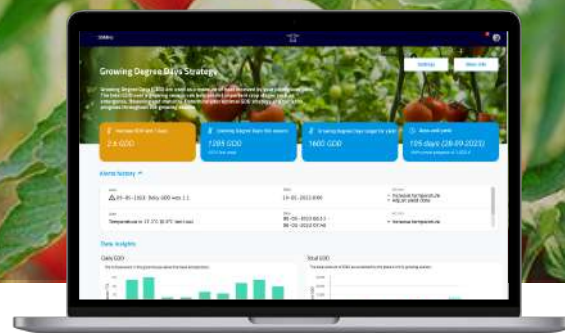


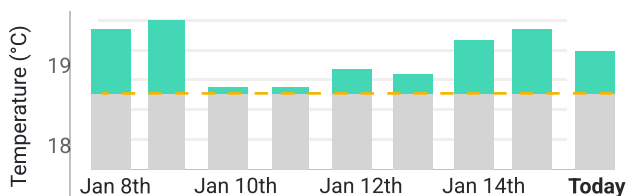


Growing Degree Days Strategy

Improve & time crop quality and yield



As a grower, you know that timing is everything when it comes to maximizing your crop yield and quality. That's why we're excited to share our updated Growing Degree Days (GDD) strategy application, designed to help growers optimize their management practices and achieve their production goals. Get quick insights into the accumulated GDD in this growing season so far, and adjust according to you and your plants' needs.



What are Growing Degree Days (GDD)?

GDD are a way to measure heat energy received by plants over a period of time. GDD are calculated based on the difference between the minimum temperature required for crop development (the base temperature) and the actual temperature in the greenhouse. The total sum of GDD over a growing season can be used to predict important crop stages, such as maturity. This information can help growers make data-driven decisions about optimal harvest timing.

Example

| | |
|-------------------------------|-------------|
| Base temperature | 15°C |
| Actual temperature greenhouse | 21°C |
| Optimal temperature range | 15°C - 26°C |

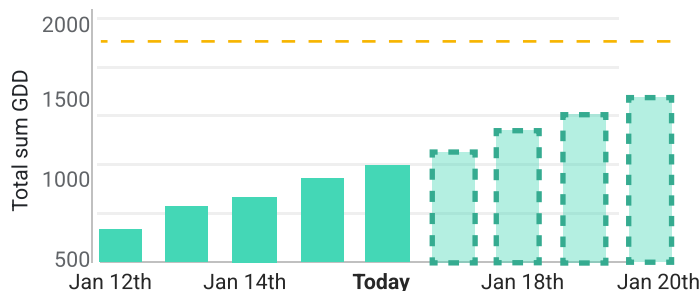
This means the GDD of this day is **6**, which is added to the total GDD sum of the growing season.

Optimizing the GDD should be done within the optimal temperature range. This range, as well as the base temperature, is dependent on the crop type.

What is the GDD strategy app?

In the GDD strategy app you can get an overview of the target GDD until yield, the currently accumulated GDD in the season so far, and the progress you are making. We calculate the days until yield for you, based on the current trend in GDD, or based on your set target.

Understanding your crop's growth stage helps you optimize resource allocation and better understand your plant's needs for optimal crop management.



Example of a graph showing the currently accumulated GDD, and the projection for the coming period based on the current average progression.

Setting the GDD target for yield

The total required GDD for a crop to reach maturity differs per crop and environmental conditions. As an expert grower, you might already be familiar with the target GDD. If not, you can consult crop growth models or tables to determine the target GDD for your specific crop and location. Once you have determined the target GDD, you can enter it into the GDD strategy app and use it as the basis for calculating the days until yield and tracking your progress towards your yield goal. By adjusting the GDD target and monitoring your progress regularly, you can optimize your crop management strategies and improve your chances of achieving your desired yield at the right time.



1285 GDD

Growing Degree Days this season



1600 GDD

Growing Degree Days target for yield

105 days until yield

With current progress of 3 GDD ✎

Planning days until yield

By default, the app calculates the days until yield based on the average GDD of the past week and the remaining total GDD required. Are you unhappy with the projection, seeing changes in the weather predictions or have another reason to assume a different GDD for the coming period? You can set the daily GDD target yourself, and the calculations will be updated based on your expertise.

What is the GDD strategy kit?

The app is part of the total product: the Growing Degree Days Strategy Kit. To get the GDD insights and predictions in real-time, the kit comes with four temperature humidity sensors, a gateway and a repeater. The sensors are compact, robust, and wireless, so they can be moved easily.

In the dashboard, you also have access to high-quality weather predictions, so you will be able to adjust the predicted GDD more accurately. The full kit is user-friendly and easy to install, enabling you to get started quickly. In addition, our dedicated support specialists are always available to assist you and provide guidance whenever needed.



GDD strategy kit

Time and optimize your yield

What does the kit consists of?



GDD strategy

Optimize your crop management with our GDD strategy app by tracking and projecting Growing Degree Days for maximum yields.



Temperature humidity sensor

Measures temperature and humidity. The temperature is used to calculate the realised greenhouse temperature for the GDD



1 Gateway

Central access point for network connections.



1 Repeater (optional)

For optimal connectivity.

Additional crop benchmarks

Beside crop maturity, there are other crop benchmarks that can be tracked or predicted using GDD. Some examples include:

- Crop emergence
- Flowering and fruiting time
- Critical growth stage
- Pest and disease emergence

Bring your data-driven crop management to the next level by adding these benchmarks to your GDD strategy and further fine-tune the crop timing.

