Product Datasheet

Hexokinase 2 Antibody (3D3)
NBP1-51643

Unit Size: 0.1 ml

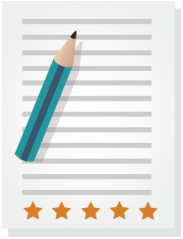
Store at 4C short term. Aliquot and store at -20C long term. Avoid freeze-thaw cycles.

www.novusbio.com technical@novusbio.com

Publications: 4

Protocols, Publications, Related Products, Reviews, Research Tools and Images at:
www.novusbio.com/NBP1-51643

Updated 9/9/2025 v.20.1



NBP1-51643

Hexokinase 2 Antibody (3D3)

Product Information

Unit Size	0.1 ml
Concentration	This product is unpurified. The exact concentration of antibody is not quantifiable.
Storage	Store at 4C short term. Aliquot and store at -20C long term. Avoid freeze-thaw cycles.
Clonality	Monoclonal
Clone	3D3
Preservative	0.03% Sodium Azide
Isotype	IgG1
Purity	Unpurified
Buffer	Ascites
Target Molecular Weight	102 kDa

Product Description

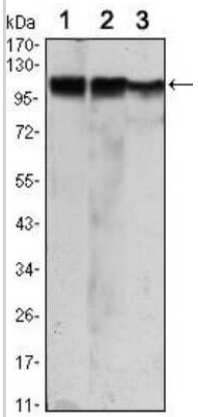
Description	Novus Biologicals Mouse Hexokinase 2 Antibody (3D3) (NBP1-51643) is a monoclonal antibody validated for use in IHC, WB, ELISA and Flow. Anti-Hexokinase 2 Antibody: Cited in 4 publications. All Novus Biologicals antibodies are covered by our 100% guarantee.
Host	Mouse
Gene ID	3099
Gene Symbol	HK2
Species	Human, Rat
Reactivity Notes	Rat reactivity reported in scientific literature (PMID: 29137232)..
Immunogen	Purified recombinant fragment of human Hexokinase 2 expressed in E. Coli.

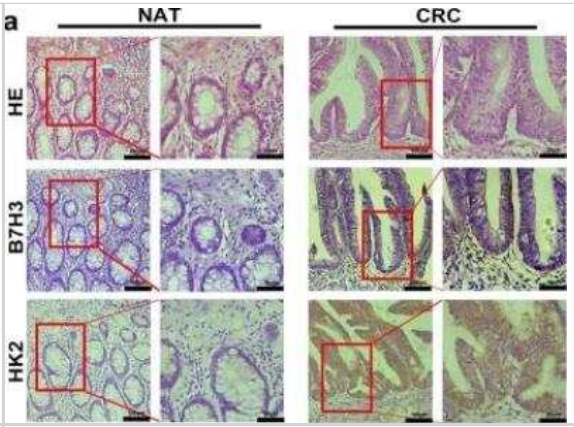
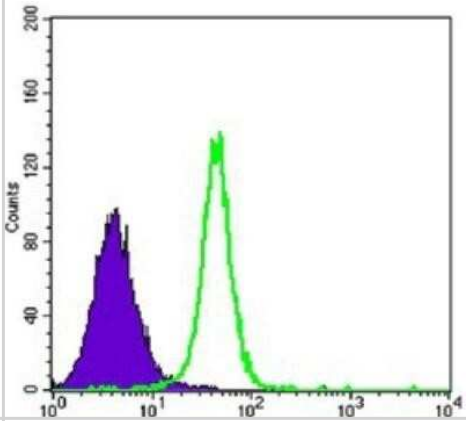
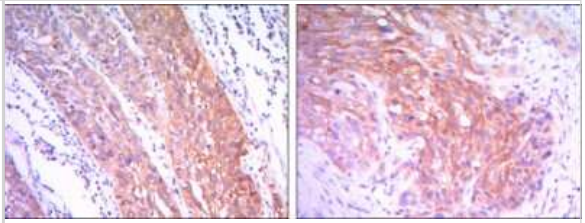
Product Application Details

Applications	Western Blot, Immunohistochemistry-Paraffin, ELISA, Flow Cytometry, Immunohistochemistry, Knockdown Validated
Recommended Dilutions	Western Blot 1:500 - 1:2000, Flow Cytometry 1:200 - 1:400, ELISA 1:10000, Immunohistochemistry 1:200 - 1:1000, Immunohistochemistry-Paraffin 1:200 - 1:1000, Knockdown Validated

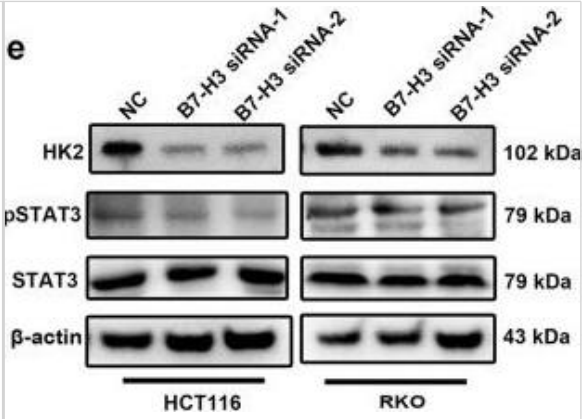
Images

Western Blot: Hexokinase 2 Antibody (3D3) [NBP1-51643] - Analysis using HK2 mouse mAb against Jurkat (1), Hela (2) and HEK293 (3) cell lysate.



