## **Recombinant Mouse Epidermal Growth Factor (rm EGF)**

Synonyms: Urogastrone, URG.

**Introduction:** Epidermal growth factor has a profound effect on the differentiation of specific cells in vivo and is a potent mitogenic factor for a variety of cultured cells of both ectodermal and mesodermal origin. The EGF precursor is believed to exist as a membrane-bound molecule which is proteolytically cleaved to generate the 53-amino acid peptide hormone that stimulates cells to divide. EGF stimulates the growth of various epidermal and epithelial tissues in vivo and in vitro and of some fibroblasts in cell culture.

**Description:** Recombinant mouse Epidermal Growth Factor produced in *E.Coli* is a single, non-glycosylated, polypeptide chain containing 53 amino acids including 3 intramolecular disulfide-bonds and having a molecular mass of 6 kDa. The EGF is purified by proprietary chromatographic techniques.

Source: Escherichia Coli.

Physical Appearance: Sterile filtered white lyophilized (freeze-dried) powder.

**Formulation:** The protein was lyophilized with 10mM NaP 7.5 The aliquots of 1µg contain Trehalose 5% (w/vol) for better recovery.

**Solubility:** It is recommended to reconstitute the lyophilized rm EGF in sterile  $H_2O$  not less than 100 µg/ml, which can then be further diluted to other aqueous solutions.

**Stability:** Lyophilized rm EGF, although stable at room temperature for 3 weeks, should be stored desiccated below –18° C. Upon reconstitution rm EGF should be stored at 4° C between 2-7 days and for future use below –18° C. For long term storage it is recommended to add a carrier protein (0.1% HSA or BSA). Please prevent freeze-thaw cycles.

Purity: Greater than 97.0% as determined by RP-HPLC and by SDS-PAGE

Amino acid Sequence: NSYPGCPSSY DGYCLNGGVC MHIESLDSYT CNCVIGYSGD RCQTRDLRWW ELR.

**Biological Activity:** The activity is determined by the dose-dependent proliferation of murine BALB/c 3T3 cells and was found to be 14-20 pg/ml

This material is offered for **research use only**. Not for use in human. For in vitro use only. ImmunoTools will not be held responsible for patent infringement or other violations that may occur with the use of our products.

small	100 µg	Cat.N°	12343406
medium	500 µg	Cat.N°	12343407

## **ImmunoTools** Excellent Quality - Advantageously priced

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