

## MOLECL

Quality Control of biomolecules. Quick, precise and detailed as never before.

### In a nutshell

MOLECL is a pioneering biotech start-up focused on molecular quality control solutions for the life sciences industry. Our cutting-edge product, DNAQURACY, leverages patented solid-state nanopore technology to address critical bottlenecks in DNA/RNA, protein, and antibody characterization. With versatile applications spanning next-generation sequencing (NGS) library QC, plasmid integrity checks, and full-stack molecular antibody characterization, MOLECL delivers transformative tools for researchers and biopharma companies alike. Our approach combines state-of-the-art hardware, data-driven software, and tailored consumables to provide highly accurate, scalable, and cost-effective quality control solutions.

### Why is our technology important?

In the rapidly advancing fields of genomics, proteomics, and biopharmaceuticals, quality control is paramount to ensure the reliability, accuracy, and reproducibility of results. Current methods are often fragmented, time-consuming, and lack precision, especially for complex applications like ultra-long DNA mapping or antibody characterization. MOLECL's nanopore-based technology bridges this gap, offering a single-device solution that delivers high-throughput, best-in-class resolution for molecular quality control. By addressing unmet needs in both short-read and long-read sequencing, as well as structural and functional characterization of biomolecules, our innovation accelerates workflows, reduces costs, and enhances data quality.

### The benefits of our solution

- **High Precision:** DNA/RNA, protein, and antibody QC and characterization.
- **Versatility:** Applications include NGS library sizing, plasmid and transfection QC, and full-stack antibody characterization.
- **Efficiency:** Rapid, comprehensive analysis saves time and resources compared to existing multi-step methods.
- **Scalability:** Clean-room production-ready nanopores enable seamless scaling for industrial use.
- **Data-Driven Insights:** Integrated real-time data analysis improves decision-making and product development.
- **Modularity:** compatible with scalable robotized platforms for RNA-seq

### Keywords

Molecular quality control, Solid-state nanopore technology, DNA/RNA integrity, Antibody characterization, NGS library QC, Plasmid QC, transfection QC, High-throughput biomolecule analysis

### Founding Team

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