Human epidermal growth factor (hEGF)

Catalog Number: OM770036

Source: Recombinant human epidermal growth factor, genetically engineered production, E. coli expression.

Product introduction

Human epidermal growth factor (hEGF) is a small molecule peptide composed of 53 amino acids, with a molecular weight of about 6000 Daltons and an isoelectric point of about 4.6. It has three pairs of disulfide bonds within its molecule, making it relatively stable to physical and chemical factors such as acid, base, and heat. HEGF has a wide range of biological effects and can strongly promote the growth of various epidermal tissues. It has been used in medicine for the treatment of burns, ulcers, various traumas, and corneal injuries. EGF can also promote the metabolism of normal epidermal cells, and when added to cell culture medium, it can promote cell growth.

Product characteristics

Items	Standard	Method
Product appearance	White, off white, light yellow powder	Visual inspection
Purity（HPLC）	≥90%	RP-HPLC
Bacterial endotoxin	≤10EU/mg	Pharmacopoeia testing methods
Residual amount of foreign aid DNA	≤10ng/mg	Pharmacopoeia testing methods
Molecular weight	6215Da	SDS-page electrophoresis detection

Storage and transport stability

Conventional storage at ≤ -20 ℃, with no loss of activity for 1 year;

After thawing, under sterile conditions (2 to 8 ℃), there was basically no loss of activity for one month.

Product advantages

No animal origin: Recombinant production, no external virus contamination, and no use of animal origin raw materials in the production process.

Stable quality: Batch production (10+g level production and supply) can ensure stable and continuous batch production; There is no difference between product batches, and the quality is stable.

High purity: high specific activity; The residual host protein is less than the limit requirement for biological products.

Freeze dried powder: easy to store and transport.

Compliance with regulatory requirements: Production equipment and environment comply with relevant regulatory requirements, and the production process fully complies with GMP guidance principles.

Product usage and recommendations

When dissolving: It is recommended to dissolve with PBS, with a dissolution concentration of no more than 1mg/ml, and prepare it as needed.

Recommended concentration for cell culture: 5-100 μg/L .

Recommended cell lines: Vero cells, BHK cells, diploid cells for producing virus particles, etc；

Pluripotent stem cells, mesenchymal stem cells, muscle stem cells.