

Research and development

Research bits and pieces

The recently established Organic Research Group (ORG), based at the University of New England (UNE), Armidale, NSW, aims to lead in innovative research for the Australian organic industry.



It will provide a focus for existing and planned research activities leading to quantifiable research output in areas such as research grants, publications and postgraduate students. It offers a whole-of-industry perspective with its experienced, diverse management team.

The group is a network of individuals committed to developing research and industry development projects with the organic industry.

The alliance is part of the Primary Industries Innovation Centre at UNE that brings together the research and industry expertise from UNE, the NSW Department of Primary Industries and industry stakeholders such as input suppliers, grower groups and individual farmers.

ORG RESEARCH SYMPOSIUM

The current focus is the ORG Collaborative Research Symposium scheduled for late September. The symposium will highlight current work by students and staff, and identify and pursue collaborative funding opportunities.

ORGANIC BEEF NETWORK

The project involves increasing the number of certified organic beef producers in the New England region to reach a critical mass in production volume of 100 head per week.

This level is required to enable local processing at the regional abattoir in Inverell.



Directors of Armidale Food Coop (left to right): Phil Coop, Norman Dean, Jodi Evans, David Pearson, Liz Moffitt and Bruce Atchinson. (Photo by Norman Dean).

LINKING CO-OPERATIVES

The Connecting Organic Food Co-operatives project, managed by Liz Moffitt, is supported by the NSW Department of Fair Trading. It plans to fund research around successful formation of the Armidale Food Co-operative for creating a network of organic food co-operatives in NSW.

The Armidale outlet began operations last December and is performing well above expectations, with monthly sales of \$30,000 and almost 300 members. (An article on the benefits and formation of the co-operative was published in the winter issue of the *Australian Organic Journal*.) ■

Contact: More information — Dr Paul Kristiansen, UNE, phone (02) 6773 2962; email <[a href="mailto:paul.kristiansen@une.edu.au">paul.kristiansen@une.edu.au>; Dr David Pearson, UNE, phone (02) 6773-3889; email <[a href="mailto:dpearson@une.edu.au">dpearson@une.edu.au>.

ORGANIC LAMB RETURNS

The Department of Primary Industries (DPI) Organic Lamb project produced prime lambs from both annual and perennial finishing systems in the 2005 season.

The project investigated four groups of lambs: two groups were finished on annual pasture and sold in late October; one of these groups was supplemented with additional protein in the form of organic soya bean meal.

The other two groups of lambs were finished on perennial pasture and sold in mid-December, also with one group fed soya bean meal.

We have completed an economic analysis that takes into account the cost of pasture establishment and compares the performance of the organic lambs with lambs finished within a conventional system.

The pasture establishment costs are included in the gross margin analysis because this provides an accurate assessment of the true costs of establishing a pasture finishing system suitable for organic production. The cost of establishing pasture will diminish over time.

Organic certification costs are not included in the analysis because this is a fixed cost each year and its effect is reduced with more lambs sold. The experimental program sold only a small number of lambs and this cost would have distorted results.

The results (Table 1) show finishing lambs on annual pasture last year was generally more profitable per hectare than finishing them on perennial pasture (\$167.51, compared with \$119.83). This result is not surprising given the high rainfall and substantial pasture growth in spring last year, resulting in heavier lambs.

Supplementing the organic lambs with organic soya bean

POWDERY MILDEW TREATMENT

Chrys Akem and Ross Wright are investigating treatments that may be effective against powdery mildew in a project by the Dept of Primary Industries and Fisheries (DPI&F).

Powdery mildew on capsicums is caused by the fungus *Leveillula taurica* and is a major disease of the crop, especially in tropical environments.

Sulphur is the only recommended product for use in organic production. While widely used, there are questions about its effectiveness.

Five treatments investigated in the project were reported to be effective against powdery mildew: sulphur, EcoCarb, Silicon (Stand SKH), powder milk and Brella oil.

The trial showed all treatments were effective in combating powdery mildew and were comparable to the effect of sulphur. All treatments reduced the amount of defoliation suffered by the plants, compared to the control.

Less defoliation was observed with the EcoCarb, silicon and milk treatments than with the sulphur treatment.

Contact: DPI&F, phone 13 25 23; email <callweb@dpi.qld.gov.au>.



DPI&F senior plant pathologist Dr Chrys Akem (right) discusses the powdery mildew trial at the Ayr Research Station with plant pathology expert at Cornell University, New York, Associate Prof Margaret McGrath.

Call for organic projects

A future in which organic farming practices contribute strongly to natural resource management within catchments of north Queensland has become the focus of a DPI&F project in Ayr funded by the Burdekin Rangelands to Reef Initiative.

The four-hectare organic study farm at the DPI&F's research station in Ayr was established in July 2003. A steering committee of interested farmers has been appointed to help promote the project and acquaint farmers with organic farming systems.

Co-ordinator of projects on the station, John Brown is keen to have the industry work in partnership with DPI&F to demonstrate organic practices and investigate possible treatments for various problems facing the organic industry in north Queensland.

"Our goal is to attract potential growers and give advice on

problems they may encounter when they convert to organic farming," he says. "Mangoes, vegetables and soybeans are being trialled at the study farm."

A block of 48 Keitt mangoes and a little more than one hectare of farming land are available for trials.

"When the mangoes were small, we demonstrated the use of weed control options under the trees," Brown says. "The only restriction on projects for the block is that all treatments must comply with the organic certification standard."

"So one project we have at the moment looking into organic control options for leaf diseases like powdery mildew has to be conducted elsewhere on the station because the control options being tested include the non-organic option used on conventional farms."

Anyone interested in conducting a trial or demonstration on the study farm may contact John Brown on 13 25 23 to talk through the proposal. ■

meal resulted in better returns compared with non-supplemented organic lambs, irrespective of the finishing system. A 30% increase in returns per hectare resulted from supplementing on annual pasture, compared with a 21% increase in returns from lambs finished on perennial pasture.

Conventional lambs provided less returns per hectare than organic lambs when finished on annual pasture, but compared favourably with non-supplemented organic lambs off perennial pasture.

Lambs from the 2006 season will be finished on both systems again this year, so a repeat set of data can be obtained for comparison.

These economic results should be used with caution as the 2005 season was exceptional for pasture growth and would not represent a typical spring season in this area.

Table 1: Gross margin for lambs finished on annual and perennial pastures established in 2004

Pastures	Measures (All figures in \$)	Groups Organic supplemented	Organic Non-supplemented	Conventional
Annual Pasture	per hectare	211.37	147.88	143.29
	per lamb	22.55	15.77	15.28
	per kg of weight gain	0.8672	0.7170	0.5459
Perennial Pasture	per hectare	132.66	105.25	121.58
	per lamb	14.15	11.23	12.97
	per kg of weight gain	0.8324	0.7586	0.5895

Source: J. Tocker (DPI, Agribusiness)

Contact: More on results — project leader Viv Burnett, phone (02) 6030 4500.

(Source: DPI Victoria Organic Newsletter, June 2006.)