

Soy-Powered Fermentation

Airable is leveraging a 5-liter bioreactor to cultivate microorganisms cost-efficiently. Using domestic soy-based feedstocks as growth nutrients allows microorganisms to grow, multiply, and thrive with minimal risk. This modification also lowers the materials cost of fermentation significantly. Our capabilities range from bacteria to yeast and fungi, with customizable growth conditions including adjustable processing types and parameter control.

Additionally, Airable focuses on downstream processing optimization using a 6-liter capacity centrifuge. This tool allows us to separate all cells from the media at once and screen different purification techniques: liquid separation, precipitation, chemical lysis, and more.

CAPABILITIES

- **Organisms (BSL-1):** bacteria (aerobic/anaerobic), yeast, fungi
- **Processes:** batch, fed batch, continuous
- **Parameter Control:** nutrient composition, temperature, pH, dissolved oxygen, agitation, gas flow (air, oxygen, nitrogen, carbon dioxide)

BENEFITS

- Flexible early-stage development
- Cost-efficient soy-based media
- Adaptable growth conditions
- Upstream processing optimization
- Downstream methods refinement

Airable can tailor our process to fit your needs. From types of organisms to parameter control and process type, we can adjust and adapt growth and purification methods. Contact us today to find out how we can fit soy in the optimization and production of your process.

