

Anti- Helicobacter pylori [HPYL/7172]

Catalog No.	Description		
AMD16-5M	6 ml of Ready-to-Use Antibody for use with BioGenex Super Sensitive TM Detection Systems OR equivalent detection system		
AMD16-10M	10 ml of Ready-to-Use Antibody in a barcode labeled vial for use with BioGenex Super Sensitive TM Detection Systems and i6000 TM Automated Staining Systems		
MUD16-UC	1 ml of Concentrated Antibody for use with BioGenex Super Sensitive TM Detection Systems OR equivalent detection system		
MUD16-5UC	0.5 ml of Concentrated Antibody for use with BioGenex Super Sensitive TM Detection Systems OR equivalent detection system		
AXD16-YCD	Ready-to-Use Antibody in Barcode labeled vial for use on the Xmatrx [®] Elite Staining System, 160 tests		
AXD16-50D	Ready-to-Use Antibody in Barcode labeled vial for use on the Xmatrx [®] Elite Staining System, 50 tests		
AXD16-4M	Ready-to-Use Antibody in Barcode labeled vial for use on the NanoVIP® Staining System, 50 tests		

Clone	Species	Ig Class
HPYL/7172	Mouse	IgG2b, kappa

Intended Use

For Research Use Only. This antibody is designed for the specific localization of Helicobacter pylori in formalin-fixed, paraffinembedded (FFPE) tissue sections. Evaluation must be performed by a qualified pathologist.

Summary and Explanation

Helicobacter Pylori (H. Pylori) is a Gram-negative, microaerophilic, helix-shaped bacterium is known to cause peptic ulcers and chronic gastritis in human. It is present on the surface of the epithelium or in the cytoplasm of the epithelial cells of the antrum and body of the stomach. H.Pylori is strongly associated with duodenal ulcers and is also implicated in the development of adenocarcinoma and low grade lymphoma of mucosa associated lymphoid tissue in the stomach.

Storage and Handling

Store at 2-8°C. Fresh dilutions, if required, should be prepared prior to use and are stable and steady for up to one day at room temperature (20-26°C). Diluted antibody preparations can be refrigerated or frozen for extended shelf life.

Principles of the Procedure

Antigen detection by immunohistochemistry (IHC) is a two-step process wherein the primary antibody binds to the antigen of interest and that binding is detected by a chromogen. The <u>primary antibody</u> may be used in IHC using manual techniques or BioGenex Automated Staining System. Positive and negative controls should always be run simultaneously with all patient specimens.

Reagents Provided

Mouse Monoclonal Antibody Helicobacter pylori is affinity purified and diluted in PBS, pH 7.2, containing 1% BSA and 0.09% sodium azide.

Dilution of Primary Antibody

BioGenex Ready-to-Use antibodies have been optimized for use with the recommended BioGenex Detection System and should not require further dilution.

BioGenex concentrated antibodies must be diluted in accordance with the recommended protocol when used with the recommended BioGenex Detection System.

Recommended Protocol

Refer to the following table for conditions specifically recommended for this antibody. Refer to the BioGenex website for guidance on specific staining protocols or other requirements.

Parameter	BioGenex		
1 arameter	Recommendations		
	Helicobacter pylori infected		
Control Tissue	stomach, Stomach tissues as		
Control Tissue	available with Biogenex FB-		
	D16M* & FG-D16M*		
Recommended Dilution for	1:20-50 in HK941		
Concentrated Antibody	1.20-30 III 111X741		
Recommended Pretreatment	EZ-AR2 (HK522-XAK)		
(Manual/i6000)**	(Two times-30min)		
Recommended	EZ-AR2 Elegance		
Pretreatment (Xmatrx &	(HX032-YCD & HX046-		
NanoVIP)	08XN)		
Antibody Incubation	30-60 Min at RT		
(Manual/i6000)	Jo oo min ut it i		
Antibody Incubation	30-60 Min at 25°C		
(Xmatrx & NanoVIP)	30 00 William 23 C		
	Use BioGenex Two-Step OR		
Detection System for	One-Step Super Sensitive TM		
Manual, Xmatrx, NanoVIP	Polymer-HRP IHC Detection		
& i6000 systems***	System/DAB; see p. 2 for more		
	information		

^{*}FB: positive control micro chamber slides, FG: positive control microscopic slides. Xmatrx & NanoVIP requires micro chamber slides.

