

# Company Profile of PLANTX Corporation

PLANTX is a Tokyo-based agri-tech startup that designs and manufactures original “Closed-type” plant production machines, which are used for indoor vertical farming.

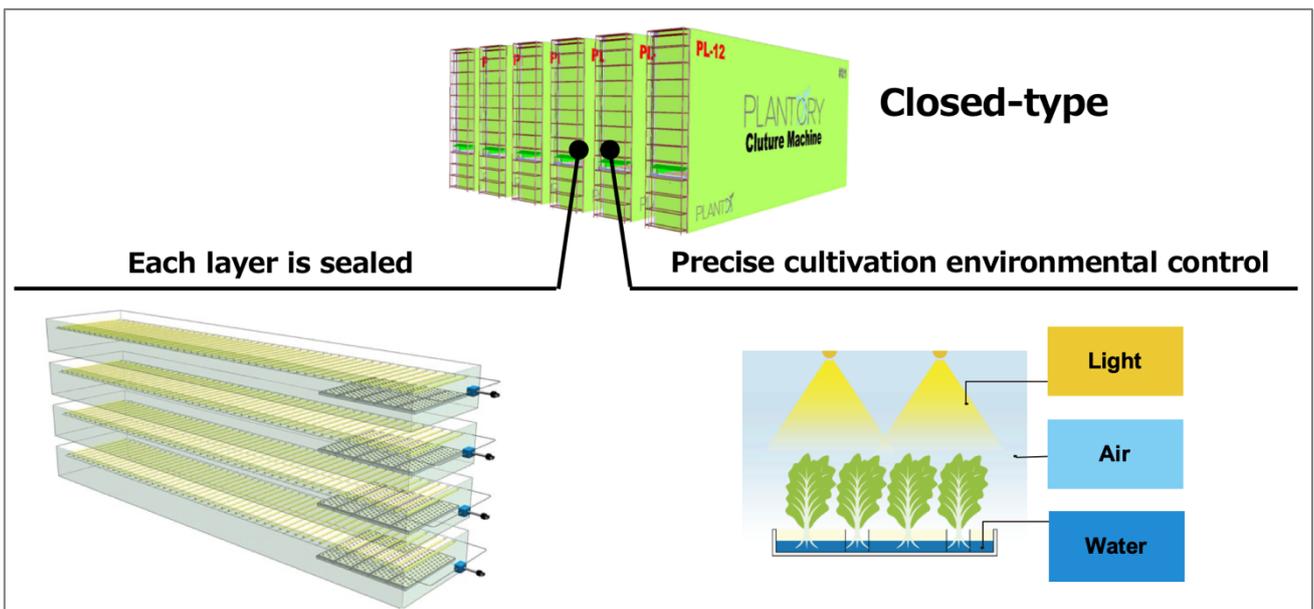
We are a group of experienced engineers with over 200 years of combined experiences in various industries including automobile and precision machinery. We will upgrade indoor vertical farming and contribute to food production in the world.



Please contact us if you are interested in building indoor vertical farms, researching on plants, and/or selling fresh and high-quality vegetables. (Our contact information is at the bottom.)

## Technology

PLANTX develops original “Closed-type” plant production machines. The most important feature of them is that each layer of a machine is sealed and inside environment can be controlled individually and highly precisely.



We have two sizes of culture machines.

One is a large-sized one for plant mass-production, named “Type M”. It is introduced to indoor vertical farms and used to produce vegetables and plants in mass-production basis.

