

# Anti-HER2/ErbB2 Antibody

CATALOG NO.: A2212-100 (100 µl)

**BACKGROUND DESCRIPTION:** This gene encodes a member of the epidermal growth factor (EGF) receptor family of receptor tyrosine kinases. This protein has no ligand-binding domain of its own and therefore cannot bind growth factors. However, it does bind tightly to other ligand-bound EGF receptor family members to form a heterodimer, stabilizing ligand binding and enhancing kinase-mediated activation of downstream signaling pathways, such as those involving mitogen-activated protein kinase and phosphatidylinositol-3 kinase. Allelic variations at amino acid positions 654 and 655 of isoform a (positions 624 and 625 of isoform b) have been reported. Amplification and/or overexpression of this gene has been reported in numerous cancers, including breast and ovarian tumors. Alternative splicing results in several additional transcript variants, some encoding different isoforms and others that have not been fully characterized.

**ALTERNATE NAMES:** HER2, MLN19, NEU, NGL, TKR1, HER-2, HER-2/neu, p185erbB2, CD340, EC 2.7.10.1, MLN 19, C-Erb B2/Neu Protein, CD340 Antigen, HER-2/Neu, Herstatin, EC 2.7.10, ERBB2, MLN19, TKR

**ANTIBODY TYPE:** Polyclonal

**HOST/ISOTYPE:** Rabbit / IgG

**IMMUNOGEN:** KLH-conjugated synthetic peptide targeting a sequence within the center region of human HER2

**MOLECULAR WEIGHT:** 185 kDa

**PURIFICATION:** Affinity purified

**FORM:** Liquid

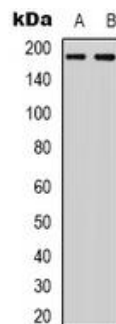
**FORMULATION:** In 0.42% Potassium phosphate; 0.87% NaCl; pH 7.3; 30% glycerol; and 0.01% sodium azide

**SPECIES REACTIVITY:** Human, Mouse, Rat, Dog

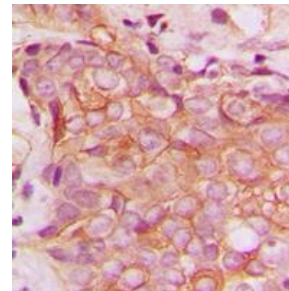
**STORAGE CONDITIONS:** Store at -20°C. Avoid freeze / thaw cycles

**APPLICATIONS AND USAGE:** WB (1:500 – 1:1000), IHC (1:100 – 1:200), IF (1:100 – 1:500)

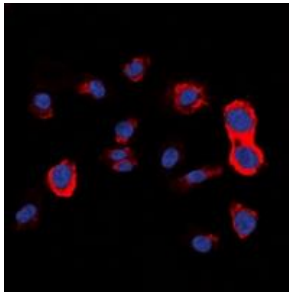
**Note:** This information is only intended as a guide. The optimal dilutions must be determined by the user



Western blot analysis of Jurkat (A), and HepG2 (B) whole cell lysates using Anti-HER2/ErbB2 antibody.



Immunohistochemical analysis of paraffin embedded formalin fixed human breast cancer using Anti-HER2/ErbB2 antibody. The tissue section was pre-treated using heat mediated antigen retrieval with sodium citrate buffer (pH 6.0), then incubated with the antibody at RT and detected using an HRP conjugated compact polymer system. Chromogen used was DAB. The section was counterstained with hematoxylin prior to mounting with DPX.



Immunofluorescent analysis of HepG2 cells using Anti-HER2/ErbB2 antibody. Formalin-fixed cells were permeabilized with 0.1% Triton X-100 in TBS, blocked with 3% BSA-PBS at RT, and incubated overnight at 4OC with primary antibody. Cells were washed with PBST and incubated with a DyLight 594-conjugated secondary antibody (red) at RT in the dark. DAPI was used to stain the cell nuclei (blue).

**RELATED PRODUCTS:**

IRS-1 Antibody (3424)  
Anti-RET Antibody (A1998)  
p44/42 MAPK (Erk1/2) Antibody (3085R)  
EGFR Antibody (3782)

***FOR RESEARCH USE ONLY! Not to be used on humans.***