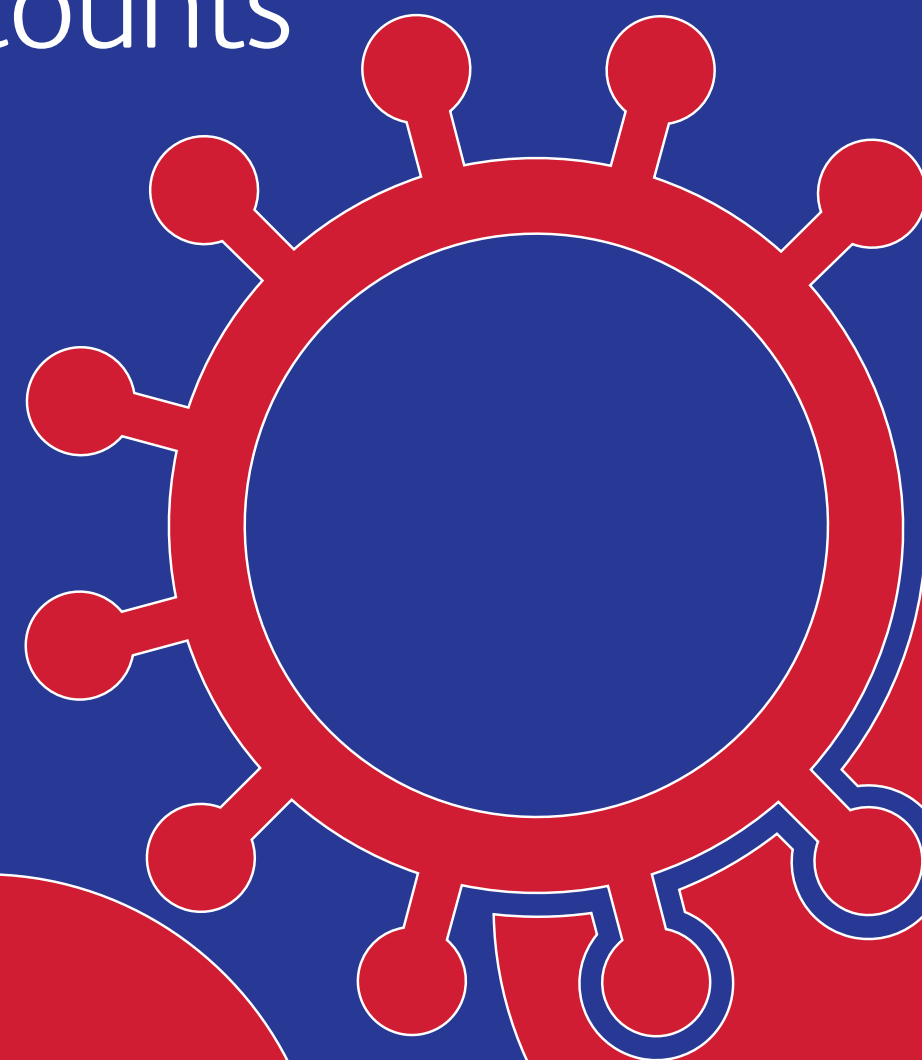


Biotechnology and Biological Sciences Research Council

Annual Report and Accounts

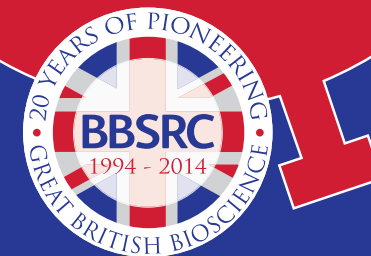
2013-2014



ISBN 978-1-4741-0309-1



9 781474 103091



Biotechnology and Biological Sciences Research Council (BBSRC)
Annual Report and Accounts 2013-2014

Presented to Parliament pursuant to Schedule 1, sections 2 [2] and 3 [3] of the Science and Technology Act 1965.

Ordered by the House of Commons to be printed 9th July 2014.

© Biotechnology and Biological Sciences Research Council (2014)

The text of this document (this excludes, where present, the Royal Arms and all departmental or agency logos) may be reproduced free of charge in any format or medium provided that it is reproduced accurately and not in a misleading context.

The material must be acknowledged as Biotechnology and Biological Sciences Research Council copyright and the document title specified. Where third party material has been identified, permission from the respective copyright holder must be sought.

Any enquiries related to this publication should be sent to us at external.relations@bbsrc.ac.uk

This publication is available at <https://www.gov.uk/government/publications>

Print ISBN 9781474103091

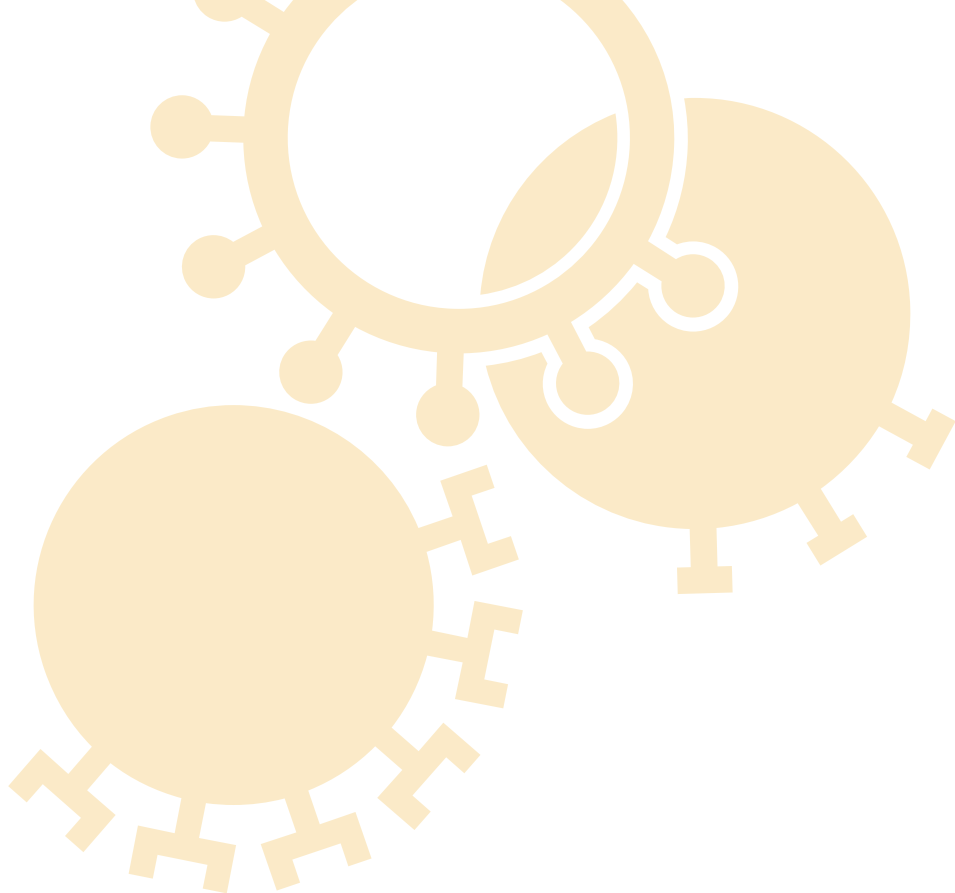
Web ISBN 9781474103107

Printed in the UK for the Williams Lea Group on behalf of the Controller of Her Majesty's Stationery Office

ID 06051402 07/14

Printed on paper containing 75% recycled fibre content minimum

Contents



PART 1 MANAGEMENT COMMENTARY

Chair's statement	2
Chief Executive's report	3
Key funding data	22

Corporate information

Governance	24
Organisational developments	24
Sustainability report	28
Financial review	30
Remuneration report	32
Acronyms	73

PART 2 ANNUAL ACCOUNTS 2013-2014

Governance statement by the Chief Executive	38
Financial statements for the year ended 31 March 2014	48

This Report provides an overview of BBSRC's major activities during the period 1 April 2013 to 31 March 2014.

This Report is accessible at www.bbsrc.ac.uk/annualreport. Readers may wish to refer to previous Annual Reports also found on this page; the BBSRC Strategic Plan 2010-2015 at www.bbsrc.ac.uk/strategy; and the BBSRC Deliver Plan 2011-2015 at www.bbsrc.ac.uk/deliveryplan

BBSRC

The Biotechnology and Biological Sciences Research Council (BBSRC), established by Royal Charter in 1994, is the UK's principal funder of basic and strategic research across the biosciences, in universities and research centres throughout the UK. BBSRC is funded primarily by the Science Budget through the Department for Business, Innovation and Skills (BIS).



BBSRC works collaboratively with its sister Research Councils through Research Councils UK (RCUK) in areas that include: cross-Council programmes of research; research training and careers development; knowledge exchange and economic impact; communications; public engagement; and administrative harmonisation. www.rcuk.ac.uk

Up to date information on BBSRC's policies, activities and impact is accessible at: www.bbsrc.ac.uk



© Tim Gander



Chair's statement

Twenty years ago, BBSRC emerged from a restructuring of the Research Councils in response to a government White Paper. Professor Sir Tom Blundell, founding BBSRC Chief Executive and current BBSRC Chair, gives his account of this radical refocusing of the science base.

The early '90s were a time of fast-moving developments in science and its potential to contribute to wealth creation. It was also a time of political turmoil.

Change in science policy was driven by an amazing group of people. William Waldegrave, based in the Cabinet Office with responsibility for public services and science from 1992 to 1994, and Richard Mottram, Permanent Secretary, were lively debating partners, spending many hours with us. David Phillips, Chair of the Advisory Board of the Research Councils, one of the wisest scientific advisors we have had in the UK, and Bill Stewart, the Chief Scientific Advisor, were central to new developments.

The stage was set for something new. In May 1993, Waldegrave published *Realising our potential: a strategy for science, engineering and technology*.

There was a vision, shared by Government, the scientific community and industry that opportunities in the biosciences were emerging at such a speed, pervasiveness and potential application that they required focus in a single, but multidisciplinary organisation.

The new Research Councils

Each Research Council was to be defined by an area of translation and an area of underpinning research: thus BBSRC, founded in 1994, brought together biological, chemical biological and biophysical research from the SERC biology committee with biological, agricultural, engineering and food research in AFRC.

Alistair Grant, CEO of Safeways, was appointed BBSRC Chair and I became Chief Executive. This proved a wonderful working relationship. Together we sought active involvement and representation of industry, universities, institutes and Government.

The creation of BBSRC was a timely move. Where physics shaped the early 20th century, and engineering and computing transformed our lives over the past 40 years, bioscience could at last be a major driver of growth. In BBSRC's first Annual Report, the then Chair Sir Alistair Grant noted the 'enormous responsibility' placed on BBSRC by this assertion.

In that same Annual Report, I wrote my first introduction as BBSRC's Chief Executive. As well as focussing on the research and training we funded and the systems and processes we were refining, I talked of the role science has in the culture of developed countries. I wrote: "It is important that the public is able, for example, to contribute to debate about how advances might be used in new technologies."

From the outset, an integral part of BBSRC's ethos has been to communicate the science it funds and

engage in a meaningful way with the public about the strengths and limitations of bioscience.

In 1994, we funded the first UK Consensus Conference examining genetic manipulation and involving lay people reaching consensus about difficult science. We were also active in championing gender diversity, recruiting more women into every aspect of our research. BBSRC won the Opportunity 2000 award for top-level commitment to equal opportunities in the public sector.

There continues to be a need to engage widely with others to ensure that the development of exciting science and opportunities for its translation into useful products and processes happen in a way that sits well with society. Now, alongside traditional outlets for communication and engagement, we are using social media platforms to ensure we reach as diverse an audience as possible.

Keeping the cogs turning

I would like to formally welcome Professor Jackie Hunter to BBSRC, as the fifth Chief Executive in BBSRC's history. She brings to the role an impressive knowledge of, and enthusiasm for, fundamental bioscience. She has an enviable track record and I am confident she will build on BBSRC's existing successes and the strong position of UK bioscience as we look at how we improve quality of life for all and build a thriving bioeconomy.

I must also thank Professor Douglas Kell for his exceptional leadership of BBSRC since 2008. Douglas led BBSRC at a time of great challenges but ensured we seized opportunities for UK bioscience.

I would also like to thank our retiring Council members for their invaluable expertise and opinions: Professor John Coggins OBE FRSE, Professor Anne Dell CBE FRS, Dr David Lawrence, Professor Keith Lindsey, Professor Chris Pollock CBE, Dr Andy Richards and Dr John Stageman OBE.

I was delighted that Professor Carole Goble OBE was appointed to BBSRC Council in April 2013.

It is a good time, on our 20th anniversary, to learn from the past and to think about the future. Bioscience is still championed as a principal driver of new lifestyles, sustainable technologies and business that will become increasingly important to us all, in the UK and beyond. Over the past 20 years, BBSRC has embraced this 'enormous responsibility' as highlighted by the title of our Strategic Plan – *The Age of Bioscience*.

Professor Sir Tom Blundell FRS

BBSRC Chair

June 2014



© Tim Gander



Chief Executive's report

I feel particularly privileged to be writing my first report in BBSRC's 20th anniversary year. While this report focuses on the past financial year, the achievements that are showcased in these pages build on the hard work, dedication and innovation of the world-class bioscience community that we have supported over the past 20 years.

During those 20 years we have funded over £5.5Bn of bioscience research, 15,000 research projects, 8,200 researchers and supported over 130 organisations. What is impressive, however, is not these large figures but rather the impacts that have come about because of them.

BBSRC was formed in response to the 1993 White Paper *Realising our Potential*, which stated that the mission of the newly proposed Biotechnology and Biological Sciences Research Council was to promote and support high quality research and training in biological systems to enhance the UK's 'industrial competitiveness and quality of life'.

And that is exactly what we are doing and have done. The world-class, multidisciplinary research base we support, is generating findings with real economic, social and health benefits for people in the UK and around the world: from generating new human bone tissue and creating greener fuel from bacteria, to developing diagnostic tests and vaccines to prevent the spread of livestock diseases and sequencing major crop genomes – laying the foundations for crop improvements.

BBSRC is incredibly proud of the bioscience community that it has helped to build, hence our anniversary slogan – '20 years of pioneering Great British bioscience'. This report outlines just some of BBSRC's highlights from the last year and showcases some of the researchers, initiatives and partnerships that will shape the next 20 years. They will help provide solutions to the grand challenges of feeding a growing global population sustainably, reducing dependence on fossil fuels and ensuring people stay healthier as we live for longer.

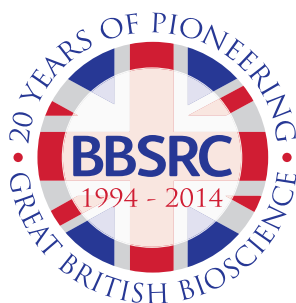
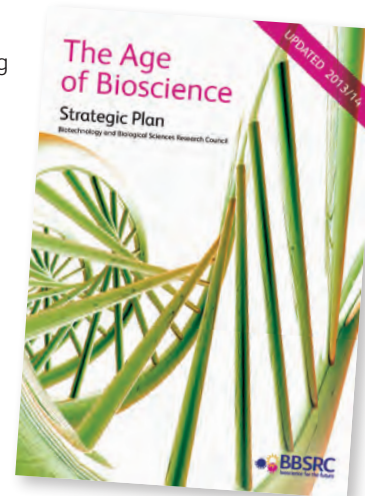
Upon joining BBSRC in October, one of my first tasks was to oversee the publication of our refreshed five-year strategic plan, *The Age of Bioscience*, first published in 2010. This provided an opportunity to review our progress and ensure BBSRC is best placed to seize emerging opportunities at the cutting edge of bioscience. Following consultation with the research community, policy and industrial end-users of our science, and the wider public, we published our refreshed strategy at BBSRC's anniversary launch event in January.

The plan continues to emphasise fundamental world-leading bioscience, while highlighting areas of increasing and emerging importance, such as the sustainable intensification of agriculture and recognition of increased capacity in synthetic biology and other enabling technologies.

To reflect these and other changes, some priority areas have new titles to better describe the science they encompass: 'Food Security' has become 'Agriculture and Food Security', for example, and the 'Basic Bioscience Underpinning Health' priority has been updated to 'Bioscience for Health'.

The 'Enabling Innovation' theme now includes UK research and innovation campuses as one of the ways in which BBSRC helps to create an environment for impact – by supporting interactions between industry and academia.

These changes are mirrored in this Annual Report.



The competitiveness of UK science was confirmed in December by a biannual report commissioned by the Department for Business, Innovation and Skills (BIS), *International Comparative Performance of the UK Research Base*.¹ Amongst comparator countries the UK has overtaken the US to rank 1st by field weighted citation impact and 'punches above its weight as a nation'.

But the report also highlights some of the challenges we face including growing competition from emerging nations.

It was therefore welcome in these challenging economic times, that BIS will continue to ring-fence, in cash-terms, the 2015-16 science and research budget. But, in reality, this means resourcefulness, partnerships and collaborations will be essential to ensure the UK continues to maintain its excellent international research standing to deliver maximum social and economic returns.

Each of the BBSRC strategically-funded institutes has commissioned independent reports to capture the impact of their activities. One of these reports showed that for every £1 invested in the John Innes Centre the UK gets over £12 back for the UK economy.²

The reports have also captured some excellent specific examples of how the research and capability at these institutes can deliver significant benefit to the UK economy. One such highlight is a programme of research called the Sustainable Shelf Life Extension (SUSSLE) project, involving the Institute of Food Research (IFR). This programme has an estimated value of approximately £25M per annum to the UK chilled food industry through improved efficiencies, reduced wastage and increased sales with £23.75M being due to IFR inputs.³

In addition, a further report has estimated that by 2011, the annual agricultural productivity gain within the UK attributable to The Roslin Institute amounted to approximately £247M, which is increasing by around £5M per year. Globally, this benefit is estimated to be around £1.26 Bn.⁴

The fundamental research we support has long lead times from lab to application but, over the 20 years, a steady stream of promising outcomes is emerging, and this year has been no exception. For example, in what was the wettest year on record for the UK, researchers from two BBSRC-funded institutes have shown that a grass hybrid species could help reduce the impact of flooding.

Researchers from Aberystwyth University's Institute of Biological, Environmental and Rural Sciences (IBERS) and Rothamsted Research North Wyke in Devon are developing new grasses that enable soils to capture increased volumes of rainfall, and so reduce the risk of flooding downstream. This is part of a five-year £2.5M LINK project named SUPERROOT, funded by BBSRC with match funding from industrial partners.

Last Autumn, two pilot badger culling zones caused controversy, and there remains much debate about the most effective way to reduce TB in cattle. In February, researchers from the University of Edinburgh's The Roslin Institute, which receives strategic funding from BBSRC, published research identifying a number of genetic signatures associated with TB resistance in disease-free cattle compared with TB-infected cattle. This work sheds further light on whether it might be possible in the future to improve TB control through selective breeding (see page 5).

The increasing resistance to antibiotics is another topic never far from the news, an issue described by England's Chief Medical Officer Dame Sally Davies as a 'ticking time bomb'. Last July, research funded by BBSRC and the MRC found that *Salmonella* bacteria develop resistance to antibiotics and antibacterial soaps through a common genetic mutation. This work, carried out by researchers from the University of Birmingham, demonstrates that common mechanisms of resistance to one group of antibiotics provides cross-resistance to other types of antibiotic, giving scientists more vital information in the fight against antimicrobial resistance and the development of new classes of anti-infective drugs.

Finally, a year on from the horse meat scandal that rocked consumer confidence in the food supply chain, the BBSRC-funded Institute of Food Research (IFR) teamed up with Oxford Instruments to develop improved ways of testing meat in the food chain.

The scandal highlighted the need for improved and expanded authenticity testing regimes. New approaches for carrying out such tests are being developed at IFR using molecular spectroscopic techniques, principally nuclear magnetic resonance, to analyse the fatty acid composition of food samples. Until recently, the equipment to carry out these tests has been too expensive and complicated to allow their use in industrial settings. IFR and Oxford Instruments are working together to develop a suitable machine and software to solve this.

There is no doubt that bioscience is, and will continue to be, central to agricultural innovation. So BBSRC welcomed the publication of the Government's *UK Strategy for Agricultural Technologies* last July, which looks to make the UK a world leader in science and technology development for agriculture.

BBSRC is supporting the implementation of the Strategy by working with our research community, our partners and the private sector to help to accelerate the translation of world class BBSRC-funded bioscience out of the lab into farmers' fields and onto consumers' plates (see Agri-Tech Catalyst, page 9 and Agri-Tech relevant development at Research and Innovation Campuses, page 7).

¹ International Comparative Performance of the UK Research Base – 2013. A report prepared by Elsevier for the UK's Department for Business, Innovation and Skills.

² Impact of the John Innes Centre, June 2013, Brookdale Consulting.

³ Impact of the Institute of Food Research, June 2013, Brookdale Consulting.

⁴ Economic Impact of The Roslin Institute, Feb 2013, BiGGAR Economics.

Science alone will not solve the challenge of providing sufficient, nutritious food for a growing global population. But without the help of new scientific tools and technologies we will struggle to feed future generations. The debate around the use of genetically modified (GM) organisms is intensifying. In March, a report from the Council for Science and Technology, (commissioned from an independent panel of scientists) was published that reviewed GM science. Two of BBSRC's strategically-funded institutes were cited in the Chief Scientific Adviser's letter to the Prime Minister outlining the main findings from the report. Professor Sir Mark Walport said that work at Rothamsted Research and the JIC illustrated 'the extraordinary potential of GM technologies'.

