# **Product Datasheet**

# PSGL-1/CD162 Antibody (HECA-452) - BSA Free NB100-78039

Unit Size: 0.1 ml

Store at 4C short term. Aliquot and store at -20C long term. Avoid freeze-thaw cycles.

www.novusbio.com



technical@novusbio.com

Reviews: 1 Publications: 12

Protocols, Publications, Related Products, Reviews, Research Tools and Images at: www.novusbio.com/NB100-78039

Updated 2/21/2025 v.20.1

Earn rewards for product reviews and publications.

Submit a publication at www.novusbio.com/publications
Submit a review at www.novusbio.com/reviews/destination/NB100-78039



#### NB100-78039

PSGL-1/CD162 Antibody (HECA-452) - BSA Free

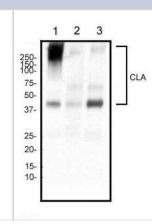
Product Information	
Unit Size	0.1 ml
Concentration	1.0 mg/ml
Storage	Store at 4C short term. Aliquot and store at -20C long term. Avoid freeze-thaw cycles.
Clonality	Monoclonal
Clone	HECA-452
Preservative	0.02% Sodium Azide
Isotype	IgM Kappa
Purity	IgM purified
Buffer	PBS

Product Description	
Host	Rat
Gene ID	6404
Gene Symbol	SELPLG
Species	Human, Mouse
Specificity/Sensitivity	CLA antibody clone HECA-452 is known to recognize the cutaneous lymphocyte-associated antigen / CLA which is a specialized glycosylated form of P-selectin glycoprotein ligand-1/PSGL-1. Besides lymphocytes, this clone has been shown to react with normal endometrium as well as breast cancer tissues (PMID 19625313 and 22970241).
Immunogen	Human tonsil stroma

<b>Product Application Details</b>	
Applications	Western Blot, ELISA, Flow Cytometry, Flow (Cell Surface), Immunocytochemistry/ Immunofluorescence, Immunohistochemistry, Immunohistochemistry-Frozen, Immunohistochemistry-Paraffin, CyTOF-ready
Recommended Dilutions	Western Blot 2 ug/ml, Flow Cytometry < = 2 ug/10^6 cells in 100 ul, ELISA, Immunohistochemistry 1:10-1:500, Immunocytochemistry/ Immunofluorescence reported in scientific literature (PMID 1693467), Immunohistochemistry-Paraffin 1:10-1:500, Immunohistochemistry-Frozen 1:10-1:500, Flow (Cell Surface), CyTOF-ready

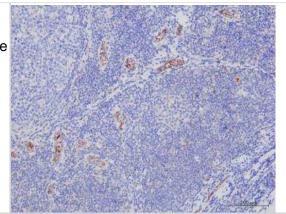
#### **Images**

Western Blot: PSGL-1/CD162 Antibody (HECA-452) [NB100-78039] - Cutaneous Lymphocyte Antigen (CLA) Antibody (HECA-452) [NB100-78039] - Analysis of human tonsil (1), human spleen (2), and human lymph node (3) tissue using CD162 antibody at a concentration of 2 ug/ml.

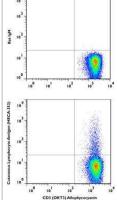




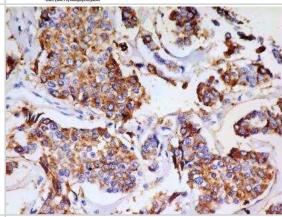
Immunohistochemistry-Paraffin: PSGL-1/CD162 Antibody (HECA-452) [NB100-78039] - Human tonsil tissue stained with PSGL-1/CD162 Antibody (HECA-452) at 5ug/mL, and Leica Refine DAB kit. IHC-P image submitted by a verified customer review.



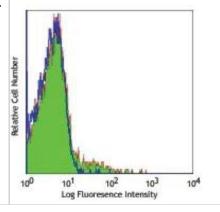
Flow (Cell Surface): PSGL-1/CD162 Antibody (HECA-452) [NB100-78039] - Cutaneous Lymphocyte Antigen (CLA) Antibody (HECA-452) [NB100-78039] - A cell surface stain was performed on CD3+ hPBMCs with Cutaneous Lymphocyte Antigen (CLA) antibody (HECA-452) NB100-78039 and a matched isotype control NBP2-31379. Cells were incubated in an antibody dilution of 1 ug/mL for 20 minutes at room temperature, followed by mouse F(ab)2 IgG (H+L) APC-conjugated secondary antibody [F0101B, R&D Systems]. A co-stain was performed using CD3 antibody NBP2-25186APC.



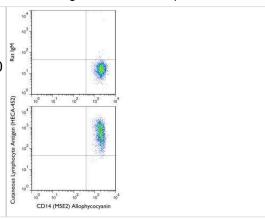
Immunohistochemistry-Paraffin: PSGL-1/CD162 Antibody (HECA-452) [NB100-78039] - Cutaneous Lymphocyte Antigen (CLA) Antibody (HECA-452) [NB100-78039] - IHC analysis of formalin-fixed paraffinembedded tissue section of human breast adenocarcinoma using CLA antibody (clone HECA-452) at 5 ug/ml concentration. The antibody generated a membrane-cytoplasmic staining in the cancerous cells of breast adenocarcinoma. Note:- Besides lymphocytes, CLA has been shown to be present on cells of normal endometrium as well as breast cancer tissues (PMID 19625313 and 22970241).



