

Certificate of Analysis

FBS Standard

US Origin

0.1 µm sterile filtered

| Product | Description | Catalogue-No. | Size |
|--------------|--|------------------------|------------------|
| FBS Standard | Fetal bovine serum, US Origin, 0.1 µm sterile filtered | ST30-1505 ST30-1506 | 100 ml 500 ml |

Lot No.: ST230302

Storage, stability, shipping:

Storage: -20 °C Stability: 03/2028 Shipping: on dry ice

| Parameter | Result | Units | |
|----------------|--------|-----------|--|
| pH value | 6.9 | n.a. | |
| Osmolality | 325 | mOsm/kg | |
| Hemoglobin | 31.95 | mg/100 ml | |
| Endotoxin | 5.77 | EŬ/ml | |
| Total protein | 37.0 | mg/ml | |
| Albumin | 15.0 | mg/ml | |
| alpha-Globulin | 17.0 | mg/ml | |
| beta-Globulin | 4.0 | mg/ml | |
| IgG | 217.2 | μg/ml | |
| Glucose | 174.0 | mg/100 ml | |
| Cholesterol | 31.0 | mg/100 ml | |
| Triglycerides | 102.0 | mg/100 ml | |

Specification Result

| | Specification | Result | |
|--|---|--|--|
| Sterility Incubation at 32 °C Incubation at 20 °C | sterile sterile | sterile sterile | |
| Mycoplasma | not detected | not detected | |
| Virus testing | | | |
| Bovine viral diarrhoea virus (BVDV) Bovine herpes virus (BHV-1) Para-influenza virus type 3 (PI-3) Bluetongue virus (BTV) Bovine adenovirus (BAV) Bovine parvovirus (BPV) Bovine respiratory syncytial virus (BRSV) Rabies virus Reovirus (RV-3) | negative | negative negative negative negative negative negative negative negative negative | |
| | | | |



| Performance | Results | |
|------------------------------------|---------|--|
| Cell type: SP2/0-Ag14, Day 3 | 106.3 % | |
| Cell type: MRC-5, Day 5 | 96.7 % | |
| Cell type: CHO K1, Day 3 | 100.7 % | |
| Relative Colony Forming Efficiency | 91.4 % | |
| Absolute Colony Forming Efficiency | 72.8 % | |
| Relative Cloning Efficiency | 117.0 % | |
| Absolute Cloning Efficiency | 53.6 % | |

TABLE 1:

| Test | Method | |
|--------------------|---|--|
| pH value | Measured with pH-electrode | |
| Osmolality | Analyzed by freezing point depression | |
| Hemoglobin | Determined spectrophotometrically at three different wave lengths | |
| Endotoxin | Kinetic limulus amoebocyte lysate test (LAL) | |
| Total protein | Colorimetric test (Biuret reaction) | |
| Albumin, Globulins | Serum protein electrophoresis (SPEP) | |
| IgG | ELISA | |
| Glucose | Colorimetric test | |
| Cholesterol | Colorimetric test | |
| Triglycerides | Colorimetric test | |
| Sterility | The absence of bacterial or fungal contamination is verified by dual incubation with Caso-Bouillon or Thioglycolat- | |
| | Bouillon according to Ph. Eur. at 32°C and 20 °C | |
| Mycoplasma | qPCR of microbial cultures | |
| Cell growth | Growth test of specific cells | |

Suitability

FOR RESEARCH USE ONLY!

These products are intended for research or manufacturing use only. Not for use in animal or human clinical or diagnostic application.

Raw material is collected in regularly inspected facilities and processed by PAN Seratech in compliance with current Ph. Eur. guidelines for Bovine Sera. Processing of raw material into finished serum product is performed by employees of PAN Seratech.

Since raw serum is not pre-aged before filtration, turbidity or flocculent debris in form of precipitate may develop upon thawing or storage of the product. This occurrence does not adversely affect the performance of the serum.

Results shown in this compilation have been obtained by carefully performing standard test methods (see table 1). Since results for any specific test may vary depending on methodology, technical equipment, or test substances used, it is suggested that results for particularly important parameters be repeated by the end user of this product.

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^{*} n.a. = not available