

ASSOCIATION OF APPLIED BIOLOGISTS

in conjunction with

THE BRITISH SOCIETY OF ANIMAL SCIENCE

ASPECTS OF APPLIED BIOLOGY 80

**Delivering sustainability within
profitable farming systems – is it
possible?**

Studley Castle, Warwickshire, UK

14-15 December 2006

Produced by the Association of Applied Biologists

**Copies available from: The AAB Office
c/o Warwick HRI, Wellesbourne,
Warwick CV35 9EF, UK**

REFERENCES

The correct form of reference for this publication, which is based on a meeting of the Association of Applied Biologists, is:

Aspects of Applied Biology **80**, *Delivering sustainability within profitable farming systems – is it possible?*, pp. xx-xx

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Printed in UK

Published by the Association of Applied Biologists, c/o Warwick HRI, Wellesbourne, Warwick CV35 9EF, UK

© 2006 The Association of Applied Biologists
ISSN 0265-1491

*Full reference: *Aspects of Applied Biology* **80**, *Delivering sustainability within profitable farming systems – is it possible?* Published by the Association of Applied Biologists, c/o Warwick HRI, Wellesbourne, Warwick CV35 9EF, UK.

Introduction

This volume of *Aspects of Applied Biology* has been produced for the conference organised by the Association of Applied Biologists in conjunction with the British Society of Animal Science.

From the 1960s until recently, the main aim for much of the agricultural industry, supported in recent decades by EU subsidies, was to maximise production. To achieve this, *inter alia*, traditional plant varieties were replaced by potentially more productive cultivars and to realise their potential, mineral nutrient fertilisers and pesticides, herbicides and fungicides were used extensively. Use of agrochemicals has contributed to several recent major environmental problems including eutrophication of freshwaters and hence estuaries and coastal water, emissions of greenhouse gases to the atmosphere and a decrease in biodiversity within and outside agricultural systems. Many countries have responded to these problems and international agreements require the UK to reduce the level of diffuse pollutants and promote biodiversity. Alongside this, the EU has sought to reduce its spend on agriculture by reducing subsidies, and to divert funding to agri-environment and other rural support. The pressure both from within and outside the EU to farm at what will soon be world market prices will engender significant change to UK agriculture and the agricultural landscape and raises a number of questions, such as:

What will happen to land use in future in response to increased environmental and political pressure for reform?; How will management of land and crops change?; What will be the impacts of that change over time?; How can agricultural, plant and animal sciences help prepare for that change?; Can the function of providing a sustainable farming income balance with the provision of environmental public goods?; Can we afford to farm at world market price and deliver environmental goods? Overall we need to assess if sustainability can be delivered within profitable farming systems

Thanks are due to all members of the organising committee (see below) for their invaluable help with this conference. Also thanks to Carol Millman and Anna Harding at the AAB Office for organising the administration for the conference and preparing this volume of *Aspects of Applied Biology*.

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CONTENTS

	<i>Page</i>
The common agricultural policy (CAP) J McCLINTOCK	1
A practical appraisal of on-farm costs of Environmental Stewardship and other influences on farmers' adoption of it C STOATE & P JARVIS	3
The Environment Agency – an overview and the role of ecological appraisal in assessing environmental impacts on the aquatic environment E W SENIOR	11
A method to predict impacts of NVZ and water framework legislation on UK vegetable and arable farming U SCHMUTZ , C FIRTH , C NENDEL, R LILLYWHITE & C RAHN	19
Are New Zealand cereal, arable and pastoral rotations sustainable? B A MCKENZIE, G R EDWARDS & G D HILL	29
The contribution of non-food crops to sustainability – a mixed picture D B TURLEY	43
Integrated Farm Management Systems – making sustainability accessible to all: the LEAF viewpoint C J DRUMMOND	51
The economic sustainability of organic vegetable systems A ROSENFELD, C FIRTH & U SCHMUTZ	65
Use of SIMS_{DAIRY} modelling framework system to specify sustainable UK dairy farms A DEL PRADO & D SCHOLEFIELD	73
Breeding forage legumes for sustainable and profitable farming systems M T ABBERTON, M FOTHERGILL, R P COLLINS & A H MARSHALL	81
Breeding potatoes to meet new market directions M F B DALE	89
Meeting the needs of stakeholders in UK agriculture: Will the Common Agricultural Policy deliver? R HALL, W SENIOR & J DIXON-DAWSON	93

