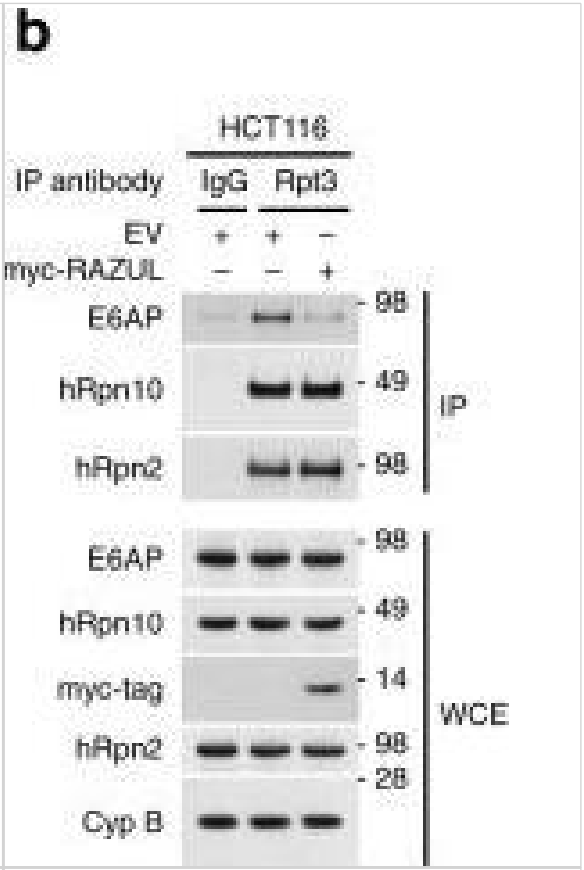
Western Blot: S5a/Angiocidin Antibody [NBP2-19952] - E6AP levels depend on hRpn10.hRpn10 (a) or E6AP (b) was knocked down in HCT116 cells by four different siRNAs & the cell lysates immunoprobed as indicated. Mock & scrambled control samples are included. β-actin is used as a loading control in a & d. c Lysates from HCT116 or clone 14 cells expressing myc-hRpn10 constructs were immunoprobed as indicated. d Lysates from HCT116 or clone 13 cells expressing HA-E6AP and/or myc-hRpn10 constructs were immunoprobed as indicated. a–d Antibodies used for immunoprobing are indicated to the left of each panel. Source data are provided as a Source Data file. Image collected & cropped by CiteAb from the following publication (https://pubmed.ncbi.nlm.nih.gov/32157086), licensed under a CC-BY license. Not internally tested by Novus Biologicals.



Western Blot: S5a/Angiocidin Antibody [NBP2-19952] - hRpn10 RAZUL contributes E6AP to the proteasome.a Immunoblots of Rpt3 immunoprecipitates or WCE from HCT116 or clone 13 lysates expressing myc-hRpn10 constructs. An asterisk "*" indicates heavy chain antibody. Cyclophilin B (Cyp B) is used as a loading control for WCE samples in a–c & hRpn2 as a positive control for the immunoprecipitation. IgG controls are included. b, d Immunoblots of Rpt3 or IgG (control) immunoprecipitates or WCE of lysates from HCT116 cells transfected with empty vector (as a control) or myc-hRpn10 RAZUL. c Immunoblots of Rpt3 immunoprecipitates or WCE from lysates of HCT116 cells transfected with a scrambled control or siRNA against E6AP. a–d Antibodies used for immunoprobing are indicated to the left of each panel. e Pull-down assay for a commercially available mixture of His6-tagged, non-cleavable K48-linked Ub2/Ub4 with incubation of human 26S proteasome (lane 6), 26S proteasome with equimolar E6AP (lane 7), or just E6AP (lane 8). E6AP or 26S proteasome was added to Ni-NTA agarose resin as negative controls (lanes 4 & 5). K48-linked Ub2/Ub4, E6AP, & 26S proteasome were loaded directly in lanes 1–3, as indicated. f Selected regions from 1D 13C-edited, 1H NMR experiments acquired at 850 MHz & 25 °C for free 13C-AZUL (black) or mixtures with equimolar unlabeled RAZUL (blue) or 26S proteasome (red). The concentration of each sample was 0.3 μM & 200,000 scans were recorded for each experiment. Source data are provided as a Source Data file. Image collected & cropped by CiteAb from the following publication (https://pubmed.ncbi.nlm.nih.gov/32157086), licensed under a CC-BY license. Not internally tested by Novus Biologicals.