Last June, the Department for the Environment, Food and Rural Affairs (Defra) granted permission to Rothamsted Researchers to plant autumn-sown wheat as part of

a GM field trial. This extension to an existing trial has allowed scientists to study the effects of autumn aphid infestations on their experimental 'aphid repelling' wheat. While GM purple tomatoes, developed by BBSRC-funded scientists at the John Innes Centre, are being harvested (in Canada) for future research and which have attracted interest from private investors.

I personally recognise that BBSRC has a very important role to play in the GM debate both in terms of the science funded and in working with our stakeholders to ensure a meaningful two-way dialogue with the general public about this technology. I fully endorse Professor Sir Mark Walport's call for GM organisms to be viewed on a case by case basis. The active engagement of scientists and policy makers as well as the public will also be important going forward in order to exploit fully the potential of other new technologies in the development of crops to feed the population sustainably.

■ Scientists have identified genetic traits in cattle that might allow farmers to breed livestock with increased resistance to bovine tuberculosis (TB).

The study, funded by BBSRC and led by the University of Edinburgh's The Roslin Institute, compared the genetic code of TB-infected animals with that of disease-free cattle and identified a number of genetic signatures associated with TB resistance in the cows that remained unaffected.

The study builds on previous research by The Roslin Institute, which showed that some cattle might be more resistant to bovine TB as a result of their genetic make-up.

Researchers at The Roslin Institute say the latest finding is significant as it sheds further light on whether it might be possible to improve TB control through selective breeding.



© The Roslin Institute, The University of Edinburgh

Holstein Friesian dairy cows.

■ In a three-year GM research trial, scientists boosted the resistance of potatoes to late blight, their most important disease, without deploying fungicides.

The findings, funded by BBSRC and The Gatsby Foundation were published in *Philosophical Transactions of the Royal Society B*.

In the third year of the trial, the potatoes experienced ideal conditions for late blight. The scientists did not inoculate any plants but waited for races circulating in the UK to blow in.

Non-transgenic Desiree plants were 100% infected by early August while all GM plants remained fully resistant to the end of the experiment. There was also a difference in yield, with tubers from each block of 16 plants weighing 6-13 kg while the non-GM tubers from infected plants weighed 1.6-5 kg per block.



© Kamil Witek

The potatoes on the left were protected from blight by a gene (*Rpi-vnt1*) from a wild relative, *S. venturii*, unlike the potatoes on the right.

BBSRC makes strategic investments in eight research institutes; the Babraham Institute (BI), the Institute of Food Research (IFR), the John Innes Centre (JIC), Rothamsted Research (RRes), The Genome Analysis Centre (TGAC), The Pirbright Institute (TPI), the Institute of Biological, Environmental and Rural Sciences (IBERS) and The Roslin Institute (RI). The institutes are central to delivering BBSRC's vision and strategic priorities and provide vital and sustained national capability in key strategic areas of agriculture, food, bioenergy, biomedicine, and diet and health.

In January, the construction phase of the DP1 high containment laboratory was completed successfully and delivered to The Pirbright Institute ahead of programme and within budget. Moving into 2014-15 The Pirbright Institute is working on a detailed validation, licensing and occupation plan. The second phase of investment continues to progress through design development of the Biological Resources Facility, and the appointment of a contractor for the CL2 laboratory facility, with construction activity commencing in April this year.

Research and Innovation Campus developments

BBSRC continues to work closely with partners and key stakeholders to develop and support world-leading UK Research and Innovation Campuses at the five locations where seven of our eight strategically funded institutes are located. These innovation 'hot spots' are creating exciting and supportive environments for innovation, and their importance was underlined by

the announcement last July of an additional £30M of capital investment for agri-tech relevant campus developments.

Highlights from our ongoing programme of campus capital investment during 2013-2014, include:

Babraham Research Campus (P44)

- Reconstituted campus operating company (with the Babraham Institute and BBSRC as shareholders) incorporated August 2013
- B580 central campus scientific services building: construction completed mid-March 2014 on schedule
- Extension to Biological Support Unit: construction completed March 2014 on schedule
- B930 follow-on-office/laboratory (Bennett Building): construction commenced October 2013, and building remains on track for completion on time and budget by end September 2014. Delivery of this building will complete the capital investment phase of P44
- As of March 2014, campus lettable space was 99% occupied, with 51 companies in residence
- Last June the Jonas Webb Building was opened. This is a new chemistry-focused building and offers around 1,500 square meters of lettable space, which will include 24 fume hoods, open plan bench space, offices and meeting rooms



© Max Alexander

Babraham Bioscience Technologies Ltd Chief Executive Derek Jones with Minister for Universities and Science David Willetts who opened the new Jonas Webb Building at the Babraham Research Campus last June.

Norwich Research Park (P26)

- Centrum building: construction nearing completion and commissioning works commenced. When completed, the Centrum will become the hub for Norwich Research Park (NRP)
- NRP Enterprise Centre (part funded by P26): building work on this exemplar, low carbon building, whose construction champions the use of natural materials and innovative building techniques, commenced December 2013, with planned completion by February 2016
- BBSRC is investing up to an additional £2.5M towards the delivery of a pilot facility for the development and production of industrially relevant molecules in plants
- In June a new 'proof of concept' fund worth £1.82M was announced to provide early-stage investment for researchers on the campus with an idea for commercial application

As part of the Government's Agri-Tech Strategy, BBSRC announced £30M last July for the further development of Research and Innovation Campuses at Easter Bush (Edinburgh), Rothamsted Research and Aberystwyth where unique facilities and world-leading agri-science can be accessed by private enterprise

Rothamsted Centre for Research and Enterprise

- BBSRC is investing up to £10.9M towards the delivery of a new shared resources hub and a new conference centre as part of a larger project that will help enable multidisciplinary interactions between industrial and academic scientists to encourage more science, business and enterprise to flourish together on the campus
- Construction of the shared resources hub and the conference centre commenced in December 2013 and both are on schedule for planned completion by March 2015

Aberystwyth Innovation and Enterprise Campus

- BBSRC is investing up to £12M to help establish a world-leading agri-innovation campus for food and renewable energy in Aberystwyth. The investment will provide new infrastructure and facilities to attract companies and researchers interested in creating commercially viable products. Contributions from other stakeholders, including Aberystwyth University and the Welsh European Funding Office, are expected to bring the total investment in this project to over £37M

The Easter Bush Campus

- BBSRC is investing up to £5M towards the delivery of incubator facilities for early-stage companies within the new Easter Bush Innovation Hub building. This is part of a larger investment programme, led by the University of Edinburgh, designed to support the successful development of entrepreneurial companies and encourage interaction between science, business and enterprise. The Scottish Government has also announced £10M additional funding towards realising the vision of the Easter Bush Campus.

© Darren Carter



Centrum will be Norwich Research Park's new hub building, offering high quality interaction space where innovative businesses and academics can meet.

© Babraham Research Campus



The Jonas Web Building, Babraham Research Campus.

BBSRC also supports capacity building through our strategic longer larger grants scheme (sLoLaS). Last year we invested £17.7M in six major long-term research projects across health, agriculture and alternatives to fossil fuels. The awards give researchers the time and resources to address areas of key strategic importance. The projects include:

- BBSRC marine wood borer enzyme programme – producing liquid fuel from waste wood, University of York
- BBSRC algal biotechnology platform for designer lipids – more sustainable production of useful molecules, including biofuels, bulk chemicals and high value products, University College London
- BBSRC *Drosophila* developmental interactome project – using the fruit fly as a model to help us understand how we develop, University of Manchester

■ Last November, Aberystwyth University's Institute of Biological, Environmental and Rural Sciences (IBERS) won the Outstanding Contribution to Innovation and Technology category award at the Times Higher Education Awards.

Aberystwyth University's winning entry focused on the breeding and development of high sugar grasses by scientists at IBERS.

Aber HSG ryegrasses have the potential to transform pastoral based livestock agriculture. Independent tests have demonstrated that Aber HSG ryegrass can increase the production of meat and milk by up to 24% and reduce methane emissions and nitrogenous pollutants by up to 20%.

ASDA and Sainsbury's promote the use of AberHSG on their farms, estimating a reduction of 186,000 tonnes of carbon dioxide per year, whilst raising profit by more than £10M per annum.



Members of the IBERS team celebrate at the 2013 Times Higher Education Awards.

© Hannah Maule-Finch

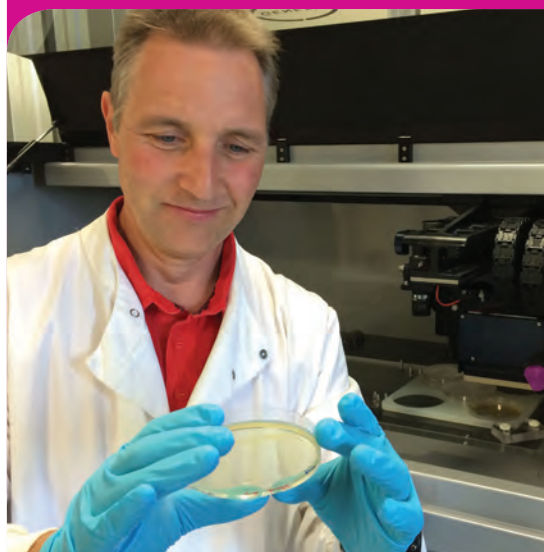
In total over 2013-2014, BBSRC invested over £484M in world-class bioscience, of which £312.88M was for research, £119.46M in the form of capital funding to UK science infrastructure and a further £52.31M on people, skills and training.

Over the course of the next few pages, you will see a snapshot of how this funding was spent, set out under our refreshed strategic priority headings and enabling themes.

■ A team from the University of Exeter, with support from Shell, has developed a method to make bacteria produce diesel on demand. While the technology still faces many significant commercialisation challenges, the diesel, produced by special strains of *E. coli* bacteria, is almost identical to conventional diesel fuel and so does not need to be blended with petroleum products as is the case for often required biodiesels derived from plant oils.

E. coli bacteria naturally turn sugars into fat to build their cell membranes. Synthetic fuel oil molecules can be created by harnessing this natural oil production process. Large scale manufacturing using *E. coli* as the catalyst is already commonplace in the pharmaceutical industry and, although the biodiesel is currently produced in tiny quantities in the laboratory, work will continue to see if this may be a viable commercial pathway to 'drop in' fuels.

This work was also supported by a BBSRC Industry Interchange Programme (IIP) award, now superseded by BBSRC's Flexible Interchange Programme (FLIP).



Dr John Love, Project leader for fourth generation biofuels.

© University of Exeter



Agriculture and Food Security

Agriculture for food and non-food products is one of the world's fastest growing markets, driven by global changes including a rising population and the rapid development of emerging economies. At the same time, agriculture needs to respond to challenges that include climate change and increasing competition for land, water and energy.

In July, BBSRC welcomed the Government's UK Strategy for Agricultural Technologies, which sets out how Government, researchers and the food and farming industry can build on the strengths of UK agriculture and related sectors. BBSRC has an important role to play in helping to deliver the Strategy and ensuring the UK's world-leading biological science that underpins agriculture is translated into practice.

Establishing 'Catalysts' is one of the ways in which BBSRC, with partners, will help align academic research more effectively with industry needs and increase the effectiveness of its translation.

The Agri-Tech Catalyst, supported by BBSRC, the Technology Strategy Board (TSB) and the Department for International Development (DfID) with some £70M of industrial strategy funding, will help to take innovations all the way from concept to commercialisation, awarding grants for early-stage, pre-industrial research feasibility studies, industrial research, and late-stage, pre-experimental and experimental feasibility studies.

In March, 11 projects were awarded £2.8M for the early- and late-stage studies in the first round of Agri-Tech Catalyst funding, alongside £1.4M co-investment from industry. Projects include:

- The Royal Holloway University is working with Germains to improve seed priming – a technique used to improve the quality of vegetable seeds
- The University of Nottingham is working with Quality Milk Management to improve the treatment and management of mastitis in dairy cattle
- The Scottish Association for Marine Sciences is leading a consortium to develop technology to farm two species of seaweed

Wheat is a globally important crop and production will have a crucial role to play in food security and the global economy, with the world's population estimated to reach 9.6 billion by 2050. The World Bank estimates that global wheat production will have to increase by 60% between 2000 and 2050 to meet rising demand.

Last May, BBSRC published a five-year Wheat Research Strategy, produced by a working group of BBSRC's Food Security Strategy Advisory Panel. The Strategy sets out the key current drivers, opportunities and challenges for delivering impact from existing and future BBSRC investments in wheat-related research.

To help achieve this, the International Wheat Yield Partnership (IWYP) was formally announced in March. It aims to increase the genetic potential of wheat yield by 50% by 2034. BBSRC played a crucial role in setting up the Partnership, with BBSRC Deputy Chief Executive Steve Visscher chairing the IWYP board of founding partners. Alongside BBSRC, the Partnership's initiators include the International Maize and Wheat Improvement Center (CIMMYT), the Secretariat of Agriculture, Livestock, Rural Development, Fisheries and Food of Mexico (SAGARPA) and the United States Agency for International Development (USAID), as the lead implementer of the United States Feed the Future initiative. These organisations will work together with a growing number of private and public funders from across the world.

In July, Rothamsted Research and Syngenta agreed a ground-breaking, £5M scientific research partnership focused on Rothamsted's 20:20 Wheat BBSRC Strategic Programme, which aims to increase wheat productivity to yield 20 tonnes per hectare within 20 years. The partnership aims to translate state-of-the-art scientific knowledge into technologies that will benefit farmers directly, provide support to UK agriculture, contribute to UK economic growth and improve wheat yields worldwide.

Last August, three highly innovative projects received funding from a joint BBSRC and US National Science Foundation scheme to help address global food demand that will need 190 million tons of nitrogen-fertiliser by 2015. Awards totalling \$8.86M were made to three teams of researchers from the UK and US. Projects include using synthetic biology to create new intracellular machines allowing plants to produce fertiliser themselves, and searching the planet for a lost bacterium with special sought after properties.

A new national capability opened last September for researchers studying chicken health and disease. The National Avian Research Facility, based at The Roslin Institute is a £14M facility, supported by BBSRC, the University of Edinburgh, Roslin Foundation and the Wellcome Trust.

In January, Alun Davies, Welsh Government Minister for Natural Resources and Food announced the initiation of Pwllpeiran Upland Research Platform in Ceredigion. The platform will be developed by Aberystwyth University's IBERS, supported by £2.5M investment from BBSRC.

The Platform will represent a unique opportunity to mobilise the resources of IBERS and other UK research providers to find solutions to challenges including: environmentally friendly farming systems; sustainable local food supply chains that allow traceable products of known provenance to be supplied to consumers; and animal production systems that minimise their environmental footprint by incorporating modern innovations in feeding, management and genetics.

In March, seven projects were awarded £7M as part of the multi-disciplinary Tree Health and Plant Biosecurity Initiative (THAPBI), funded under the auspices of the Living With Environmental Change partnership. The projects will generate knowledge to tackle pests and diseases to support the future health of UK woodlands, commercial forests and urban trees.

BBSRC continues to lead the multi-funder, multidisciplinary Global Food Security programme (GFS). In November, GFS launched a refreshed strategy at a Parliamentary event to highlight the success of the programme in bringing research funders together to tackle food security challenges.

Other calls and initiatives announced under this strategic priority in 2013-14:

- Last June, BBSRC and the Natural Environment Research Council (NERC) joined forces to offer £4.5M for research into soil ecosystems and their impact on agriculture and food production. ‘Soil and Rhizosphere Interactions for Sustainable Agri-ecosystems’ is the first call for proposals developed through the GFS programme
- Nearly £800K was awarded to East Malling Research and the Sainsbury Laboratory to look at disease resistance in strawberries over five years, with a further £1M from industry
- A €10.5M call to fund research into food security and land-use change was launched in July by the Belmont Forum and the Agriculture, Food Security & Climate Change Joint Programming Initiative (FACCE-JPI), with UK input to this programme coordinated through the Global Food Security programme. Three GFS partners, BBSRC, ESRC and NERC, are providing funding of up to €1.75M for this call, and expect to support UK participation in approximately five to eight projects across both project types
- £13M India-UK collaboration farmed animal health and disease. The fund will address disease that threaten food security in the UK and globally. £6.5M has been awarded by BBSRC with matched funding from India’s Department of Biotechnology (see page 19)
- Researchers from the Moredun Research Institute and Scotland’s Rural College received £700K to develop a project that could lead to an early warning system to identify poor health and welfare in dairy cattle. The BBSRC grant was awarded under its Animal Welfare and Assessment category

■ Scientists at the University of Warwick Crop Centre have launched research to develop the haricot bean (*Phaseolus vulgaris*) as a novel crop for homegrown food production in rotation with conventional field vegetable and cereal crops in the UK.

The haricot bean is a major source of vegetable protein in the British diet that is most commonly eaten smothered in tomato sauce as baked beans. The ingredients for this popular food product are currently imported for canning in the UK. Bean varieties bred for US and Canadian farming have been poorly adapted for growing conditions in the UK. However, climate change in recent decades and advances in genetics research from DNA sequencing technology provide an opportunity to adapt new varieties suitable for haricot bean production by UK growers.

BBSRC is supporting this research with funding for a PhD studentship in food security at the University of Warwick.



Cooked white and red haricot beans surrounded by a variety of UK-grown vegetables.

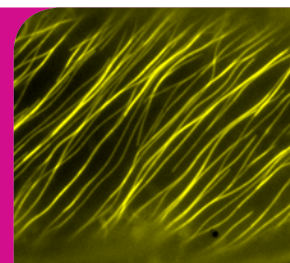
© Eric Holub

■ Scientists from the University of Manchester have discovered an important mechanism in plant cells which regulates the direction that plant cells grow. The finding could have the potential to develop higher yielding crops or increase the size of plants grown for use in biofuels.

The BBSRC-funded team demonstrated how plant cell scaffolds are organised in order to allow the plant cell to grow in particular directions so producing distinct shapes.

Key to this process is the distribution of cellulose, a strong compound which forms much of the plant cell wall. A protein scaffold within the cell, called the microtubule network, dictates the organisation of cellulose in the wall by forming tracks which guide its placement.

The researchers demonstrated that a protein called SPIRAL2 regulates where and when microtubule cutting occurs.



Cell scaffold is essential to plant growth. This image shows a close-up of ordered microtubule networks.

© Raymond Wightman



Industrial Biotechnology and Bioenergy (IBBE)

Following our Strategic Plan refresh, there was an increased emphasis on the broader applications of industrial biotechnology, not just renewable energy, but including chemical feedstocks, industrial raw materials and intermediates, high-value chemicals and biopharmaceuticals.

Alongside this, BBSRC will play a central role in supporting the development of a cohesive industrial biotechnology and bioenergy research community in the UK, which is highly engaged with industry.

As part of BBSRC's priority to position the UK as a recognised centre for IBBE research, two major schemes were launched.

Last December, BBSRC announced 13 unique industry-academia Networks in Industrial Biotechnology and Bioenergy (BBSRC NIBB). The BBSRC NIBB seek to link high quality academic research with business supply chains to develop research projects with the potential to overcome major challenges in the IBBE arena. They also allow new members to come on board with skills that can benefit the group.

The BBSRC NIBB include:

- **Anaerobic Digestion Network** – Professor Charles Banks, University of Southampton, and Professor Orkun Soyer, University of Warwick
- **Crossing biological membranes: engineering the cell-environment interface to improve process efficiency** – Professor Jeff Green, University of Sheffield, and Professor Gavin Thomas, University of York
- **Food Processing Waste and By-Products Utilisation Network (FoodWasteNet)** – Professor Dimitris Charalampopoulos, University of Reading, and Professor Keith Waldron, the Institute of Food Research
- **High Value Chemicals from Plants Network** – Professor Ian Graham, University of York, and Professor Anne Osbourn, the John Innes Centre
- **Metals in Biology: the elements of Biotechnology and Bioenergy** – Professor Nigel Robinson, Durham University, and Professor Martin Warren, University of Kent
- **PHYCONET: unlocking the IB potential of microalgae** – Dr Saul Purton, University College London, and Dr Michele Stanley, SAMS

■ Scientists from Rothamsted Research have shown that a co-product from biodiesel manufacture could be used to protect soil quality for agriculture by reducing nitrate leaching and so improving agricultural sustainability.

An important goal in agricultural sustainability is to establish better management of nitrogen (N) to prevent "leaching" of nitrate (NO₃) out of the soil into water.

The increased demand for food, fuel and fibre in the last decade has increased pressure on agricultural land. A previous criticism of diesel production from oil crops was related to the inefficiency of arable systems (not just energy crops). Much of this inefficiency is due to the production and losses of N fertiliser. This research suggests that biodiesel production could be used to help improve agricultural sustainability by reducing these losses.



© Rothamsted Research

■ An antibiotic has been found to stimulate its own production, a discovery that could make it easier to scale up antibiotic production for commercialisation.

The antibiotic, called planosporicin, is produced by a soil bacterium called *Planomonospora alba*. Scientists from the John Innes Centre discovered that when nutrients become limited, a small amount of the antibiotic is produced which then triggers production throughout the bacterial population.

The researchers used their understanding of how the antibiotic is produced naturally to engineer the bacterium to markedly increase the level of production. Their findings were published in the *Proceedings of the National Academy of Sciences (PNAS)* last June.



© Thinkstock 2013

In January, applications opened for the first Industrial Biotechnology Catalyst, supported by BBSRC, TSB and EPSRC. The first IB Catalyst call will support four major integrated research and development projects involving collaborations between the academic and business communities. The IB Catalyst is modelled on the MRC/TSB Biomedical Catalyst and will encourage major challenge-led research projects derived from the activities of the BBSRC NIBB. The IB Catalyst will allocate funds of up to £45M in the first year, with £20M from BBSRC, £15M from TSB and £10M from EPSRC.

