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in conjunction with

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

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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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