

## **ACTH Recombinant Monoclonal Mouse Antibody (rCLIP/1407)**



## **Product Description**

ACTH (same as Corticotropin) is a 39 amino acid active peptide produced by the anterior pituitary. This MAb is specific to Synacthen (aa1-24 of ACTH); does not react with CLIP (aa17-39 of ACTH). POMC (pro-opiomelanocortin or corticotropin-lipotropin) is a 267 amino acid polypeptide hormone precursor that goes through extensive, tissue-specific posttranslational processing by convertases. POMC is cleaved into ten hormone chains named NPP, ACTH, alpha-MSH (Melanocyte Stimulating Hormone), beta-MSH, gamma-MSH, CLIP (corticotropin-like intermediary peptide), Lipotropin-beta, Lipotropin-gamma, beta-endorphin and Met-enkephalin. ACTH is also produced by cells of immune system (T-cells, B-cells, and macrophages) in response to stimuli associated with stress. Anti-ACTH is a useful marker in classification of pituitary tumors and the study of pituitary disease. It reacts with ACTH-producing cells (corticotrophs). It also may react with other tumors (e.g. some small cell carcinomas of the lung) causing paraneoplastic syndromes by secreting ACTH. Primary antibodies are available purified, or with a selection of fluorescent CF® dyes and other labels. CF® dyes offer exceptional brightness and photostability. See the CF® Dye Brochure for more information. Note: Conjugates of blue fluorescent dyes like CF®405S and CF®405M are not recommended for detecting low abundance targets, because blue dyes have lower fluorescence and can give higher non-specific background than other dye colors. Stock status: Because Biotium offers a large number of antibody and conjugation options, primary antibody conjugates may be made to order. Typical lead times are up to one week for CF® dye and biotin conjugates, and up to 2-3 weeks for fluorescent protein and enzyme conjugates. Please email order@biotium.com to inquire about stock status and lead times before placing your order. Catalog number key for antibody number 2296, Anti-ACTH (rCLIP/1407)

