# BBRO Advisory Bulletin



14<sup>th</sup> April 2025

#### IN BRIEF

- The dry spell may have come to an end with welcome but variable amounts of rain over the weekend. More is forecast over the coming days, and this should help with germination and early seedling growth.
- For those still to drill, check the depth of moisture before commencing. The ideal seed depth is 3-5cm, slightly deeper may be possible on lighter land but may still compromise even establishment.
- Mouse and early bird damage has been recorded. Some re-drilling has occurred.
- No sugar beet aphids have been recorded by suction traps to date. BBRO aphid monitoring will commence after Easter following the earlier aphid forecasts.
- Several reports of wireworm and leatherjackets have been highlighted, although these should not cause too many issues in current dry conditions.
- Drying soils. Areas that were overworked prior to drilling could be capped. Keep an eye on establishment and check for a hard pan. Re-drilling may be required.
- Recent dry conditions increase the need for careful consideration regarding weed control options but in most cases, weeds are struggling to establish too.
- Attention to detail required when drilling Conviso<sup>®</sup>Smart varieties.
- <u>BeetCast April: Unpicking seedling diseases.</u>
- <u>Weather watcher? View the data collected by our new weather stations.</u>

#### ADVISORY

#### Soil conditions

Those who had weekend rain will have seen soil moisture levels improve, although we are conscious that this was quite local. However, it does appear that the recent dry spell is coming to an end (if you believe the weather forecasts!) that will help with both sugar beet germination and early plant growth, although be aware of weed flushes too (see later in bulletin).

It is also worth noting what your cultivation practices were (and where), and how the seedbed has fared under the recent dry conditions. If your soil has developed a hard pan, then it may be a case of needing to redrill – check plant populations in each field.

Mouse damage has been observed in some dry seed beds and the weather has led to bird damage on emerging seedlings too as they look for moisture.

#### Irrigation

A few growers have used irrigation to help germination; this is always a balance between maximising plant numbers and early growth against capping, although this issue is often soil type related. For those growers who have available water for sugar beet irrigation this season, the previous summary of BBRO research showed that its greatest value, when dry, is most effective in June and July (Hess 2018).

#### Moisture and pre-emergence herbicides.

Soil conditions at present are variable across the beet growing region with some areas having received no rainfall and others 30mm plus. Pre-emergence herbicides will obviously work better where there is soil moisture and in the last two seasons, pre-emergence applications have given good results due to the amount of moisture present. Using a pre-emergence spray should also provide more flexibility with post-emergence herbicide timings which is useful when sprayer capacity is limited.

#### Weed control (info supplied by Pam Chambers, British Sugar)

A wide variation in crop growth stages from not emerged to first true leaves is present across the beet growing region and that follows for weeds as well! A few early drilled crops now receiving their second post-emergence herbicide sprays, but the majority are at the T1 timing. Knotgrass is approaching or is at the first true leaves in early drilled fields.

## How well have pre-emergence herbicides worked this season, should we still be applying them?

The three actives that can be applied at the pre-emergence timing are shown in Table 1. together with soil properties. Further information was provided in Advisory Bulletin No.2 2025.

Active	DT 50 (typical	DT 50 (field)	Interpretation (field)	Comments	
ethofumesate	21.6	37.8	Moderately persistent	Black-grass control + ABLW's*	
metamitron	30	11.1	Non-persistent	ABLW's* and some black-grass activity	
quinmerac	30	9.8	Non-persistent	Only available in formulated mix with metamitron for pre-em use	
<b>Source:</b> University of Hertfordshire, pesticide properties database *Annual Broad-leaved Weeds					

Pre-emergence herbicides will certainly not be as effective as last year due to the lack of moisture, but they will 'kick in' once rain does fall. Where high levels of black-grass are expected then it is still useful to apply ethofumesate. If applying ethofumesate it is worth considering adding a tank mix partner to broaden the weed spectrum controlled. Where black-grass is not an issue then saving herbicides for post-emergence timing would be sensible.