March saw the *International Bioenergy Conference 2014* bring together over 300 researchers from around the world to hear the latest developments in bioenergy science and consider questions relating to the field, including policy, commercialisation and international collaboration. BBSRC joined with other Research Councils and TSB to organise the conference as part of the RCUK Energy programme.

As part of a national dialogue project last May, BBSRC launched a 'bioenergy toolkit' to encourage researchers and the public to engage in a conversation around bioenergy. The toolkit provides a game, future scenario cards and guidelines to help people plan and run dialogue events.

Findings from the BBSRC and Sciencewise Bioenergy Dialogue were published in December, providing useful insights into the hopes, concerns and aspirations of the 162 people who took part across 11 researcher-led events.

Other calls and initiatives announced under this strategic priority in 2013-14:

- In November, up to £3.8M was made available by BBSRC, the Technology Strategy Board (TSB), the Engineering and Physical Sciences Research Council (EPSRC) and the Welsh Government for businesses to develop standard tools and services that will help grow the emerging industry of synthetic biology
- ERA-IB's fifth international joint call for multilateral research projects using IB opened in February. The main purpose is to generate joint European research and development activities as well as to stimulate and unify researchers and academics who specialise in IB to work



Bioscience for Health

Increases in lifespan have not been matched by increases in healthspan, meaning that as people grow older they face a plethora of age-related conditions. This, in turn, has serious societal and economic implications. That is why BBSRC continues to fund a research portfolio to help provide answers to maintaining life-long wellbeing. An important part of this is funding research to provide a better understanding of the mechanisms by which nutrition impacts on development and health.

In March, BBSRC Council endorsed BBSRC's commitment to a new *Food and Health Research Centre* located on Norwich Research Park to provide a step change for food and health research and the translation of benefit to the UK economy and society.

More detailed plans for the Centre will now be developed, including the appointment of architects and contractors. The partners in the Centre (Institute of Food Research, University of East Anglia, the Norfolk and Norwich University Hospital) are committed to developing the concept and investing in the building. BBSRC will make an initial investment to progress the new Centre and work with the partners to secure further capital funding.

To address the technical and scientific challenges associated with translating promising scientific discoveries in regenerative medicine, the MRC with co-funding from BBSRC and EPSRC launched the UK Regenerative Medicine Platform. In 2013-14, £25M was awarded to five 'hubs' to ensure that research addressing regenerative medicine connects seamlessly from discovery science through to clinical and commercial application. BBSRC contributed £5M.

Two Lifelong Health and Wellbeing (LLHW) research centres have been awarded renewed funding. The centres were first set up in 2008 under the cross Research Council and Health Department LLHW partnership. The renewed five-year funding will enable them to continue multidisciplinary ageing research and support capacity building.

The LLHW Centres are:

Centre for Cognitive Ageing and Cognitive Epidemiology, University of Edinburgh – looking at how ageing affects cognition, and how mental ability in youth affects health and longevity.

Centre for Ageing and Vitality, Newcastle University – seeking to understand the mechanisms which underlie human ageing and how these mechanisms are modified by lifestyle interventions.

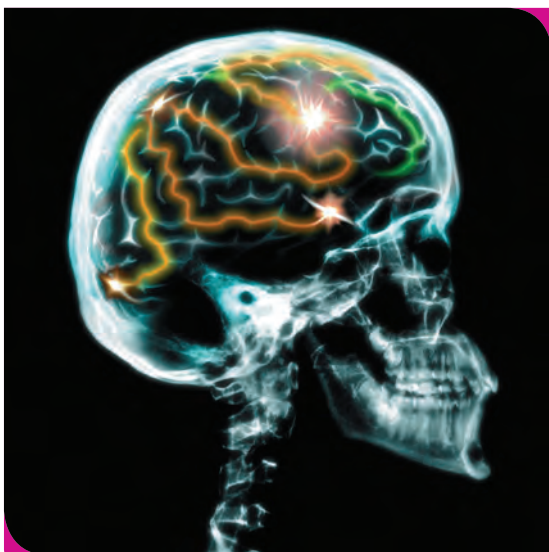
As highlighted in the refreshed strategic plan, BBSRC will also be focussing more on opportunities which support multidisciplinary studies that underpin improvements in both human and animal health and wellbeing.

In January, the first international call for the Joint Programming Initiative on Antimicrobial Resistance was launched. MRC is leading for the UK and BBSRC will contribute on a case by case basis.

BBSRC is sponsoring the development of a UK Veterinary Vaccinology Research Network with £300K being made available over the next five years. The aim of the Network is to foster a multidisciplinary community to enhance the development and uptake of novel tools and technologies as well as to address unmet needs in protective immunity. At a preliminary meeting at the beginning of the year, over 150 people from over 40 institutions expressed interest in joining the network.

Last October, a collaboration between BBSRC, the US National Science Foundation (NSF), National Institutes of Health (NIH) and the US Department of Agriculture National Institute of Food and Agriculture (NIFA) awarded more than \$16M, including £1.45M of BBSRC funding, in Ecology and Evolution of Infectious Diseases (EEID) grants.

© Digital Vision



■ Scientists at Newcastle University have shed new light on how the brain tunes in to relevant information, revealing the interplay of brain chemicals which help us pay attention.

By changing the way neurons respond to external stimuli we improve our perceptual abilities. While these changes can affect the strength of a neuronal response, they can also affect the fidelity of that response. The researchers, funded by the Wellcome Trust and BBSRC, found that the quality of the response is altered by means of glutamate coupling to NMDA receptors (a molecular device that mediates communication between neurons).

The research has implications for our understanding of how our brains work and also gives an insight into conditions such as schizophrenia, Alzheimer's disease and attention deficit disorder.

The 10 projects, which include three US-UK collaborations funded through the EEID programme, will allow scientists to study how large-scale environmental events – such as habitat destruction, invasions of non-native species and pollution – alter the risks of the emergence of viral, parasitic and bacterial diseases in humans and other animals.

Some of the projects will be looking at:

- Disease in complex communities: how multi host, multi pathogen interactions drive infection dynamics
- Understanding the effects of spatial structure on the evolution of virulence in the real world: honeybees and their destructive parasites
- The evolution and spread of virulent infectious diseases

There are many challenges related to health and food security. The UK's strength in animal science is fundamental to both animal health and welfare as well as sustainable food production.

In March, we held a joint community-building workshop with NERC looking at multidisciplinary approaches to fish health and disease research. Aquaculture is a rapidly growing area of global food supplies and an improved understanding of the basic biology and health of farmed fish and shellfish is needed to support the continued development of sustainable production. The workshop was extremely successful with attendees from across the academic community, industry and the devolved administrations. BBSRC and NERC are currently discussing options for a joint activity in this area.

BBSRC has been working alongside organisations from across the bioscience sector to develop a concordat on openness on animal research. It is hoped that the concordat will help the sector build on existing good practice and become more open about animal research in the UK. This will mean that members of the public have access to accurate and up-to-date information about what animal research involves and can debate the issues and make up their own minds.

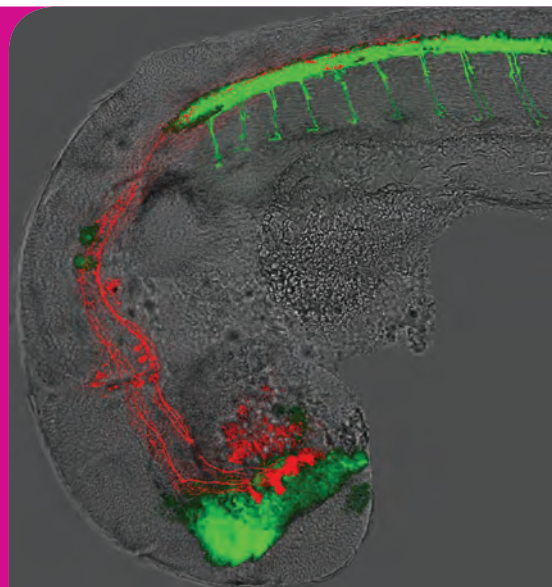
Other calls and initiatives announced under this strategic priority in 2013-14:

- In February, BBSRC, in collaboration with the National Institute of Food and Agriculture (NIFA) and US Department of Agriculture (USDA), announced a joint call for collaborative projects involving researchers from the US and UK in Animal Health and Disease and Veterinary Immune Reagents
- In October, BBSRC agreed to contribute up to £3M to the European Space Agency's (ESA) Life Science Research Using the Human Spaceflight Analogue – Bed Rest. Research into ageing has been identified by BBSRC as one of the key areas of research in the UK which might benefit from this scheme, with ESA's bed rest facilities offering an important tool for addressing questions related to health and wellbeing in an ageing population
- In March, applications were assessed and the funders agreed to support over £18M of research under the Zoonoses and Emerging Livestock Systems: Reducing the Risk to Livestock and People programme. This is a multi-funder partnership between DFID, BBSRC, ESRC, MRC and NERC. BBSRC is contributing around £2M

■ Scientists have found that a key hormone allows young zebrafish to develop and adult fish to replace their motor neurons. The discovery may aid efforts to create neurons from stem cells in the lab, and support further research into Motor Neuron Disease, for which there is still no cure.

The study, led by scientists at the University of Edinburgh's Centre for Neuroregeneration, is the first to show that a signal released from the fish's brain – a hormone called dopamine – triggers the development and regeneration of motor neurons in the fish spinal cord and aids generating motor neurons from human stem cells.

The work also involved researchers from the Universities of Cambridge, Helsinki and the Okazaki Institute for Integrative Biosciences, Japan.



© Becker group, CNR Edinburgh

In a side view of a zebrafish embryo (head at the bottom middle), fibres containing dopamine (red) can be seen to contact stem cells (green) in the spinal cord (top).



Enabling Innovation

BBSRC is working with partners and the research community to maximise the social and economic benefit of the research we fund. This is done through people, partnerships, training, knowledge exchange and translation.

BBSRC supports high-quality PhD training to ensure new researchers develop the necessary breadth of skills that modern bioscience requires.

Through two collaborative training programmes, BBSRC has committed to spending £26.6M to fund 266 PhD studentships. BBSRC has funded 124 Industrial CASE Studentships (iCASE) starting in the academic year 2014-15 at a cost of £12.4M and 142 Industrial CASE Partnership (ICP) studentships allocated over two years will begin in 2014-15 and in the following academic year, at a total cost of £14.2M. Both programmes will give top PhD candidates the chance to conduct research at an academic institution and collaborate with an industrial partner. Students must undertake at least a three-month industrial placement – with partners ranging from large companies to smaller SMEs.

Over the past year, BBSRC has funded eight awards through our Flexible Interchange Programme (FLIP), which supports the movement of people into new environments to exchange knowledge, technology and skills.

Luke Alpey, from The Pirbright Institute, was named BBSRC *Innovator of the Year* 2014, with Queen Mary University of London and King's College London winning BBSRC's *Activating Impact* competition. The two contests form part of BBSRC's *Fostering Innovation* suite of competitions to promote excellence among researchers, knowledge exchange practitioners, departments and institutions by recognising successful approaches to innovation and impact in the biosciences.

© Tim Gander



Professor Luke Alpey won BBSRC's Innovator of the Year title, now in its sixth year, for his work on the genetic control of pest insects (Oxitec Ltd) including the dengue fever-carrying mosquito.

Working in partnership with scientists and research organisations the competitions promote long-term strategies encouraging researchers and their institutions to accelerate the outcomes of world-class bioscience research to tangible economic and social benefits.

Research and Technology Clubs and collaborative initiatives are highly successful in delivering the strategic research and skills needed to drive growth in major industrial sectors. The latest initiative was announced last August – the Horticulture and Potato Initiative (HAPI). BBSRC and the Scottish Government announced nearly £3M for four projects in HAPI under the Global Food Security Programme.

The funded projects are:

- **Controlling dormancy and sprouting in potato and onion** – Dr Glenn Bryan, The James Hutton Institute, Dundee, working with PepsiCo, Albert Bartlett, AHDB-Potato Council, and Mylnefield Research Services
- **Establishing biofumigation as a sustainable pesticide replacement for control of soil-borne pests and pathogens in potato and horticultural crops** – Professor Peter Urwin, University of Leeds, working with Agrii, Biotechnical Solutions Ltd, Hay Farming Ltd, RJ and AE Godfrey, G&D Matthews, Richard Austin Agriculture Ltd, Barworth Agriculture Ltd, Tozer Seeds Ltd, AHDB-Potato Council and Horticultural Development Company (HDC)
- **Exploiting next generation sequencing technologies to understand pathogenicity and resistance in *Fusarium oxysporum*** – Dr John Clarkson, University of Warwick, working with HDC and Nickerson-Zwaan
- **Strategies for integrated deployment of host resistance and fungicides to sustain effective crop protection** – Dr Frank van den Bosch, Rothamsted Research, working with AHDB-Potato Council, Syngenta, Belchim Crop Protection Ltd and BASF AG

The first round of funding for the Animal Health Research Club (ARC) was also announced last year, with £4M awarded to seven projects, all looking to improve the health of farmed animals through combating costly livestock diseases, creating safer vaccines, breeding healthier livestock and investigating immune system interactions.

The grants represent the first round of awards in a five-year partnership between BBSRC, the Scottish Government and a consortium of leading companies from the animal breeding, animal health and farming sectors including Aviagen, BPEX*, Centre for Dairy Information, Cobb, DairyCo*, EBLEX*, Genus, Merial, Moredun Scientific, MSD Animal Health, the Scottish Salmon Producer's Organisation and Zoetis.

The Bioprocessing Research Industry Club (BRIC) held its third skills development school for post-doctoral researchers and students last November, hosted by Eden Biodesign. The course aims to improve commercial awareness and industrially important transferable skills in early-career scientists.

*divisions of the Agriculture and Horticulture Development and Board

BBSRC is continually seeking opportunities to increase the range and depth of interactions with business and exploring opportunities and mechanisms for joint working. One successful partnership model is that of the Rainbow Seed Foundation (RSF), an evergreen early-stage venture capital fund dedicated to kick-starting and catalysing further investment in technology companies. BBSRC is one of the core partners of RSF. A recent economic analysis illustrating the value of the RSF's early-stage investment in tech start-ups to the economy shows that the Fund's investment to date of £7M has already leveraged more than £150M from private investors, has helped create 255 high-tech jobs, £40M of export sales and economic gross value add of £32M.

Policy makers are important end users of the research we fund. BBSRC has a responsibility to ensure that they are aware of the outcomes of the research we fund to maximise economic and social potential.

During 2013-14 BBSRC provided written evidence to 11 parliamentary select committee inquiries, as well as providing input into several reviews including the Department for Transport's call for evidence on Advanced Fuels, Defra's Future of Farming Review and Sir Andrew Witty's review of Universities and Growth.

BBSRC also provided oral evidence to the House of Commons EFRA Committee Inquiry on Food Security and responded to 19 Parliamentary Questions and 29 Freedom of Information requests.

Other calls and initiatives announced under this theme in 2013-14:

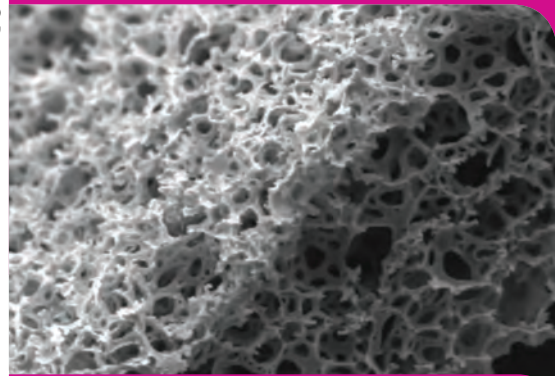
- Up to £3.8M has been made available for businesses by BBSRC, the TSB, EPSRC and the Welsh Government. The money is to encourage the development of standard tools and services that will help grow the emerging industry of synthetic biology

- Technology developed from BBSRC-funded research will be used in experiments on board the International Space Station, in orbit 150 miles above the Earth.

Alvetex® Scaffold technology, produced by Durham University spin-out company Reinnervate, allows cells to be grown in three dimensions (3D), overcoming problems with two-dimensional (2D) culture methods and offering a more life-like model of how cell populations grow in tissues.

Now a team from Massachusetts General Hospital, investigating bone loss during bed rest, in microgravity or through diseases such as osteoporosis, has received funding from the US National Institutes of Health and NASA to perform an experiment with bone cells using Alvetex® Scaffold on the space station in 2014.

© Reinnervate

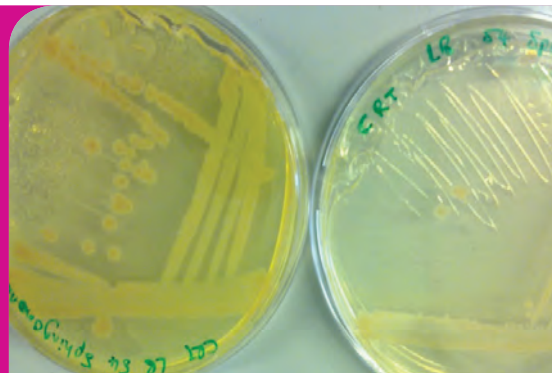


Scanning electron microscope (SEM) image of Reinnervate's 3D cell culture scaffold Alvetex®

- A Knowledge Transfer Partnership (KTP) announced last November between Biome Bioplastics and the University of Warwick will help accelerate the commercialisation of industrial biotechnology research.

As a leading developer of natural plastics, Biome Bioplastics is conducting pioneering research in the field of industrial biotechnology aimed at significantly improving the costs, functionality and performance of bio-based polymers.

The KTP is supported by BBSRC and TSB with funding of £164,000 to support a Postdoctoral Associate's work to transfer knowledge and expertise of lignin degradation, a waste product of the pulp and paper industry.



© Tim Bugg, University of Warwick

One of the bacterial strains being used in the project (*Sphingobacterium* T2), sprayed with nitrated lignin, showing the production of coloured metabolites.



Exploiting New Ways of Working

Biological discovery is increasingly being driven by ground-breaking technologies, which in turn generate massive and complex datasets which researchers need to be able to access. To meet this growing need, BBSRC is strengthening its investments in bioinformatics and biological resources.

BBSRC commitment to 'Big Data' is exemplified by our contribution to the funding of ELIXIR – a pan-European infrastructure for the sharing and analysis of biological data. The aim of ELIXIR (European Life-Science Infrastructure for Biological Information) is to coordinate bioinformatics activities throughout Europe in order to increase the availability and uptake of biological data in commercial and non-commercial R&D.

In October, the European Bioinformatics Institute's new South Building was opened, which will house the ELIXIR directorate. The new facilities will enable researchers throughout Europe to remain competitive in this expanding area, and will secure the UK's position at the forefront of bioinformatics.

The South Building was funded through a Large Facilities Capital Fund grant via the UK Research Councils, led by BBSRC. This financing also supports technical infrastructure and equipment, which enables the European Molecular Biology Laboratory-EBI to increase its capacity in data handling and storage.

In December, ELIXIR became an independent legal entity, following ratification of the ELIXIR Consortium Agreement by five countries. BBSRC, on behalf of the UK, was the first organisation to sign up to the agreement. The agreement will enable ELIXIR to manage, and make the most of, the vast quantities of molecular information generated through bioscience research and maximise the impact of this big data in medicine, agriculture and the environment through the creation of a sustainable data infrastructure.

Data sharing and mass collaboration are 21st century approaches to bioscience. Exploiting information-rich approaches is essential to maintaining the UK's competitive position. BBSRC is committed to ensuring that the publically funded research we support is accessible to the widest possible audience at the earliest stage.

Last June, just two months after receiving the first samples from 'tree 35' one of the few trees to survive Ash Dieback in Denmark, researchers from TGAC, generated the first sequence data. Working in collaboration with the JIC and The Sainsbury Laboratory, the data is available for analysis on the crowdsourcing site OpenAshDieBack.

And last November, within two weeks of being published in *BMC Genomics*, research from IFR which produced a new map of the *Campylobacter* genome, received a 'highly accessed' accolade, an indication of its value to the *Campylobacter* research community around the world.

Working alongside the other Research Councils, BBSRC continues to strive to improve access to the rich-data sets generated from its funded research.

In April last year, RCUK published a revised Open Access Policy, which includes the expectation that all publically funded research will be open access. In conjunction with other Research Councils, BBSRC also revised its funding for open access publication costs. From April last year, funding has been made available through block grants to institutions.

In December, RCUK launched *Gateway to Research* – a web-based portal that gives businesses access to more than 42,000 research projects supported across all seven UK Research Councils and the TSB in a single website. This is already providing useful information for interested companies and other organisations.

© EBI



EMBL-EBI delivers world-leading, freely available data on genes and other molecules to researchers in industry and academia. The new building will house EMBL-EBI staff; an industry and translation suite offering space for collaboration with industry partners in the spheres of pharma, agribusiness, biotech and consumer goods; and the directorate and technical staff of the ELIXIR Technical Hub.

BBSRC plays a crucial role in funding new and emerging technologies, methodologies and resources. One emerging area where such new technologies are being developed is synthetic biology.

