

"Focus on the conditions rather than the crop"

"It starts with an analysis of the soil," says Marco van Gurp from N-xt Soil Services when beginning the explanation of his method. Van Gurp clarifies the method's added value on the basis of the results at a trial field at PPO Westmaas, where crops have been grown according to the vision and products of N-xt Fertilizers over the past five years. "If you correct the soil on the basis of the right ratios, you can increase the yield by 10%, without using any extra fertilizer."

During the last growing season there were sugar beets on this trial field, which is called "Puntje Dijk". That crop also achieved remarkable results. "PPO Westmaas is an experimental farm on heavy soil and is one of the first practical examples yielding visible results."

Less tare, higher sugar content

Since 2016, the method of N-xt has been combined with the Kinsey-Albrecht soil analyses. This means that the right products and actions – according to the advice based on that method – are applied to rectify any deficiencies and surplus. In short, the ratios of the different nutrients are very important.

The conclusions after crop year 2017 are clear: the beets contain far less tare and a higher sugar content. Van Gurp: "We saw this immediately in the early phase, and later in the season remarkable differences also occurred. The crop on "Puntje Dijk" had a better colour and was much more uniform than the beets on adjacent fields. Ultimately, this was also evident in better growth and development underground. This not only applies to sugar beets, but to all crops."



To the left are the beets grown according to the vision and products of N-xt. It is immediately noticeable that they are much "cleaner" than the sugar beets on the right

| "If the soil is doing well, all crops will grow well" |

According to Van Gurp, the results at PPO Westmaas completely change the opinions on crop plan fertilization: "We should focus a lot more on the soil. What does the soil need to be in balance? This does not depend on the crop, for if the soil is in balance all crops will do well in it."

Optimize conditions

So it is all about reverse thinking: in this case the beets perform better because the soil conditions have been improved, so that the soil biology is in balance. "We must adapt the conditions to the crop rather than the crop to the conditions," explains Van Gurp. "Our goal is therefore to make farmers aware of the importance of optimizing the conditions. Make sure that the soil regains its natural strength, so that much less input is required to use the full potential of the crop field. If, in addition to that, the grower gives the correct input, the yield will improve even more."

Flywheel

As Van Gurp points out, this is exactly the reason why the Kinsey-Albrecht philosophy has been added to determine how soil and leaf fertilizers are used: "If the nutrient ratios in the soil are correct, this will act as a flywheel, which accelerates the soil processes via a better soil structure, increases the availability of trace elements and improves the soil life." By encouraging that cycle, the grower increases the crop's resilience, quality and yield."



This close-up photo of the trial field at PPO Westmaas shows that the soil in which the beets are growing has a better structure.

This growth season (2018) the crop at the trial field at PPO Westmaas is winter barley. Van Gurp: "We look forward to seeing the results."

Cinema

The Kinsey-Albrecht method gives growers pointers on how to recover the balance in their fields in a responsible manner. An important principle in this respect is the so-called TEC, which is the Total Exchange Capacity of minerals in the soil. "You could compare this capacity with a cinema, in which we are not only interested in the size, but also – and even more so – in the distribution of the audience among the available seats." On the basis of this information advice is given on how to optimize the mineral ratios, which is the distribution of the audience in the cinema. N-xt Soil Services offers crop farmers a practical, easy-to-use tool that states exactly which products and doses are needed at a specific time to continue to optimize the soil. It provides growers with insight into how the soil functions and what is needed to guarantee the best performance of both soil and crop."

A house for crop and biology

"You can think of it as building a house. The structure requires sand, cement and gravel in the correct ratios. Otherwise you won't get good concrete to work with. What we are currently doing on the fields is to collect a container full of stones and a heap of gravel. At first sight this seems fine, and on the basis of research you can demonstrate there is enough. But that doesn't mean you have a house. What matters is that the available resources are used correctly, so that the house for the soil biology and our crops is completed and can annually supply products of a good quality and size. If something changes in the soil and fertilizer situation, everything else will change too. So what matters are the conditions. In agriculture we are not yet used to making the environment decisive when researching a product, but that's the way we should be heading. This is called systems research." N-xt Soil Services, as the official consultant of the Kinsey-Albrecht method, would like to help you with this.