

# Spreading more muck

Dairy farmers who use a calculation programme called BEX, developed by Wageningen UR, can spread more muck on their land. That saves them thousands of euros per year.

TEXT MARION DE BOO PHOTOGRAPHY THEO TANGELDER



S (%)	7	< 7,5
s-fractie (%)	2,6	160-15
traat	154	170-
Ruw eiwit	166	40
Ruw eiwit totaal	61	
Oplosbr.ruw eiwit(%)	38	
Ruw vet	254	
Ruwe celstof	119	
	506	

Experts from Wageningen and from LTO Netherlands collaborated on the development of a calculation programme called BEX which helps dairy farmers keep levels of nitrate and phosphate in manure their cows produce to a minimum. The calculation programme shows exactly how much nitrogen and phosphate a cow has ingested through its feed, and how much it excretes in its dung.

‘BEX gives you an insight into the mineral flow on your farm’, says dairy farmer Bart van der Hoog, from the Dutch village of Enspijk. He was among the first to adopt the programme. ‘Every month we calculate precisely the right rations for the cows and we have every batch of silage analysed.’ This generates quite some extra work but also considerable savings because farms that make efficient use of minerals by precisely dosing their cows’ feed produce manure containing mineral levels below the national average. And BEX users are then allowed to calculate their own farm’s actual manure production.

‘The manure policy is based on standard norms but the figures from individual farms can deviate from those considerably’, says agrosystems expert Fran Aarts of Plant Research International, part of Wageningen UR. He coordinates a project called ‘Cows and Opportunities’ which instigated the development of BEX back in 2006. Now about half the dairy farmers in the Netherlands make use of it.

**STRONG EVIDENCE**

‘If a dairy farmer can prove that his own business management scores above the average on environmental friendliness, he is allowed to spread more muck on his own farm’, explains Aarts. ‘But then you do have to have strong evidence, with proper laboratory analyses. In BEX we have developed a verifiable, checkable system. Some farmers pay as much as 15 euros per cubic metre to dispose of manure, so the savings made by using BEX quickly mount up.’

Van der Hoog from Enspijk farms together

with his parents and keeps 125 milking cows and 90 calves on 66 hectares of land. ‘We spread all the muck on our own land. Without BEX, standard calculation tables would tell us that we have about 8 hectares too little space for our muck. That would mean having to dispose of about 400 cubic metres per year.’ ■

**‘Without BEX we would have to dispose of 400 cubic metres of manure per year’**