In January, BBSRC and EPSRC announced three new multidisciplinary synthetic biology research centres alongside an investment of £40M. The centres are:

- **Bristol Centre for Synthetic Biology (BrisSynBio)** – led by Professor Dek Woolfson. This £13M Centre will bring together scientists from a range of different research backgrounds to develop new techniques, technologies and reagents that will allow biologically-based products to be more easily, quickly and cheaply produced, and in sufficient quantities to make them useful
- **Synthetic Biology Research Centre Nottingham (SBRC Nottingham)** – led by Professor Nigel Minton. This £14.3M Centre will provide sustainable routes to important chemicals. The team will use synthetic biology to engineer microorganisms that can be used to manufacture the molecules and fuels that modern society needs in a cleaner, greener way
- **OpenPlant Synthetic Biology Research Centre** – led by Professor David Baulcombe and Dr Jim Haseloff at the University of Cambridge and Professors Dale Sanders and Anne Osbourn at the JIC. This £12M collaboration will develop technologies for plant synthetic biology by establishing internationally-linked DNA registries for sharing information about plant-specific parts and simple test beds

In November, entrepreneurial scientists in the synthetic biology space benefited from a £10M investment to help technology start-up companies develop new synthetic biology tools and services from publically funded research. The synthetic biology fund will be managed by private investment specialists Midven through its association with the Rainbow Seed Fund. BBSRC's investment is in response to the 2012 Synthetic Biology Roadmap, which sets out plans to harness opportunities in this area.

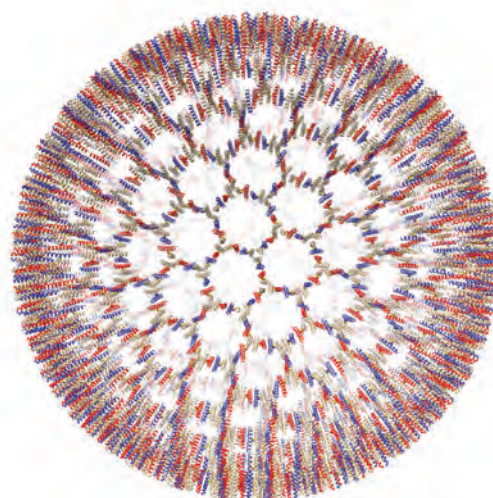
Other calls and initiatives announced under this theme in 2013-14:

- BBSRC, the Wellcome Trust and the MRC granted £15.6M for a new imaging centre for biology at Diamond Light Source. It will operate like a beamline and, although not connected to the powerful synchrotron light source, it will complement and synergise with Diamond's current capabilities
- In December, BBSRC invested £10M in advanced scientific research instruments. The 20 grants from the BBSRC Advanced Life Sciences Research Technologies Initiative (ALERT13) represent the first major equipment purchasing grant scheme from BBSRC since 2007
- BBSRC and the MRC awarded £1.43M for a suite of software that allows scientists to determine the 3D structure of molecules. CCP4 is a world leading X-ray crystallography software resource based at the Research Complex at Harwell. Seven of the eight CCP4 projects were funded by BBSRC with MRC funding the eighth

■ Scientists from the University of Bristol have developed a new type of nanoparticle with potential applications in chemistry, biology and medicine. The findings, published in *Science* in April 2013, could potentially be used to deliver bioactive molecules, such as drugs, to cells and eventually diseased tissues in the body.

The multidisciplinary team of researchers described how small protein molecules, known as peptides, can be designed from scratch to deliver a toolkit for constructing more-complex structures and materials.

The team used parts from the toolkit to make larger hexagonal protein assemblies, which then piece themselves together to make protein sheets, resembling the pattern of hexagons in chicken wire. In turn, this molecular mesh folds over on itself to form nanoscale cages.



Molecular models for protein nanocages (SAGEs) designed by the Woolfson group, Bristol

© Image courtesy of Richard Sessions, Thom Sharp, Jordan Fletcher and Dek Woolfson.



Partnerships

BBSRC is increasing its focus on the internationalisation of research and creating the environment in which UK strengths in bioscience can be exploited and expanded to meet both national needs and global challenges.

The International Relations Unit has been strengthened and international aspects are being integrated into all of our key programmes.

The eight BBSRC strategically funded institutes independently formed a new alliance last June called the National Institutes of Bioscience. A key element of this alliance will be an increasingly collective approach to representing institute capability globally.

BBSRC has run three joint calls with the Indian Department of Biotechnology (DBT) across two of our strategic priority areas. In November, BBSRC awarded £6.5M, with matched funding from India's Department of Biotechnology (DBT), to projects tackling major livestock diseases threatening food security in the UK and globally. Projects funded through the Farmed Animal Health and Disease fund include:

- **An effective vaccination programme for the eradication of foot-and-mouth disease from India**
David Paton, The Pirbright Institute, and Bramhadev Pattnaik, Indian Council of Agricultural Research
- **Identification of the molecular basis of differential host responses to rapidly evolving avian influenza viruses in different avian species**
David Burt, The Roslin Institute, and Anamika Mishra, High Security Animal Disease Laboratory, IVRI, Bhopal
- **Development of recombinant BCG vaccine and complementary diagnostics for TB control in cattle**
Johnjoe McFadden, University of Surrey, and V. Maroudam, Tamil Nadu Veterinary and Animal Sciences University

BBSRC has committed €3M as a major partner in a new Europe-wide call for research projects in Synthetic Biology. The call was the first from the Synthetic Biology ERA-NET (ERA-SynBio). BBSRC along with 12 other EraSynBio funding agencies from Europe and the USA will support around €13M of research into this emerging field.

And scientific links between the UK and China in the field of synthetic biology received a boost in October with the announcement of five grants awarded through a Synthetic Biology Partnering Award, co-funded by BBSRC, the Chinese Academy of Sciences (CAS) and EPSRC. £124,000 will be provided by BBSRC and EPSRC with CAS providing matched funding to Chinese researchers.

In September, RCUK and the National Science Foundation (NSF) in the US entered a new groundbreaking agreement designed to help support international research partnerships between the two countries. Under this agreement, BBSRC and the Directorate for Biological Sciences within NSF have launched a two-year pilot opportunity to support UK-US collaborative research projects in the areas of systems biology, data driven bioscience and synthetic biology.

One of BBSRC's fundamental partnerships is with the general public. BBSRC can only continue to fund the exciting, innovative research that it does, if it has public support. It is important to ensure that the work carried out by our bioscience community is accessible, is communicated effectively and in a timely fashion.

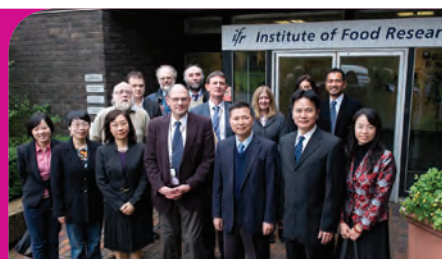
BBSRC's 20th anniversary is a great opportunity to reach a new, younger audience through social media. Therefore, we have created a visually-led, public-facing anniversary blog on Tumblr (see image below), all about the fascinating world of bioscience and how it impacts everyone's daily lives.

The Tumblr blog, set up in February, has already recruited over 2,000 followers, and more than 2,700 people have liked, shared or commented on our posts. These visitors are predominantly aged between 18-34.

- A BBSRC China Partnering Award has allowed the Institute of Food Research (IFR) to build up a fruitful relationship with Chinese scientists, to contribute to reducing the risks of food poisoning.

Foodborne botulism is a serious health concern, causing life-threatening illness and long-term health effects. In the UK, regulators, food companies and researchers have come together to implement robust systems that make outbreaks extremely rare, with no reported deaths for over a decade. In China, however, the incidence of foodborne botulism is much higher and causes a number of deaths.

Possible sources of foodborne botulism are foods containing mushrooms and aquatic products, which are major dietary components in China. With the award, the IFR collaborated with the Shanghai Academy of Agricultural Sciences and Shanghai Ocean University, to investigate mushrooms as a possible source of botulism.



Food safety experts from the Department of Health for Southern China visit the Institute of Food Research

© IFR

BBSRC also supported The Royal Institution 'Life Fantastic' Christmas lectures broadcast on BBC Four, helping to spread the word about bioscience and its potential to 2.2 million viewers.

In the past year, 25 new videos have been uploaded onto BBSRC's dedicated YouTube channel, which has received 614,601 hits in this period and increased our subscribers by nearly 800 on last year's figures.

The BBSRC website is the main channel used to keep the bioscience community, stakeholders and the general public abreast of BBSRC news. The mobile device-friendly layout has been rolled out across BBSRC's website to maximise accessibility. During 2013-14 the website received over 2.6M visitors.

The Twitter feed @BBSRC continues to grow with over 11,000 followers as well as a growing number of BBSRC 'Twitterati', with over 40 BBSRC staff regularly tweeting about their activities.

In the past year, BBSRC has published 352 online articles about BBSRC-funded research and issued 60 press releases to the media, resulting in a monthly average of over 600 news articles in print, online and broadcast channels featuring BBSRC-funded science and initiatives, achieving publicity valued at over £300,000 per month.

Face to face contact is also an important part of BBSRC's communication and engagement programme. Last year, BBSRC had a stand at several events including Cereals, the Oxford Farming Conference and the Big Bang Fair.

To ensure the bioscience community has the skills and confidence to communicate and engage with the public about their research, BBSRC runs specific training courses. Last year, BBSRC ran seven media training days, attended by 115 researchers, and four public engagement training days, attended by 56 researchers.

BBSRC is also committed to seeking the views of stakeholders and the public, specifically around emerging and rapidly evolving areas of bioscience.

Recognising BBSRC's expertise in public engagement, Sciencewise invited BBSRC to develop and deliver a public debate around the Agri-Tech Strategy at last year's Cheltenham Science Festival. Over 40 people attended and concerns raised included the power of supermarkets, environmental impacts and GM technologies.



BBSRC's Tumblr blog developed to reach a new audience

Other calls and initiatives launched under this enabling theme in 2013-14 included:

- Fifty awards were made under the 2013 International Partnering Award calls for collaborations with Brazil, China, Europe, India, Japan, Taiwan, US and other countries. These awards support the development of partnerships between researchers in the UK and overseas, promoting the exchange of scientists, including early career researchers, and to providing access to facilities
- Two new International Partnering Award schemes were announced – the *European Partnering Award* to support consortia-building between UK and EU scientists which led to the development of UK led applications to Horizon 2020 and the *Other Countries Partnering Award* to support partnering activities with any country

■ BBSRC-funded scientists are helping to unravel the genetic code of different rice varieties. Following the successful genome sequencing of 36 lines of traditional Vietnamese rice varieties, the second phase of a joint Vietnam-UK project to characterise the genetic diversity of Vietnamese rice was launched last August in Hanoi.

At the launch, the Director of The Genome Analysis Centre, Dr Mario Caccamo and Group Leader Dr Sarah Ayling joined representatives from the Vietnamese Ministry of Science and Technology, the Vietnamese Ministry of Agriculture and Rural Development, the Agricultural Genetics Institute (AGI), the Vietnam National Seed Cooperation, the Southern Seed Joint Stock Company, Thai Binh Seed Company, representatives of rice research and breeding communities and the British Ambassador to Vietnam.

This second phase will focus on a wider exploration of rice varieties to develop molecular markers for traits associated with climate change and use them for breeding purpose at AGI. In parallel, 600 rice varieties with important traits will be sequenced at TGAC and phenotyped under field conditions in Vietnam.



The launch of the second phase of a joint Vietnam-UK rice project

© TGAC



Reflections

Finally, I would like to thank all the researchers, partners, institutes and BBSRC staff for their dedication, passion and commitment which ensures that UK bioscience remains at the forefront of tackling some of the most pressing and complex problems of tomorrow. In particular, I must thank my predecessor, Professor Douglas Kell, whose leadership and drive over the past five years have put BBSRC and UK bioscience in a strong position going forward. I was therefore very pleased that Doug was awarded a CBE in the New Year's Honours list for his services to science and research.

I would also like to wish Professor Maurice Moloney well in his new role as Group Executive, Food, Health and Life Science Industries for the Commonwealth Scientific and Industrial Research Organisation, following his four years as Director and Chief Executive of Rothamsted Research, where he made a huge contribution.

In his place, I would like to welcome Professor Achim Dobermann who takes up the Directorship in June. He is recognised internationally as an authority on science and technology for food security and sustainable management of the world's major cereal cropping systems.

I was also delighted that Dr Mario Caccamo was formally announced as TGAC's new Director in October, following his time as Acting Director. I am sure that TGAC will go from strength to strength under his leadership.

As BBSRC enters the next 20 years, I am confident that we will continue to realise the potential of UK bioscience. Working together with our partners, research community, stakeholders and the public, I look forward to ensuring that BBSRC continues to pioneer Great British bioscience.

Professor Jackie Hunter

BBSRC Chief Executive
1 July 2014



BBSRC anniversary timeline concertina – to mark its 20th year, BBSRC launched resources to enable the public to explore the impact of bioscience. This includes a timeline that guides the user through BBSRC discoveries such as: the first cloned mammal 'Dolly' the sheep, creating greener fuel from tiny bacteria, and generating new human bone tissue.



Key funding data

BBSRC Comprehensive Spending Review 2010 Allocations

	2011-12 £'000	2012-13 £'000	2013-14 £'000	2014-15 £'000
Programme Resource	370,306	359,471	351,471	351,471
Administration Resource	27,236	26,479	17,488	16,300
Sub Total Resource	397,542	385,950	368,959	367,771
Programme Non-Cash	7,500	7,900	10,100	10,100
Administration Non-Cash	2,431	2,486	2,551	2,618
Sub Total Non-Cash	9,931	10,386	12,651	12,718
Total Resource DEL	407,473	396,336	381,610	380,489
Base Capital Allocation	38,000	29,700	29,700	29,700
Cash Projects	86,000	73,600	82,200	104,700
Total Capital DEL	124,000	103,300	111,900	134,400
Total BBSRC DEL	531,473	499,636	493,510	514,889

Summary of grant applications and success rates

	2010-11	2011-12	2012-13
Number of applications (excluding Fellowships)	1,832	1,469	1,507
Success rate by number (%)	28	30	29
Equivalent success rate by value (%)	26	29	28

Applications and success rates by gender

	2010-11		2011-12		2012-13	
	Male	Female	Male	Female	Male	Female
Project grants	23.0	21.0	29.0	24.0	26.7	22.5
Programme grants	46.7	40.8	53.4	33.3	41.3	33.3
New investigators	23.6	17.5	38.2	24.1	24.2	21.7
Fellowships	7.8 ¹	N/A ²	8.6 ³	6.3 ⁴	5.7 ⁵	6.3

Percentage of female applicants from total applications and from successful applications for peer-reviewed funding

	2010-11		2011-12		2012-13	
	Total	Successful	Total	Successful	Total	Successful
Project grants	21.3	19.8	22.5	20.0	21.9	19.1
Programme grants	18.6	16.7	20.5	13.9	18.0	15.1
New investigators	31.0	25.0	29.9	21.2	25.8	23.8
Fellowships	29.4	N/A ²	31.4	25.0 ⁴	31.45	33.3

¹ In 2010-11 a total of six awards were available, compared to 16 awards in previous sessions

² Fellowships were offered to three female applicants, all of whom declined

³ In 2011-12 a total of four awards were available

⁴ Fellowships were offered to two female applicants, one of whom declined

⁵ In 2012-13 a total of five awards were available and two male applicants declined awards

BBSRC Funding to Funded Institutes in 2013-14 (£M)

Institute	BBSRC Strategic Grants	BBSRC Other Funding	BBSRC Capital Funding	Total BBSRC Funding
Babraham Institute (BI)	12.5	5.8	10.5	28.8
Pirbright Institute (PI) ⁶	14.2	8.7	21.4	44.3
Institute of Food Research (IFR)	9.5	3.0	5.4	17.9
John Innes Centre (JIC)	13.9	12.7	6.7	33.3
Rothamsted Research (RRes)	13.8	10.9	8.2	32.9
The Genome Analysis Centre (TGAC)	6.3	0.7	0.4	7.4
Roslin Institute at the University of Edinburgh (RI) ⁷	7.7	0.2	0.8	8.7
Institute of Biological, Environmental and Rural Sciences at Aberystwyth University (IBERS) ⁷	4.4	0.3	5.8	10.5
2013-14 Totals	82.3	42.3	59.1	183.8
2012-13 Totals	80.8	35.2	84.6	200.6

Top 25 Universities by Grant Funding

2013-14		2012-13	
University	£M	University	£M
1 The University of Manchester	18.14	1 The University of Manchester	17.51
2 University of Cambridge	16.49	2 University of Cambridge	14.89
3 University College London	12.34	3 The University of Edinburgh ⁸	13.41
4 University of Nottingham	12.17	4 University College London	12.52
5 The University of Edinburgh ⁸	11.54	5 Imperial College London	11.66
6 Imperial College London	10.77	6 University of Nottingham	11.46
7 University of Oxford	10.40	7 University of Oxford	10.65
8 University of Glasgow	9.08	8 University of Bristol	8.42
9 University of Bristol	8.51	9 University of Glasgow	6.89
10 University of Warwick	7.61	10 University of Warwick	6.85
11 University of Sheffield	6.24	11 University of Sheffield	5.74
12 King's College London	6.19	12 Newcastle University	5.52
13 Newcastle University	5.67	13 University of Leeds	5.40
14 University of Liverpool	5.42	14 King's College London	5.24
15 University of Leeds	5.38	15 University of Liverpool	5.08
16 University of Exeter	5.20	16 University of Birmingham	4.43
17 University of York	4.47	17 University of Dundee	4.21
18 University of Dundee	4.30	18 University of East Anglia	3.90
19 University of Birmingham	3.93	19 Cardiff University	3.82
20 Cardiff University	3.58	20 University of Exeter	3.78
21 University of Reading	3.36	21 University of York	3.71
22 Royal Veterinary College	3.23	22 Royal Veterinary College	3.68
23 University of East Anglia	3.18	23 University of Aberdeen	3.57
24 University of Southampton	3.16	24 University of Southampton	3.38
25 University of St Andrews	3.11	25 University of St Andrews	2.71

⁸ Two BBSRC funded institutes, the Institute of Biological, Environmental and Rural Sciences (IBERS) and the Roslin Institute (RI) are now embedded in Aberystwyth University and the University of Edinburgh respectively. Core Strategic Grants of £4.4M (2012-13 £4.4M) to IBERS and £7.7M (2012-13 £7.6M) to RI are excluded from the "Top 25 Universities by Grant Funding"

An analysis of research funding can be found in note 2 of the Accounts.

⁶ Formerly the Institute for Animal Health (IAH)

⁷ Two BBSRC funded institutes, Roslin Institute and the Institute of Biological, Environmental and Rural Sciences, are embedded in the University of Edinburgh and Aberystwyth University respectively. Competitive Research Grant funding, provided under the 'Other Funding' category is provided direct to the Universities and not include here.



Corporate information

Governance

BBSRC is an independent non-departmental public body of the Department for Business, Innovation and Skills (BIS), established by Royal Charter. BBSRC's working relationship and lines of accountability with its sponsor department BIS are defined through a Management Statement and Financial Memorandum, which are subject to periodic review.

BBSRC's Chief Executive, in her role as Accounting Officer, is accountable to the public via Parliament. Parliament monitors and influences BBSRC's work through its Select Committees and the Parliamentary Ombudsman.

Council

The Governance Statement in the Accounts describes the role of Council within BBSRC's governance framework and provides information about Council's membership, performance and attendance. Information about Council's Boards is also contained within the Governance Statement. More information about Council can be found at: www.bbsrc.ac.uk/organisation/structures/council

Note 25 in the Accounts contains details of related party transactions. Registers of interest for Council, Boards and Committees can be found at: www.bbsrc.ac.uk/web/FILES/Conflicts/council_conflicts.pdf

Panels and Committees

BBSRC's strategy advisory structure comprises the panels listed below. Membership can be found on BBSRC's website at: www.bbsrc.ac.uk/organisation/structures/panels

- ▶ Bioscience for Health Strategy Advisory Panel
- ▶ Bioscience for Industry Strategy Panel
- ▶ Bioscience for Society Strategy Panel
- ▶ Bioscience Skills and Careers Strategy Panel
- ▶ Exploiting New Ways of Working Strategy Advisory Panel
- ▶ Food Security Strategy Advisory Panel
- ▶ Industrial Biotechnology and Bioenergy Strategy Advisory Panel
- ▶ Integrative and Systems Biology Panel
- ▶ Research Advisory Panel

BBSRC has a number of committees which assess applications for responsive mode grant funding and assess studentship and fellowship applications. BBSRC's committees are listed below and membership can be found on BBSRC's website at: www.bbsrc.ac.uk/organisation/structures/committees. A list of members in BBSRC's peer review and strategy pool of experts is also available at this webpage.

- ▶ Committee A – animal disease, health and welfare
- ▶ Committee B – plants, microbes, food and sustainability
- ▶ Committee C – genes, development and STEM approaches to biology
- ▶ Committee D – molecules, cells and industrial biotechnology
- ▶ Committee E – fellowships and other personal awards

Organisational developments

Efficiency programme

As set out as part of the 2010 spending review settlement, the Research Councils have begun implementation of an efficiency programme to drive down the costs and overheads associated with research. The efficiency savings derived from this programme are being re-invested in research.

In the spring of 2011 RCUK published *Efficiency 2011-15: Ensuring Excellence with Impact* describing how the Research Councils would implement the recommendations in Sir William Wakeham's report *Financial Sustainability and Efficiency in Full Economic Costing of Research in UK Higher Education Institutions*. The efficiency savings are being applied to both research grants and fellowships awarded via competitive route to Research Organisations and also to Research Council institutes. The combined savings for the first two years of the programme (2011-12 and 2012-13) have exceeded the planned £30.5 million and £82.2 million targets with details provided in the programme's annual report at http://www.rcuk.ac.uk/RCUK-prod/assets/documents/documents/RCUK_Efficiency_Savings_Report_2012-13.pdf The combined saving for the third year (2013-14) are planned to be £138.5 million rising over the four year Spending Review period to reach a total of £428 million over the full period.