The impact of historical heavy metal contamination on the microbial community of upland pastures in the North Pennines L BAMBOROUGH & S P CUMMINGS	95
Simulation of gaseous emissions of nitrogen from organic ley-arable systems under different management regimes L WU, B C BALL, J A BADDELEY & C A WATSON	101
Gibberellic acid production is a component of the mechanism of action of the cereal growth promoting <i>Rhizobium radiobacter</i> strain 204 M ANDREWS, B THYNE, R WIMAL, H PERERA, N D SATYANARAYAN & W J LOUGH	109
Aiming for sustainable red meat production G BUTLER & C SCOTT	113
Effect of organic, ‘low-input’ and conventional production systems on disease incidence and severity in winter wheat J M COOPER, C S SCHMIDT, A WILKINSON, L LUECK, C M HALL, P N SHOTTON & C LEIFERT	121
Effect of soil steaming, amendments and resistant rootstocks on soil borne disease incidence and yields and in organic tomato production systems C GIOTIS, E TOUFEXI, A THEODOROPOULOU, N DAFERMOS, E MARKELOU, A KASSELAKI, N MALATHRAKIS & C LEIFERT	127
Effect of organic, low-input and conventional production systems on yield and quality of winter wheat L LUECK, C S SCHMIDT J M COOPER, C M HALL, P N SHOTTON and C LEIFERT	135
Will a ‘business as usual’ scenario decrease UK agricultural nutrient surpluses by 2015? M SHEPHERD & G GOODLASS	141
Effect of fertility management and variety choice on yield and baking quality of organic spring and winter wheat A WILKINSON, D YOUNG, J M COOPER, S WILKOCKSON & C LEIFERT	147
Brewery wastes. Strategies for sustainability. A review. K R THOMAS & P K S M RAHMAN	153
The impact of the degradation of the herbicide bromoxynil on bacteria in an agricultural soil J BAXTER & S P CUMMINGS	163

Avirulence management for durable control of stem canker of oilseed rape in Europe	171
J S WEST, A O LATUNDE-DADA, Y-J HUANG, N EVANS & B D L FITT	
A comparison of grass and grass/white clover dairy pastures in nitrate vulnerable zones in the UK: environmental and financial considerations	177
M ANDREWS, R HALL, S HODGE & J A RAVEN	
Farm-gate nitrogen and phosphate balances	181
G GOODLASS, B R COTTRILL, B J CHAMBERS, S J RICHARDSON, D SCHOLEFIELD, K GOULDING & J OBORN	
Interactions between livestock and diversity in upland systems	189
A WATERHOUSE	
Effect of production system, geographic location and sampling date on milk quality parameters	193
G BUTLER, S STERGIADIS, M EYRE & C LEIFERT	
Corporate social and environmental responsibility in relation to the agricultural sector and the food supply chain: a case study of Waitrose	199
J DIXON-DAWSON, A CATHCART, A E OSSEO-ASARE & M ANDREWS	
Delivering sustainable resource use through organically managed farming systems	201
R M REES, C F E TOPP & C A WATSON	
Ploughing of grass/clover swards in an organic rotation – the impact on soil nitrogen dynamics	207
C F E TOPP & C A WATSON	
Effect of organic, ‘low input’ and conventional crop production systems on crop yield, quality and health; the Nafferton Factorial Systems Comparison Experiments	215
C LEIFERT	
Predicting soil nitrogen dynamics for an organic rotation using NDICEA	217
G J H M VAN DER BURGT, C F E TOPP, C A WATSON, G J M OOMEN & W A H ROSSING	