Flow Cytometry: PSGL-1/CD162 Antibody (HECA-452) [NB100-78039] - Cutaneous Lymphocyte Antigen (CLA) Antibody (HECA-452) [NB100-78039] - Human peripheral blood lymphocytes stained with purified HECA-452, followed by anti-mouse IgG FITC



Flow (Cell Surface): PSGL-1/CD162 Antibody (HECA-452) [NB100-78039] - Cutaneous Lymphocyte Antigen (CLA) Antibody (HECA-452) [NB100-78039] - A cell surface stain was performed on CD14+ hPBMCs with Cutaneous Lymphocyte Antigen (CLA) antibody (HECA-452) NB100 -78039 and a matched isotype control NBP2-31379. Cells were incubated in an antibody dilution of 1 ug/mL for 20 minutes at room temperature, followed by rat-Dylight 488 conjugated secondary antibody. A co-stain was performed using CD14 antibody NB100-77758AF488.



#### **Publications**

Qi Xu, Ming Shi, Lu Ding, Yu Xia, Liang Luo, Xiaofang Lu, Xiaoying Zhang, David Y. B. Deng High expression of P-selectin induces neutrophil extracellular traps via the PSGL-1/Syk/Ca 2+ /PAD4 pathway to exacerbate acute pancreatitis Frontiers in Immunology 2023-09-28 [PMID: 37841279]

Li GX, Jiang XH, Zang JN et al. B-cell receptor associated protein 31 deficiency decreases the expression of adhesion molecule CD11b/CD18 and PSGL-1 in neutrophils to ameliorate acute lung injury The International Journal of Biochemistry & Cell Biology 2022-11-01 [PMID: 36210579] (Western Blot, Block/Neutralize)

Shi H, Jiang C, Yao H et al. CD44 fucosylation on bone marrow-derived mesenchymal stem cells enhances homing and promotes enteric nervous system remodeling in diabetic mice Cell & Bioscience 2021-12-01 [PMID: 34193268] (Mouse)

Yeini E, Ofek P, Pozzi S et al. P-selectin axis plays a key role in microglia immunophenotype and glioblastoma progression Nature communications 2021-03-26 [PMID: 33771989] (FLOW)

Yamanaka K, Dimitroff CJ, Fuhlbrigge RC et al. Vitamins A and D are potent inhibitors of cutaneous lymphocyte-associated antigen expression. J Allergy Clin Immunol. 2008-01-01 [PMID: 17910894] (WB)

Picker LJ, Michie SA, Rott LS, Butcher EC. A unique phenotype of skin-associated lymphocytes in humans. Preferential expression of the HECA-452 epitope by benign and malignant T cells at cutaneous sites. Am J Pathol. 1990-05-01 [PMID: 1693467] (IF/IHC, WB, FLOW)

Walcheck B, Leppanen A, Cummings R et al. The monoclonal antibody CHO-131 binds to a core 2 O-glycan terminated with sialyl-Lewis x, which is a functional glycan ligand for P-selectin. Blood. 2002-06-01 [PMID: 12010808] (FLOW, ELISA)

Borges E, Pendl G, Eytner R et al. The binding of T cell-expressed P-selectin glycoprotein ligand-1 to E- and P-selectin is differentially regulated. J Biol Chem. 1997-11-01 [PMID: 9353350]

Picker LJ, Kishimoto TK, Smith CW et al. ELAM-1 is an adhesion molecule for skin-homing T cells. Nature. 1991-02-01 [PMID: 1705666]

Berg EL, Yoshino T, Rott LS et al. The cutaneous lymphocyte antigen is a skin lymphocyte homing receptor for the vascular lectin endothelial cell-leukocyte adhesion molecule 1. J Exp Med. 1991-12-01 [PMID: 1720810]

Duijvestijn AM, Horst E, Pals ST et al. High endothelial differentiation in human lymphoid and inflammatory tissues defined by monoclonal antibody HECA-452. Am J Pathol. 1988-01-01 [PMID: 3276207]

Kim CH, Cheong KA, Park CD, Lee AY. Therapeutic Effects of Combination Using Glucosamine Plus Tacrolimus (FK-506) on The Development of Atopic Dermatitis-Like Skin Lesions in NC/Nga Mice. Scand J Immunol;75(5):471-8. 2012-05-01 [PMID: 22023698] (IF/IHC, Mouse)





### **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 NB100-78039**

NBL1-15720 SR-BI Overexpression Lysate

HAF005 Goat anti-Rat IgG Secondary Antibody [HRP]

F0105B Goat anti-Rat IgG Secondary Antibody [Phycoerythrin]

NBP1-43320-0.5mg Rat IgM Kappa Light Chain Isotype Control (eBRM)

#### 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/NB100-78039

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