Alongside these measures the Research Councils also introduced changes to the requests for equipment on grants, including asking applicants to demonstrate how the usage of the equipment will be maximised. RCUK is currently working with university partners to develop options to promote and assist equipment sharing, including exploring the issues around asset registers. There is good anecdotal evidence of significant progress by universities to promote sharing, and of very efficient usage of large pieces of experimental equipment.

Staff report

On 1 April 2014, there were 1580 BBSRC employees in institutes funded by BBSRC and in the BBSRC Office, compared to 1582 on 1 April 2013. Of the 1580 staff, 1230 were based at BBSRC strategically-funded institutes and 350 were based in BBSRC Office (which includes staff in Joint Service Units which BBSRC hosts on behalf of all of the Research Councils). As at 1 April 2014, 633 of the BBSRC-employed staff were in the science category, which represents 40.1% of all BBSRC staff. 26% of BBSRC employees in senior posts (pay bands PC1-F) are female. The comparable figure for 2012-13 was 26%.

Under revised governance arrangements for BBSRC strategically-funded institutes, existing BBSRC staff at institutes remain BBSRC employees working under a deployment agreement. These staff will therefore continue to be included in BBSRC data; however, staff employed locally by institutes on different terms and conditions will be excluded from BBSRC statistics.

BBSRC's employment policies, strategies and guidance are set out in the BBSRC Employment Code, which can be found on our website: www.bbsrc.ac.uk/organisation/policies/employment/code-index.aspx

Employee engagement

BBSRC has active employee engagement and during 2013-14 has progressed a number of continuous improvement activities such as:

- In October 2013 BBSRC participated in the Civil Service People Survey achieving a 69% engagement index, which benchmarks at +8% against other high performing units completing the survey. BBSRC has consistently been viewed as a good employer, reported as being fair and inclusive, and well led and managed with regards to its strategic direction. Employees view their work as interesting and are reporting to be sufficiently challenged
- Overall line management is described as very effective; employees report receiving feedback on their work and reflect that a job well done is recognised. There are challenges which Executive Group continue to work on around leadership and managing change, career development and career progression, but in general there is strong evidence of much positivity around employee engagement and working for BBSRC
- BBSRC will seek reaccreditation of the Investors in People award. Since accreditation in November 2012, the BBSRC Office Employee Group have been undertaking a number of internal reviews against the Investors in People standards to ensure that BBSRC continues to meet the standard requirement. Reaccreditation is due in November 2014. The Employee Group has also been actively engaged in the development of core values as reflected elsewhere in this report

Learning and Development

BBSRC continues to offer a mature provision of learning and development activities through a number of modules, and includes in excess of 75% of training courses accessed through the RCUK core catalogue delivered by UK Shared Business Services. In addition to the core suite of offerings, BBSRC also sponsors a number of 'high value' awards, including professional accreditation and other recognised qualifications, which have included a Post-Graduate Certificate in Science Communication and a CIPD Diploma in HR management. These are considered though an open competition on a bi-annual basis where individual cases are evaluated to ensure consistency and effective training budget spend; return on investment is monitored. BBSRC also continues to develop strategic management and leadership capability through the current programmes including a targeted senior leadership programme. The BBSRC Office responses to the 2014 Civil Service People Survey reflected a 77% positive response from staff concerning their ability to access the right learning & development opportunities.

Diversity and Equality

BBSRC recognises that diversity drives innovation and creativity. BBSRC's commitment to Equality and Diversity is much more than a standard business case or as a means to fulfil our obligations as a public body under the Equality Act 2010; it is embedded in the way we operate within BBSRC and the way we work with our partners and stakeholders.

BBSRC has recently evaluated and reviewed a number of internal processes to ensure that they are designed to be sensitive to the different needs and cultures that exist within the academic community and also reflect the variety of mechanisms employed to support different types of research.

As an employer, BBSRC continues to work to create an inclusive culture in order to attract, develop and retain high quality staff from different backgrounds. In addition BBSRC is working alongside the other Research Councils to identify ways of increasing diversity on external boards.

Health and Safety, Biosafety and Security

BBSRC carries out a wide range of activities, some of which involve risks that are new, or unpredictable. We cannot provide a totally risk-free environment. We can, however, strive to ensure that we all make well-informed decisions, and are responsible and considerate about the risks we encounter at work. We aspire to excellence in health, safety biosafety and security management.

The priorities for the Health, Safety, Biosafety and Security team are to continue to manage and monitor our risks in a way which supports our overall mission.

We will:

- maintain and develop our health and safety management system – we are currently reviewing and updating the BBSRC Health and Safety policies and associated guidance to ensure compliance with statutory requirements and to promote best practice. This means we are able to support science and business needs in a timely manner
- ensure we take a whole system approach and help everyone in our organisation understand their role in improving health, safety, biosafety and security, which enables us to work collaboratively
- develop new ways to establish and maintain an effective health, safety and security culture in a changing economy, so that everyone is fully involved and risks are properly managed. The delivery of high quality training to maintain and enhance health and safety competence remains a priority
- proactively work in partnership with other organisations, particularly other Research Councils, learning from others and sharing our own experience. This has included joint training events, a joint security conference and the production of a joint Security Policy
- set standards, benchmarking processes and bring independent professional oversight through the HSBS Audit, so that we can control and mitigate risks, providing assurance to the Chief Executive and Accounting Officer
- continue to address new and emerging work-related health issues. This includes wellbeing. In 2013/14 BBSRC received recognition for demonstrating exemplary leadership in increasing mental health knowledge in our community

It is a legal requirement to report certain incidents and ill health at work, as set out in the table below.

Annual Occurrence Reportable Incident Category (defined as in RIDDOR 1995)	2013-14	2012-13	2011-12
Contact with moving machinery or material being machined	1	0	0
Hit by a moving, flying or falling object	0	0	0
Hit by a moving vehicle	0	0	0
Hit by something fixed or stationary	0	1	2
Injured while handling, lifting or carrying	2	0	3
Slipped, tripped or fell on the same level	2	3	4 (including 1 visitor)
Fell from a height	0	1	0
Trapped by something collapsing	0	0	0
Drowned or asphyxiated	0	0	0
Exposed to, or in contact with, a harmful substance	0	0	0
Exposed to fire	0	0	0
Exposed to an explosion	0	0	0
Contact with electricity or an electrical discharge	0	0	0
Injured by an animal	0	0	4
Physically assaulted by a person	0	0	0
Another kind of accident	2	1	3
Total accidents	7	6	17 (including 1 visitor)
Cases of occupational disease	0	2	0
Dangerous occurrence	0	1	1
Overall total	7	9	18

Sickness absence: BBSRC office (including BITS)	2013-14	2012-13	2011-12
Total days of absence	2140	1526	1778
Frequency of absences lasting longer than 28 days	12	23	9
Total days of long-term sickness	933	536	594
Average days of sick absence per person at BBSRC Swindon Office	6.11	5.29	5.93

Protected personal data related incidents

BBSRC recognises and fully supports the need for effective information governance in protecting its information and the information entrusted to it in the course of its business. Compliance with data protection law is taken very seriously and as such, BBSRC provides all employees with annual basic training on their responsibilities. BBSRC continues to monitor and assess its information risks in order to identify and address any weaknesses, and ensure continuous improvements of its systems and procedures.

There have been no personal data related incidents in 2013-14 requiring reporting to the Information Commissioner's Office.

TABLE 1: SUMMARY OF PROTECTED PERSONAL DATA RELATED INCIDENTS FORMALLY REPORTED TO THE INFORMATION COMMISSIONERS OFFICE IN 2013-14

Statement on Information risk	<ul style="list-style-type: none"> - All staff have been provided with Information Governance and Data Protection Awareness training, either through new starter inductions or annual refresher training. - Audits of BBSRC on the following areas were carried out in 2013-14 by Research Councils Audit and Assurance Group and received substantial assurance: <ul style="list-style-type: none"> • use of personal data; • subject access request processing; and • data security. - Privacy Impact Assessments are routinely carried out on new systems to ensure that BBSRC remains compliant with data protection legislation and put in necessary security controls. - Data Sharing Agreements are routinely implemented as and when BBSRC is required to share data with other organisations. - New Government Classification Policy and staff guidance introduced March 2014. 			
Date of incident (month)	Nature of incident	Nature of data involved	Number of people potentially affected	Notification Steps
None	0	0	0	0
Further action on information risk	Revision of the Data Protection Policy is in progress. Revision of the Retention Schedule is in progress.			

TABLE 2: SUMMARY OF OTHER PROTECTED PERSONAL DATA RELATED INCIDENTS IN 2013-14

Incidents deemed by the Data Controller not to fall within the criteria for report to the Information Commissioner's office but recorded centrally within the Department

Category	Nature of incident	Total
I	Loss of inadequately protected electronic equipment, devices or paper documents from secured Government premises	0
II	Loss of inadequately protected electronic equipment, devices or paper documents from outside secured Government premises	0
III	Insecure disposal of inadequately protected electronic equipment, devices or paper documents	0
IV	Unauthorised disclosure	0
V	Other	3

TABLE 3: YEAR-ON-YEAR TOTAL NUMBERS OF PROTECTED PERSONAL DATA RELATED INCIDENTS PRIOR TO 2013-14

Total number of protected personal data related incidents formally reported to the Information Commissioner's Office, by category number.							Total number of other protected personal data related incidents by category number.						
	I	II	III	IV	V	Total		I	II	III	IV	V	Total
2013-14	0	0	0	0	0	0	2013-14	0	0	0	0	3	3
2012-13	0	0	0	0	0	0	2012-13	0	0	0	1	0	1
2011-12	0	0	0	0	0	0	2011-12	0	0	0	1	0	1
2010-09	0	0	0	0	0	0	2010-11	0	6	0	2	1	9

Public Sector Information Holder

BBSRC does not sell data and therefore is not making a statement with regard to the requirements set out in HM Treasury and Office of Public Sector Information guidance.

Sustainability

Environmental policy

BBSRC has formalised and strengthened its corporate Environmental policy which confirms its commitment to promote environmental best practice. Energy efficiency is an important element of the policy.

BBSRC funded institutes occupying BBSRC sites have fully supported the corporate Environmental policy and have formulated their individual environmental policies, specific to their own activities, to reflect the framework of the BBSRC policy. Specifically BBSRC is committed to:

- Understanding its environmental impacts, including the direct environmental impacts of the research that it sponsors. It requires recipients of BBSRC funding to monitor and minimise any adverse impacts on the environment and local communities
- Compliance with relevant environmental legislation, and, where appropriate, adoption of current standards of best practice
- Continual development of objectives and targets to reduce environmental impacts through the application of realistic, measurable and achievable performance indicators
- The efficient use of energy and natural resources, minimising waste and encouraging effective re-use and recycling
- Minimising the environmental impacts of new buildings and structures through good specification and design whilst supporting their primary function
- Working with suppliers and contractors to promote approaches to supply chain management and product sourcing that minimise adverse environmental impacts
- Raising awareness and training staff in best practice in order to ensure effective resource management
- Raising awareness and maintaining dialogue with external stakeholders, including commercial and domestic tenants, contractors, suppliers, local communities, local authorities and other organisations, to identify key environmental issues and to ensure standards of best practice on site
- Regularly reviewing its environmental impacts and environmental management practices

Energy policy

BBSRC is committed to reducing energy consumption to the lowest practical level, commensurate with the realistic needs of the research programme. The policy commitments are:-

- To promote best practice in energy and environmental conservation and to implement strategies to reduce energy consumption and cost
- To promote energy and environmental conservation and to encourage all staff to be efficient with their use of energy
- To ensure, as far as possible, that new buildings, plant and equipment are designed to provide for a high but cost effective standard of energy and environmental conservation
- To implement energy efficient capital schemes at institute sites
- To adopt energy purchasing strategies to achieve the best prices from the marketplace and to seek opportunities for purchasing renewable energy
- To measure and reduce carbon emissions

Environmental management and implementation

Research Councils UK (RCUK), the body that hosts the seven research councils within Polaris House, has been awarded and implements an Environmental Management system (EMS) via ISO 14001.

BBSRC is active in promoting and supporting its associated Institutes in attaining accreditation for Environmental Management systems under ISO 14001; Rothamsted Research at Harpenden has been awarded ISO 14001.

The environmental impact, together with the monitoring and usage of resources within Polaris House is managed by the Joint Building Operations Services (JBOS) which has set a target of reducing to five per cent, waste disposal to landfill by 2014. It is hoped that this target will be met in 2013-14 as all food waste has been diverted from landfill to a composting site. However, reporting on the actual quantities of waste disposal will not be available until after the publication of this document.

JBOS has continued to implement and integrate energy saving and Carbon reducing technologies into the building systems. There are various technologies available for future consideration, such as: -

- ▶ Photo Voltaic electrical generation
- ▶ combined heat and power generation
- ▶ free cooling to serve the IT server room
- ▶ installation of low energy lighting
- ▶ bore hole water supply

The above are technologies that require substantial capital investment, together with extended payback periods that in many cases extend beyond the expected efficient operational life of the integrated components. These technologies require careful examination prior to the commitment of funds to these sizable investments.

As at 31 March 2014, it can be reported that:

- free cooling to the IT server room is now in place
- low energy 'LED' type lighting is being installed within the areas of Polaris House that are undergoing refurbishment
- the installation of photo voltaic panels upon the south-facing roof of Polaris House is being considered via a Government-wide funding initiative

Sustainability

BBSRC is fully committed to a programme of review and reduction in the use of energy, finite resources and waste disposal.

The majority of BBSRC's Carbon emissions emanate from the use of mains supplied electricity within its' head office, Polaris House, and it is this resource that when targeted with energy saving technologies will return the highest level of reductions.

Financial review

- In 2013-14 BBSRC had a working budget of £494M (£500M in 2012-13), comprising £382M resource and £112M capital. Resource fell against the previous year due to: (i) BBSRC's restructuring funding from BIS coming to an end, representing a reduction of £8M; and (ii) a reduction in administration budget of £9M. The capital programme profile for large projects increased by £9M. The table below shows BBSRC's budgetary outturn against allocation

£'000	Resource	Capital	Total
Initial Allocation	381,610	111,900	493,510
Target Outturn	383,610	112,150	495,760
Outturn	384,363	112,149	496,512
Underspend / (overspend)	(753)	1	(752)
Underspend / (overspend) %	(0.20%)	0.00%	(0.15%)

BBSRC's target outturn includes: (i) an additional £250K in Capital relating to an agreed overspend to match an agreed underspend of £250K elsewhere in the BIS family; and (ii) an additional £2M in Resource which relates to an agreed overspend of £2M relating entirely to one specific restructuring item: the classification of the Pirbright Institute.

BBSRC's budget outturn set out in the table above is based on Government budgeting rules as set out in HM Treasury's Consolidated Budgeting Guidance 2013-14 and aligns to the budget results recorded by BIS for BBSRC. It differs to the figures reported in the financial statements.

Programme budget

- During the year, BBSRC spent £432.4M on research and capital grants (compared to £414.7M in 2012-13). The increase in grant expenditure reflects BBSRC's continued commitment to invest in high-quality bioscience research and facilities. An analysis of research funding is included in note 2 to the accounts
- In 2013-14 BBSRC provided £52.3M for training and fellowship awards (compared with £52.3M in 2012-13)
- BBSRC's initial capital allocation for 2013-14 is set out in the table below. As noted above, BBSRC's capital allocation for 2013-14 was supplemented by an agreed overspend of £250K

Capital Budget 2013-14	£'000
Base capital allocation	29,700
Research facilities at the Pirbright Institute	23,000
Research campus development at Babraham and Norwich	13,000
ELIXIR European biological data storage hub	9,000
e-infrastructure	4,200
Synthetic Biology	25,000
Big Data	8,000
TOTAL	111,900

- The first phase of investment at the Pirbright Institute to construct new high containment virology laboratories was successfully completed within target for cost, time and quality during 2013-14. Commissioning and validation works are in progress and should be completed in 2014-15. Work has begun on the second phase
- Capital commitment at 31 March 2014 was £195.2M, £42.0M lower than at 31 March 2013 (£237.2M) for two reasons: (i) several of BBSRC's major capital investment programmes are ending in 2014-15; and (ii) BBSRC has not yet received capital allocations beyond 2015-16, as these will be determined as part of the next comprehensive spending review
- The net book value of BBSRC's tangible fixed asset base increased by £32.0M from £352.2M in 2012-13 to £384.2M in 2013-14
- During the year, a dwelling surplus to requirements at the Compton site was sold for £192K with a loss on disposal of £8K. A further building and associated land that was surplus to requirements at Compton were sold for £3.01M with a profit on disposal of £10K
- Impairments in 2013-14 amounted to £5.61M, compared to £8.9M in 2012-13. The impairments relate to properties on the site leased to the Institute of Food Research

Administration budget

- In 2013-14, BBSRC received an administration allocation of £17.5M (2012-13: £26.1M), a decrease of £8.6M on the previous year. The budget reduction reflects both continuing austerity measures across Government and a change in the funding arrangements for services provided to BBSRC by UK SBS. In previous years, BBSRC's budget included an allocation for BBSRC to pay its share of the UK SBS costs. For 2013-14 onwards, BIS covers BBSRC's share of the UK SBS costs and BBSRC pays only for any extra services provided in the year
- As noted above, BBSRC's administration allocation for 2013-14 was supplemented by an agreed overspend of £2M taking the total to £19.5M, relating specifically to the treatment of the Pirbright Institute

Clear Line of Sight

During 2013-14, BBSRC continued to work within the HM Treasury's 'Clear Line of Sight' accounting environment, which aims to simplify the reporting of public finances, and improve transparency and accountability. As part of this pan-Government initiative BBSRC's parent Department, BIS, has a legal requirement to produce consolidated resource accounts for 2013-14 incorporating the financial results of its partner organisations.

UK Shared Business Services Ltd (UK SBS Ltd)

UK SBS Ltd provides processing services in human resources, procurement, payroll, finance, grants and IT to all seven Research Councils.

Creditor payment policy

BBSRC observes HM Treasury guidance and makes every effort to pay creditors within 5 days of receipt of invoice. Where this is not possible, BBSRC observes the CBI's Prompt Payers' Guide, and adheres to the principles of the Prompt Payers' Code, endeavouring to ensure compliance with the agreed terms of payment of creditors' invoices and to pay them within 30 days of receipt of invoice. During 2013-14, 83.3% of undisputed invoices were paid within 5 working days (82.5% in 2012-13). During 2013-14, 98.9% of undisputed invoices were paid within 30 calendar days (98.5% in 2012-13).

Auditors

BBSRC's Accounts are audited by the Comptroller and Auditor General in accordance with Section 2(2) of the Science and Technology Act 1965. The audit fee for the year was £85,000 (2012-13: £85,000). No non-audit work was performed by the Auditors during the year. In so far as the Accounting Officer is aware, there is no relevant audit information of which BBSRC's auditors are unaware, and the Accounting Officer has taken all the steps that she ought to have taken to make herself aware of any relevant audit information and to establish that the BBSRC's auditors are aware of that information.

Professor Jackie Hunter
Chief Executive and Accounting Officer

Date: 1 July 2014

Remuneration report

Council Chair and Council members except Chief Executive

Policy (unaudited information)

Remuneration rates are the same across the Research Councils. The rates are reviewed each year by the Department for Business, Innovation and Skills (BIS). In considering the new rates, BIS may take into account the increase given to the senior civil service. BIS consults with the Research Councils and the agreed change is implemented in October.

Appointments are non-pensionable and there is no entitlement to compensation for loss of office. No fee is payable in respect of Civil Servants, employees of Research Councils and other Non-Departmental Public Bodies and Agencies.

Remuneration (audited information)

Standard Fee Paid to Council Members (£ per annum)	2013-14	2012-13
Council Chair	16,430	16,430
Council Members who also chair Committees	9,110	9,110
Council Members	6,850	6,850

	Appointments		Remuneration £000s	
	From	To	2013-14	2012-13
Chair – Professor Sir Tom Blundell	01/07/2009	30/06/2015	16	16
Deputy Chair and Chief Executive – Professor Douglas Kell CBE	01/10/2008	20/10/2013	N/A	0
Deputy Chair and Chief Executive – Professor Jackie Hunter CBE	21/10/2013	21/10/2017	N/A	N/A
Professor Sir David Baulcombe FRS	01/04/2009	31/03/2016	7	7
Professor John Coggins FRSE	01/04/2008	31/03/2014	7	9
Professor Anne Dell CBE FRS	01/04/2007	31/03/2014	7	7
Professor Russell Foster FRS	01/04/2011	31/03/2015	7	7
Professor Carole Goble OBE	01/06/2013	31/03/2017	6	N/A
Mr Jim Godfrey OBE	01/04/2009	31/03/2015	7	7
Dr Mike Goosey	01/04/2011	31/03/2015	7	7
Mr David Gregory	01/04/2010	31/03/2018	9	9
Professor Sarah Gurr	01/04/2012	31/03/2016	7	7
Dr David Lawrence	01/04/2008	31/03/2014	7	7
Professor Keith Lindsey	01/04/2010	31/03/2014	9	7
Professor Christopher Pollock CBE	01/04/2008	31/03/2014	7	7
Dr Andrew Richards	01/04/2008	31/03/2014	7	7
Professor David Richardson	01/04/2012	31/03/2016	7	7
Dr John Stageman OBE	01/04/2008	31/03/2014	7	7
Dr Will West	01/04/2011	31/03/2015	7	7
Professor Tim Wheeler	01/04/2012	31/03/2016	0	0

The total emoluments of the Chairman were honoraria of £16,430 (2012-13: £16,430). The Chairman's appointment is non-pensionable and there is no entitlement to compensation for loss of office.

