

## Phosphohistone H3 (PHH3) (Polyclonal)


### Rabbit Polyclonal Anti-Human Phospho-Histone H3 (PHH3) (Polyclonal)

#### REFERENCES AND PRESENTATIONS<sup>1</sup>

- **ready-to-use** (manual or LabVision AutoStainer)  
MAD-000584QD-3  
MAD-000584QD-7  
MAD-000584QD-12
- **Ready-to-use (MD-Stainer)<sup>2</sup>**  
MAD-000584QD-3/V  
MAD-000584QD/V
- **concentrated**  
MAD-000584Q - 1:50 recommended dilution

#### COMPOSITION

Anti-human PHH3 rabbit polyclonal antibody purified from serum and prepared in 10mM PBS, pH 7.4, with 0.2% BSA and 0.09% sodium azide

**INTENDED USE** : Immunohistochemistry (IHC) on paraffin embedded tissues. Not tested on frozen tissues or Western-Blotting

**CLONE:** Polyclonal

**Ig ISOTYPE:** Rabbit IgG

**SPECIES REACTIVITY:** In vitro diagnostics in humans. Not tested in other species

**DESCRIPTION AND APPLICATIONS:** The phosphohistone H3 (phh3) is the phosphorylated form of nuclear histone H3, which together with the latter one forms the major protein component of the chromatin in eukaryotic cells. In mammalian cells the phosphohistone H3 is negligible during interphase, but reaches its maximum expression at mitosis, more precisely at the transition between the late G2 and M phases of the cell cycle.

Immunohistochemical studies have shown that the PHH3 antibody specifically detects the nuclear histone H3 only when protein phosphorylation occurs at the level of serine 10 or serine 28. These studies have also shown that this phosphorylation during apoptosis does not occur on the histone H3, so that the presence of phh3 molecule can serve as a good marker for separating mitotic figures from the



apoptotic bodies and nuclear karyorrhexis detritus and is likely to constitute a useful tool for tumor grading, treatment stratification and tumor follow-up especially in CNS, skin, lung, esophagus, breast, soft tissue, stromal gastrointestinal and gynecologic tumors. In fact, recent studies granted PHH3 with greater importance and relevance than Ki- 67 in identifying mitotic figures and a higher intra -and inter reproducibility in cases of melanoma

**IHC POSITIVE CONTROL:** Tonsil

**VISUALIZATION:** The antibody shows nuclear staining and for the interpretation nuclei with fine granular staining must be ignored

#### IHC RECOMMENDED PROCEDURE:

- 4µm thick section should be taken on charged slides; dry overnight at 60°C
- Deparaffinise, rehydrate and HIER (heat induced epitope retrieval) – boil tissue in the Pt Module using Vitro S.A Citrate buffer pH6<sup>3</sup> for 20 min at 95°C. Upon completion rinse with 3-5 changes of distilled or deionised water followed by cooling at RT for 20 min
- Endogenous peroxidase block - Blocking for 10 minutes at room temperature using peroxidase solution (ref. MAD-021540Q-125)
- Primary antibody: incubate for 10 minutes [The antibody dilution (when concentrated) and protocol may vary depending on the specimen preparation and specific application. Optimal conditions should be determined by the individual laboratory]
- For detection use Master Polymer Plus Detection System (HRP) (DAB included; ref. MAD-000237QK)
- Counterstaining with haematoxylin and final mounting of the slide

**STORAGE AND STABILITY:**  Stored at 2-8°C. Do not freeze.  Once the packaging has been opened it can be stored until the expiration date of the reagent indicated on the label. If the reagent has been stored under other conditions to those indicated in this document, the user must first check its correct performance taking into account the product warranty is no longer valid.

<sup>1</sup> These references are for presentation in vials of Low Density Polyethylene (LDPE) dropper. In case the products are used in automated stainers, a special reference is assigned as follows:

- / L: Cylindrical screw-cap vials (QD-3 / L, QD-7 / L, QD-12 / L).

- / N: Polygonal screw-cap vials (QD-3 / N, QD-7 / N, QD-12 / N).

For different presentations (references / volumes) please contact the supplier.

<sup>2</sup> For Technical specifications for MD-Stainer, please contact your distributor.

<sup>3</sup> Ref: MAD-004071R/D



**Vitro S.A.**

Calle Luís Fuentes Bejarano 60 Ed. Nudo Norte Local 3 41020 Sevilla (Spain)  
Tel: +34 954 933 200. [vitra@vitro.bio](mailto:vitra@vitro.bio) ; [www.vitro.bio](http://www.vitro.bio)



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#### WARNINGS AND PRECAUTIONS:

1. Avoid contact of reagents with eyes and mucous membranes. If reagents come into contact with sensitive areas, wash with copious amounts of water.
2. This product is harmful if swallowed.
3. Consult local or state authorities with regard to recommended method of disposal.
4. Avoid microbial contamination of reagents.

#### SAFETY RECOMMENDATIONS










This product is intended for laboratory professional use only. The product is NOT intended to be used as a drug or for domestic purposes. The current version of the Safety Data Sheet for this product can be downloaded by searching the reference number at [www.vitro.bio](http://www.vitro.bio) or can be requested at [regulatory@vitro.bio](mailto:regulatory@vitro.bio).

#### BIBLIOGRAPHY

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9. Brunner A, Riss P, Heinze G, Brustmann H. pHH3 and survivin are co-expressed in high-risk endometrial cancer and are prognostic relevant. Br J Cancer. 2012 Jun 26;107(1):84-90

#### LABEL AND BOX SYMBOLS

Explanation of the symbols of the product label and box:

	Expiration date
	Temperature limit
	Manufacturer
	Sufficient content for <n> assays
	Catalog number
	Lot code
	Refer to the instructions of use
	Medical product for <i>in vitro</i> diagnosis.
	Material safety data sheet

