## NovaCropControl

## Manual plant sap sampling

# Raspberry



### **Contact details**

NovaCropControl
Gasthuisstraat 20
5061 PB Oisterwijk
The Netherlands
info@novacropcontrol.nl
www.novacropcontrol.nl





#### Sampling and sending samples

#### Location

Take the following steps into consideration when collecting leaf samples:

- Avoid the outer rows of the greenhouse or field and the first and last 10 yards of a row.
- Sample leaves of average leaf quality.
- Sample abnormal plants (with deficiency symptoms) separately. If a deficiency might be present in the young or old leaves of the total crop, sample these leaves separately as a young or old leaf sample.
- Keep in mind the sunny and shady side of the plant. Always consistently sample the same side.

#### Time of sampling

It is strongly recommended to take the samples before 9:00 AM. The plant will then have enough leaf-tension with proper moisture conditions.

Begin sampling when the 5<sup>th</sup> leaf is developed, from then on every two or three weeks until the end of harvest.

#### **Plant parts**

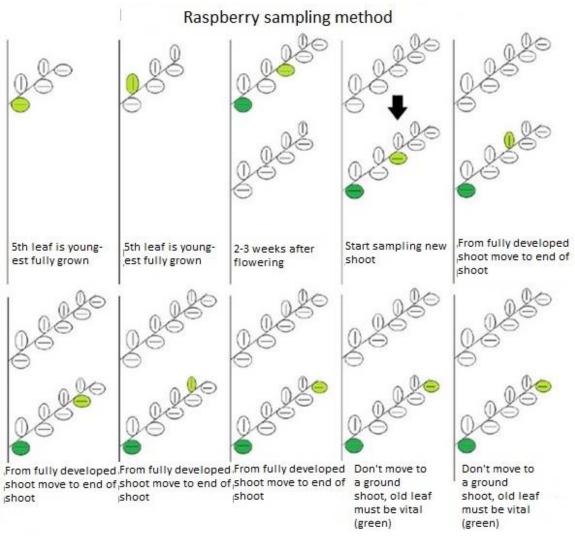
Sample the youngest, fully developed leaves and the oldest, but still vital leaves (pic. 1). From these composited leaves, only sample the middle/top leaf (pic. 2). Picture 3 shows an example of a young and an old leaf sample.

It is not allowed to send in samples that have a fungal, bacterial or virus infection. The leaves must also be free from insects.









Pic. 1









Sample the middle top leaf from the composited leaf.

Pic. 2



Pic. 3 Young leaf sample (left) and an old leaf sample (right)

#### Sample size

For an average, representative (young or old) sample about 25 leaves are needed, at least 150 grams. Sample size can vary, depending on leaf type (size and thickness). If you have questions about sample size, please contact us.











#### Packing the leaf samples

When leaves are wet on the outside due to dew or rain, they can be dried with a tissue. Leaves have to be dry from the outside to be analyzed because water will have an influence on the results. Moreover, the leaves will spoil faster if there is water in the sample bag.

Please pack the young and old leaf samples separately, these will be two different samples. To assure fluent processing please stack the leaves, fold the leaves if needed, and put them in a plastic zip-lock bag carefully. Make sure all air is out, so any leaf evaporation is excluded. See pictures.







Fill in the labels correctly and place them on the bags (see pictures below). We prefer pre-printed labels because it saves us a lot of administration time. It has also advantages for you:

- When using Bemesting-Online program you need the same location names and crop names to make comparisons (graphs), pre-printed labels make this a lot easier;
- If our employees must read what is on the label, the chance of reading errors is very high, this is not the case with preprinted labels;
- You no longer must write the location and crop name on the label on the spot. Let us know if you need help with this.







www.novacropcontrol.nl











#### Sending the samples

The sample zip-lock bags with barcode can be sent in an envelope (make sure it fits in a mailbox (max 3,5 cm. high)). In case you want to send more than one sample, please send them together in 1 box, so they will arrive together. Then put sufficient postage on the envelope or package. Always check the weight. Please take care that envelopes are sealed well. You can put an extra tape over the closure to avoid opening during transportation.

We recommend to sample crops on Friday and send the same day by DHL or FedEx, then NovaCropControl is receiving your samples in the beginning of the next week. Please put €1.00 as the shipment value on the sample package.

Do you ship samples from outside Europe? To avoid clearance delay at the customs please consult our shipment guide for sending samples to Europe. You can find this guide at our website: <a href="https://www.novacropcontrol.nl/en/sampling">https://www.novacropcontrol.nl/en/sampling</a>

Please send samples to the address below:

### NovaCropControl

Gasthuisstraat 20 5061 PB Oisterwijk The Netherlands