As noted in the policy section above, no fees are payable to Professor Kell or Professor Hunter.

Committee Chairs and Members (unaudited information)

The remuneration of Committee Chairs and Members is set by the Financial Management Group of the Research Councils. Committee remuneration rates are reviewed every two years by the Research Councils' Finance Directors Group. It was decided to maintain the remuneration rates at their current level for 2013-14.

Committee Rates (£ per day)	2013-14	2012-13
Committee Chairman	230	230
Committee Members	170	170

Chief Executive and BBSRC Executive Directors (audited information)

Remuneration Committee

The Chief Executive's remuneration is determined by the Permanent Secretary of the Department for Business, Innovation and Skills. The Permanent Secretary is advised by a Remuneration Committee chaired by the Director General of Research Councils. The Chair of BBSRC Council is consulted.

BBSRC Remuneration Board

The remuneration of BBSRC Executive Directors is reviewed and adjusted annually by the Council Remuneration Board. The Board is chaired by the Chair of Council and other membership comprises the Chief Executive and three Council Members, at least one of whom must have an industry background. Members of the Remuneration Board are listed within the Governance Statement in the Accounts.

Policy

Subject to successful performance, the Chief Executive's salary rises by a cost of living increase and a pre-determined incremental increase up to a salary ceiling. In addition, non-consolidated, non-pensionable annual performance related pay may be awarded for performance towards objectives agreed by BBSRC and the Chief Executive.

The BBSRC Remuneration Board reviews performance against a series of objectives, categorised between fundamental, value-added or breakthrough, in determining each Executive Director's annual salary level and any Performance Related Pay award. The Board will also take account of public sector pay constraints, relativities, job weight and any special factors. Increases are normally awarded from 1 July annually.

Contractual Policy

Professor Douglas Kell was appointed BBSRC Chief Executive on 1 October 2008 on a four year fixed term contract, with the option for extension. Professor Kell's contract was extended to 18 October 2013. Professor Kell was employed with BBSRC for four days a week and throughout his contract he continued to be employed one day a week with the University of Manchester.

Professor Jackie Hunter was appointed BBSRC Chief Executive on 21 October 2013 on a four year fixed term contract, with the option for extension.

BBSRC Executive Directors are members of the BBSRC Executive Group. The Executive Directors are on indefinite contracts, similar to the majority of BBSRC staff, with notice periods of three months. Executive Directors' remuneration for 2013-14 is detailed in the table below. No Executive Director is in receipt of benefits in kind.

Employee Name	Start Date	Expired Term	Notice Period
Paul Burrows	01/07/2009	Open Ended no Expired Term	13 weeks
Celia Caulcott	15/09/2008	Open Ended no Expired Term	13 weeks
Paul Gemmill	15/12/2003	Open Ended no Expired Term	13 weeks
Jackie Hunter	21/10/2013	21 October 2017	3 months
Jan Juillerat	01/03/2012	Open ended no Expired Term	13 weeks
Doug Kell	01/10/2008	20 October 2013	3 months
David Parfrey	01/11/2008	Open ended no Expired Term	13 weeks
Steve Visscher	01/10/2008	Open ended no Expired Term	13 weeks
Melanie Welham	01/10/2012	Open ended no Expired Term	13 weeks

Remuneration of senior employees (audited information)

Single total figure of remuneration								
Executive Directors	Salary (£'000)		Bonus Payments (£'000)		Pension Benefits (£'000)		Total (£'000)	
	2013-14	2012-13	2013-14	2012-13	2013-14	2012-13	2013-14	2012-13
Mr Paul Burrows	85-90	70-75	0-5	0-5	122	75	210-215	150-155
Dr Celia Caulcott	105-110	105-110	5-10	10-15	60	33	170-175	150-155
Mr Paul Gemmill	95-100	95-100	5-10	5-10	24	36	125-130	135-140
Professor Jackie Hunter*	60-65	N/A	0	N/A	N/A	N/A	60-65	N/A
Ms Janet Juillerat	85-90	80-85	0-5	5-10	64	48	155-160	130-135
Professor Douglas Kell**	90-95	130-135	20-25	0-5	18	43	130-135	180-185
Mr David Parfrey	95-100	90-95	5-10	5-10	49	21	150-155	115-120
Mr Steve Visscher	145-150	145-150	10-15	5-10	N/A	N/A	160-165	155-160
Professor Melanie Welham	95-100	45-50	0-5	0	37	19	135-140	65-70

* Professor Jackie Hunter is not a member of the RCPS. Jackie commenced on 21 October 2013. Her first full year equivalent salary is £140,000-£145,000.

** Based on a 4-day week. Douglas worked at BBSRC until 20 October 2013. His full year equivalent salary is £165,000-£170,000.

Salary and Allowances

Salary and allowances covers both pensionable and non-pensionable amounts and includes: gross salaries; performance related pay; over-time; allowances and any ex-gratia payments. It does not include amounts which are a reimbursement of expenses directly incurred in the performance of an individual's duties.

Benefits in Kind

The monetary value of benefits in kind covers any benefits provided by the employer and treated by HM Revenue and Customs as a taxable emolument. There were no benefits in kind for any of the senior management during the year.

Bonuses

Bonuses are based on performance levels attained and are made as part of the appraisal process. Bonuses relate to the performance in the year in which they become payable to the individual. The performance related pay awards reported in 2013-14 relate to performance in 2013-14 and the comparative awards reported for 2012-13 relate to the performance in 2012-13.

Pay Multiples

Reporting bodies are required to disclose the relationship between the remuneration of the highest-paid director in their organisation and the median remuneration of the organisation's workforce.

The banded remuneration of the highest-paid Executive Director in BBSRC in the financial year 2013-14 was £160,000-£165,000 (2012-13: £170,000-£175,000). This was 5.43 times (2012-13: 4.63) the median remuneration of the workforce, which was £29,883 (2012-13: £37,248).

In 2013-14, 1 employee received remuneration in excess of the Chief Executive (2012-13: 0).

Total remuneration includes salary, non-consolidated performance-related pay, benefits-in-kind as well as severance payments. It does not include employer pension contributions and the cash equivalent transfer value of pensions.

Pension benefits

Executive Director	Accrued pension and lump sum at pension age as at 31/03/2014	Real increase in pension and lump sum at pension age	Cash equivalent transfer value as at 31/03/2014	Cash equivalent transfer value as at 31/03/2013	Real increase in cash equivalent transfer value
Mr Paul Burrows	145-150	20-22.5	705	567	99
Dr Celia Caulcott	15-20	2.5-5.0	267	188	29
Mr Paul Gemmill	15-20	0-2.5	340	291	24
Professor Jackie Hunter*	N/A	N/A	N/A	N/A	N/A
Ms Janet Juillerat	30-35	2.5-5.0	436	365	43
Professor Douglas Kell	15-20	0-2.5.0	257	228	12
Mr David Parfrey	20-25	2.5-5.0	347	283	39
Mr Steve Visscher	310-315	N/A	1,694	1,694	N/A
Professor Melanie Welham	0-5	0-2.5	38	12	18

*Professor Jackie Hunter is not a member of the RCPS

Details of pension scheme

The employees of the Council are members of the Research Councils' Pension Schemes (RCPS) which are defined benefit schemes funded from annual grant-in-aid on a pay-as-you-go basis. The benefits are by analogy to the Principal Civil Service Pension Scheme, except that while the schemes provide retirement and related benefits based on final or average emoluments, redundancy and injury benefits are administered and funded by the Council. The scheme is administered by the Research Councils' Joint Superannuation Service with the associated grant-in-aid managed by BBSRC.

From 30 July 2007, employees may be in one of four defined schemes; either a 'final salary' scheme (classic, classic plus or premium); or a career average scheme (nuvos). Pensions payable are increased annually in line with changes in the Retail Prices Index (RPI). Employees' contributions vary between 1.5% and 8.25% depending on scheme. The employer's contribution is agreed by the RCPS Board of Management on the recommendation of the Government Actuary's Department (GAD) and is set at 26.0% of pensionable pay.

As part of the pension reform process, the Government is increasing member contributions to the main public service pension schemes by an average of 3.2% of pay over three years from 2012. The Government has announced the third of these increases to the contribution rates that some civil servants will pay to their Civil Service pension from April 2014. The Research Councils Pension Scheme (RCPS) is a 'by-analogy' scheme to the Principal Civil Service Pension Scheme (PCSPS) and as a result any changes made to the PCSPS, including member contribution rates, are automatically applied to the RCPS.

Members of the classic, premium, classic plus and nuvos schemes will be affected. These increases do not apply to those who earn less than £15,000 (salary and pensionable allowances on a full time equivalent basis).

A table of the increases by pay band and scheme is provided below.

ANNUAL PENSIONABLE Earnings (full-time equivalent basis)	CLASSIC SCHEME		PREMIUM, CLASSIC PLUS AND NUVOS	
	Current Contribution Rate	New 2014 Contribution	Current Contribution Rate	New 2014 Contribution
Up to £15,000	1.50	1.50	3.50	3.50
£15,001 - £21,000	2.70	3.00	4.70	5.00
£21,001 - £30,000	3.88	4.48	5.88	6.48
£30,001 - £50,000	4.67	5.27	6.67	7.27
£50,001 - £60,000	5.46	6.06	7.46	8.06
Over £60,000	6.25	6.85	8.25	8.85

A Partnership Pension Account was made available to new staff from 1 October 2002, based on the portable Stakeholder Pension introduced by the Government in 2001. This is a defined contribution scheme. The employers pay the RCPS 0.8% of pensionable pay to cover death in service and ill health benefits. The employers pay the balance to the employee's private pension provider.

The accrued pension quoted is the pension the member is entitled to receive when they reach pension age or immediately on ceasing to be an active member of the scheme if they are already at or over pensionable age. Pensionable age is 60 for members of classic, classic plus and premium and 65 for members of nuvos.

For further details about the Research Councils Pension Scheme pension arrangements can be found at the website <http://jsspensions.nerc.ac.uk/>

Cash Equivalent Transfer Value (CETV)

A Cash Equivalent Transfer Value (CETV) is the actuarially assessed capitalised value of the pension scheme benefits accrued by a member at a particular point in time. The benefits valued are the member's accrued benefits and any contingent spouse's pension payable from the scheme. A CETV is a payment made by a pension scheme or arrangement when the member leaves a scheme and chooses to transfer the benefits accrued in the former scheme. The pension figures shown relate to the benefits that the individual has accrued as a consequence of their total membership of the pension scheme, not just their service in a senior capacity to which disclosure applies. The CETV figures include the value of any pension benefit in another scheme or arrangement which the individual has transferred to the Research Councils' pension arrangement and for which the RCPS has received a transfer payment commensurate with the additional pension liabilities being assumed. They also include any additional pension benefit accrued to the member as a result of their purchasing additional years of pension service in the scheme at their own cost.

Real increase in the value of the CETV

The real increase in the value of the CETV reflects the increase effectively funded by the employer. It takes account of the increase in accrued pension due to inflation, contributions paid by the employee (including the value of any benefits transferred from another pension scheme or arrangement) and uses common market valuation factors for the start and end of the period.

Compensation for loss of office

There has been no compensation for loss of office of senior managers in 2013-14 or 2012-13.

Professor Jackie Hunter
Chief Executive and Accounting Officer

Date: 1 July 2014

Annual Accounts 2013-2014

Statement of Responsibility of Council and Chief Executive as Accounting Officer

Under Section 2(2) of the Science and Technology Act 1965, the Secretary of State with the consent of HM Treasury has directed BBSRC to prepare for each financial year a statement of accounts in the form and on the basis set out in the Accounts Direction. The accounts are prepared on an accruals basis and must give a true and fair view of the state of affairs of BBSRC and its net expenditure, changes in taxpayers' equity, and cash flows for the financial year.

In preparing the Accounts, the Accounting Officer is required to comply with the requirements of the Government Financial Reporting Manual (www.financial-reporting.gov.uk) and in particular to:

- observe the Accounts Direction issued by the Secretary of State including the relevant accounting and disclosure requirements, and apply suitable accounting policies on a consistent basis;
- make judgments and estimates on a reasonable basis;
- state whether applicable accounting standards as set out in the Government Financial Reporting Manual have been followed, and disclose and explain any material departures in the financial statements; and
- prepare the financial statements on a going concern basis, unless it is inappropriate to presume that the Council will continue to operate.

The Department for Business, Innovation and Skills has appointed the Chief Executive as Accounting Officer of BBSRC. The responsibilities of an Accounting Officer, including responsibility for the propriety and regularity of the public finances for which the Accounting Officer is answerable, for keeping proper records and for safeguarding BBSRC's assets, are set out in the NDPB Accounting Officers' Memorandum issued by HM Treasury and published in '*Managing Public Money*'.

Governance statement by Chief Executive

1. Scope of responsibility

As Accounting Officer, I have responsibility for maintaining a sound system of internal control that supports the achievement of BBSRC's policies, aims and objectives, whilst safeguarding the public funds and departmental assets for which I am personally responsible, in accordance with the responsibilities assigned to me and disclosed in 'Managing Public Money'.

The BIS Accounting Officer has designated me as the Accounting Officer of BBSRC, responsible for the effective, safe and efficient operation of the Council in accordance with the Management Statement and Financial Memorandum agreed between BBSRC and its sponsoring department, the Department for Business, Innovation and Skills (BIS).

BBSRC, together with other Research Councils, is reliant on the UK Shared Business Services Ltd (UK SBS Ltd) for the provision of administration systems and this statement also explains the oversight and assurance process and results for the service supplied.

2. The purpose of the governance statement

The Governance statement, for which I take personal responsibility, gives a clear understanding of the dynamics of BBSRC and its control structure. It records the stewardship of BBSRC, and provides a sense of BBSRC's performance during the year and how successfully it has coped with the challenges it faced. The statement explains how BBSRC has complied with the principles of Good Governance, reviews the effectiveness of these arrangements, and complies fully with the Corporate Governance Code.

3. Governance framework

BBSRC is an independent non-departmental public body of BIS, established by Royal Charter. BBSRC's working relationship and lines of accountability with its sponsor department BIS are defined through a Management Statement, Code of Practice and Financial Memorandum. These documents were reviewed through a cross Research Council Governance Group operating under the auspices of the Efficiency and Reform Group and updated and revised versions are being reviewed by BIS and are expected to be issued early in the 2014-2015 financial year.

In my role as BBSRC's Accounting Officer, I am supported by BBSRC's Council, its Boards, and the Executive team within BBSRC.

BBSRC Council

Council is BBSRC's top level decision-making body, and comprises the Chair, me, and between 10-18 other members, at least half of whom are appointed for their qualification in relevant science. Users of research in both Government and industry are also represented. All members are appointed by the Secretary of State for Business Innovation and Skills, and are required to abide by a code of practice that covers conflicts of interests and general conduct.

Council is a body corporate with executive responsibilities set up under the Science and Technology Act of 1965 and by Royal Charter (amended 1993) thus ensuring that it has separate legal status. Council members have corporate responsibility for the actions of Council and BBSRC staff. Council meets at regular intervals throughout the year and exercises full and effective control over the activities of BBSRC and its staff. Council decides all issues of major importance, including: issues of corporate strategy; key strategic objectives and targets; major decisions involving the use of financial and other resources; and substantive personnel issues, including key appointments. Nevertheless, Council delegates responsibility to me, as Chief Executive, and BBSRC staff to the maximum extent possible.

Examples of recent Council meeting agenda items for discussion include:

- ▶ Refresh of the BBSRC 2010-2015 Strategic Plan
- ▶ Partnerships with other organisations and funding bodies
- ▶ Review of Bioinformatics and Biomathematics at BBSRC Strategically Funded Institutes
- ▶ Competitive Research Funding
- ▶ Strategically Funded Institutes, Centres and Campuses

The table below shows Council membership and number of meetings attended during 2013-2014:

Council Members	No. of meetings attended 2013-14 (max 4)
Professor Sir Tom Blundell FRS (Chair) – BBSRC Chairman	4
Professor Sir David Baulcombe FRS – Academic	2
Professor John Coggins OBE FRSE – Academic	3
Professor Anne Dell CBE FRS – Academic	4
Professor Russell Foster FRS – Academic	3
Mr David Gregory – Industry/User	3
Mr Jim Godfrey OBE – Industry/User	3
Dr Mike Goosey – Industry/User	4
Professor Carole Goble OBE – Academic	3
Professor Sarah Gurr – Academic	4
Professor Jackie Hunter CBE – BBSRC Chief Executive (from 21 October 2013)	2
Dr David Lawrence – Industry/User	4
Professor Keith Lindsey – Academic	4
Professor Douglas Kell CBE – BBSRC Chief Executive (until 18 October 2013)	2
Professor Chris Pollock CBE – Independent	4
Dr Andy Richards – Industry/User	2
Professor David Richardson – Academic	4
Dr John Stageman OBE – Industry/User	4
Dr Will West – Industry/User	4
Professor Tim Wheeler – Government User	4

In line with good corporate governance practice, each year BBSRC carries out a formal appraisal of the performance of Council. Collective appraisal provides Council with an opportunity to consider its own effectiveness and to comment on issues which are not normally part of its usual business.

Members of Council (excluding the Chair and myself) are required to complete an online questionnaire which provides information for an anonymous and confidential collective report. It is then presented to Council for an open discussion on issues of significant note.

BBSRC also has in place annual appraisals of individual Council members. The resulting reports are used in the process for considering Council re-appointments.

Council's Boards

Council approves the membership of the three Boards that report to it; namely the Appointments Board, Audit Board and the Remuneration Board. The Chair of each Board is required to report regularly on the work of their respective Boards and to take forward specific tasks as directed by Council.

Appointments Board

Appointments Board is responsible for the open and transparent selection processes for the appointment of members to BBSRC Panels and Committees. BBSRC Panels advise on strategy development and Committees assess funding applications. Appointments are made on the basis of quality and suitability to carry out in full the responsibilities of the Panel or Committee to which the appointments are being made, with due regard to; the balance of expertise, appropriate representation of 'user community' on each Panel and Committee, achieving a balance of members in terms of location at both institutional and regional levels on each Panel or Committee, and diversity issues.

Appointments Board meets twice per year, although it also deals with appointments by correspondence throughout the year. The table below shows Appointments Board membership and number of meetings attended during 2013-2014:

Appointments Board Members	No. of meetings attended 2013-14 (max 2)
Professor K Lindsey (Chair) – BBSRC Council Member	2
Professor D Richardson (Deputy Chair) – BBSRC Council Member	2
Professor R Bardgett – BBSRC Committee	1
Dr J Burke – Independent (until 31 December 2013)	0
Professor A Hetherington – Chair of BBSRC Strategy Panel (until 31 December 2013)	0
Professor R Hubbard – Independent	1
Professor B Hirst – Independent (from 1 January 2014)	1
Professor J Hurst – Independent (until 30 September 2013)	0
Professor A Osborne – Independent	2
Professor C Rawlings – Independent	2
Professor A Willis – Independent	1

Council is provided with the minutes of Appointments Board and is asked to approve appointments to Panel and Committee Chairs. During 2013-2014 the Appointments Board Chair highlighted to Council the need to carry on previous work on increasing the diversity of applicants to BBSRC Strategy Panels and the Pool of Experts.

Audit Board

The Audit Board Chair and at least three non-executive members are appointed by Council, being members independent of management and free of any relationship that, in the opinion of Council, would interfere with the exercise of independent judgement as Board members.

Audit Board meets at least four times a year, three meetings plus an additional teleconference, to monitor standards of risk management, corporate governance, internal control reports from the Audit and Assurance Services Group (AASG), external audit reports and to review the annual statutory accounts of BBSRC and the BBSRC-hosted Research Councils' Pension Schemes.

Audit Board approves BBSRC's internal audit programme plan for the year in the light of the key risks identified as part of the risk management framework. In particular, business critical projects are picked out for special assessment by the Audit Board on an on-going basis.

The table below shows Audit Board membership and number of meetings attended during 2013-2014:

Audit Board Members	No. of meetings attended 2013-14 (max 5)
Dr D Gregory (Chair) – Council Member	5
Professor A Dell – Council Member	3
Mr D Mann – Independent	4
Mr P Ratcliffe – Independent	5
Dr A Richards – Council Member	4

Council is provided with the minutes of Audit Board and is given an oral update by the Audit Board Chair. During 2013-2014 the following points were highlighted to Council:

- update on the progress of the 2013-2014 Annual report and Accounts for BBSRC and the 2013-2014 Annual Report and Accounts of the Research Councils Pension Schemes (which BBSRC hosts)
- progress on the level of overall assurance that BBSRC would receive from the AASG
- Audit Board's approval of BBSRC's risk management reporting

In line with good corporate governance practice, each year BBSRC carries out a formal appraisal of the performance of Audit Board. Collective appraisal provides the Board with an opportunity to consider its own effectiveness and to comment on issues which are not normally part of its usual business.

Members of the Board (excluding Chair) are required to complete an online questionnaire which provides information for an anonymous and confidential collective report. It is then presented to The Board and Council for an open discussion on issues of significant note.

BBSRC also has in place annual appraisals of individual Board members. The resulting reports are used in the process for considering re-appointments.

