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**Immunogen** 

peptide conjugated to

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orders & support:

## Mouse Monoclonal Antibody to

## **EGFR (C-Terminus)**

clone 13G8

biotinylated

0007-100BIOTIN/EGFR-13G8 Order No.:

**Applications** 

100 Size (µg) 0007S Lot No.:

**Species Reactivity** 

**Ref.Cell Line Epitope** 

1186), independent of

02/260207F

KLH

IgG1

Isotype

human, mouse

ICC, Luminex

ELISA, WB, IP, 180 kDa

Mol. Weight

HepG2

C-terminus (aa 1165 phosphorylation status

## **Background and Specificity:**

EGF Receptor (EGFR) and erbB2, erbB3, and ErbB4 are members of subclass I of receptor tyrosine kinases.

EGFR/erbB receptors are activated upon binding of EGF and EGF-related growth factors such as TGF alpha, beta-cellulin, Hb-EGF, HRG, or NRG. Binding of these ligands leads to receptor homo- and heterodimerization followed by autophosphorylation and activation of downstream signal transduction pathways (MAPK, PI3K/PKB, and STAT). In addition, EGFR becomes fully activated after phosphorylation of Y845 by src family kinases.

Phosphorylation of Y1045 leads to association with cbl and subsequent receptor degradation. Phosphorylation of S1047 by CamKinase II leads to attenuation of kinase activity; phosphorylation of T654 (by PKC) and T669 (by MAPK, p38) interferes with receptor endocytosis/recycling.

Mab EGFR-13G8 specifically recognizes the C-terminus of EGF receptor (aa 1165 - 1186). Recognition is independent of the phosphorylation status at tyrosine 1173.

The antibody was purified from serum-free cell culture **Purification:** 

supernatant by subsequent thiophilic adsorption and size

exclusion chromatography.

Formulation: liquid; 0.5 mg/ml in PBS/0.09% Na-Azide/PEG and Sucrose

Reconstitution:

Stability: Aliquote and freeze in liquid nitrogen; antibody can be stored

frozen at -80°C up to 1 year. Thaw aliquots at 37°C. Thawed

aliquots may be stored at 4°C up to 3 months.

Avoid repeated freeze / thaw cycles.

#0811: Cell lysate from untreated HepG2 cells **Positive Control:** 

Immunoblotting: 1  $\mu$ g/ml for HRPO/ECL detection

> Recommended blocking buffer: Casein/Tween 20 based blocking and blot incubation buffer, e.g. nanoTools product

#3031-500/CPPT or #3031-3000/CPPT.

Immunoprecipitation: use at 1 - 10 µg per 10<sup>6</sup> pervanadate-treated A431 cells

use at 1 - 10 μg/ml **Immunocytochemistry ELISA:** use at 0.05 µg/ml

> All products are supplied for research and investigational use only. Not for use in humans or laboratory animals.

**Related Products** 

mab to EGFR (cytoplasmic domain)

mab to EGFR (extracellular domain)

mab to EGFR (aa 960 - 980) #0199-100/EGFR-16F8

mab to EGFR (N-terminus)

#0201-100/EGFR-140

mab to phospho-EGFR (pY 845) #0116-100/EGFR-12A3

mab to phospho-EGFR (pY1045)

mab to phospho-EGFR (pY1068)

mab to phospho-EGFR (pY 1086)

#0188-100/EGFR-8B8

mab to phospho-EGFR (pY 1148)

mab to phospho-EGFR (pY1173)

mab to dephospho-EGFR (Y1173)

#0009-100/EGFR-20G3

mab to phospho-EGFR (pT669)

#0191-100/EGFR-5F10

mab to phospho-EGFR (pT654)

mab to phospho-EGFR (pS1047)

#0107-100/EGFR-1H9

For monoclonal antibodies against erbB2, phospho-erbB2, erbB3 and erbB4, as well as against various EGFR downstream targets, please refer to our website at www.nanotools.de