Product Datasheet

Prolactin R Antibody (U5)
NB300-561-0.025mg

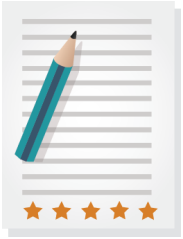
Unit Size: 0.025 mg

Store at -20C. Avoid freeze-thaw cycles.

Publications: 13

Protocols, Publications, Related Products, Reviews, Research Tools and Images at:
www.novusbio.com/NB300-561

Updated 9/9/2025 v.20.1



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Prolactin R Antibody (U5)

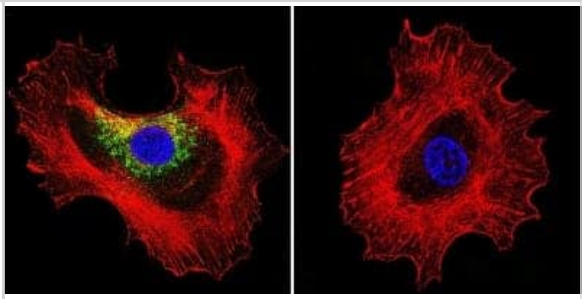
Product Information	
Unit Size	0.025 mg
Concentration	LYOPH mg/ml
Storage	Store at -20C. Avoid freeze-thaw cycles.
Clonality	Monoclonal
Clone	U5
Preservative	0.05% Sodium Azide
Reconstitution Instructions	Reconstitute with 0.1 ml PBS.
Isotype	IgG1
Purity	Protein G purified
Buffer	PBS

Product Description	
Description	Novus Biologicals Mouse Prolactin R Antibody (U5) (NB300-561) is a monoclonal antibody validated for use in IHC, WB, Flow, ICC/IF and IP. Anti-Prolactin R Antibody: Cited in 13 publications. All Novus Biologicals antibodies are covered by our 100% guarantee.
Host	Mouse
Gene ID	5618
Gene Symbol	PRLR
Species	Human, Mouse, Rat, Porcine, Bovine, Equine, Hamster, Rabbit, Sheep
Reactivity Notes	Sheep reactivity reported in scientific literature (PMID: 2707162). Bovine reactivity reported in scientific literature (PMID: 25212395). Mouse reactivity reported in scientific literature (PMID: 19211889). Hamster reactivity reported in scientific literature (PMID: 24142695). Please note that this antibody is reactive to Mouse and derived from the same host, Mouse. Additional Mouse on Mouse blocking steps may be required for IHC and ICC experiments. Please contact Technical Support for more information
Immunogen	Purified rat liver PRL receptor.

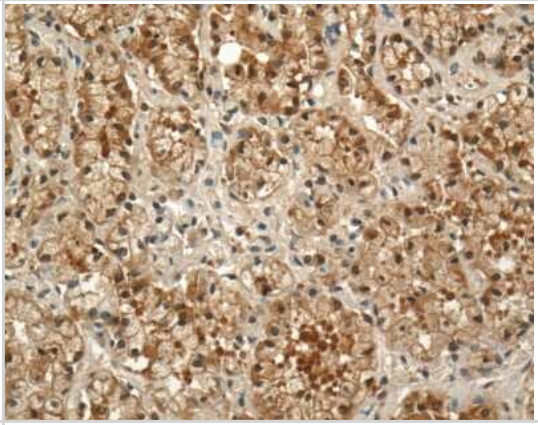
Product Application Details	
Applications	Western Blot, Immunohistochemistry-Paraffin, Flow Cytometry, Immunocytochemistry/ Immunofluorescence, Immunohistochemistry, Immunohistochemistry-Frozen, Immunoprecipitation
Recommended Dilutions	Western Blot 1 ug/ml, Flow Cytometry 1:10 - 1:1000, Immunohistochemistry 1:10 - 1:500, Immunocytochemistry/ Immunofluorescence 1:10-1:500, Immunoprecipitation 1:10 - 1:500, Immunohistochemistry-Paraffin 1:10 - 1:500, Immunohistochemistry-Frozen 1:10 - 1:500
Application Notes	May be useful in IHC, IP, and WB. WB: Detects an approx. 40 kDa and 100 kDa protein representing both the short and long forms of the PRL receptor, respectively, in various tissues. IHC: Staining of PRL receptor in rat Islets of Langerhans with NB 300-561 results in a staining pattern consistent with cytoplasmic vesicle staining. NB 300-561, after biotinylation, has been used to detect human lymphocyte PRL receptor by Flow Cytometry. NB 300-561 does not inhibit the interaction of prolactin with the receptor. Use in ICC/IF was reported in scientific literature (PMID: 29874677).

Images

Immunocytochemistry/Immunofluorescence: Prolactin R Antibody (U5) [NB300-561] - Prolactin Receptor (green), F-Actin staining with Phalloidin (red) and nuclei with DAPI (blue) is shown. Cells were grown on chamber slides and fixed with formaldehyde prior to staining. Cells were probed without (control) or with an antibody recognizing Prolactin Receptor at a dilution of 1:20 over night at 4C, washed with PBS and incubated with a DyLight-488 conjugated.



Immunohistochemistry: Prolactin R Antibody (U5) [NB300-561] - Mammary gland tissue from lactating light horse mare (equine) was incubated in anti-prolactin receptor monoclonal mouse antibody at 1:100 for 1 hour at 23C and for 24 hours at 4C. Second antibody was biotinylated goat anti-mouse IgG at 23C for 1 hour. Development using avidin-biotin complex 23C for 1 hour plus 3,3-diaminobenzadine for 15 min and counterstained with haematoxylin.



