



Seed

Many growers are in the process of sourcing seed for the coming season and all the talk at the moment is that supplies of some of the traditional varieties is very scarce, so you need to contact your supplier as soon as possible. This problem looks like it may continue for a few years so more growers may be interested in home saving a proportion of their seed again this year, however there are a couple of points to consider;

1. You can only home save one generation from certified seed.
2. This seed can only be used for your own use.
3. While not compulsory fields should be tested for PCN, this can be done with the Department of Agriculture
4. Where possible grow the seed separately from ware crops.
5. Seed crops require more aphid management for virus control than ware.
6. Before planting home saved seed they should be tested for viruses. This can only now be done in the UK. See the link in blue below for more details.

[Seed Testing Services NIAB Cambridge UK](#)

7. Royalties may have to be paid, depending on the variety planted.

For any other queries contact the Crops Policy Division of the Department of Agriculture in Backweston. **Telephone:** 01-5058792

Email; potatoOnline@agriculture.gov.ie

Website; [DAFM Seed Certification Scheme 2022](#)

When you receive your seed carry out the usual inspections and check for disorders etc. if there are any issues contact your supplier immediately. Remember to always keep seed labels in a safe place in case any issues occur later in the season, all certified seed can be traced to the original field and to other batches from the same original field.

Where you plan to apply a fungicide treatment for rhizoctonia do this as early as possible, the labels for both Rhino and Maxim advise to apply before dormancy break.

When handling seed, coming out of the cold store, make sure to warm up the seed before putting them across a platform to apply seed dressings or before transferring into sprouting trays. Remember cold tubers are more susceptible to damage including bruising and splitting.

The video from Certis UK in the link below highlights some of the key factors of achieving good coverage on the seed when applying seed treatments to potatoes.

Good coverage of tubers with seed treatments

Table 1; Liquid seed treatments 2022

Name	Gavel	Maxim	Rhino
A.I.	Imazalil	Fludioxonil	Flutolanil
Rate/t	0.1-0.15L	0.25L	0.2L
Timing	Before chitting		
B. Scurf		***	***
S. Scurf	***	**	

SETTING UP A SPROUTING HOUSE

Many growers are traying up seed at the moment especially early varieties in order to start the sprouting process, more are using sprouted seed on maincrop varieties to bring forward crop maturity and make desiccation easier with the current chemistry.

In the past, glasshouses have been widely used for chitting; very good illumination ensures that sprout growth is short and sturdy but temperature control is more difficult and expensive to maintain. However it may be more economical to sprout in conventional buildings and to provide the necessary levels of illumination artificially. To ensure that light reaches all the seed tubers in roughly equal amounts stacks of chitting trays are used. The trays usually measure 30 inches x 18 inches x 5 inches. White plastic trays are best. The trays should be loaded at a rate of 70 per tonne for main crop and 80 per tonne for earlies. The stacking height is rarely above 3m (10 ft.) and should ideally suit the lengths of lighting units. Gangways between each double row of trays are necessary to accommodate the lights and provide access. The width of the gangways should not exceed 400mm (20 inches) to maintain light intensity.

(1) Light:

Lighting for the seed tubers is not required until the eyes have opened and sprout growth has begun. Fluorescent lights of the "warm white" type are essential for good illumination over the full height of the stack and to reduce unwanted heat input into the building. The duration of the light period should be gradually increased as growth proceeds, starting at six to eight hours and being extended to 12 hours over a period of several weeks. One light unit should be allowed for each eight stacks of trays (six stacks for earlies). It's approximately one light for each tonne of seed. The lights are best suspended from a gantary wire and are moved on each day; when the unit reaches the stacks of trays served by the next light, the process is reversed. If the grower is prepared to move the light twice a day the total number of fittings can be halved.

Where natural light is being used be aware of any shading in the boxes this will lead to poor sprout control. In this case rotate the boxes to ensure even control of the sprouts.

Control of Artificial Light:

Some growers leave the lights on the whole time. This appears to be justified only when there is a restricted number of lights and where they are being moved twice daily.

The fluorescent light units generate a certain amount of heat. Except in very cold weather, some ventilation should be given while the lights are on so that the temperature may be held steady at whatever level is desired. For vigorous growing earlies, it is often necessary to give unrestricted ventilation to maintain a low enough temperature (7 -9 °C). Both lighting and ventilation are then best

done at night provided it is not frosty; in the latter event, the ventilators would be wholly or partially closed. Unless air mixing facilities are used, the admission of frosty air is risky.

