

Data sheet | SciNX medium for serum-free cell culture and exosome production

Background

SciNX was developed to enable the growth of various rodent as well as human cell lines under serum-free conditions as adherent or suspension culture. The chemically defined, protein-free formulation of SciNX provides all essential nutrients for growth and recombinant protein, exosome, or virus production. SciNX is free of any animal component and was successfully tested on following cell lines:

Rodent: *CHO-K1, CHO-DG44, Sp2/0-Ag-14 and V79,*

Human: *HEK293, HeLa, HaCaT, U251 MG, U2 OS, NCH465K and various (other) glioblastoma, colocal carcinoma as well as hepatoma cell line*

Others: *Vero, fish cell lines such as ZFL*

Application note | Characteristics

Cell lines previously cultured in serum-free media are easily adapted by media change. SciNX is provided as a 0.22 µm sterile filtered as well as sterility tested liquid with an osmolality of 280 – 310 mOsmol·kg⁻¹, a pH of 7.3 ± 0.1 and tested for the absence of mycoplasma.

We recommend the addition of 4 – 6 mM L-glutamine and cell-specific growth factors such as EGF, IGF-1, TGF-β1 and/or bFGF. This medium contains no poloxamer 188 or other polymers.

Performance

For exosome production, a 60-80% confluent culture is washed with SciNX and incubated with SciNX for up to 6 – 10 days without media change. For improved exosome production we recommend the addition of our compatible feed media. In the same manner, continuous cultures can be performed by using appropriate growth factors as an addition if needed. SciNX allows a facilitated work flow: Media change can be skipped and passaging is performed weekly by lowering the seeding density.

Available products

Art. No.	Components
100101a-500ml	SciNX w/o L-glutamine, with nucleosides Basal culture medium
100101b-500ml	SciNX with L-glutamine, with nucleosides Basal culture medium
100101P-1L	SciNX w/o L-glutamine, w/o nucleosides, w/o NaHCO ₃ powdered formulation
100204b-500ml	SciFY7 w/o L-glutamine, with D-(+)-glucose Chemically defined feed medium
100205b-500ml	SciFY8 w/o L-glutamine, with D-(+)-glucose Chemically defined feed medium