

ChemWhat Technical Data Sheet (TDS)

Catalog Number:	105-11
Source:	<i>Escherichia coli</i> .
Molecular Weight:	Approximately 11.3 kDa, a single non-glycosylated polypeptide chain containing 98 amino acid residues.
Quantity:	10µg /50µg /1000µg
AA Sequence:	SVRVEQVVKP PQNKTESENT SDKPKRKKKG GKNGKNRRNR KKKNPCNAEF QNFCIHGECK YIEHLEAVTC KCQQEYFGER CGEKSMKTHS MIDSSLK
Purity:	> 95 % by SDS-PAGE and HPLC analyses.
Biological Activity:	Fully biologically active when compared to standard. The ED ₅₀ as determined by a cell proliferation assay using murine Balb/c 3T3 cells is between 5-10 ng/ml.
Physical Appearance:	Sterile Filtered White lyophilized (freeze-dried) powder.
Formulation:	Lyophilized from a 0.2 µm filtered concentrated solution in PBS, pH 7.4.
Endotoxin:	Less than 1 EU/µg of rHuAmphiregulin as determined by LAL method.
Reconstitution:	We recommend that this vial be briefly centrifuged prior to opening to bring the contents to the bottom. Reconstitute in sterile distilled water or aqueous buffer containing 0.1 % BSA to a concentration of 0.1-1.0 mg/mL. Stock solutions should be apportioned into working aliquots and stored at ≤ -20 °C . Further dilutions should be made in appropriate buffered solutions.
Shipping:	The product is shipped at ambient temperature. Upon receipt, store it immediately at the temperature recommended below.
Stability & Storage:	Use a manual defrost freezer and avoid repeated freeze-thaw cycles. <ul style="list-style-type: none">● 12 months from date of receipt, -20 to -70 °C as supplied.● 1 month, 2 to 8 °C under sterile conditions after reconstitution.● 3 months, -20 to -70 °C under sterile conditions after reconstitution.
Usage:	ChemWhat Limited in UK offers this branded product for research, development or further evaluation purposes. NOT FOR HUMAN USE.

Human Amphiregulin

Amphiregulin is an EGF related growth factor and was originally isolated from the conditioned media of a PMA-treated MCF-7 human breast carcinoma cell line. It is mainly expressed numerous carcinoma cell lines and the epithelial cells of various human tissues including colon, stomach, breast, ovary, kidney, etc. Synthesized as a transmembrane protein, Amphiregulin's extracellular domain is proteolytically processed to release the mature protein. There are 6 conserved cysteine residues, which form 3 intramolecular disulfide bonds essential for biological activity. Amphiregulin signals through the EGF/TGF- α receptor, and stimulates growth of keratinocytes, epithelial cells and some fibroblasts. It also inhibits the growth of certain carcinoma cell lines. Mutations in this encoded protein are associated with a psoriasis-like skin phenotype.