

MEM ALPHA

w/ L-Glutamine w/o Ribonucleosides w/o Deoxyribonucleosides

CAT N° : L0475**Theoretical pH** : 7.3 ± 0.3 **Osmolality** : 300 mOsm/kg $\pm 10 \%$ **Colour** : Clear orange - red solution**Storage conditions** : +2°C to +8°C, protected from light.**Shelf life** : 12 months**Sterility tests** :

- Bacteria in aerobic and anaerobic conditions
- Fungi and yeasts

Endotoxin : < 1 EU/ml**Cell growth test** :

Medium tested for the ability to support L929 cell growth.

Composition : Displayed on website, also available on request.**Recommended use** :

- Respect storage conditions of the product
- Do not use the product after its expiry date
- Store product in an area protected from light (not necessary for saline solutions).
- Manipulate the product in aseptic conditions (e.g. : under laminar air flow)
- Wear clothes adapted to the manipulation of the product to avoid contamination (e.g. : gloves, mask, hygiene cap, overall...)

The product is intended to be used in vitro, in laboratory only. Do not use it in therapy, human or veterinary applications.

Applications :

Minimum Essential Medium (MEM), developed by Harry Eagle, is one of the most widely used of all synthetic cell culture media. Early attempts to cultivate normal mammalian fibroblasts and certain subtypes of HeLa cells revealed that they had specific nutritional requirements that could not be met by Eagle's Basal Medium (BME).

Subsequent studies using these and other cells in culture indicated that additions to BME could be made to aid growth of a wider variety of fastidious cells. MEM, which incorporates these modifications, includes higher concentrations of amino acids so that the medium more closely approximates the protein composition of cultured mammalian cells. MEM has been used for cultivation of a wide variety of cells grown in monolayers. Optional supplementation of non-essential amino acids to the formulations that incorporate either Hanks' or Earle's salts has broadened the usefulness of this medium. The formulation has been further modified by optional elimination of calcium to permit growth of cells in suspension culture.

Uses :

This medium is formulated without antibiotics, serum supplement. This prolongs shelf lives and gives additional flexibility to its applications. The desired amount of serum and antibiotics should be added, using aseptic techniques, immediately prior to use.

Supplements, such as antibiotics, should be added as sterile supplements to the medium. Storage conditions and shelf-life of supplemented product will be affected by the nature of the supplements.

Signs of Deterioration :

Medium should be clear and free of particulate and flocculent material. Do not use if medium is cloudy or contains precipitate.

Other evidence of deterioration may include colour change or degradation of physical or performance characteristics.