

Anti-ERBB3/Her3 Antibody

Catalog # ABO11187

Specification

Anti-ERBB3/Her3 Antibody - Product Information

ApplicationWBPrimary AccessionP21860HostRabbitReactivityHumanClonalityPolyclonalFormatLyophilizedDescriptionRabbit lgG polyclonal antibody for Receptor tyrosine-protein kinase

Rabbit IgG polyclonal antibody for Receptor tyrosine-protein kinase erbB-3(ERBB3) detection. Tested with WB in Human.

Reconstitution Add 0.2ml of distilled water will yield a concentration of 500ug/ml.

Anti-ERBB3/Her3 Antibody - Additional Information

Gene ID 2065

Other Names Receptor tyrosine-protein kinase erbB-3, 2.7.10.1, Proto-oncogene-like protein c-ErbB-3, Tyrosine kinase-type cell surface receptor HER3, ERBB3, HER3

Calculated MW 148098 MW KDa

Application Details Western blot, 0.1-0.5 μg/ml, Human

Subcellular Localization Isoform 1: Cell membrane; Single-pass type I membrane protein.

Tissue Specificity Epithelial tissues and brain.

Protein Name Receptor tyrosine-protein kinase erbB-3

Contents

Each vial contains 5mg BSA, 0.9mg NaCl, 0.2mg Na2HPO4, 0.05mg Thimerosal, 0.05mg NaN3.

Immunogen A synthetic peptide corresponding to a sequence at the N-terminus of human ErbB 3(162-181aa DWRDIVRDRDAEIVVKDNGR).

Purification



Immunogen affinity purified.

Cross Reactivity No cross reactivity with other proteins

Storage

At -20°C for one year. After r°Constitution, at 4°C for one month. It°Can also be aliquotted and stored frozen at -20°C for a longer time.Avoid repeated freezing and thawing.

Sequence Similarities

Belongs to the protein kinase superfamily. Tyr protein kinase family. EGF receptor subfamily.

Anti-ERBB3/Her3 Antibody - Protein Information

Name ERBB3

Synonyms HER3

Function

Tyrosine-protein kinase that plays an essential role as cell surface receptor for neuregulins. Binds to neuregulin-1 (NRG1) and is activated by it; ligand-binding increases phosphorylation on tyrosine residues and promotes its association with the p85 subunit of phosphatidylinositol 3-kinase (PubMed:20682778). May also be activated by CSPG5 (PubMed:15358134). Involved in the regulation of myeloid cell differentiation (PubMed:27416908).

Cellular Location [Isoform 1]: Cell membrane; Single-pass type I membrane protein

Tissue Location Epithelial tissues and brain.

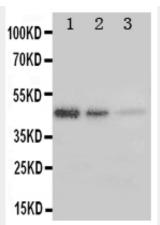
Anti-ERBB3/Her3 Antibody - Protocols

Provided below are standard protocols that you may find useful for product applications.

- <u>Western Blot</u>
- Blocking Peptides
- <u>Dot Blot</u>
- Immunohistochemistry
- Immunofluorescence
- Immunoprecipitation
- Flow Cytomety
- <u>Cell Culture</u>

Anti-ERBB3/Her3 Antibody - Images





Anti-ErbB 3 antibody, ABO11187, Western blottingRecombinant Protein Detection Source: E.coli derived -recombinant Human ERBB3, 45.0KD(162aa tag+ M1-A245)Lane 1: Recombinant Human ERBB3 Protein 5ngLane 2: Recombinant Human ERBB3 Protein 2.5ngLane 3: Recombinant Human ERBB3 Protein 1.25ng

Anti-ERBB3/Her3 Antibody - Background

ERBB3(V-erb-b2 avian erythroblastic leukemia viral oncogene homolog 3) also known as ONCOGENE ERBB3 or HER3, is an enzyme that in humans is encoded by the ERBB3 gene. This gene encodes a member of the epidermal growth factor receptor(EGFR) family of receptor tyrosine kinases. This membrane-bound protein has a neuregulin binding domain but not an active kinase domain. By in situ hybridization, Kraus et al.(1989) mapped the ERBB3 gene to chromosome 12q13. Carraway et al.(1994) demonstrated that ERBB3 is a receptor for heregulin and is capable of mediating HGL-stimulated tyrosine phosphorylation of itself. Most notably, EGFR and ErbB2 became markedly more promiscuous as the threshold was lowered, whereas ErbB3did not. Engelman et al.(2007) found that amplification of MET caused gefitinib resistance by driving ERBB3-dependent activation of phosphoinositide 3-kinase, a pathway though to be specific to EGFR/ERBB family receptors.