(2) Ventilation:

A positive system of ventilation is required to control the temperature within the house. Natural draught or fan assisted systems are suitable.

(3) Frost Protection:

The seed must be protected from frost damage during the winter. This can be achieved through a combination of insulation and / or heating.

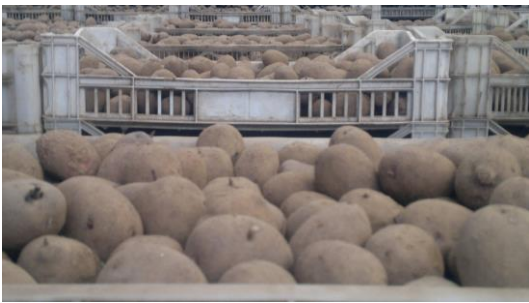
Existing farm buildings are likely to be deficient in relation to lightning and ventilation. Replacing some of the cladding with transparent material will improve light levels. Doors at opposite ends of the building and or fans will improve the control of temperature levels.

Double clad polythene houses are very successful for sprouting maincrop and seed crop potatoes. Polythene houses must have a very good frost protection system i.e. thermostatic controlled fan heaters units. A polythene house 19.0m x 8.5m will hold about 25-30 tonnes of seed potatoes in trays. Tunnels in excess of 19.0m long create difficult ventilation problems.

Sprouting houses should be cleaned and washed down after the seed is planted. During or after sprouting aphids may be found in the sprouting house. These can be very difficult to control so every effort should be made to prevent them getting into the sprouting house in mild weather.



Plenty of natural light in this sprouting shed, but frost damage can sometimes be an issue in glasshouses



Well controlled sprouts from good sprouting set up



Poor sprout control from poor sprouting house set up

Soil Testing

This is a good time of year to get soil testing done, with fertiliser prices at an all time high, any savings that can be achieved will pay very well this year. Allow two to three weeks for the test results to come back so if you want to place orders in February especially for speciality mixes, then the sooner fields are tested the better. When you get your samples back sit down with your agronomist or advisor and complete a full farm nutrient management plan for all fields and crops. Target potatoes in fields that already have high fertility levels, where the rotation allows, as these will have lower fertiliser costs and generally yield better. When completing your nutrient management plan for the potato fields there are a couple of things to consider;

1. There are significant fertiliser savings in high fertility soils i.e. Index 4 vs low fertility soils i.e. index 1. Depending on the mixes used there could easily be over €500 per hectare savings to be achieved.
 2. Low pH soils are often seen as a benefit from a common scab point of view, however soils with pH levels lower than 6 will poorly utilise the fertilisers applied.
 3. From looking at recent farm records nitrogen rates on maincrop rooster in continuous fields range from 100 kg/ha (80 units/acre) up to just over 150 kg/ha (120 units per acre) with very little difference in yield. So for many growers there may well be scope to reduce the total nitrogen amount used, especially if crops are planted in the month of May.
 4. There are many alternative fertiliser or nutrition type products being sold in the market, how effective many of these are is questionable. Be very wary of reducing base fertiliser applications and replacing them with some
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of these products unless they have clear and robust independent trial work to show that this is possible.

5. Match the best fertiliser compound to each field this may mean having two or more base compound fertiliser types for your crops. Relying on one single type e.g. 7.6.17 or 10.10.20 may cost more over the entire farm.
6. Placing fertiliser at planting has been shown that you can reduce the overall amount of fertiliser required by anything from 10-20%.

Also it may well be worthwhile testing soils for pests such as PCN or wireworm especially if the fields are new to you in 2022. Wireworm in particular has been a problem for many growers in the last few years especially after long term ley ground. Put some tubers into the soil for a few weeks before planting and see if there is any evidence of damage. While this is not fool proof, if there is any evidence of damage then don't plant infected fields.

National Potato Conference

The National Potato Conference would normally be due to take place this February, however it has been decided to postpone the conference for this year as the World Potato Congress 2022 will take place in Dublin from May 30th to June 2nd. For details of the congress or to book a place please click on the link below.

World Potato Congress Ireland 2022



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