

# Greenhouse **Vertical-Solutions**

«Go Vertical 🕡 – that's the maximum»

PitchDeck September 2025

Supported by















Silver Medal at Invention Geneva 2025





## **VISION**

We are revolutionizing Greenhouse farming and setting new standards – by **thinking vertically** and unlocking the **full potential of every square meter** -

making a **significant contribution** to the agriculture of tomorrow.



## MISSION 🖋

We combine proven technologies with **Frugal Innovation** to create sustainable **Vertical Farming Systems** that harness natural sunlight

Our innovative **Tower-System** enables space-saving, resource-efficient, and economically attractive food production – for greenhouses, urban spaces, and beyond.

BSBZ Greenhouse Pilot with 160 lettuce per m<sup>2</sup>





We are fast, perfectly organized, and have extensive experience in product development, production, and sales



### SASCHA ROHNER

100%

CEO, Initiator & Co-Founder

- 20 years in product development
- 10 years in business development
- 10 years of experience with hydroponics

Certified Plastics Technician, Industrial Engineer



### PAUL OEHY

100%

CTO, Co-Founder

- **25 years** in electronics development and software programming
- 15 years of experience in the production of assemblies and complete devices

Certified Electrical Engineer



### JÜRG BÄUERLE

100%

CSO, Co-Founder

- 30 years of sales experience
- Large network across Europe

Sales professional

### Team



### **Brigitte**

Controlling & Events



#### Bea

Admin & Personnel



#### Claudia

Admin & Production



### Roland

Plant expert (Consultant)

M.Sc. Horticultural Sciences



#### THE CHALLENGES

### Intensive land use leaves its mark and climate conditions make cultivation more difficult



The world's population is growing by **80 million people** every year.



**28%** of the world's arable land no longer has sufficient water available.

With current farming methods, we will only be able to adequately feed **50%** of the global population by 2050.



Every year, we lose agricultural land equivalent to the size of **14 million football fields**.



**70%** of global freshwater consumption is used for food production.





Agriculture is facing challenges – open-field cultivation suffers from climate change, greenhouses lack automation, and vertical farming is too costly.

### **Open-field cultivation**



## Open-field cultivation faces major challenges:

- Climate change & extreme weather
- · Water scarcity & soil erosion
- Limited grable land
- Rising production costs
- Fluctuating market prices

### Our Focus

#### **Greenhouses**



## Greenhouses are reaching their limits:

- Single-level horizontal cultivation
- · Lack of modular vertical solutions
- · High labor intensive
- Lack of automation
- Labor shortage

### **Vertical Farming**



# Vertical farms struggle with high operating costs:

- High energy consumption
- · 100% artificial light
- 100% climate control
- · Unprofitable in many regions
- Operating at a loss





Today's systems are rigid and non-modular – The future lies in combining existing and innovative solutions that optimize space and increase efficiency through automation and integration.

### **Current problems of Greenhouse systems:**

- Rigid, inflexible and non-modular
- Difficult maintenance and cleaning
- Space is not optimally utilized
- · Labor-intensive cultivation
- Lack of automation

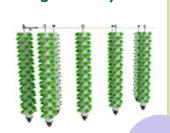
### **Horizontal-Systems**



### **Vertical-Systems**



FrugalTec-System



Today

**Future** 

Planting & Harvesting process	Horizontal	Vertical	Horizontal
Growing process	Horizontal	Vertical	Vertical
Number of plants per m <sup>2</sup>	16	120	> 160
Modular (height & plant distance)		$\circ$	•
Uniform photosynthesis through rotation	$\bigcirc$	$\circ$	•
Low-cost automation possible	$\bigcirc$	$\bigcirc$	
Flexible seedling relocation possible		$\bigcirc$	
Easy visual pest detection and control	$\bigcirc$	$\circ$	•
Easy cleaning possible	$\bigcirc$	$\circ$	

#### THE USP - OUR TOWER-SYSTEM

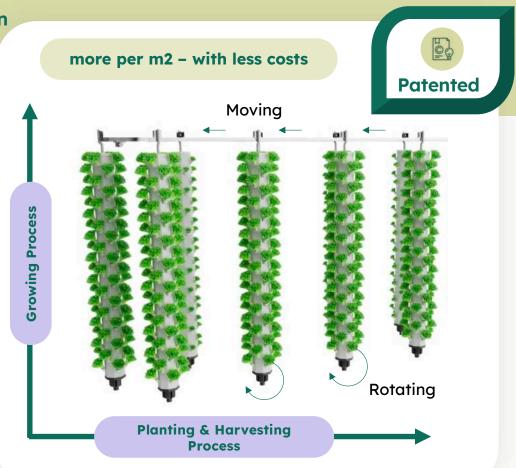


We clearly stand out from the competition by planting & harvesting horizontally, while cultivating vertically.

