

Bacterial wilt

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The compulsory testing and strict measures as contained in the Scheme's regulations, resulted in a real decline in the occurrence of bacterial wilt disease in the seed potato industry. However, towards the end of 2003 the planting of certified seed potatoes produced by three growers led to infestation at six seed potato growers and 13 confirmed cases in table potato plantings. These outbreaks resulted in growers and table potato producers again questioning the Scheme's regulations and the test protocol. The industry justifiably claimed that an investigation be launched into these cases and that measures be put in place to prevent a repetition.

The industry requested that:

- An investigation be launched into the implementation of the protocols of Potato Certification Service (PCS) and Potato Laboratory Services (PLS).
- Where growers knowingly and wilfully contravene the scheme's regulations, sterner action be taken against such growers.
- The publication of confirmed bacterial wilt cases be considered.
- Reports by the Bacterial Wilt Committee be made available to the industry.
- Methods be investigated as to how producers who suffered losses could be compensated.

The following procedures are currently in place to handle bacterial wilt.

Precautions within the Certification Scheme:

- The source of all registered plantings are verified before registration is granted.
- The scheme requires that during field inspections any plant with wilt symptoms be tested. If bacterial wilt is confirmed, the whole cultivated unit is rejected.
- A statistical sample is drawn according to the required procedure and subjected to testing.
- Testing comprises the use of the Elisa test kit and the verification of positive results through the physical identification of the organism by conventional techniques and identification of the organism, confirmation of the organism by way of five biochemical tests and as from December 2003 also by way of the process known as "Koch's postulates".
- A zero tolerance is therefore applied within the scheme as required by the Agricultural Pests Act.

Strategies for the management of bacterial wilt

The strategies to manage the disease can be summarized as follows:

- Compulsory testing of all seed potato sources registered under the scheme.
- The establishment of a Bacterial Wilt Committee to investigate the continuation of seed potato production on farms where bacterial wilt has been confirmed.
- In the case of confirmed

bacterial wilt, race 1 (bio-var 3) on a unit, such unit will never again be considered for registered seed potato production.

- In the case of confirmed bacterial wilt, race 3 (bio-var 2) on a unit, such unit will be withdrawn for registered seed potato production for a minimum period of eight years.
- During the eight year period specific crop rotation requirements apply.
- The seed potato grower and the relevant Potato Certification Service regional office may in the case of confirmed bacterial wilt request that the Bacterial Wilt Committee investigate the case.
- Where bacterial wilt is confirmed on two or more occasions on a farm, Potato Certification Service will request that the Bacterial Wilt Committee investigate the risk of seed potato production on the relevant farm. The committee may for instance recommend that no further registrations be accepted on such farm.
- The execution of the recommendations of the Bacterial Wilt Committee is monitored by Potato Certification Service after approval by the Independent Certification Council for Seed Potatoes (ICCSP).
- Guidelines for the control and management of the disease are available to all producers.

Notification of confirmed bacterial wilt cases

The current procedure is as follows:

- buyers of certified seed potatoes may upon

request be informed by Potato Certification Service Head Office on the bacterial wilt status of a unit (grower) in consultation with the relevant grower of the seed potatoes.

- Units on which bacterial wilt was previously confirmed coming into production after eight years, are identified. If seed potatoes are produced on the relevant unit again, the date of bacterial wilt confirmation is entered in the tuber inspection report.
- Further information regarding the confirmation may be provided upon request and with the consent of the seed potato grower.

Enquiries have been received from the industry regarding the various aspects as listed above. A legal opinion has been obtained which offers clear answers on the various questions. The following are extracts (in italic) from the legal opinion.

Refusal of registrations

Potato Certification Service is legally empowered to withdraw or refuse registrations in terms of various articles (e.g. Sections 13 and 30) of the scheme. Potato Certification Service may act according to its discretion, but must "act with care".

The powers of Potato Certification Service do not stretch further than laying a criminal charge and to refuse registrations.

