

TheraPRO® CHO Media System



Protein Production Made Simple

As the versatility and efficiency of antibody therapeutics continues to transform the healthcare industry, optimization of workflow and ease-of-use has become pivotal in accelerating time to market for new treatments.

The TheraPRO® CHO Media System is a chemically-defined, animal component-free formulation proven to optimize productivity and product quality when used in conjunction with the GS-CHO cell line, the prevalent protein expression system worldwide for therapeutic proteins and antibodies.

With speed-to-market in mind, the TheraPRO® CHO Media System is scalable from cell line development through bioprocess manufacturing and supported by subject matter experts with extensive experience in troubleshooting production processes. All components of the system are manufactured in ISO 13485 certified facilities in accordance with GMP and are accompanied by a Drug Master File (DMF) and assistance with regulatory submissions.

Why choose TheraPRO® CHO Media System?

- **Proven platform:** The TheraPRO® CHO Media System provides for rapid process development and speeds products to market through the utilization of a purpose built, streamlined media set. It is designed for use with a broad spectrum of GS-CHO cell lines, including Lonza platforms with an excellent track record of success, with many commercial products on the market and many more in the clinical pipeline.
- **Outstanding product performance:** Achieve >4.5 g/L of high quality protein and >90% cell viability when pairing the TheraPRO® CHO Media System with Lonza's established cell lines. The TheraPRO® CHO Media System provide for a simple, chemically defined and animal component free, two part production media set, consisting of one production medium and one feed. It provide consistently low antibody aggregation with even the most difficult to produce molecules.
- **Quality and expertise** – All components are manufactured in accordance with GMP and in ISO 13485 certified facilities, ensuring quality and traceability, with support from Lonza's subject matter experts.

TheraPRO® CHO Media System Attributes:

- **Production System:** 1 part powder medium and 1 part powder feed available in a range of scale ready pack sizes
- **Expansion and Cloning:** Ready-to-use, 1X liquid formulations

Features and Benefits

- Easy to use CHO medium solution
- Simplifies upstream processing and reduces preparation time
- Speeds time to market
- Achieves > 4.5 g/L of high quality protein and >90% cell viability
- Subject matter experts are on hand to provide technical support where needed

Ordering and Catalog Information

Part code	Description	Size
BESP1609Q	TheraPRO® CHO Cloning Medium	1 L
BESP1630Q	TheraPRO® CHO Expansion Medium	1 L
BESP1571B	TheraPRO® CHO Production Medium	5 L
BESP1603BX	TheraPRO® CHO Feed	5 L

TheraPRO® CHO Media System yields a higher VCC when compared to competitor media using same conditions

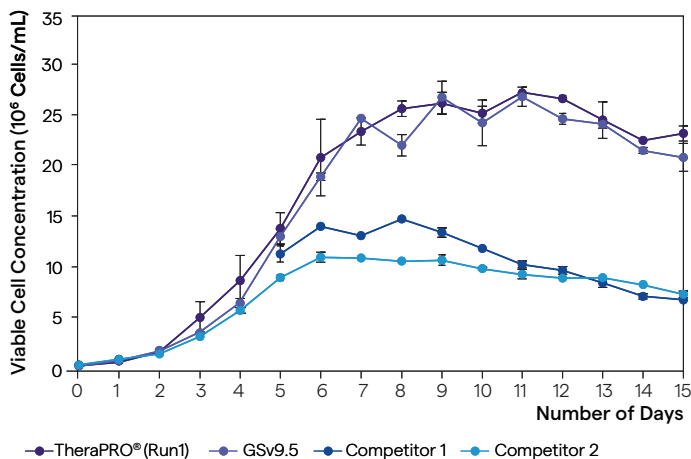


Figure 1: All cultures inoculated between 0.47 and 0.55 x 10⁶ cells/mL. TheraPRO® CHO Media System (Run 1) and GSv9.5 both shows similar trend, achieving maximum VCC of nearly 28 million cells/mL. Competitor 1 only grew to approx. 15 million cells/mL and Competitor 2 plateaued out at 12 million cells/mL.

Protein titer remains constant at different scales using the TheraPRO® CHO Media System

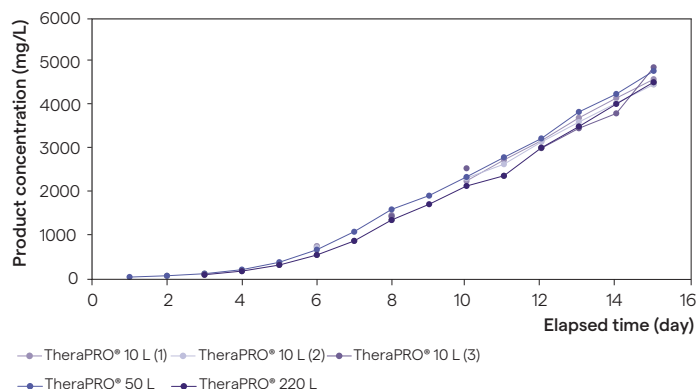


Figure 2: TheraPRO® CHO performance has been tested across a range of scales including 10 L, 50 L and 220 L. All scales show similar protein titer trends demonstrating TheraPRO® CHO is associated with high product quality across culture scales.

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