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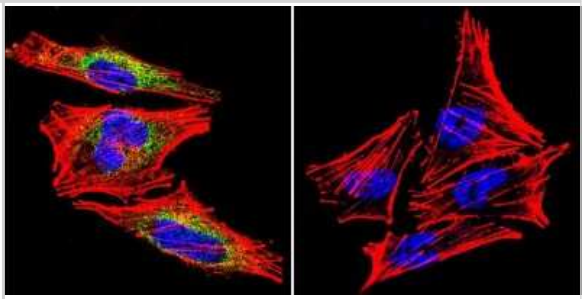

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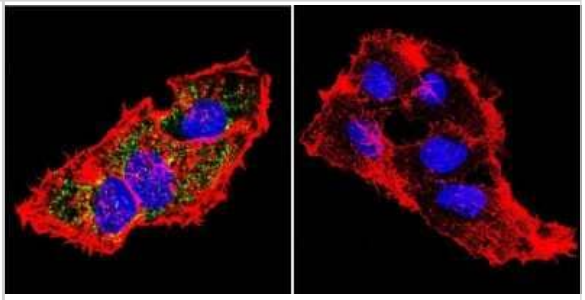
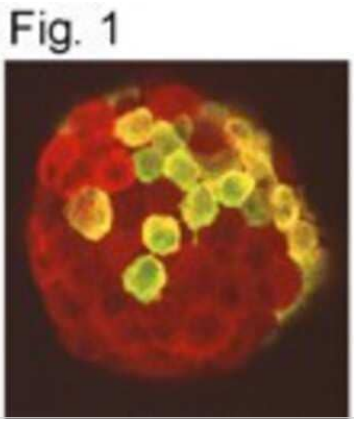


Immunohistochemistry: Prolactin R Antibody (U5) [NB300-561] - Figure 1 shows immunohistochemical staining of PRL receptor in rat Islets of Langerhans using NB300-561.



Publications

Wang B, Shi L, Men J et al. Controlled synchronization of prolactin/STAT5 and AKT1/mTOR in bovine mammary epithelial cells In Vitro Cell. Dev. Biol. Anim. 2020-02-20 [PMID: 32078727] (Human)

Wang B, Men J, Wang C et al. Laminin-dependent integrin beta 1 signaling regulates milk protein synthesis via prolactin/STAT5 pathway in bovine mammary epithelial cells Biochem. Biophys. Res. Commun. 2020-01-24 [PMID: 31987497] (WB, Bovine)

Ochoa-Amaya JE, Queiroz-Hazarbassanov N, Namazu LB et al. Short-Term Hyperprolactinemia Reduces the Expression of Purinergic P2X7 Receptors during Allergic Inflammatory Response of the Lungs Neuroimmunomodulation 2018 Jun 06 [PMID: 29874677] (ICC/IF, Rat) Neuroimmunomodulation. [PMID: 29874677] (ICC/IF, Rat)

Perrot-Applanat M, Gualillo O, Buteau H, Edery M, Kelly PA. Internalization of prolactin receptor and prolactin in transfected cells does not involve nuclear translocation. J. Cell Sci., 110: 1123-1132. 1997-01-01 [PMID: 9175708]

Dardenne M, de Moraes Mdo C, Kelly PA, Gagnerault MC. Prolactin receptor expression in human hematopoietic tissues analyzed by flow cytofluorometry. Endo., 134(5): 2108-2114. 1994-01-01 [PMID: 8156910]

Rui H, Lebrun JJ, Kirken RA, Kelly PA, Farrar WL. JAK2 activation and cell proliferation induced by antibody-mediated prolactin receptor dimerization. Endo., 135(4): 1299-1306. 1994-01-01 [PMID: 7925093]

Sorenson RL, Stout LE. Prolactin receptors and JAK2 in islets of Langerhans: an immunohistochemical analysis. Endo., 136(9): 4092-4098. 1995-01-01 [PMID: 7649117]

Royster M, Driscoll P, Kelly PA, Freemark M. The prolactin receptor in the fetal rat: cellular localization of messenger ribonucleic acid, immunoreactive protein, and ligand-binding activity and induction of expression in late gestation. Endo, 136(9): 3892-3900. 1995-01-01 [PMID: 7649097]

Katoh M, Raguet S, Zachwieja J, Djiane J, Kelly PA. Hepatic prolactin receptors in the rat: characterization using monoclonal antireceptor antibodies. Endo, 120: 739-749. 1987-01-01 [PMID: 3803302]

Okamura H, Zachwieja J, Raguet S, Kelly PA. Characterization and applications of monoclonal antibodies to the prolactin receptor. Endo., 124(5): 2499-2508. 1989-01-01 [PMID: 2707162]

Dardenne M, Kelly PA, Bach JF, Savino W. Identification and functional activity of prolactin receptors in thymic epithelial cells. Proc. Natl. Acad. Sci., USA, 88: 9700-9704. 1991-01-01 [PMID: 1946390]

Rozakis-Adcock M, Kelly PA. Mutational analysis of the ligand-binding domain of the prolactin receptor. J. Biol. Chem., 266(25): 16472-16477. 1991-01-01 [PMID: 1885580]

More publications at http://www.novusbio.com/NB300-561

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