Liability of growers

continued on p 29

Bacterial wilt

There should be differentiated between criminal and civil liability. If the Plant Improvement Act or the scheme regulations are transgressed, a criminal charge can be laid against the transgressor (Article 35 of the Act). Sentences vary from fines to jail sentence from one to four years. The charge can be laid by Potato Certification Service or the affected party. However, conviction does not lead to affected party being compensated for his losses. Experience has also proven that it can take up to seven years before the case is resolved; and that while the guilty party may carry on with business until such time.

In order to recover the losses, civil litigation must be lodged. The buyer (affected party) firstly has to prove that the infected seed potatoes were responsible for the losses and secondly the loss will have to be proven quantitatively. The process is time consuming and expensive, but is the only way losses can possibly be recovered.

It is not practical to legalise the recommendations of the BW Committee as every case differs. The current recommendations are indeed executed and monitored as long as the grower cultivates registered seed potatoes.

Where applicable, the Agricultural Pests Act can come into force. This entails the issuing of restraining orders which, however, may also have

far reaching implications for inter alia the ware potato industry.

Amendment of contract between Potato Certification Service and seed potato growers

It is possible to amend the contract as such and to add an acceptance to the effect that if a grower contravenes the scheme's regulations and/or sell infected seed potatoes as certified material resulting in a loss for buyers as a result thereof, the grower will be responsible to compensate the losses. However, even if growers are prepared to sign such a contract, it will not result in collection as the buyer will still have to prove his losses through civil litigation.

The following addition to the application for registration may be considered:

"The grower undertakes to comply with the regulations on prohibited organisms as contained in the scheme and the recommendations in the case of a Bacterial Wilt Committee investigation (as condoned by the Independent Certification Council for Seed Potatoes) in the case of a confirmed bacterial wilt result". Disregard for the regulations and recommendations may result in the grower being held liable for losses as a result of the bacterial wilt coming from his/her farm or store.

The last sentence of the legal opinion above should be kept in mind.

Publication of confirmed bacterial wilt cases

The scheme's regulations make provision that the Authority may make known in the Government Gazette the relevant particulars regarding the refusal of registrations and/or the details of the infected unit as well as the name and address of the relevant grower (article 30(4)).

The legal opinion also states that the notice is limited to the Government Gazette. The notice will provide the reasons for the withdrawal and the details of the grower. As soon as the notice is published in the Government Gazette, any person can publish the notice in any magazine.

However, the above opinion has the following implications:

- Publication of cases can result in the relevant seed potato grower losing clients notwithstanding the fact that no risks exist with his current seed production and that sufficient precautionary measures were taken.
- The majority of growers where bacterial wilt already has been confirmed, for years thereafter have successfully produced seed potatoes.
- The question is that if bacterial wilt cases have to be published, orders would possibly need to be issued on the infected unit which would prohibit further potato production.
- The further implication is that orders may then be issued on all bacterial wilt positive units, also at table potato producers.
- The question is whether the publication of the

bacterial wilt cases will not lead to the "keep quiet" syndrome. This will inevitably hamper management of the disease.

- No control has been built in at table potato producers where bacterial wilt has occurred.

Sometimes uncertified material are sold as seed potatoes. In this instance measures will have to be put in place to crack down on the build-up and spreading of the disease.

As already mentioned bacterial wilt is managed in terms of compulsory testing and the implementation of preventative measures to limit the spreading of the organism. The risk of spreading is therefore eliminated to a large extent.

The Forum agreed that everything possible should be done to resolve the problem. However, it would be senseless to implement additional rules and regulations and the authorities should rather concentrate on the strict application of approved measures.

The Forum therefore decided to recommend that:

- no additional measures rules be implemented but that the authorities should rather concentrate on the strict application of approved measures to manage and control bacterial wilt
- the retention of untested planting material be discouraged in the strongest possible terms; and
- the possibility be considered to extend the management of bacterial wilt to ware potato plantings.