Immunohistochemistry: Hexokinase 2 Antibody (3D3) [NBP1-51643] - Images of IHC analysis of B7-H3 and HK2 protein expression and hematoxylin and eosin (H&E) staining of CRC (n=126) tissue sections. One representative image is shown. Image collected and cropped by CiteAb from the following publication (nature.com/articles/s41419-019-1549-6), licensed under a CC-BY license.	
Flow Cytometry: Hexokinase 2 Antibody (3D3) [NBP1-51643] - Analysis of K562 cells using HK2 mouse mAb (green) and negative control (purple).	
Immunohistochemistry-Paraffin: Hexokinase 2 Antibody (3D3) [NBP1-51643] - Analysis of esophagus cancer tissues (left) and human lung cancer (right) using HK2 mouse mAb with DAB staining.	
Western Blot: Hexokinase 2 Antibody (3D3) - BSA Free [NBP1-51643] - B7-H3 regulated glycolysis through HK2.a The protein level of HK2 in B7-H3-overexpressing HCT116 or RKO cells after transfection with siRNA negative control (NC) or HK2 siRNA transfection were analyzed by western blot. β-actin served as a loading control. b, c Glucose consumption (b) & lactate production (c) were measured in B7-H3-overexpressing HCT116 or RKO cells transfected with NC or HK2 siRNA. d, e Glucose consumption (d) & lactate production (e) were measured in B7-H3-overexpressing HCT116 or RKO cells treated with PBS or 2-DG. Values are expressed as means (SEMs). Five samples were analyzed per condition, & the experiments were performed in triplicate. *P < 0.05 Image collected & cropped by CiteAb from the following publication (https://pubmed.ncbi.nlm.nih.gov/30952834), licensed under a CC-BY license. Not internally tested by Novus Biologicals.	

Western Blot: Hexokinase 2 Antibody (3D3) - BSA Free [NBP1-51643] - B7-H3 promoted the expression of HK2 in CRC cells.a, b The expression of glycolysis-related genes was detected by RT-qPCR in both B7-H3-overexpressing HCT116 (a) & RKO (b) cells. c, d The mRNA level of HK2 was detected by RT-qPCR in both HCT116 (c) & RKO (d) cells after transfection with siRNA NC, B7-H3 siRNA-1 or B7-H3 siRNA-2. e HK2 protein level & STAT3 activation (examined by the p-STAT3 expression level) were detected by western blot in both HCT116 & RKO cells after transfection with NC, B7-H3 siRNA-1 or B7-H3 siRNA-2. β-actin served as a loading control. f HK2 protein level & STAT3 activation (examined by the p-STAT3 expression level) were detected by western blot in both B7-H3-overexpressing HCT116 & RKO cells. β-actin served as a loading control. g Schematic representation of the proposed B7-H3/STAT3/HK2 axis. Values are expressed as means (SEMs). Five samples were analyzed per condition, & the experiments were performed in triplicate. *P < 0.05 Image collected & cropped by CiteAb from the following publication (https://pubmed.ncbi.nlm.nih.gov/30952834), licensed under a CC-BY license. Not internally tested by Novus Biologicals.



Publications

Fong LY, Huebner K, Jing R et al. Zinc treatment reverses and anti-Zn-regulated miRs suppress esophageal carcinomas in vivo Proceedings of the National Academy of Sciences of the United States of America 2023-05-16 [PMID: 37155893]

Shi, T;Ma, Y;Cao, L;Zhan, S;Xu, Y;Fu, F;Liu, C;Zhang, G;Wang, Z;Wang, R;Lu, H;Lu, B;Chen, W;Zhang, X; B7-H3 promotes aerobic glycolysis and chemoresistance in colorectal cancer cells by regulating HK2 Cell Death Dis 2019-04-05 [PMID: 30952834] (WB, Human)

Hao Y, Kacal M, Ouchida AT et al. Targetome analysis of chaperone-mediated autophagy in cancer cells Autophagy 2019-03-01 [PMID: 30821613] (WB, Human)

Fong LY, Jing R, Smalley KJ et al. Integration of metabolomics, transcriptomics, and microRNA expression profiling reveals a miR-143-HK2-glucose network underlying zinc-deficiency-associated esophageal neoplasia Oncotarget. 2017-10-10 [PMID: 29137232] (IHC-P, Rat)

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 NBP1-51643

HAF007	Goat anti-Mouse IgG Secondary Antibody [HRP]
NB720-B	Rabbit anti-Mouse IgG (H+L) Secondary Antibody [Biotin]
NBP1-97005-0.5mg	Mouse IgG1 Isotype Control (MG1)
NBP3-21294PEP	Hexokinase 2 Recombinant Protein Antigen

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/NBP1-51643

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