## **Product attributes**

Call us: 800-304-5357

Antibody reactivity	ACTH			
Antibody number	#2296			
research-areas	Cancer, Endocrinology			
Antibody type	Primary			
Host species	Mouse			
Clonality	Recombinant Monoclonal			
Clone	rCLIP/1407			
	IgG1			
Isotype	ACTH is ~5 kDa, and the POMC precursor is ~30 kDa. The molecular weight of POMC depends upon isoforn variation and post-translational modifications.			
Molecular weight				
Synonyms	Pro-opiomelanocortin (POMC); Adrenocorticotropin; Adrenocorticotropin; Adrenocorticotropin; hormone; Melanocyte Stimulating Hormone (MSH); Melanotropin; beta-Endorpini; Lipotropin; Met-Enkephalin; POC			
Entrez gene ID	5443			
SwissProt	P01189			
Human gene symbol	POMC			
Unigene	1897			
Immunogen	Synthetic peptide corresponding to aa25-39 of human ACTH (NGAEDESAEAFPLEF)			
Species reactivity	Broad reactivity, Human, Mouse, Rat			
Verified antibody	IHC (FFPE) (verified)			
Antibody target cellular localization	Secreted (extracellular), Vesicular			
Antibody application notes	Higher concentration may be required for direct detection using primary antibody conjugates than for indirect detection with secondary antibody, Immunohistology (formalin): 0.5-1 ug/ml, for 30 minutes at RT, Staining of formalin-fixed tissues requires bolling tissue sections in 10 mM citrate buffer, pH 6.0, for 10-20 minutes followed by cooling at RT for 20 minutes, Optimal dilution for a specific application should be determined by user			
	with secondary antibody, Immunohistology (formalin): 0.5-1 ug/ml for 30 minutes at RT, Stlaining of formalin-fixed tissues requires boiling tissue sections in 10 mM citrate buffer, PH 6.0, for 10-20 minutes followed by cooling at RT for 20 minutes, Optimal dilution for a specific application should			
Positive control	with secondary antibody, Immunohistology (formalin): 0.5-1 ug/ml for 30 minutes at RT, Stlaining of formalin-fixed tissues requires boiling tissue sections in 10 mM citrate buffer, PH 6.0, for 10-20 minutes followed by cooling at RT for 20 minutes, Optimal dilution for a specific application should			
Positive control Storage Conditions	with secondary antibody, Immunohistology (formalin): 0.5-1 ug/ml for 30 minutes at RT, Staining of formalin-fixed tissues requires boiling tissue sections in 10 mM citrate buffre, PH 60, for 10-20 minutes followed by cooling at RT for 20 minutes, Optimal dilution for a specific application should be determined by user			
	with secondary antibody, Immunohistology (formalin): 0.5-1 ug/ml for 30 minutes at RT, Staining of formalin-fixed tissues requires boiling tissue sections in 10 mM citrate buffer, pH 6.0, for 10-20 minutes followed by cooling at RT for 20 minutes, Optimal dilution for a specific application should be determined by user Normal pituitary gland or pituitary tumor Store at 2 to 8 °C, Protect fluorescent conjuactes from light, Note: store			
Storage Conditions	with secondary antibody, Immunohistology (formalin): 0.5-1 ug/ml for 30 minutes at RT, Staining of formalin-fixed tissues requires boiling tissue sections in 10 mM citrate buffer, pH 6.0, for 10-20 minutes followed by cooling at RT for 20 minutes, Optimal dilution for a specific application should be determined by user  Normal pituitary gland or pituitary tumor Store at 2 to 8 °C, Protect fluorescent conjugates from light, Note: store BSA-free antibodies at -10 to -35 °C			
Storage Conditions Shipping condition	with secondary antibody, Immunohistology (formalin): 0.5-1 ug/ml for 30 minutes at RT, Staining of formalin-lixed tissues requires boiling tissue sections in 10 mM citrate buffer, pH 6.0, for 10-20 minutes followed by cooling at RT for 20 minutes, Optimal dilution for a specific application should be determined by user  Normal pituitary gland or pituitary tumor Store at 2 to 8 °C, Protect fluorescent conjugates from light, Note: store BSA-free antibodies at -10 to -35 °C  Room temperature  Guaranteed for at least 24 months from date of receipt when stored as			
Storage Conditions Shipping condition Shelf life	with secondary antibody, Immunohistology (formalin): 0.5-1 ug/ml for 30 minutes at RT, Staining of formalin-fixed tissues requires boiling tissue sections in 10 mM citrate buffer, pH 6.0, for 10-20 minutes followed by cooling at RT for 20 minutes, Optimal dilution for a specific application should be determined by user  Normal pituitary gland or pituitary tumor Store at 2 to 8 °C, Protect fluorescent conjugates from light, Note: store BSA-free antibodies at -10 to -35 °C  Room temperature  Guaranteed for at least 24 months from date of receipt when stored as recommended  For research use only (RUO)  Conjugates: 0.1 mg/mL in PBS/0.1% BSA/0.05% azide, HRP conjugates: 0.1 mg/mL in PBS/0.05% BSA, Purifled: 0.2			
Storage Conditions Shipping condition Shelf life Regulatory status Antibody/conjugate	with secondary antibody, Immunohistology (formalin): 0.5-1 ug/ml for 30 minutes at RT, Staining of formalin-fixed lissues requires boiling tissue sections in 10 mM citrate buffer, pH 6.0, for 10-20 minutes followed by cooling at RT for 20 minutes, Optimal dilution for a specific application should be determined by user  Normal pituitary gland or pituitary tumor Store at 2 to 8 °C, Protect fluorescent conjugates from light, Note: store BSA-free antibodies at -10 to -35 °C  Room temperature  Guaranteed for at least 24 months from date of receipt when stored as recommended  For research use only (RUO)  Conjugates: 0.1 mg/mL in PBS/0.1%  BSA/0.05% azide, HRP conjugates: 0.1 mg/mL in PBS/0.05% BSA, Purified: 0.2 mg/mL in PBS/0.05% BSA, Purified; 0.2			

Email: btinfo@biotium.com

## **Catalog Number Key for Primary Antibody Conjugates**

Antibody # prefix	Conjugation	Ex/Em (nm)	Laser line	Detection channel	Dye Features
BNC04	CF®405S	404/431	405	DAPI (microscopy), AF405	CF®405S Features
BNC88	CF®488A	490/515	488	GFP, FITC	CF®488A Features
BNC68	CF®568	562/583	532, 561	RFP, TRITC	CF®568 Features
BNC94	CF®594	593/614	561	Texas Red®	CF®594 Features
BNC40	CF®640R	642/662	633-640	Cy®5	CF®640R Features
BNC47	CF®647	650/665	633-640	Cy®5	CF®647 Features
BNCB	Biotin	N/A	N/A	N/A	
BNUB	Purified	N/A	N/A	N/A	
BNUM	Purified, BSA-free	N/A	N/A	N/A	

Alexa Fluor, Pacific Blue, Pacific Orange, and Texas Red are trademarks or registered trademarks of Thermo Fisher Scientific; Cy is a registered trademark of Cytiva; IRDye, LI-COR, and Odyssey are registered trademarks of LI-COR Bioscience.

Call us: 800-304-5357 Email: btinfo@biotium.com

This datasheet was generated on January 30, 2023 at 08:26:06 PM. Visit product page to check for updated information before use. Product link: <a href="https://biotium.com/product/acth-recombinant-monoclonal-mouse-antibody-rclip-1407/">https://biotium.com/product/acth-recombinant-monoclonal-mouse-antibody-rclip-1407/</a>