We focus on systems that enables dense, vertical cultivation in greenhouses to maximize the use of natural sunlight,

using a 100% flexible and adaptable setup **unmatched by competitors.** 









Vertical Tower-Farming in greenhouses increases production output while using natural resources efficiently



The industrial Greenhouse sector is experiencing significant growth, driven by several key factors;

- Increasing global demand for fresh, high-quality, and locally grown greens
- Climate change drives the need to ensure stable yields, consistent quality, and reduce reliance on open-field farming
- Water scarcity and sustainability concerns drive the adoption of resource-efficient growing systems use less water and fertilizer
- **Scarce farmland** increases the need to optimize land use; greenhouse with vertical farming maximize production per square meter.

### Forecast for **High-Tec** Greenhouses

2023 60'000 ha 2030 > 120'000 ha







### The global Greenhouse Farming market is set for rapid growth – we provide the vertical solution

It is developing with a growth rate (CAGR) of about 10%.

In 2021, the global commercial
Greenhouse market TAM was valued at
USD 29 billion and is projected to grow
with a CAGR of 10%.

TAM

According to Global Research forecasts, the market value is expected to exceed USD 70 billion by 2030.

We can assume that about 40-50% of the global Greenhouse Market pertains to modern, technology-based systems.

USD 28 billion by 2030.

SAM

The path is defined - by 2030, we will achieve USD >7 millions in revenue with continued rapid growth

SOM

Worldwide, the demand for **alternative systems** for resource-efficient and secure cultivation is growing.

Natural disasters and increasing regulations are making **field farming** more difficult and uneconomical.

We must therefore offer solutions that are accepted by farmers and enable economically viable production!





Diverse revenue streams from hardware, services, licensing, and software position us for scalable growth

**Hardware Sales:** 

Revenue comes from sales of Tower-Farming systems, easily integrated into new and existing greenhouses. Recurring Revenue:

Recurring revenue from spare parts and software subscriptions for remote monitoring.

**Service Contracts:** 

Optional service agreements for optimizations, and ongoing technical support.

Future Opportunities:

Producing and supplying seedlings to growers, or developing systems designed for this purpose.

**Licensing Model:** 

Licensing options for partners to produce and sell our System under official rights in their region.

**Target Customers:** 

Greenhouse operators, producers, commercial growers, and agribusinesses seeking higher efficiency and yield through vertical farming infrastructure.





## From Pilot Project to market scale – Your investment powers rapid growth and shapes the Future

### **Traction & Partnerships**

- 1. Running Pilot with Agriculture School Austria (BSBZ)
- 2. Running Project with FHNW (University CH)
- 3. Collaboration Project with FHGR (University CH)
- 4. Collaboration Project with FHOST (University CH)



Scaling & growth
Post 2028

evelopment & 2025/ 2026

80/

Expansion

2027/ 2028

### **Pilot Projects & Validation**

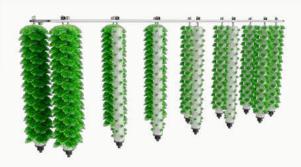
- TowerFarming concept
- Secure Partnerships
- Finish Seed round
- System Development
- Pilot projects in DACH-Region
- Product launch mid-2026

### **Expansion European Markets**

Entry into other neighboring
European markets such as Italy,
Spain, and France in cooperation
with strategic partners.

## **International Scaling**

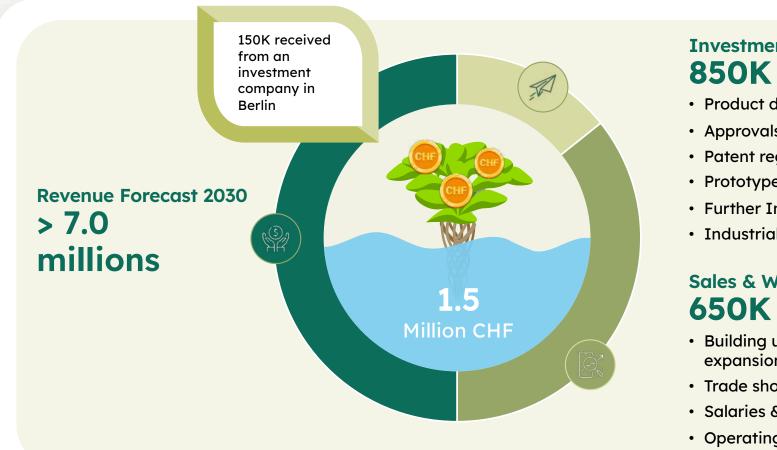
Scaling into international markets beyond Europe.







Together, your investment accelerates our path to success – for mutual gain!



# **Investments**

- Product development
- Approvals & certifications
- Patent registrations
- Prototypes & sample parts
- Further Injection tools
- Industrialization

# Sales & Working Capital

- Building up sales power & expansion
- Trade shows & advertising
- Salaries & rental costs
- Operating costs





## QUESTIONS?

## **CONTACT US!**

## Sascha Rohner

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