#### What is the impact on early morning frosts on post-emergence weed control?

Recently, frosts have been occurring frequently in partnership with warm days, so a large fluctuation between night and day temperatures. Some crops are showing signs of being impacted by the frost, but the crop and the weeds become hardened off quickly. Allow crop to recover from the frost (1 to 2 days) and then continue with herbicide programmes, remembering that contact activity will be reduced in these conditions so use adjuvants to increase activity. Crops can be more vulnerable to herbicide damage when growth is quick in moist and warm conditions and where cloud cover is minimal.

#### If the crop is demonstrating variable emergence what is the best approach?

If crop emergence is variable, weed emergence will be as well. Don't delay weed control programmes. Start herbicide programmes as soon as weeds are at the cotyledon stage, don't wait for full crop emergence, but check to make sure seed not yet emerged is still viable. It may be necessary to use 'holding' sprays that have support for applying at any crop growth stage. (Table 1.)

	Active	Example products	Rate/ha	Comments
	phenmedipham	Betasana		Some phenmedipham products are 320 g
(160 g a.i./litre		SC	0.5	a.i./litre e.g. Shrapnel
ethofumesate				Check the inclusion rates of actives if using
FAR	(500 g a.i./litre	Efeckt	0.2	formulated products
	metamitron	Ethosat 500		Use of adjuvant not supported
	(700 g a.i./litre	Bettix Flo	0.5	
		Goltix 70 SC		
Conventional	metamitron	Goltix 70 SC	1.65	Use of Cropspray 11E*is supported at 1.65 l/ha
	(700 g a.i./litre	Bettix Flo	1.70	Use of adjuvant oil supported at 1.7 l/ha

#### Table 1. herbicide programmes for any crop growth stage

\* An emulsifiable concentrate formulation containing 99.0 % w/w oil (petroleum oils)

#### Spray intervals – how close should they be?

The first post-emergence sprays are critical especially where difficult to control weeds are present such as the polygonums e.g., knot-grass, persicaria, redshank. Aim to keep spray intervals tight between the first two post-emergence sprays this season, don't let weeds 'harden up' by leaving too big a gap. On one of the trials fields, we are aiming to go 5-7 days between sprays where knot-grass, small nettle and field pansy are present. Check labels to ensure there are no specific restrictions regarding intervals between sprays.

#### Bayer Conviso message:

- Do not mix Conviso<sup>®</sup>Smart and conventional varieties in the drill; if sowing a Conviso<sup>®</sup>Smart variety plan to drill whole fields
- Ensure seed drills are completely clear of conventional seed before planting a <sup>®</sup>Smart variety
- All Conviso<sup>®</sup>Smart seed is uniquely identified as having a purple-coloured inner to the pellet
- Do not drill areas of fields that cannot be lifted by a harvester; for stewardship of the technology this creates a risk of groundkeepers in the following crop
- Return any surplus Conviso<sup>®</sup>Smart seed from the drill to the original box for storage
- Keep a record and mark Conviso<sup>®</sup>Smart drilled fields; only apply Convis One herbicide to fields drilled with a Conviso<sup>®</sup>Smart variety; beware, conventional varieties treated with Conviso<sup>®</sup> One herbicide will be destroyed.

**Ö** EVENTS

Book now for our spring in-field events (click below).



#### Missed our March Growers BeetChat event? Catch up here: https://youtu.be/09Dm0EKuznM

#### CONTACTS

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### **Ö** BASIS POINTS

Two BASIS points in total (not per bulletin) have been allocated for the period between 01/06/2024 – 31/05/2025 - CP/138145/2425/g. To claim these points please email cpd@basis-reg.co.uk

Two NRoSO points in total (not per bulletin) have been allocated from 01/9/2024 – 31/05/2025 NO503154f. To claim these points please email nroso@basis-reg.co.uk.