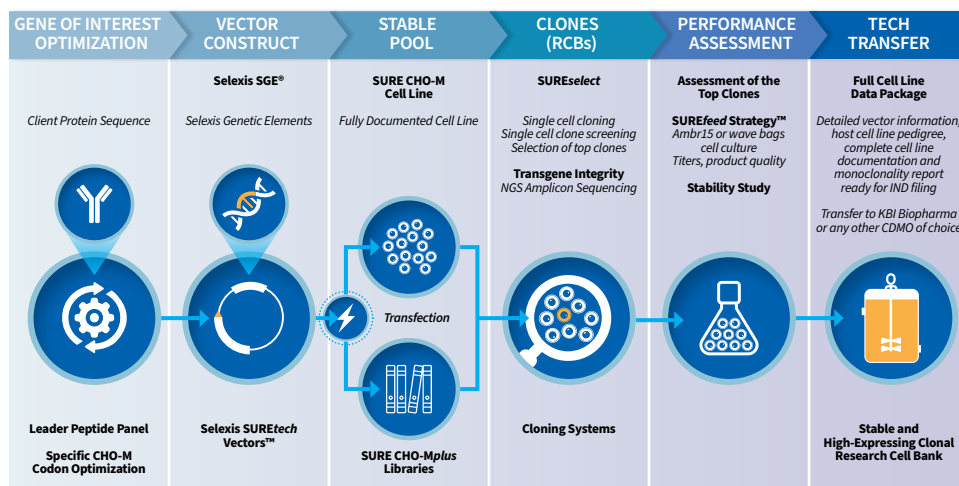


CAPABILITIES

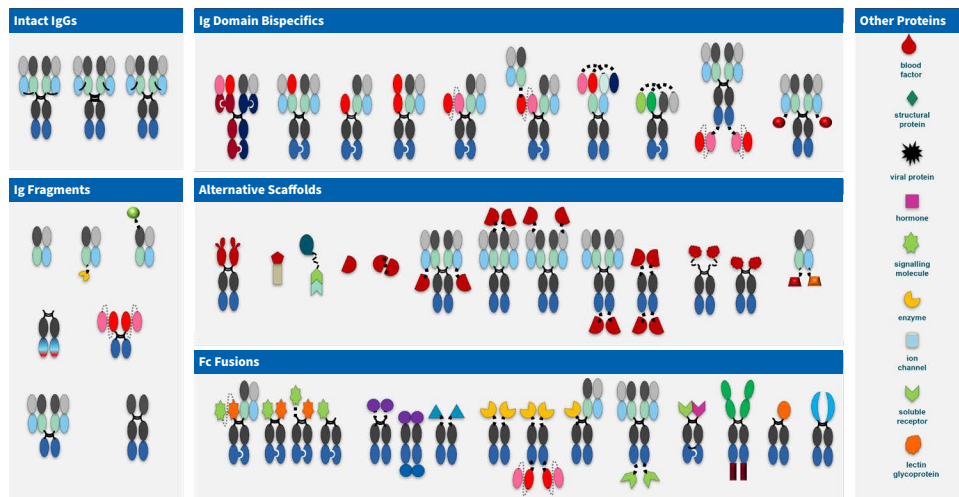
CELL LINE DEVELOPMENT (CLD)

For over 20 years, Selexis has helped its partners to predictably, rapidly and cost-effectively generate life-saving biologic medicines and vaccines. Its SUREtechnology Platform™ is being used by global partners as one of the most robust CLD technologies worldwide.



Scaffold Expression Diversity With the SUREtechnology Platform™

Selexis is the global leader in producing difficult-to-express proteins as next-generation therapeutics.



*Product dependent

CHO-M CELL LINES

FAST DOUBLING TIME

Selexis SURE CHO-M Cell Line™ (CHO-M) is a suspension-adapted CHO-K1 derived cell line that has a fast doubling time of 15.6 hours, enabling the reach of high cell densities in short process timeframes.

HIGH YIELD

- 2–6 g/L for mAbs (fed batch culture in Ambr15)
- >10 g/L in bioreactor*
- Increase in recombinant protein expression levels compared to classical expression system

STABILITY

Stable for **more than 60 generations**

VERSATILITY

Can express a wide range of recombinant proteins (Fc-fusion proteins, classical mAbs, bispecific mAbs, enzymes, blood factors, hormones, and other new scaffolds)

FULLY CHARACTERIZED GENOME

The Selexis CHO-M genome is entirely sequenced to provide you fully traceable cell lines.