Remuneration Board

The Remuneration Board is responsible for ensuring compliance with Public Sector pay guidance and promoting the aims of the BIS and Government Policy on Senior Remuneration. The Board is responsible for evaluating the performance of the Directors in BBSRC Office and determining their remuneration. Remuneration Board also has a review role as follows:

- review reports from Institute Chairs (local Remuneration Boards)
- monitor local procedures to confirm they are in line with good practice
- monitor outcomes and identify possible inconsistency of standards
- identify any diversity issues
- alert Chairs of Governing Boards to cases where apparent inconsistencies or diversity issues may require a reappraisal of standards or procedures

Remuneration Board meets once per year. The table below shows Remuneration Board membership and number of meetings attended during 2013-2014:

Remuneration Board Members	No. of meetings attended 2013-14 (max 1)
Professor Sir Tom Blundell FRS (Chair) – BBSRC Chairman	1
Dr Michael Goosey – BBSRC Council Member	1
Sarah Gurr – BBSRC Council Member	1
Professor D Kell – BBSRC Chief Executive	1
Dr D Lawrence – BBSRC Council Member	1
Mr Steve Visscher – Deputy Chief Executive	1

Executive

BBSRC Executive Group comprises me, the Deputy Chief Executive and Executive Directors. Executive Group meets fortnightly, alternating between operational issues and strategic issues. Executive Group is responsible for taking forward actions on all matters emanating from Council and its Boards. It also ensures that relevant business is laid before Council in a timely manner, and reviews business associated with BIS and RCUK.

It is the role of all Executive Directors to support and advise me regarding my responsibility to ensure the effective, safe and efficient operation of BBSRC. Executive Directors' Stewardship Statements are completed by each BBSRC Group Executive Director and the Deputy Chief Executive on an annual basis, and the results are discussed at an Executive Group meeting. These statements provide assurance to me, in my role as Accounting Officer that a sound system of internal control has been in place throughout BBSRC for the year.

For 2013-2014, the combined view from the Stewardships Statements was that all of BBSRC's business areas were given full or substantial assurance ratings. Executive Directors discussed the areas where weaknesses or improvements were identified, and agreed that adequate mitigating actions were in place. This provided me with a satisfactory level of assurance.

Institutes

BBSRC's scientific remit requires research that is most appropriately delivered at mission-oriented Institutes with specialist facilities, alongside that conducted in university research departments, and new multi-disciplinary and 'virtual' centres.

In 2011-12, revised governance arrangements were implemented for Institutes previously sponsored by BBSRC, which resulted in independence of these bodies from BBSRC. BBSRC Executive Directors continue to meet regularly with Institutes to discuss high level policy and strategic issues. In terms of BBSRC's assurance regarding Institutes, BBSRC's Audit Board focuses on the following:

- BBSRC's grants funding, where no changes are proposed to the current RCUK Assurance programme which provides an annual report to the BBSRC Audit Board
- BBSRC's owned estate, where Audit Board will be presented with an annual review, and associated risks will be managed via BBSRC's Corporate Risk Register which Audit Board reviews regularly
- BBSRC's capital developments, which are included within Audit Board's regular reports on business critical programmes, as well as in BBSRC's Corporate Risk Register
- reputational risks to BBSRC from Institute activities, which are again managed via the BBSRC Corporate Risk Register as appropriate

4. System of internal control

The system of internal control is designed to manage risk to a reasonable level rather than eliminate all risk of failure to achieve policies, aims and objectives; it can therefore only provide reasonable and not absolute assurance of effectiveness. The system of internal control is based on an ongoing process designed to identify and prioritise the risks to the achievement of BBSRC's policies, aims and objectives, to evaluate the likelihood of those risks being realised and the impact should they be realised, and to manage them efficiently, effectively and economically. The system of internal control has been in place in BBSRC for the year ended 31 March 2014 and up to the date of approval of the annual report and accounts, and accords with HM Treasury guidance.

5. The risk and control framework

Overall responsibility for risk management in BBSRC rests with me as the Chief Executive and Accounting Officer. I sign this annual Governance Statement as part of the audited Annual Accounts. The task of implementing and maintaining the risk management policy and strategy is delegated to the Executive Director, Finance and Campus Operations who fulfils the role of the Director responsible for risk. However, all BBSRC Executive Directors share the responsibility to ensure the effective application of BBSRC's risk management strategy and policy. Within this established structure, BBSRC gives leadership to the process by a number of means, including:

- setting out a risk management policy and strategy and defining the BBSRC level risk appetite
- signing up to risk management assurance statements at the most senior levels within BBSRC
- updating and reviewing the corporate register of key risks at least quarterly by senior management and at every Audit Board meeting
- reinforcing risk management at staff level through the development and implementation of group-level risk registers in support of those at corporate level
- appointing risk "owners" for all risks identified. These will typically be middle/senior managers within BBSRC who will be responsible for the day-to-day management of risk. They will lead the development of appropriate risk management plans and ensuring that risk response actions are carried out as required
- a formal PRINCE 2 based project management approach with embedded risk management is used for major activities, including the business critical programmes listed below
- hosting the RCUK Audit and Assurance Services Group (AASG) which is responsible for providing an assessment of internal control to Chief Executives, through a carefully determined and managed internal audit programme. AASG currently includes the RCUK Assurance unit which is responsible for managing and undertaking the Research Councils Assurance Programme). In BBSRC the AASG programme forms a key part of an overall Assurance Map which brings activities, risks and assurance together
- considering the interests of key stakeholders and operational partners in the formation and delivery of risk management policy and strategy
- using the Office of Government Commerce Gateway review process for significant programmes, including the business critical programmes below
- a formal whistle-blowing procedure set out in BBSRC's Employment Code, with the Chair of BBSRC's Audit Board acting as a confidential, external contact

BBSRC actively encourages a culture of effective risk management. This recognises that effective risk management is an essential component of successful business operations, rather than simple risk avoidance.

BBSRC adopts HM Treasury best practice on corporate governance and risk management. Risk management and internal control are considered on a regular basis by BBSRC Executive and Audit Board during the year. Both groups regularly review the strategic and operational risk management registers and framework, and receive reports on business critical programmes pertaining through the year.

The activities of AASG in respect of BBSRC are reviewed by Audit Board and the scope of the internal audit plan for the coming year, which is based on the overall assessment of risk, is agreed. With this overarching view of audit activities, Audit Board plays a pivotal role in evaluating and reviewing the evidence supporting the Chief Executive's assurance statement on internal control.

The Council's role, in terms of risk management, is to oversee the work of Audit Board through review of Audit Board minutes and key risks highlighted by the Audit Board Chair.

Risk assessment

BBSRC's Corporate Risk Register identifies key risks and the possible threat/opportunity should these risks crystallise. It assesses the probability, impact and proximity, and considers the inherent, current and target exposure levels. Existing controls and mitigation plans are noted alongside an indication of the current trajectory of the risk. If risks materialise, they are transferred to the Corporate Issues Register, which is managed alongside the Corporate Risk Register.

The Corporate Risk Register is formally monitored on a quarterly basis by BBSRC's Executive Group and is circulated to every Audit Board meeting. The Corporate Risk Register is supported by Group Risk Registers, which enable the effective escalation of risks for consideration by BBSRC's Executive.

As an indicative benchmark, BBSRC's Audit Board and Executive agreed that around 15 corporate risks fit within our appetite and our ability to manage the risk profile. At 31 March 2014, the Corporate Risk Register had 17 risks which had been agreed and were being monitored. Of the 17 risks, 4 risks are rated with a red current risk score. The successful delivery of mitigations plans will reduce this exposure to zero risks with a red score. I believe that this supports the view that active risk management is having a strong influence and impact on BBSRC operations.

In 2013-2014 BBSRC conducted a risk based review of fraud and error in accordance with instructions from BIS. The review included an assessment of the potential for fraud and error, a capacity assessment and an action plan. The outcome of the review was that there were no particular high risk areas of fraud and error within BBSRC. The action plan will be pursued in 2014-2015 and a further review conducted. This work has removed the need for separate work to be undertaken under the Managing Risk of Financial Loss initiative.

New risk management system

As part of the ongoing process of improving and further embedding risk management within BBSRC working practices Finance and Campus Operations Group has procured a new risk management system. The aim is to establish a robust platform to manage BBSRC's risks based on a web based database. This has a series of dashboards and reports which provide a spectrum of information about risks in BBSRC and allows analysis and review. The building and development of the new system is now nearing completion and the roll out and training of key staff and managers responsible is scheduled to take place in April 2014.

Macpherson

The Macpherson review was in response to a perceived need to keep track of the most business critical analytical models in use in government and ensure that they are fit for purpose. Following the review BBSRC assessed its use of analytical modelling and did not identify any that were considered to be business critical. This was communicated to BIS and I can confirm that BBSRC complies with the requirements set out by the BIS Director General of Finance, Howard Orme, in his letter dated 15 May 2013.

Transparency of spend

In support of the government's transparency agenda, with effect from 1 December 2012 we are publishing details of all of our spend including Government Procurement Card (GPC) transactions regardless of value. Prior to this date we published details of our spend over £25,000 and all GPC transactions of £500 and over.

Details of BBSRC transactions are published on both our website and the government site www.data.gov.uk.

Business critical programmes

Business Critical Programmes (previously defined as Business Critical Projects) are defined as programmes that could have a major and pervasive effect across one or more of BBSRC's principal areas of activity. Failure of any of these programmes could adversely affect the Council's operation and reputation or financial position.

The business critical programmes at 31 March 2014 were as follows:

- Campus Funding totalling £70M for the development of the research campuses at the strategic partnership Institutes
- ELIXIR programme totalling £75M, which plans to expand facilities for biological data-storage at the European Bioinformatics Institute in Cambridge and deliver a new technical hub, in support of life sciences research and its translation
- Pirbright Redevelopment Programme totalling £255M for the first two construction phases to produce truly world class facilities

Counter fraud

BBSRC's Fraud and Bribery Policy has been rewritten and will be reissued in 2014-2015 as part of a package of counter fraud measures. This also includes the roll out of an e-Learning awareness training package covering fraud and bribery.

I consider the level of risk of financial loss to which the BBSRC has been exposed to be low and I am confident that the BBSRC's financial statements for 2013-2014 are free from material misstatement from fraud. There were no instances of fraud identified within BBSRC during 2013-2014.

Regularity

I can confirm that for the financial year ended 31 March 2014, neither I nor my staff authorised a course of action, the financial impact of which is that transactions infringe the requirements of regularity as set out in Managing Public Money, and that Treasury approval has been obtained for all novel, contentious or repercussive transactions relating to 2013-2014.

Pay remit

Pay setting arrangements throughout the civil service are set out in guidance issued by HM Treasury, however, in respect of the 2013-14 pay remit BBSRC did not follow all of the requirements. We will review the internal processes to ensure compliance in the future.

UK Shared Business Services Ltd (UK SBS Ltd)

The UK SBS Ltd provides processing services in human resources, procurement, payroll, finance, grants, and IT to all seven Research Councils. During 2013-2014, work was ongoing to develop further the security and controls framework operating between the Research Councils and UK SBS Ltd.

The Annual Governance Statement (AGS) has to record the level of assurance received in respect of the work carried out by UK SBS Ltd on behalf of the Research Councils. In past years this assurance has been recorded through the AASG report and commentary from the RC's Client Services Group (CSG) which oversaw the UK SBS Ltd/RC relationship and provided a report for the AGS. Reports on AASG activity and CSG review are still included in this AGS but the CSG role has altered as direct ownership and control of UK SBS Ltd has passed from the Research Councils to BIS.

This year the Chief Executive Officer of UK SBS Ltd has provided assurance directly to Research Council Accounting Officers. In a letter dated 28 February 2014, the CEO provided a personal assurance that the shared service had operated properly during the year. The letter provides a detailed commentary in ten specific areas listed below.

- Significant challenges faced by the business in 2013-2014
- Progress against audit recommendations
- The Company's Risk Management and Internal Control and Compliance Arrangements
- The Company's performance against its Critical Performance Indicators (CPI)
- Counter Fraud
- Information Security and Data Security
- IT Challenges and the effectiveness of the Company's Security Arrangements
- The Client Governance Fora
- Internal Audit Annual Assurance Statement
- Significant challenges the business expects to face in the course of 2014-2015 financial year

While significant challenges remain, there are positive improvements in system controls. While much needs to be done, UK SBS Ltd has concluded that risks have generally been managed to an acceptable level.

Overall assurance

I note the positive content of the UK SBS Ltd letter and welcome it as a source of assurance for this year and in future years. I would expect the positive improvement to continue and, as a result, that the level of assurance will also improve. One concern I have is the position regarding the UK SBS internal audit provision for 2014-15. UK SBS is reviewing its internal audit provision; it recognises the challenge will be to develop an audit plan and approach which means the company's needs and also satisfies the assurance requirements of its customers. This issue needs to be resolved urgently.

Key areas

As set out above, particular attention has been given to UK SBS stabilisation over the past year. Going forward the governance arrangements will continue to evolve as new clients come on board and discussions are in hand to formalise these arrangements:

- ▶ Post Stabilisation, manual workarounds
- ▶ Grants service provision
- ▶ Fixed Assets and impact of Modified Historic Cost Accounting (MHCA) calculations
- ▶ Error count, accuracy, duplication, and timeliness of activities
- ▶ Management Information (MI) for project managers
- ▶ Systems availability and security

A revised governance model has been rolled out as BIS and Partner Organisations begin to take service from UK SBS Ltd and this replaced the CSG structure during 2013-2014 (although CSG is still running alongside the new governance structure). The Research Councils will participate within (and influence the shape of) this new governance structure.

Audit and Assurance Services Group (AASG)

The Director of AASG is required to provide me with an opinion on the overall adequacy and effectiveness of the BBSRC's framework of governance, risk management and control. This opinion is provided in accordance with Governance Internal Audit Standards and is informed through the work of internal audit completed during the year in line with the internal audit plan agreed by management and the Audit Board. The internal audit plan covers three assurance components:

- BBSRC core activities
- UK SBS Ltd Shared Assurance
- Cross-Council assurance

Based on the work of internal audit, the Director of AASG was able to provide the following assurance that the system of internal control in place at the BBSRC for the year ended 31 March 2014 was operating effectively.

The overall opinion

Sufficient internal work has been undertaken to allow the Director of AASG to provide a positively stated (evidence-based) and reasonable (not absolute) assurance opinion on the overall adequacy and effectiveness of BBSRC's system of internal control. The overall opinion is:

▶ Substantial Assurance

A basically sound system of internal control, but where there are a few weaknesses that may put achievement of some system objectives at risk. There are no qualifications to this opinion.

The basis for the overall opinion

The overall opinion is the professional judgement of the Director of AASG based on the results of **43 planned** individual assurance engagements in the approved risk-based internal audit plan for 2013-14. The plan consisted of 10 Core BBSRC assurance, 12 UK SBS Ltd shared assurance and 21 Cross-client assurance assignments.

Of the 43 assurances provided, 81% [35] reflect substantial assurance. In determining the overall opinion, an assurance weighting is applied to each element of the internal audit plan to take account of its significance to the organisation's complete system of internal control. Greater significance is attached to assurances within the organisation's core client activity because of their closer alignment and relevance to BBSRC's objectives and risk priorities. The totality of BBSRC's complete system of internal control is therefore 89% substantially assured [as illustrated below]. This is supported by the fact that of the total recommendations raised [113], 14% [16] required a high priority action implementation.

Significant audit findings

Seven core audits were carried out in BBSRC and all received substantial assurance. No significant control weaknesses were identified that should be disclosed in the governance statement.

20 Cross-client audits were carried out of which 20% [4] were advisory and (55%) [11] received substantial assurance. 25% [5] cross councils audits received an overall rating of limited assurance: RCUK Governance, Risk Management and control; Business Continuity Planning; External IT Service Providers; IS/IT Strategy and Critical Systems Assurance. No significant control weaknesses were identified that should be disclosed in the governance statement.

Results from the SBS [SBSSA] work confirm that the controls operating across the end-to-end [E2E] processes have continued to improve. 100% [14] of the processes examined in 2013-14 received substantial assurance, compared to 86% [12] in 2012-13. However, not all material improvements have been made to the system of internal control to ensure that system objectives are achieved and the control and risk management frameworks need improving in the following areas:

- There are quality shortfalls in the master data that supports the Purchase to Pay and Order to Cash processes
- Across the client base, non-compliance with some iExpenses processes remains high [e.g. in Q3 10% of expense claims examined were not properly receipted]

The Controls and Security Framework (CSF) that underpins the E2E processes is 50% substantially assured. 50% [3] of the areas within the CSF audits completed in 2013/14 received Limited Assurance: Change Control; Master Data Maintenance; and Database Security and Control. Action plans and monitoring are now in place at UK SBS to address issues raised within the CSF audits.

There is one significant control weakness remaining open at the year-end.

- The Centre does not have disaster recovery arrangements covering all information systems and the arrangements that are in place have not been tested.

Conclusion

From the internal audit programme as a whole, I am able to gain the necessary confidence and assurance on the workings of the audit framework, but note that progress on the resulting actions needs to continue.

RCUK Assurance

Assurance activities focus on the control environment and its effectiveness in ensuring compliance with the Research Councils' terms and conditions which accompany grant funding, with a further strand of work focusing on the scrutiny of the costing methodology used in research organisations, which for universities is the Transparent Approach to Costing (TRAC). The programme is an important element of the risk management framework for the BBSRC with an annual report produced for me, as the Accounting Officer, which reports on activities undertaken in the year as well as proposed activities for the following year.

The Research Councils' UK Assurance Unit is hosted by BBSRC and acts on behalf of the Research Councils by reviewing the regularity of expenditure on Research Council grants at all eligible Research Organisations. In 2013-14, 36 assurance assignments were undertaken, comprising of 15 visits, 3 enhanced desk based reviews and 18 desk based reviews. Findings for the year across this activity indicate that a satisfactory level of assurance can be reported based on the work undertaken.

Following a 2012-2013 AASG conducted independent Review of Funding Assurance Delivery Methodology (AASB Orange Paper 44), there was a shift of emphasis from an AASG assessment of a Research Organisation's (RO) control environment to an evidence based self-assessment completed by the RO. In March 2014 a further review of assurance activity expressed concern that there was a potential conflict between the traditional independent and objective viewpoint provided by Internal Audit and the input into policy which is the part of the function of the Assurance Team. A paper was provided to the Research Councils' Efficiency Reform Group (ERG) which recommended decoupling assurance from internal audit. This proposal was accepted in principle by ERG. The specific details of the decoupling are under discussion and are expected to be clarified during 2014-15.

6. Review of effectiveness and conclusion

As Accounting Officer, I have responsibility for conducting an annual review of the effectiveness of BBSRC's governance, risk management and internal control. My review is informed by the work of the internal auditors and the Executive Directors within BBSRC, and comments made by the external auditors in their management letter and other reports. The Governance Statement represents the end product of the review of the effectiveness of the governance framework, risk management and internal control.

The principal elements of support for the Accounting Officer's assurance statement are the work of the Audit Board and the BBSRC Executive, including the review of business critical programmes, the annual report from the Director of AASG, BBSRC Executive Directors' stewardship statements, the risk management frameworks developed by BBSRC, and responses to external management letters which identify where control gaps exist.

There are still significant issues which require close scrutiny going forwards:

- UK SBS Ltd service delivery – BBSRC continues to work closely with UK SBS Ltd to achieve stabilisation. In line with Government directives, there is a need for UK SBS Ltd to develop a wider client base to realise the full benefits to be derived from bulk transactional processing. I remain concerned by the risk associated with this growth; that the priorities for UK SBS Ltd introduced by new clients may divert resources away from service improvement and benefit delivery for the Research Councils at a critical time. BBSRC will continue to work collaboratively with other Research Councils to monitor and engage with UK SBS Ltd to achieve a reliable service.
- UK SBS Ltd technical platform – there is a separate but linked issue which also has a potentially significant impact on future shared services provision. BBSRC, like all Research Councils, is currently operating with a technical platform (Oracle) provided by UK SBS Ltd which requires upgrading. This upgrade will be a major project due to the current system being significantly customised and the associated need to decouple the Grants system (Siebel). This is an issue we will be taking forward with UK SBS Ltd in 2014-15.
- Capital funding – BBSRC has a number of large scientific estates which require considerable capital investment to develop and maintain. In 2013-14, BBSRC was delighted to receive further capital funding which enabled the continued development of world-class scientific facilities. Such funding is critical for the UK to retain facilities which enable world-leading research. BBSRC maintains capital strategies and plans enabling investment to be prioritised and utilised effectively.
- Efficiencies and savings – like all public sector bodies, in this continuing period of austerity and economic uncertainty BBSRC faces cost challenges and budget pressures. BBSRC is focused on delivering efficiencies and administration cost savings, and continues to work collaboratively with other Research Councils to explore the opportunity for greater process harmonisation. From March 2014 BBSRC began providing an Estates Management service to the Natural Environment Research Council (NERC) in order to maximise the efficiency of both BBSRC and NERC, ensuring we have critical mass in key functions.

I have considered the evidence provided with regards to the production of the Annual Governance Statement. The conclusion of the review is that BBSRC's overall governance and internal control structures result in risk being managed to a reasonable level and I can provide assurance that it supports the achievement of the BBSRC's policies, aims and objectives.

The Certificate and Report of the Comptroller and Auditor General to the Houses Of Parliament

I certify that I have audited the financial statements of the Biotechnology and Biological Sciences Research Council for the year ended 31 March 2014 under the Science and Technology Act 1965. The financial statements comprise: the Statements of Comprehensive Net Expenditure, Financial Position, Cash Flows, Changes in Taxpayers' Equity; and the related notes. These financial statements have been prepared under the accounting policies set out within them. I have also audited the information in the Remuneration Report that is described in that report as having been audited.

