Covering the bases at flowering

66 A fungicide that controls all three diseases is what we're looking for. **99**

Technical <u>OSR agro</u>nomy

'One spray or two' is always the million-dollar question when it comes to protecting the OSR crop during flowering. *CPM* garners some advice on the issue.

> By Lucy de la Pasture and Rob Jones

Sclerotinia is one of those diseases that may or may not strike, but in a season where the weather is dodgy during the flowering period, it can become a serious issue. Over the past few years, growers have seen fewer incidences of sclerotinia, with diseases such as light leaf spot often being a more prominent concern when deciding their fungicide strategies.

Steve Cook of Hampshire Arable Systems, a consultancy which provides independent advice on over 40,000ha, says that while sclerotinia has historically not been such a problem in his area, maintaining control over the disease is still a consideration in his spraying strategy. "Light leaf spot is a big issue for us here and alternaria can be a threat too, so our flowering spray programme needs to be one that tackles both these diseases. The fungicides we use also provide control of sclerotinia, so by staying vigilant against light leaf spot, we're also working to ensure that the risk of a sclerotinia outbreak remains low."

Flowering period

Steve suggests two fungicide sprays will probably be required to cover the whole flowering period. "Each spray is going to give you three to four weeks protection, so in our region a one-spray strategy isn't really a viable option. We'd recommend the first spray going on at the yellow-bud stage, with the second being applied at mid-flowering at the earliest.

"We tend to use tebuconazole along with Taurus or Topsin (thiophanate-methyl) for the first spray, and then finish with Proline (prothioconazole). It's about covering all the bases," he says. "The last spray needs to be a high quality one to keep the buds clean and green, so a fungicide that controls all three diseases is what we're looking for."

ADAS research scientist Caroline Young believes that, in most cases, the chance of achieving good control of sclerotinia from

a one-spray programme will very much depend on two factors — the weather conditions and the flowering stage of the crop. Infection is likely if spore inoculum is present when there are 24 or more continuous hours with temperatures above 7°C and humidity above 80%, she explains.

"If you get cold nights at the start of the flowering period, you may be able to delay putting that first spray on and potentially even avoid a second spray entirely," she says. "But it really depends on your specific



Caroline Young says spray timing and the number of sprays is very dependent on weather conditions and the duration of flowering.

OSR agronomy



Steve Cook advocates a two-spray strategy in his region to cover all the bases at flowering.

circumstances and flowering can vary so much from year to year, both in terms of timing and duration. In some places flowering is done and dusted in four weeks, and in others it's closer to eight weeks.

"It's a good idea to keep an eye on the

AHDB sclerotinia risk-monitoring website, which will warn if weather-based infection alerts are likely in your area. Another useful tool is the BASF sclerotial germination monitoring, which indicates the onset of spore release by region," she advises.

Fungal masses

Bayer's Tim Nicholson explains sclerotia — the fungal masses that germinate and infect the crop — can remain in the soil for many years, so a series of low pressure years does not guarantee that the disease will not suddenly resurface.

"We've had a run of several low infection years now — or rather, several years where growers have done a very good job of using flowering sprays to control the disease in their OSR crop. It may well be the case that there are fewer sclerotia in the soil to cause sclerotinia this season. But it's always worth bearing in mind that if the disease isn't effectively controlled, you could lose half a crop quite easily."

He points out an effective fungicide programme can do more than just help



Keeping light leaf spot from spreading further up the canopy may be a consideration at flowering.

protect yield potential. Crop's will also remain greener for longer, with a resulting increase in oil content as well, he says.

"The oil is accumulated during the second half of seed filling, so you want the crop to stay green, have plenty of big seeds, and fill those seeds for a long time. A small increase in oil content can make a big difference to the final price, even a 0.5% boost would equate to an increase of £11.56/ha." ■

Slugs may be a headache for spring OSR growers

With grower's pest radar finely attuned to cabbage stem flea beetle attack, be careful not to overlook the potential for slug damage where spring OSR is planned this season, urges Geoffrey Bastard, technical specialist at Certis. He believes the risk posed by slugs during establishment could be high and suggests getting a slug control strategy in place before the spring crop goes in the ground.

Despite the recent cold weather, it doesn't mean the risk of slug damage has gone away, particularly after what has been a wet winter in many regions. Fields with historically high pest populations may have seen slugs migrate deeper into the soil when it's been frozen, but these will come to the surface as vulnerable seedlings emerge, he says.

Spring OSR plants are vulnerable to slugs from emergence to the four-leaf stage.



"A wet winter followed by a dry cold period, as we've recently experienced, is likely to lead to spring crops going into cold soils with low moisture levels. As a result, establishment will be slow, and this will leave spring OSR exposed to a very high risk of slug damage.

"Serious losses can occur in spring OSR plants up until the four-leaf stage," he says. "So while the aim is to get the crop in the ground early, to maximise the crop's growing window and achieve the best possible yield, minimising the risk from pest damage during that critical early growth period is a top priority."

With so many possible variations in weather for the season ahead, planning a slug control strategy can be a difficult, Geoffrey explains. the level of likely slug pressure.

"If more than four slugs are found per trap, then an application of ferric phosphate pellets as soon as possible after drilling is advisable," he says.

Geoffrey adds that however tempting it may be to delay drilling, this isn't a good idea as it could lead to a significant yield penalty in the spring OSR crop. "But it's important for the focus on drill timing to be on ground and weather conditions, rather than a set date."

Making sure conditions are right so the spring crop comes up and is quickly away is a good strategy for slug control. "A consolidated seedbed will ensure good seed to soil contact



Doing all you can to get spring OSR up and growing away quickly will help reduce the risk from slug damage.

and in the spring, climbing temperatures and adequate soil moisture will give crops the best possible start. If they grow through the vulnerable growth stages quickly, it will also reduce risk from slug attack."

Because spring OSR is very susceptible to slug damage from establishment up until the four-leaf stage, it's vital to monitor it very closely during this time, particularly if crops are developing slowly due to cold or dry weather, he explains. "Where germination and development are slow, an application of slug pellets can help to keep slugs at bay and give the crop time to get away."