Sugar beet review



Irrigation is still 'missing link' for water resource planning

Water for agriculture is a key for food security, says **Melvyn Kay**



nother dry spring has again seen growers irrigating sugar beet and cereal crops – highlighting the need to secure adequate supplies of water for agriculture.

Early this year, I did wonder if we were heading for a record breaking year of drought following the fifth driest January on record for East Anglia. Although March rainfall was normal, April and early May saw more than eight weeks with little or no rain.

April was particularly dry with an average of only 12mm rainfall – just 26% of the long term average and affecting most catchments. Soil moisture deficits were high and increasing, river flows below normal, but groundwater was holding up.

The Environment Agency has now downgraded irrigation prospects in East Anglia from Good to Moderate.

This is proving to be a unusual year for irrigators mainly because of concerns over food security and the massive increase in energy and fertiliser costs resulting from the war in Ukraine. Drought is just an additional problem.

Some farmers have already reduced their irrigated area of potatoes and have turned to cereals to take advantage of high prices. But cereals do not escape drought and would ben-

efit from irrigation.

Irrigation costs do not yet justify installing irrigation for cereals even if you can get a licence to abstract. But who knows how current problems and of course our changing climate may begin to shift this kind of thinking.

Nor does sugar beet alone justify irrigation investment. Irrigation was reviewed by the British Beet Research Organisation in 2016, which suggested the largest yield increases from irrigation occur in dry summers and on the lightest soils.

However, in all but very dry summers, the increase in sugar yield would not be sufficient to cover the cost of irrigating. Increasing energy costs have only made it more difficult to justify irrigation.

Financial return

This is also the time of year when other crops on the farm are demanding irrigation water and decisions about which crops to prioritise will depend on which shows the greater financial return.

Irrigation's greatest value is surely in crop establishment, stopping the soil surface layers from drying out while the crop establishes itself and reaches moisture deeper in the soil profile.

Should we begin to think more widely about the role of irrigation in UK's food security? NFU deputy president Tom Bradshaw has described water for agriculture as the missing link in water resources planning – something the UK Irrigation Association was been highlighting for many years with limited progress.

While other domestic and environmental use has essential user status, water for food does not, and irrigating crops remains a commercial decision. Hence the crop switching that is going on this year.

Melvyn Kay is executive secretary of the UK Irrigation Association.

Conference debates water security

Ways to secure more sustainable water supplies will be highlighted at the UK Irrigation Association annual conference on 6 July in Peterborough.

The conference has the theme Building resilience and sustainability in irrigation agriculture. Speakers include farmers, the Environment Agency, and international experts who will reveal how other countries are tackling similar problems.

Special guest will be Olcay Unver – a world leader in water for agriculture. Mr Unver was recently deputy chairman of UN-Water and led the United Nations Food and Agriculture Organisation water programmes and activities.

Not known for hyperbole, the FAO report last month warned that the world is running out of good agricultural land – with water resources and systems at breaking point as demand for supplies continue to increase.

The conference will discuss ways to build resilient and sustainable food production systems that meet UK food security needs. For the full programme and to register, visit www.ukia.org.