^{**}Pretreatment times will vary based on individual microwave power.

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***For automation systems (Xmatrx-Elite, NanoVIP & i6000 Diagnostics), refer to the factory protocols provided with the instrument.

Detection	Two-Step	One-Step	Link and
System	HRP Kit	HRP Kit	Label Kit
Manual	QD440-XAKEN (1000 Test) QD430-XAKEN (1000 Test)	QD630-XAKEN (1000 Test)	QP300- XAKE (1000 Test)
Manuai	QD420-YIKEN (500 Test) QD400-60KEN (60 Test)	QD620-XAKEN (500 Test)	QP900- 9LE (500 Test)
Xmatrx -	QD550-YCDEN	QD610-YADEN	N/A
Automation	(200 Test)	(200 Test)	
NanoVIP-	QD551-YCDEN	QD611-YADEN	N/A
Automation	(100 Test)	(100 Test)	
i6000 -	QD410-YAXEN	QD610-YAXEN	N/A
Automation	(200 Test)	(200 Test)	

Precautions

This product contains sodium azide at concentrations of less than 0.1%. Sodium azide is not classified as a hazardous chemical at the product concentrations, but proper handling protocols should be observed. For more information, a Safety Data Sheet (SDS) for sodium azide is available upon request. Dispose of unused reagents according to Local, State and Federal Regulations. Wear suitable Personal Protective Equipment, do not pipette reagents by mouth, and avoid contact of reagents and specimens with skin and mucous membranes. If reagents or specimens come in contact with sensitive area, wash with copious amounts of water.

For more information, visit <u>www.biogenex.com</u>.

Quality Control

Refer to BioGenex detection system documents for guidance on general quality control procedures.

Troubleshooting

Refer to the troubleshooting section in the documentation for BioGenex Detection Systems (or equivalent detection systems) for remedial actions on detection system related issues, or contact BioGenex Technical Support Department at 1-800-421-4149 or support@biogenex.com or your local distributor to report unusual staining.

Expected Results

This antibody stains cytoplasmic/ H.pylori bacterium in positive cells in formalin-fixed, paraffin embedded tissue sections. An example image of a tissue section stained with this antibody can be found on the product page on the BioGenex website. Interpretation of the staining result is solely the responsibility of the user. Experimental results should be confirmed by a medically-established diagnostic product or procedure.

Limitations of the Procedure

Improper tissue handling and processing prior to immunostaining can lead to inconsistent results. Variations in embedding and fixation or the nature of the tissue may lead to variations in results. Endogenous peroxidase activity or pseudo peroxidase activity in erythrocytes and tissue biotin may result in non-specific staining based on the detection system employed. Tissues containing Hepatitis B Surface Antigen (HBsAg) may give false positive with horseradish peroxidase systems. Improper counterstaining and mounting may compromise the interpretation of results.

Bibliography

- 1. Li ZW *et al.* Inflammatory cytokine gene polymorphisms increase the risk of atrophic gastritis and intestinal metaplasia. *World J Gastroenterol* 16:1788-94 (2010).
- 2. Hu W *et al.* Vitamin D3 activates the autolysosomal degradation function against Helicobacter pylori through the PDIA3 receptor in gastric epithelial cells. *Autophagy* 15:707-725 (2019).

2°C 8°C	Temperature Limitation	***	Manufacturer
\mathbb{M}	Use By Date	LOT	Batch Code
NON STERILE	Non-Sterile	[]i	Consult Instructions for Use

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