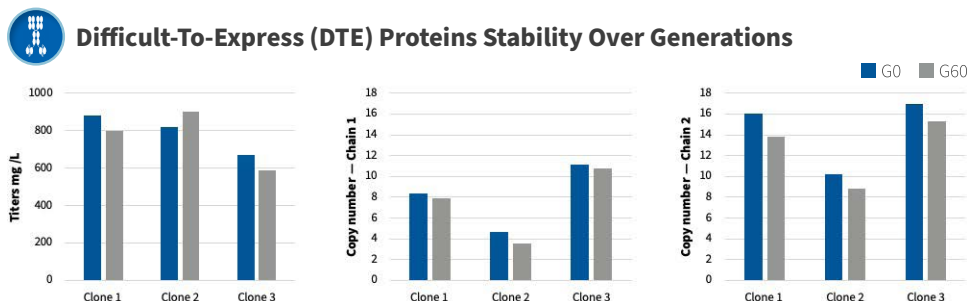
CAPABILITIES

Cell Line Performance

The Selexis SURE CHO-M Cell Line™ (CHO-M) is a proprietary high-performance suspension adapted CHO-K1-derived cell line, whose genome and transcriptome have been extensively characterized. The growth and production properties of the CHO-M Cell Line are well-defined, allowing for faster and more efficient scale-up to bioreactors.

Cell Line Stability

SURE CHO-M cells are stable over 60 generations both in productivity reaching high titers and in transgenes copy number. Below is a case study to illustrate this.



Titer of DTE has been determined by LabChip®. Copy number of each polypeptide chain constituting the assembled protein has been determined by ddPCR. Over 60 generations and across 3 clones, DTE is stable both in productivity, reaching high titers, and copy number.

WHOLE GENOME SEQUENCING (WGS) AND FISH

Selexis has developed several WGS applications to help clients with their cell lines development initiatives, genome characterization and clonality assessment in a fast turnaround time and with great accuracy. Selexis services support strategic decision-making process for the development of cell lines expressing biologics.

Genomic Characterization of RCBs

Selexis SUREscan® combines Illumina NGS technology with Selexis' proprietary bioinformatics tools to quickly characterize transgene-genome junctions. The Selexis data package is a valuable asset for regulatory filings.

	SUREscan®*
Deliverable	Transgene-genome junctions Gene copy number
Compatibility	Selexis CHO-M Other CHO Other mammalian cells**

Monoclonality Assessment

Regulatory authorities expect cell banks to be thoroughly documented for their clonal derivation. Selexis proposes three tools to assess monoclonality with very high probability. SUREsignature™ and SUREclone™ are based on the deep sequencing of the CHO-M genome and the use of accurate bioinformatics tools. Selexis has also developed a unique FISH industrial platform for high throughput karyotype data analysis to assess monoclonality in a cost- and time-effective manner.

	SUREsignature™	SUREclone™*	FISH
Deliverable	Monoclonality assessment	Monoclonality assessment	Monoclonality assessment
Compatibility	Selexis CHO-M	Selexis CHO-M Other CHO cell line Other mammalian cells**	Selexis CHO-M Other CHO cell line

*Wet lab step included **If reference genome is publicly available

SUREtechnology PLATFORM™

Ensure your biotherapeutic development with best-in-class cell line development technology. Selexis' proprietary technology platform and comprehensive services provide fast, reliable cell line development.

PROPRIETARY TECHNOLOGY

- SUREtechnology vectors: strong expression vectors
- No gene amplification required
- High performance host CHO-M cell

SPEED

As little as **8–12 weeks** for research cell banks generation, addressing product-specific expression bottlenecks with high-throughput approach

SAFETY

- Highly adaptable non-viral vectors
- Chemically defined, serum-free medium and feeds

PROVEN

- **160+** biologic drug candidates in preclinical and clinical development and **10 products in commercial manufacturing**
- Proven track record in the expression of mAbs, enzymes, Fc-Fusion, cytokines, vaccines, hormones, alternative scaffolds, receptors, blood factors and more
- World-class science, project management and highly efficient tech transfer to CDMOs

Best Medium Workplaces™

Great Place To Work.

SWITZERLAND
2022