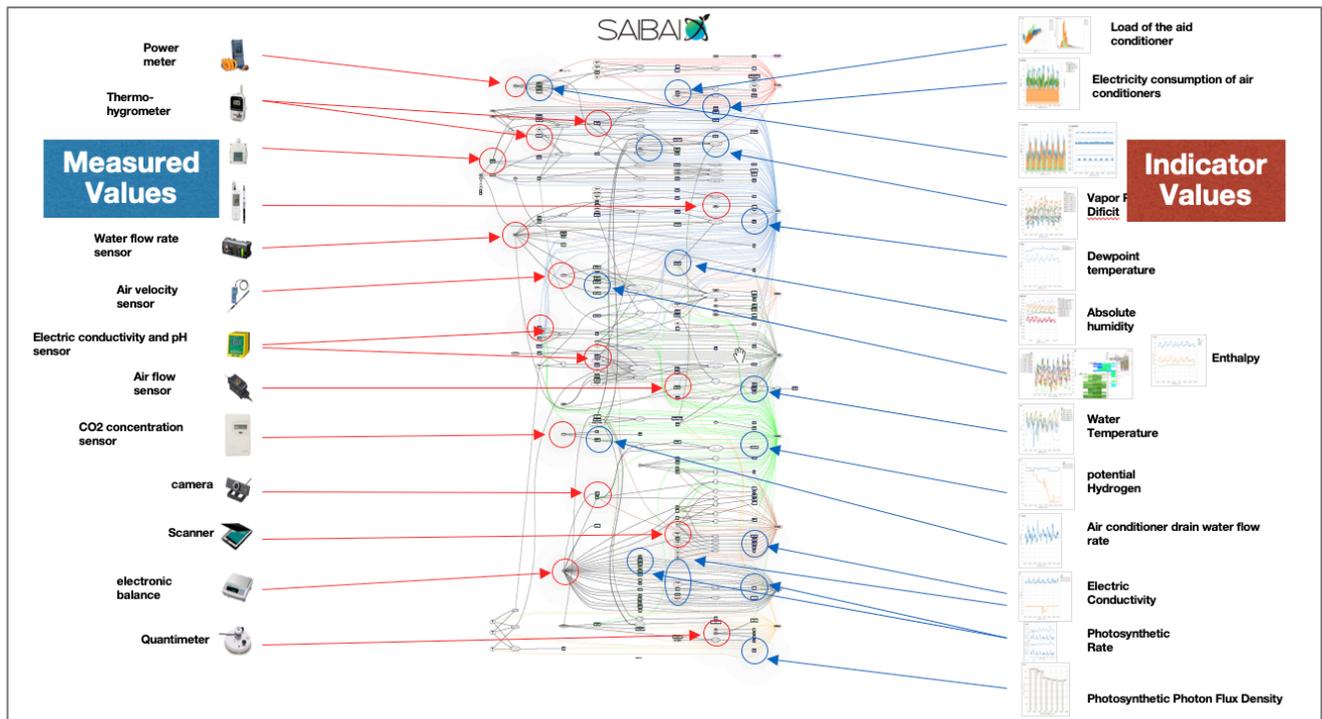


The other is a small-sized one for plant research, named “Type XS”. It is used for search for data-sets of the environmental parameters to grow specific vegetables and plants, not only delicious and nutritious vegetables but also medicinal plants with more pharmaceutical ingredients.



In both “Type M” and “Type XS” machines, our original software named “SAIBAIX” works. “SAIBAIX” connects input (electricity, seeds, CO<sub>2</sub>, nutrients, and water) and output (plant growth) of an indoor vertical farm. With “SAIBAIX”, users can monitor 20 parameters of “Closed-type” machines and control them in real time in order to grow plants as intended.

There are many measured values and indicator values relating plant cultivation as in the figure below. PLANTX built an equation chain that represent these complex relationships of plant cultivation. This equation chain is built in our original “SAIBAIX” software.



## Products and Services

The following three are PLANTX's main products and services.

- **Planning, building, and operation of indoor vertical farms:**

We will plan and design indoor vertical farms with our original “Type M” machines for companies that are willing to build vertical farms. Additionally, we will support their operations.



- **Research on plant cultivation environments:**

We will research plant cultivation environments by using our “Type S” machines according to our customers' requests. We will provide data-sets of the environmental parameters to grow specific vegetables and plants, not only delicious and nutritious vegetables but also medicinal plants with more pharmaceutical ingredients. The following is an image of PLANTX's “Plant Research Center”, which will be built in the near future.



## ▪ Vegetable and plant sales:

In Tokyo, PLANTX operates an indoor vertical farm using our plant production machine by ourselves. There, we have produced vegetable for over a year. Additionally, our vegetable is sold at supermarkets in Tokyo and highly evaluated by demanding consumers.



## Comparison with conventional technology

Our original “Closed-Type” plant production machines have significant competitive advantages against Conventional “Open-Type” as follows.

	<b>Closed-Type</b> (PLANTX's original technology)	<b>Open-Type</b> (Conventional technology of indoor vertical farms)
		
Method	Each layer (shelf) is sealed, and the environment of each layer is controlled separately.	Shelves are open to the entire room. As each layer is not separated, the environmental control is done within the entire room.
Production Stability	Stable throughout the year	Often unstable
Productivity	High productivity	Difficult to improve productivity
Quality of Plant	By the precise environmental control, Quality and nutrients of plants can be actualized as intended.	As the environment of the cultivation room cannot be controlled precisely, quality and nutrients of plants cannot be controlled.
Multi-plant cultivation	Possible (Because each layer can have a different environment, various plants can be grown in the same machine and room.)	Difficult (Only one kind of environment can be set in the entire room, so it is difficult to grow various plants there.)

## Members

We are a group of experienced engineers with over 200 years of combined experiences in various industries including automobile and precision machinery.



## Contact Information

PLANTX Corporation

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