Product Datasheet

HIF-1 alpha Antibody
NB100-296SS

Unit Size: 0.025 ml

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

www.novusbio.com support@novusbio.com

Publications: 4

Protocols, Publications, Related Products, Reviews, Research Tools and Images at:
www.novusbio.com/NB100-296

Updated 2/9/2014 v.20.1

NB100-296SS

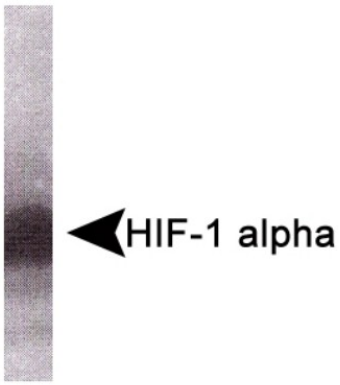
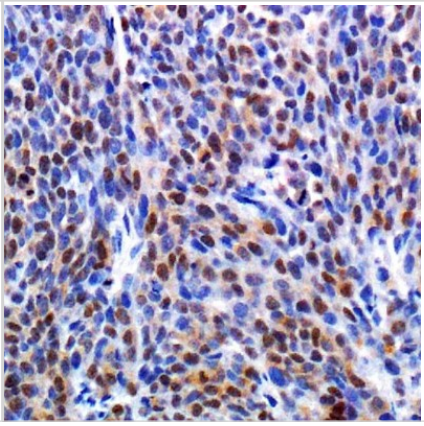
HIF-1 alpha Antibody (HA111)

Product Information	
Unit Size	0.025 ml
Concentration	1.1 mg/ml
Storage	Store at 4C short term. Aliquot and store at -20C long term. Avoid freeze-thaw cycles.
Clonality	Monoclonal
Clone	HA111
Preservative	0.1% Sodium Azide
Isotype	IgG2 Alpha
Purity	Protein G purified
Buffer	PBS

Product Description	
Host	Mouse
Gene ID	3091
Gene Symbol	HIF1A
Species	Human
Species Reactivity	Human.
Immunogen	Human HIF-1 alpha, corresponding to amino acids 329-530. [UniProt# Q16665]

Product Application Details	
Applications	Western Blot, Immunohistochemistry, Immunohistochemistry-Paraffin, Immunoprecipitation
Recommended Dilutions	Immunohistochemistry 1:100, Immunohistochemistry-Paraffin 1:100, Immunoprecipitation, Western Blot 1:500-1:1000
Application Notes	This HIF-1 alpha (HA111) antibody is useful for Western Blot and Immunohistochemistry on paraffin-embedded sections. Use in Immunoprecipitation was reported in scientific literature (PMID: 18222538). In IHC-P, staining was observed in the nucleus of human ovarian cancer tumor. Prior to immunostaining paraffin tissues, antigen retrieval with sodium citrate buffer (pH 6.0) is recommended. **Nuclear extracts should be used for Western blot analysis.

Images

Western Blot: HIF-1 alpha Antibody (HA111) [NB100-296] - Detection of HIF-1 alpha (125-130 kDa) from human placental villous explant total protein using NB100-296. (explants were subjected to 21 and 2% oxygen for 4 hours).	
Immunohistochemistry-Paraffin: HIF-1 alpha Antibody (HA111) [NB100-296] - HIF-1 antibody was tested in human ovarian cancer tumor xenograft using DAB with hematoxylin counterstain.	

Publications

Zheng X, Ruas JL, Cao R et al. Cell-type-specific regulation of degradation of hypoxia-inducible factor 1a: Role of subcellular compartmentalization. Mol Cell Biol 2006 Jun [PMID: 16738327] (IP, WB, Rabbit)

Rajakumar A, Michael HM, Daftary A et al. Proteasomal activity in placentas from women with preeclampsia and intrauterine growth restriction: implications for expression of HIF-alpha proteins. Placenta 2008 Mar [PMID: 18222538] (IP, Human)

Lauzier, MC et al. (2R)-[(4-Biphenylylsulfonyl)amino]-N-hydroxy-3-phenylpropionamide (BiPS), a matrix metalloprotease inhibitor, is a novel and potent activator of hypoxia-inducible factors. Mol Pharmacol;74(1):282-8. 2008 Jul. [PMID: 18424552]

Gillespie, DL et al. Silencing of hypoxia inducible factor-1alpha by RNA interference attenuates human glioma cell growth in vivo. Clin Cancer Res. 2007 Apr 152008 Jan 1. [PMID: 17438103]

Procedures

Immunohistochemistry-Paraffin Embedded Sections (NB100-296)
Immunohistochemistry-Paraffin Embedded Sections

Antigen Unmasking:

Bring slides to a boil in 10 mM sodium citrate buffer (pH 6.0) then maintain at a sub-boiling temperature for 10 minutes. Cool slides on bench-top for 30 minutes.
Staining:

1. Wash sections in deionized water three times for 5 minutes each.
2. Wash sections in wash buffer for 5 minutes.
3. Block each section with 100-400 ul blocking solution for 1 hour at room temperature.
4. Remove blocking solution and add 100-400 ul diluted primary antibody. Incubate overnight at 4 degrees C.
5. Remove antibody solution and wash sections in wash buffer three times for 5 minutes each.
6. Add 100-400 ul biotinylated diluted secondary antibody. Incubate 30 minutes at room temperature.
7. Remove secondary antibody solution and wash sections three times with wash buffer for 5 minutes each.
8. Add 100-400 ul Streptavidin-HRP reagent to each section and incubate for 30 minutes at room temperature.
9. Wash sections three times in wash buffer for 5 minutes each.
10. Add 100-400 ul DAB substrate to each section and monitor staining closely.
11. As soon as the sections develop, immerse slides in deionized water.
12. Counterstain sections in hematoxylin.
13. Wash sections in deionized water two times for 5 minutes each.
14. Dehydrate sections.
15. Mount coverslips.

Novus Biologicals USA
8100 Southpark Way, A-8
Littleton, CO 80120
USA
Phone: 303.730.1950
Toll Free: 1.888.506.6887
Fax: 303.730.1966
novus@novusbio.com

Novus Biologicals Canada
461 North Service Road West, Unit B37
Oakville, ON L6M 2V5
Canada
Phone: 905.827.6400
Toll Free: 855.668.8722
Fax: 905.827.6402
canada@novusbio.com

Novus Biologicals Europe
12 Cambridge Science Park
Cambridge, CB4 0FQ
United Kingdom
Phone: +44 (0)1223 426001
Fax: +44 (0)871 971 1635
europe@novusbio.com

General Contact Information
www.novusbio.com
Technical Support: technical@novusbio.com
Orders: orders@novusbio.com
General: novus@novusbio.com

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 guarantee, please visit www.novusbio.com/guarantee.