Western Blot: S5a/Angiocidin Antibody [NBP2-19952] - hRpn10 RAZUL contributes E6AP to the proteasome.a Immunoblots of Rpt3 immunoprecipitates or WCE from HCT116 or clone 13 lysates expressing myc-hRpn10 constructs. An asterisk "*" indicates heavy chain antibody. Cyclophilin B (Cyp B) is used as a loading control for WCE samples in a–c & hRpn2 as a positive control for the immunoprecipitation. IgG controls are included. b, d Immunoblots of Rpt3 or IgG (control) immunoprecipitates or WCE of lysates from HCT116 cells transfected with empty vector (as a control) or myc-hRpn10 RAZUL. c Immunoblots of Rpt3 immunoprecipitates or WCE from lysates of HCT116 cells transfected with a scrambled control or siRNA against E6AP. a–d Antibodies used for immunoprobing are indicated to the left of each panel. e Pull-down assay for a commercially available mixture of His6-tagged, non-cleavable K48-linked Ub2/Ub4 with incubation of human 26S proteasome (lane 6), 26S proteasome with equimolar E6AP (lane 7), or just E6AP (lane 8). E6AP or 26S proteasome was added to Ni-NTA agarose resin as negative controls (lanes 4 & 5). K48-linked Ub2/Ub4, E6AP, & 26S proteasome were loaded directly in lanes 1–3, as indicated. f Selected regions from 1D 13C-edited, 1H NMR experiments acquired at 850 MHz & 25 °C for free 13C-AZUL (black) or mixtures with equimolar unlabeled RAZUL (blue) or 26S proteasome (red). The concentration of each sample was 0.3 μM & 200,000 scans were recorded for each experiment. Source data are provided as a Source Data file. Image collected & cropped by CiteAb from the following publication (https://pubmed.ncbi.nlm.nih.gov/32157086), licensed under a CC-BY license. Not internally tested by Novus Biologicals.



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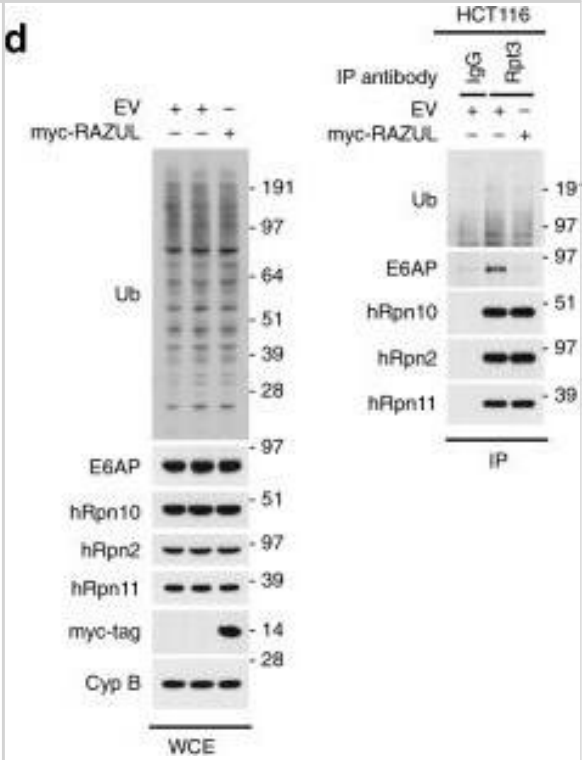

