

MACHINERY

New mechanical hoes and a revolutionary insect control method took pride of place at last week's Biovak 2010. Steven Vale joined the visitors at the Dutch event.

Organic growth for the specialist show

► Specialist event sees 13,000 visitors



ALTHOUGH just 2.5 per cent of Dutch farms now operate organically, it is large enough for the country to organise a dedicated organic show.

Called Biovak, the first purely-Dutch event three years ago saw 61 exhibitors and 2,800 visitors attend. A year later in 2009, from a new venue at the IJsselhallen exhibition complex, the exhibitor count rose to 160 and the number of visitors to 5,300.

Last week's show confirmed the international flavour, with exhibitors from Germany, France, Spain, Italy and Belgium. The organisers stress there are no plans to turn it a consumer event.

Aimed purely at the specialists, this year it attracted nearly 13,000 of them.

Despite falling commodity prices, some mechanical hoe mak-

ers reckon to have increased sales by 10 to 15 per cent during 2009.

Many of them are confident of breaking this figure this year. The increase in sales is not solely from organic vegetable growers.

Most conventional ones now favour one or two passes with a mechanical hoe. Not necessarily for weed control, but to loosen the top soil and get some air into it.

Growers hungry for information on the latest cultivation and weeding developments would not have been disappointed. There was plenty to see.

Beetle Eater proves itself with other pests

ORIGINALLY designed for sucking Colorado beetles from Canadian potato crops, the Beetle Eater is proving a useful mechanical means to keep on top of pests in a wide range of vegetable crops.

That is the finding from the Dutch PPO Arable Research Station, which owns one of just two machines in Europe.

During two years of trials, the Beetle Eater has shown good results in cabbage and asparagus.

Fitted with two fans, one blasts air to a series of deflector plates at each side of the row-straddling canopy.

The second fan sucks the loosened insects into the machine where they are macerated before being ejected



through a chute at the side. Although it looks cumbersome, it weighs just 1,000kg and coupled to an 80hp tractor, it covers the ground at speeds of 4kph.

VSS Agro unveils new cultivator



VSS hit the headlines a couple of years ago when it acquired the rights to Amac's machines.

Not the harvesters, but all soil-engaging kit, which it sells as VSS Amac.

The Dutch company also makes cultivators under the VSS Agro banner, and used Biovak to reveal a version aimed specifically at the organic market.

Called the NKG 450, two sets of cutting shares are followed by crumbler rollers. Working at a shallow depth of 5-6cm, the aim is to cultivate the land but without turning it.

Designed to work at speeds of 8-10kph, to get the best results from the 4.5m wide machine needs coupling to a 150hp tractor.

It costs around €13,000 (£11,385).

KA Havelaar aims to make a mark on UK market with the Foldonomic 900

DUTCH-firm KA Havelaar has a long history of hoe making. From its origins as a blacksmith in 1917 it used to make hand-held machines.

Tractor-mounted versions were added soon after World War 2, which up until recently were sold in the UK.

Now the company is looking to target the British market once again with a brand new 9m-wide hoe - the biggest on display.

Called the Foldonomic 900, and aimed mainly at cabbage growers, a big feature is the new parallel linkage.

Dubbed the Para LX, it does away with tools to alter the settings.

Folding to 3m for transport, the initial customer plans to couple it to an 85hp tractor and operate at speeds approaching 15kph.

In Europe it costs around €23,000 (£21,140).



Smothering the problem with soil



STRUUK is another Dutch company that is no stranger to the UK because its inter-row potato cultivators, ridgers, front-mounted potato toppers and mechanical hoes are sold through Deptford Marketing.

Known as the Weedfix, its mechanical hoe is designed mainly for large-leaved plants, such as cabbages, cauliflowers and Brussels sprouts. With the leaves parted, it relies on a series of hydraulically or mechanically rotating tines to flick soil into the rows to smother weeds.

Price of the 4-row machine on display is around €8,500-€10,000 (£7,440 - £8,750).

Charging free battery weeder

THERE are few Dutch organic vegetable growers that do not own some form of battery-powered construction allowing weeds to be manually plucked from the ground.

The big drawback are the batteries, which require charging at night.

But not anymore because Dutch-company LSE has developed a novel solar-powered system. Fitted to a machine known as the Biokeeper, the

combined efforts of two solar panels pump out 15amps.

Supplying a series of 12amp batteries, the 3amps surplus ensures the batteries remain fully charged.

The batteries power an electric motor, which in turn powers the chain-driven rear wheels.

Forward speeds vary up to a maximum of 1,800m/hr.

Price is around €15,000 (£13,135).



Culti-Clean aims to put the heat on weed problems

ALTHOUGH it was not on show the CultiClean combines a Struik rotary cultivator with gas burning technology from Hoaf.

As soil falls back to the ground from the second rotary tiller it is heated to 80 to 85 deg C.

The aim is not to sterilise the soil but more to pasteurise it and kill weeds.

The company is confident of a big future, and not just with organic growers.

The chemicals used in many conventionally-grown crops,



such as baby leaf, spinach and rucicola, may soon be banned.

Growers are being forced to consider alternatives, such as flame technology.