

## Predictive modeling of plant growth

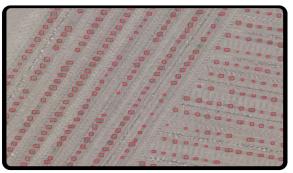
VanBoven Internship

Ever thought your knack for technology could change the way we feed the world? At VanBoven, we make agriculture more data-driven by developing predictive solutions using drone imagery and AI. We currently have an internship position open, so grab your chance and join us on our mission.

## **Job Description**

At VanBoven we have developed proprietary Deep Learning technology to automatically analyze agricultural drone imagery. In fields with over 150k plants, our algorithms are able to identify every single one of them. We determine every plants' size, and compare it with previous recordings to establish growth patterns. When harvest time comes around we take it to the next level and determine which broccolis, lettuces and cabbages are ready to be harvested.





In this internship you will analyse a time-series of drone recordings to develop a predictive growth model. You can use all the data we have collected so far. However, we also want to provide the opportunity to design your ideal dataset and execute a data campaign during the 2021 season. Once you have the perfect data, you can use our machine learning toolset to extract the data you need from the imagery you've gathered for your research. And don't worry, we've already laid some groundwork.

A summary of your work:

- Inspect our current data and groundwork and set the scope for your research
- Design and execute a data campaign tailored to your requirements
- Develop your method and tooling on our existing dataset
- Run your analysis on the data you've gathered
- Perform statistical analysis of plant growth variation in both space and time
- Work towards an operational predictive model, possibly using machine learning.

## What do we expect from you?

- Msc. level thinking with mathematical/analytical focus
- Available for at least 5 months
- Experienced with Python
- Fluency in English. Dutch is a bonus

## What we offer

- €300/month full-time internship reimbursement
- Hands-on application of Deep Learning and Computer Vision techniques
- Flexible work hours and location
- Travel allowance
- Being part of a quickly growing team

Interested? Please send your CV and a short motivation to me (<u>kaz@vanboven-drones.nl</u>) and I will get in touch with you as soon as possible. Any questions, remarks, tips, feel free to get in touch with me over mail.