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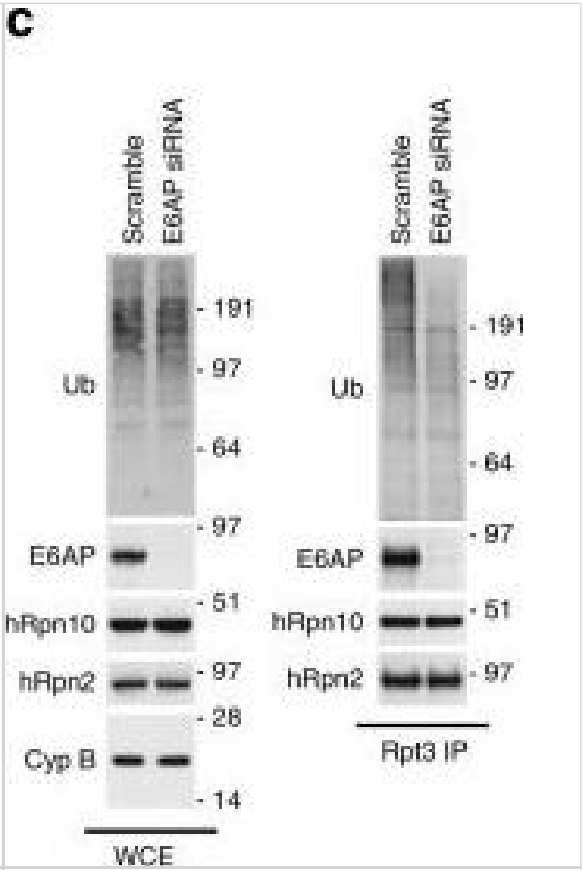
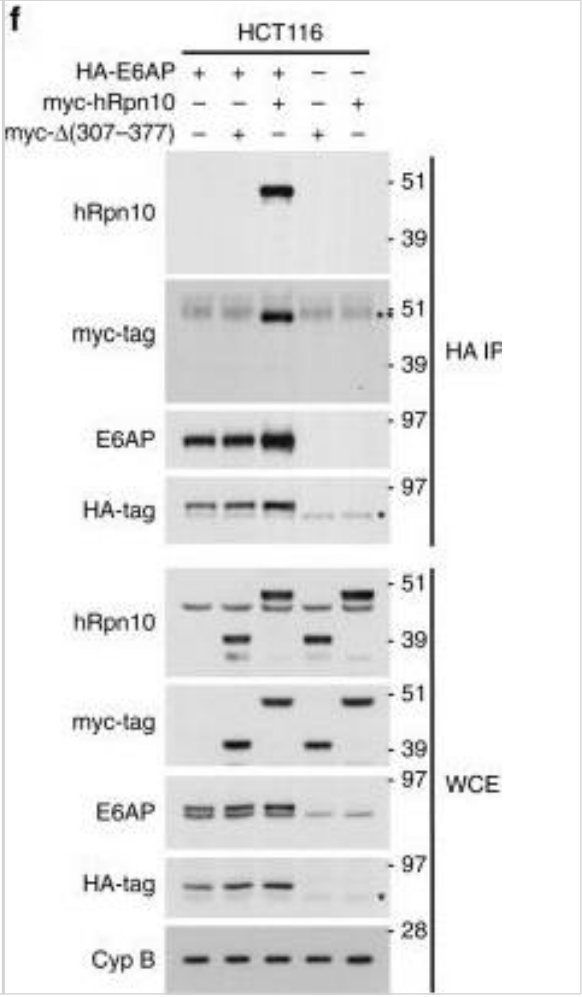


Western Blot: S5a/Angiocidin Antibody [NBP2-19952] - A C-terminal domain in hRpn10 binds E6AP AZUL.a Positions of known functional domains within hRpn10 (top) & E6AP isoform II (bottom). Question mark "?" indicates hRpn10 uncharacterized region & the E6AP catalytic cysteine C843 is indicated. b Pull-down assay of His-tagged hRpn10full-length (full), hRpn10196–377 or hRpn10196–306 without (−) or with (+) incubation of E6AP. c1H, 15N HSQC spectra of 0.2 mM 15N-hRpn10305–377 (black) & with twofold molar excess unlabeled AZUL (green). Shifted signals are labeled. d Table summarizing Kd, kon, & koff average values with standard deviations for the hRpn10305–377: AZUL interaction measured by ITC and/or SPR. N/A, not applicable. e HCT116 lysates expressing empty vector, myc-hRpn10 full length, or myc-Rpn10 with RAZUL deleted (Δ307–377) were subjected to myc-immunoprecipitation with anti-myc-tag nanobody-coupled agarose. Whole cell extracts (WCE) & myc-immunoprecipitates were immunoprobed with the indicated antibodies. Cyclophilin B (Cyp B) is used as a loading control in e & f. f Lysates from HCT116 cells expressing HA-E6AP & the myc-hRpn10 constructs of e were subjected to HA IP followed by immunoblotting with the indicated antibodies. An asterisk "*" indicates non-specific interaction; double asterisk "**" indicates heavy chain antibody. e–f All antibodies used for immunoprobing are indicated to the left of the images. Note that the hRpn10 & E6AP antibodies recognize both endogenous & exogenously expressed protein, causing these panels to show both tagged & endogenous protein. g Schematic representation highlighting interaction domains of hRpn10 including newly identified RAZUL. Source data are provided as a Source Data file. Image collected & cropped by CiteAb from the following publication (https://pubmed.ncbi.nlm.nih.gov/32157086), licensed under a CC-BY license. Not internally tested by Novus Biologicals.



Publications

Osei-Amponsa V, Sridharan V, Tandon M et al. Impact of losing hRpn13 Pru or UCHL5 on proteasome clearance of ubiquitinated proteins and RA190 cytotoxicity Mol. Cell. Biol. 2020-07-06 [PMID: 32631902]

Structure of E3 ligase E6AP with a proteasome-binding site provided by substrate receptor hRpn10 Buel GR, Chen X, Chari R et al. Nat Commun [PMID: 32157086] (KD, WB, Human)

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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.

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