



## CO-FOUNDER NEEDED

# Artificial spider silk as a replacement for elastane

## Biomimica

### THE PROBLEM

The textile industry is responsible for around 1.2 billion tons of CO<sub>2</sub> emissions annually. Fast fashion has driven a sharp increase in fossil-based fibers such as polyester and elastane, which contribute to over 30% of global microplastic pollution.

### OUR SOLUTION

Biomimica is developing artificial spider silk fibers as a sustainable, high-performance alternative to elastane using microfluidics.

### PATENT STATUS

We are at a pre-filing stage, and no patents have yet been filed. The core microfluidic spinning concept and associated process refinements originate from academic research at SDU & DTU.

### FINANCIAL OVERVIEW

Biomimica will operate as a B2B materials company, generating revenue through: (1) direct sales of yarn to textile manufacturers, (2) licensing and royalty agreements for the use of our silk in branded products, and (3) long-term protein-product sales at later stage.

### MILESTONES

Our technology is at TRL 3-4, and we have secured >5 mio. DKK in non-dilutive funding. We have also received 3 LOI's from industry partners. Within 12 months our technology will reach TRL 5 and we will start pilot tests with our industry contacts.

### TARGET MARKET & CUSTOMERS

Our market entry focuses on sportswear & technical textiles, where the demand for sustainable, high-performance elastic materials is strongest. This market need has already been validated by industry leaders such as PUMA and NASA.

### CO-FOUNDER PROFILE WE ARE LOOKING FOR

#### Preferred qualifications

- Speaks English
- Background in business administration
- Background in sales, marketing, textile market
- Background in accounting, finance, or economics
- Background in microfluidics, fluid dynamics or protein development

#### Personal fit

- Passionate
- \$Teamplyah\$
- Likes to have fun

#### TASKS & RESPONSIBILITIES (FIRST 3 MONTHS)

Support for securing funding

Market contact/securing partnerships

Business development

Handling funding

Technical & scientific support in regards to microfluidics and recombinant protein development

#### ACADEMIC & ENTREPRENEURIAL BACKGROUND OF CURRENT CO-FOUNDERS

Irina Iachina: CEO & co-founder, PhD in Engineering Science

Victor Robledo: COO & co-founder, MBA

#### PHYSICAL ADDRESS

The primary place of operations is currently DTU Skylab, but hybrid or online would not be an issue.

#### READ MORE HERE

[www.biomimica.dk](https://www.biomimica.dk)



### ABOUT OPEN ENTREPRENEURSHIP

Open Entrepreneurship is a collaboration between all Danish universities aiming to create more research-based startups.

[www.open-entrepreneurship.com](https://www.open-entrepreneurship.com)



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