

Datasheet for ABIN5954984

ErbB2/Her2 Protein (AA 23-652) (His tag,AVI tag,Biotin)[Go to Product page](#)[2 Images](#)[1 Publication](#)

Overview

Quantity:	200 µg
Target:	ErbB2/Her2
Protein Characteristics:	AA 23-652
Origin:	Human
Source:	HEK-293 Cells
Protein Type:	Recombinant
Biological Activity:	Active
Purification tag / Conjugate:	This ErbB2/Her2 protein is labelled with His tag,AVI tag,Biotin.

Product Details

Sequence:	AA 23-652
Specificity:	Biotinylation of this product is performed using Avitag™ technology. Briefly, the single lysine residue in the Avitag is enzymatically labeled with biotin.
Purity:	>90 % as determined by SDS-PAGE.
Endotoxin Level:	Less than 1.0 EU per µg by the LAL method.

Target Details

Target:	ErbB2/Her2
Alternative Name:	Her2 (ErbB2/Her2 Products)
Background:	Human Epidermal growth factor Receptor 2 (HER2) is also called ERBB2, HER-2,HER-2 /neu,

Target Details

NEU, NGL,TKR1 and c-erb B2,and is a protein giving higher aggressiveness in breast cancers. It is a member of the ErbB protein family, more commonly known as the epidermal growth factor receptor family. HER2 is a cell membrane surface-bound receptor tyrosine kinase and is normally involved in the signal transduction pathways leading to cell growth and differentiation. HER2 is thought to be an orphan receptor, with none of the EGF family of ligands able to activate it. Approximately 30 % of breast cancers have an amplification of the HER2 gene or overexpression of its protein product. Overexpression of this receptor in breast cancer is associated with increased disease recurrence and worse prognosis. HER2 appears to play roles in development, cancer, communication at the neuromuscular junction and regulation of cell growth and differentiation .

Molecular Weight: 73.0 kDa

NCBI Accession: [NP_004439](#)

Pathways: [RTK Signaling](#), [Fc-epsilon Receptor Signaling Pathway](#), [EGFR Signaling Pathway](#), [Neurotrophin Signaling Pathway](#), [Skeletal Muscle Fiber Development](#)

Application Details

Comment: Ready-to-use Avitag™ biotinylated protein:
The product is exclusively produced using the Avitag™ technology. Briefly, a unique 15 amino acid peptide, the Avi tag, is introduced into the recombinant protein during expression vector construction. The single lysine residue in the Avi tag is enzymatically biotinylated by the E. Coli biotin ligase BirA.

This single-point enzymatic labeling technique brings many advantages for commonly used binding assays. The biotinylation happens on the lysine residue of Avi tag, and therefore does NOT interfere with the target protein's natural binding activities. In addition, when immobilized on an avidin-coated surface, the protein orientation is uniform because the position of the Avi tag in the protein is precisely controlled.

Restrictions: For Research Use only

Handling

Format: Lyophilized

Buffer: PBS, pH 7.4

Handling Advice: Please avoid repeated freeze-thaw cycles.

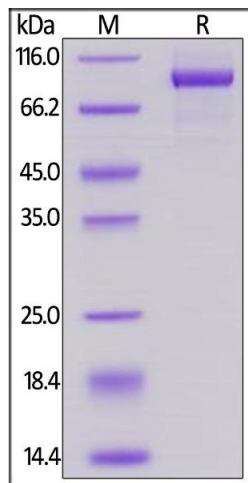
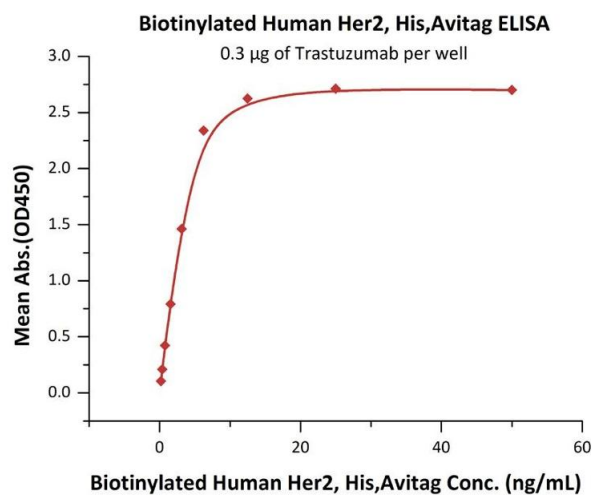
Handling

Storage: -20 °C

Publications

Product cited in: Hussack, Raphael, Lowden, Henry: "Isolation and characterization of camelid single-domain antibodies against HER2." in: **BMC research notes**, Vol. 11, Issue 1, pp. 866, (2019) ([PubMed](#)).

Images



ELISA

Image 1. Immobilized Trastuzumab at 3 µg/mL (100 µL/well) can bind Biotinylated Human Her2, His,Avitag (ABIN5954984,ABIN6253623) with a linear range of 0.2-6 ng/mL (QC tested).

SDS-PAGE

Image 2. Biotinylated Human Her2, His,Avitag on under reducing (R) condition. The gel was stained overnight with Coomassie Blue. The purity of the protein is greater than 90 % .