Respective responsibilities of the Council, Accounting Officer and Auditor

As explained more fully in the Statement of Council's and Chief Executive's Responsibilities, the Council and the Accounting Officer are responsible for the preparation of the financial statements and for being satisfied that they give a true and fair view. My responsibility is to audit, certify and report on the financial statements in accordance with the Science and Technology Act 1965. I conducted my audit in accordance with International Standards on Auditing (UK and Ireland). Those standards require me and my staff to comply with the Auditing Practices Board's Ethical Standards for Auditors.

Scope of the audit of the financial statements

An audit involves obtaining evidence about the amounts and disclosures in the financial statements sufficient to give reasonable assurance that the financial statements are free from material misstatement, whether caused by fraud or error. This includes an assessment of: whether the accounting policies are appropriate to the Biotechnology and Biological Sciences Research Council's circumstances and have been consistently applied and adequately disclosed; the reasonableness of significant accounting estimates made by the Biotechnology and Biological Sciences Research Council; and the overall presentation of the financial statements. In addition I read all the financial and non-financial information in the Annual Report to identify material inconsistencies with the audited financial statements and to identify any information that is apparently materially incorrect based on, or materially inconsistent with, the knowledge acquired by me in the course of performing the audit. If I become aware of any apparent material misstatements or inconsistencies I consider the implications for my certificate.

I am required to obtain evidence sufficient to give reasonable assurance that the expenditure and income recorded in the financial statements have been applied to the purposes intended by Parliament and the financial transactions recorded in the financial statements conform to the authorities which govern them.

Opinion on regularity

In my opinion, in all material respects the expenditure and income recorded in the financial statements have been applied to the purposes intended by Parliament and the financial transactions recorded in the financial statements conform to the authorities which govern them.

Opinion on financial statements

In my opinion:

- ▶ the financial statements give a true and fair view of the state of the Biotechnology and Biological Sciences Research Council's affairs as at 31 March 2014 and of its net expenditure after notional charges for the year then ended; and
- ▶ the financial statements have been properly prepared in accordance with the Science and Technology Act 1965 and Secretary of State directions issued thereunder.

Opinion on other matters

In my opinion:

- ▶ the part of the Remuneration Report to be audited has been properly prepared in accordance with Secretary of State directions made under the Science and Technology Act 1965; and
- ▶ the information given in the Management Commentary for the financial year for which the financial statements are prepared is consistent with the financial statements.

Matters on which I report by exception

I have nothing to report in respect of the following matters which I report to you if, in my opinion:

- ▶ adequate accounting records have not been kept or returns adequate for my audit have not been received from branches not visited by my staff; or
- ▶ the financial statements and the part of the Remuneration Report to be audited are not in agreement with the accounting records and returns; or
- ▶ I have not received all of the information and explanations I require for my audit; or
- ▶ the Governance Statement does not reflect compliance with HM Treasury's guidance.

Report

I have no observations to make on these financial statements.

Sir Amyas CE Morse

Comptroller and Auditor General

Date: 3 July 2014

National Audit Office

157-197 Buckingham Palace Road

Victoria

London SW1W 9SP

Statement of Comprehensive Net Expenditure for the period ended 31 March 2014

		2013-14		2012-13
		£'000	£'000	£'000
	NOTE			
EXPENDITURE				
Research and Capital Grants	2	432,350		414,649
Training Awards and Fellowships	2	52,307		52,281
Staff Costs	3	11,615		11,393
Other Operating Costs	6	7,014		17,636
Research Institute Staff Restructuring	9	2,132		6,273
Depreciation and Amortisation	13,15	7,904		8,053
(Profit)/Loss on Disposals and Demolition of Non-Current Assets	11	(2)		160
Impairment	14	5,608		8,940
Profit/Loss on Joint Ventures and Associates	12	(548)		1,864
TOTAL EXPENDITURE			518,380	521,249
INCOME				
Other Operating Income	7		(1,486)	(671)
Other Recoveries	7		(71)	(530)
VAT Recovered			6	(40)
Other Grant Income	7		(14,015)	(18,382)
TOTAL OPERATING INCOME			(15,566)	(19,623)
NET EXPENDITURE			502,814	501,626
Interest Payable			-	-
Net Expenditure after interest			502,814	501,626
Notional UKSBS service charges			4,146	-
Net Expenditure after Notional Charges			506,960	501,626
Other Comprehensive Expenditure				
Net (gain)/loss on Revaluation of Property, Plant and Equipment			(45,483)	(63,807)
Net loss/(gain) on Revaluation of Assets Held for Sale			163	-
			(45,320)	(63,807)
Total Comprehensive Expenditure for the period ended 31 March 2014			461,640	437,819

All activities are regarded as continuing.

The notes on pages 52 to 72 form part of these accounts.

Statement of Financial Position as at 31 March 2014

		31 March 2014 £'000	31 March 2013 £'000
	NOTES		
NON-CURRENT ASSETS			
Property, Plant and Equipment	13	384,195	352,161
Intangible Assets	15	36	69
Financial Assets	12	7,803	1,465
Non Current Receivables	17	980	11,228
TOTAL NON-CURRENT ASSETS		393,014	364,923
CURRENT ASSETS			
Assets Classified as Held for Sale	16	570	3,933
Trade and Other Receivables	17	24,216	29,621
Cash and Cash Equivalents	20	8,167	56,950
TOTAL CURRENT ASSETS		32,953	90,504
TOTAL ASSETS		425,967	455,427
CURRENT LIABILITIES			
Trade and Other Payables	18	(49,041)	(62,261)
Provisions	10	(1,175)	(587)
TOTAL CURRENT LIABILITIES		(50,216)	(62,848)
NON-CURRENT ASSETS LESS CURRENT LIABILITIES		375,751	392,579
NON-CURRENT LIABILITIES			
Provisions	10	(3,873)	(6,194)
TOTAL NON-CURRENT LIABILITIES		(3,873)	(6,194)
ASSETS LESS LIABILITIES		371,878	386,385
TAXPAYERS' EQUITY			
Revaluation Reserve		369,362	330,471
General Reserve		96	53,890
Gates Reserve		2,420	2,024
TOTAL TAXPAYERS' EQUITY		371,878	386,385

Professor Jackie Hunter

Date: 1 July 2014

Chief Executive and Accounting Officer

The notes on pages 52 to 72 form part of these accounts

Statement of Cash Flows for the period ended 31 March 2014

	NOTE	31 March 2014		31 March 2013	
		£'000	£'000	£'000	£'000
CASH FLOWS FROM OPERATING ACTIVITIES					
Net Expenditure for Year		(506,960)		(501,626)	
Adjustment for Depreciation and Amortisation		7,904		8,053	
Adjustment for Impairment Charge		5,608		8,940	
Adjustment for Profit on Joint Venture		(548)		1,864	
Adjustment for notional SBS charge		4,146			
Adjustment for Loss on Disposal and Demolition of Property, Plant and Equipment		(2)		160	
Decrease in Provision for Liabilities and Charges		(1,733)		(436)	
Decrease in Trade and Other Receivables Excluding those for Property, Plant and Equipment		15,652		496	
(Decrease)/Increase in Trade and Other Payables Excluding those for Property, Plant and Equipment		(13,220)		1,054	
NET CASH OUTFLOW FROM OPERATING ACTIVITIES			(489,153)		(481,495)
CASH FLOWS FROM INVESTING ACTIVITIES					
Payments to Acquire Property, Plant and Equipment	13,15	(30)		(126)	
Purchase of Financial Assets	12	(5,790)		-	
Disposal of Financial Assets	12			7,855	
Receipts from Sale of Property, Plant and Equipment	11	3,202		86	
Movement on Currency Hedge Funds	26	(70)		71	
NET CASH OUTFLOW FROM INVESTING ACTIVITIES			(2,688)		7,886
NET CASH OUTFLOW BEFORE FINANCING			(491,841)		(473,609)
CASH FLOWS FROM FINANCING ACTIVITIES					
Capital Grants from BIS		111,900		103,300	
Revenue Grants from BIS	19	331,158		421,475	
NET CASH INFLOW FROM FINANCING ACTIVITIES			443,058		524,775
(DECREASE)/ INCREASE IN CASH AND CASH EQUIVALENTS IN THE PERIOD			(48,783)		51,166
CASH AND CASH EQUIVALENTS AT THE BEGINNING OF THE PERIOD			56,950		5,784
CASH AND CASH EQUIVALENTS AT THE END OF THE PERIOD			8,167		56,950

The notes on pages 52 to 72 form part of these accounts

Statement of Changes in Taxpayers' Equity for the period ended 31 March 2014

	NOTE	Revaluation Reserve £'000	General Reserve £'000	Gates Reserve £'000	Total Reserves £'000
Balance at 1 April 2013		330,471	53,890	2,024	386,385
Comprehensive Expenditure for the Year		-	(506,960)	-	(506,960)
Grants from BIS	19	-	443,058	-	443,058
Valuation Additions		39,742	-	-	39,742
Transfers between Reserves		-	(396)	396	-
Transfers between Reserves – movements on fixed assets		(6,428)	6,428	-	-
Gains/Losses Recognised in the Statement of Comprehensive Expenditure		5,577	-	-	5,577
Notional UKSBS service charges		-	4,146	-	4,146
Movement on Financial Instruments	26	-	(70)	-	(70)
At 31 March 2014		369,362	96	2,420	371,878

	NOTE	Revaluation Reserve £'000	General Reserve £'000	Gates Reserve £'000	Total Reserves £'000
Balance at 1 April 2012		274,520	23,601	1,237	299,358
Comprehensive Expenditure for the Year		-	(501,626)	-	(501,626)
Grants from BIS	19	-	524,775	-	524,775
Valuation Additions		55,464	-	-	55,464
Transfers between Reserves		-	(787)	787	-
Transfers between Reserves – movements on fixed assets		(7,856)	7,856	-	-
Gains/Losses Recognised in the Statement of Comprehensive Expenditure		8,343	-	-	8,343
Movement on Financial Instruments		-	71	-	71
At 31 March 2013		330,471	53,890	2,024	386,385

The notes on pages 52 to 72 form part of these accounts.

The sum of the valuation additions and the gains/losses recognised in the Statement of Comprehensive Net Expenditure is shown in the Statement of Comprehensive Net Expenditure as the net gain/loss on revaluation of Property, Plant and Equipment and net gain/loss on revaluation of Assets Held for Sale.

1. STATEMENT OF ACCOUNTING POLICIES

a) Basis of Accounting

- i) These financial statements have been prepared in accordance with the Accounts Direction issued by the Secretary of State for the Department for Business, Innovation, and Skills (BIS), pursuant to Section 2(2) of the Science and Technology Act 1965.

These financial statements have been prepared in accordance with the 2013-14 Government Financial Reporting Manual (FReM). The accounting policies contained in the FReM apply International Financial Reporting Standards (IFRS) as adapted or interpreted for the public sector context.

Where the FReM permits a choice in accounting policy, the accounting policy judged to be the most appropriate to the particular circumstances of BBSRC for the purpose of giving a true and fair view have been selected. The particular policies adopted by BBSRC are described below. They have been applied consistently in dealing with items that are considered material to the accounts

ii) Going Concern

BBSRC is dependent on funding from BIS to meet liabilities falling due within future years. Funding for 2014-15 has been agreed at £515,393M (2013-14: £493,510M).

BBSRC has no reason to believe that future funding from BIS will not be forthcoming after this spending review period, and therefore the accounts are produced on a going-concern basis.

iii) Adoption of new or amended standards effective in 2013-14

There are no revised standards and interpretations applied by the Council from 1 April 2013.

b) Measurement Convention

These financial statements have been prepared under the historical cost convention modified to account for the revaluation of land, buildings and other fixed assets. Non-current assets held for sale are stated at the lower of previous carrying amount and fair value less costs to sell.

The financial statements are presented in pounds sterling, BBSRC's functional currency, and all amounts have been rounded to the nearest thousand unless otherwise stated.

c) Non-Current Assets

i) Intangible assets

Intangible Assets comprise purchased and developed specialist computer software and the BBSRC website, and are carried at fair value. Intangibles are given definite useful lives and are amortised on a straight line basis over the useful life of the asset from the date of use, based on nil residual value. The average expected useful life is 5 years for software and 3 years for website costs. Amortisation method and useful life are reviewed annually.

Intangible assets are reviewed for impairment whenever events or circumstances indicate that the carrying amount may not be recoverable. An impairment loss is recognised in the Statement of Changes in Net Expenditure based on the amount by which the carrying amount exceeds the recoverable amount.

ii) Land and Buildings

Land and buildings are carried at valuation at the reporting date. The basis of valuation for specialised scientific buildings is depreciated replacement cost and at open market value for non-specialised buildings. Valuations are adjusted annually at the reporting date by using the appropriate published indices and statistics. A full revaluation of land and buildings is carried out at least every five years, except for buildings under construction or sites being prepared for sale.

Some buildings with similar remaining lives have been grouped together for valuation and depreciation purposes.

The Council owns land and buildings which are leased to a number of funded institutes, all of whom are constituted as companies limited by guarantee and as registered charities and who prepare separate audited accounts. Additions to these assets may be funded wholly or in part from sources other than BBSRC.

Where funded institutes carry out development funded by sources other than BBSRC that results in a material change in the value of the Council's owned assets, this is disclosed as a fixed asset valuation addition within the Property, Plant and Equipment note, with the contra to Reserves.

Any capital funding provided by BBSRC to funded institutes in the form of capital grants is included within Research Grants in the Statement of Comprehensive Net Expenditure. Where these contributions result in a change in value of BBSRC's owned assets, this is also disclosed as a fixed asset valuation addition in the Property, Plant and Equipment note based on the construction costs during the year up to the Statement of Financial Position date, with the contra to Reserves.

iii) Information Technology, Plant and equipment

Capital expenditure includes purchases valued at £10,000 or more. Assets are included in the Statement of Financial

Position at depreciated historical cost which approximates to fair value.

iv) Revaluation

Increases in valuation are credited to the revaluation reserve.

Losses on revaluation are debited to the revaluation reserve to the extent of the gains previously recorded and then to the Statement of Comprehensive Net Expenditure.

In the opinion of BBSRC, there is no material difference between the historic cost of equipment, fixtures and fittings and their current cost. Accordingly these assets have not been revalued and this position is kept under review.

v) Depreciation

Provision is made for depreciation on all non-current assets at rates calculated to write off the valuation of each asset (or group of assets) to its estimated residual value evenly over its expected useful life from the date the asset is brought into use. An expected useful life is assessed at each location by the valuer.

Expected useful lives are as follows:

Freehold Land	-	not depreciated
Depreciated replacement cost buildings	-	up to 60 years
Agriculture buildings	-	up to 60 years
Dwellings	-	up to 60 years
Office and computing equipment	-	3 to 5 years
System Software	-	5 years
BBSRC website	-	3 years
Motor vehicles	-	up to 4 years
Assets under construction	-	not depreciated until available for use

Increased depreciation charges arising from revaluation are matched by annual transfers from the revaluation reserve to the general reserve. On disposal of a revalued asset, that element of the revaluation reserve that becomes realised as a result is also transferred to the general reserve.

d) Financial Assets

Investments are financial assets and are carried at cost less provision for any impairment in value, where there is no material difference between cost and fair value or where value information is not available.

e) Joint Ventures and Associates

Those investments that are held as Joint Ventures and those that are held as Associates are accounted for under the equity method.

f) Investment Properties

Properties that BBSRC subleases to other Councils are not deemed to be investment properties. In its capacity as host of the Joint Building and Office Services unit (JBOS), BBSRC leases buildings for administration space on behalf of the Research Councils and recovers the full cost from them.

Assets leased to BBSRC strategically funded institutes are deemed not to be investment properties as the assets are provided to fulfil the BBSRC business principle to further science. If the assets were not provided to the institutes, BBSRC would incur additional grant expenditure to fund the institutes' rent of properties commercially. Accordingly the asset is held for the business of sponsoring research rather than for capital appreciation.

Impairment

The carrying amounts of the Council's assets are reviewed at each statement of financial position date to determine whether there is any indication of impairment; an asset is considered to be impaired if objective evidence indicates that one or more events have had a negative effect on the estimated future cash flows of that asset. If any such indication exists, the asset's recoverable amount is estimated.

An impairment loss is recognised whenever the carrying amount of an asset or its cash-generating unit exceeds its recoverable amount. Impairment losses are recognised in the Statement of Comprehensive Net Expenditure.

g) Non-Current Assets Held for Sale

Where a non-current asset's carrying amount will be recovered principally through a sales transaction rather than through continuing use, it is available for immediate sale in its present condition and its sale is highly probable, then the asset is classified as held for sale.

A sale is highly probable where there is evidence of management commitment to sell, there is an activity programme to locate a buyer, the asset is actively marketed for sale at a reasonable price, the sale will be completed within 12 months from the date of classification, and actions required to complete the sale indicate that it is unlikely that the plan to sell will be significantly changed or withdrawn.

The asset is measured at the lower of carrying amount and fair value less costs to sell, unless the asset is outside the measurement provisions of IFRS 5 *Non Current Assets Held for Sale and Discontinued Operations*.

Depreciation ceases on assets classified as held for sale from the date the re-classification is made.

h) Derivatives and Financial Instruments

As the cash requirements of BBSRC are met through grant-in-aid provided by BIS, financial instruments play a more limited role in creating and managing risk than would apply to a non-public sector body. The majority of financial instruments relate to contracts to buy non-financial items in line with BBSRC's expected purchase and usage requirements and BBSRC is therefore exposed to little credit, liquidity or market risk.

Trade receivables

Trade receivables are not interest bearing and are carried at original invoice amount less allowance for impairment. Provision for impairment is established when there is objective evidence that the Council will not be able to collect all amounts due according to the original terms of the receivable. The amount of provision is the difference between the carrying amount and recoverable amount and is recognised in the Statement of Comprehensive Income.

Trade and other payables

Trade and other payables are recognised in the period in which related money, goods or services are received or when a legally enforceable claim against the Council is established or when the corresponding assets or expenses are recognised.

i) Cash and Cash Equivalents

Cash and cash equivalents comprise cash balances and call deposits.

j) Employee Benefits

Under IAS 19 *Employee Benefits*, an entity is required to recognise short term employee benefits when an employee has rendered service in exchange for those benefits. Included in the financial statements under other accruals is an accrual for the outstanding employee holiday and flexitime entitlement at the year end on an undiscounted basis.

k) Pension Scheme and Retirement Costs

The employees of the Council are members of the Research Councils' Pension Scheme (RCPS) which is a defined benefit scheme funded from annual grant-in-aid on a pay-as-you-go basis. The benefits are by analogy to the Principal Civil Service Pension Scheme, except that while the schemes provide retirement and related benefits based on final emoluments, redundancy and injury benefits are administered and funded by the Council. As permitted by paragraph 31 of IAS 19, the Company has recorded the pension contributions payable for the period as its charge to the Statement of Changes in Net Expenditure.

l) Provisions

Provisions are recognised when: the Council has a present legal or constructive obligation as a result of past events; it is more likely than not that an outflow of resources will be required to settle the obligation; and the amount can be reliably estimated.

When BBSRC has taken a decision to fund a programme of redundancies, then the associated costs are provided for. The provision for the ongoing Annual Compensation Payments is transferred from the Major Institute Restructuring provision and any remaining balance released once the redundancies are complete.

Where the time value of money is material, the amount of the provision will be the present value of the expenditures expected to be required to settle the obligation.

Provisions are reviewed at the end of each reporting period and adjusted to reflect the current best estimate. The discount rate used for post-employment benefits is 2.7% which is the real rate set by HM Treasury.

m) Contingent Liabilities

Contingent liabilities, including letters of comfort and financial guarantees, where obligations due cannot be measured reliably are not recognised as liabilities in the Financial Statements but are disclosed by way of a note in accordance with IAS 37.

n) Leases

Operating lease rental payments are charged to the Operating Cost Statement on a straight line basis over the term of the lease.

Operating lease receipts are posted to the Operating Cost Statement on a straight line basis over the term of the leases. BBSRC also has leases with sponsored institutes where peppercorn receipts are due.

BBSRC holds no finance leases.

o) Foreign Currencies

Transactions in foreign currencies are translated at the foreign exchange rate ruling at the date of the transaction. Monetary assets and liabilities denominated in foreign currencies at the balance sheet date are translated at the foreign exchange rate ruling at that date. Foreign exchange differences arising on translation are recognised in the Statement of Changes in Net Expenditure, except where a hedging relationship is designated and where it qualifies for hedge accounting under IAS 39.

Non-monetary assets and liabilities that are measured in terms of historical cost in a foreign currency are translated using the exchange rate at the date of the transaction. Non-monetary assets and liabilities denominated in foreign currencies that are stated at fair value are translated at foreign exchange rates ruling at the dates the fair value was determined.

p) Value Added Tax

As the Council is partially exempt for VAT purposes, all expenditure and fixed asset additions are shown inclusive of VAT where applicable. Residual input tax reclaimable by the application of the partial exemption formula is taken to the Operating Cost Statement as Other Operating Income. Income is shown net of VAT.

q) Ownership of Equipment Purchased with BBSRC Research Grants

Equipment purchased by an institution with research grant funds supplied by the Council belong to the institution and are not therefore the equipment of the Council.

r) Grant-in-Aid

Grant-in-aid for revenue purposes is recognised as a financing flow and thus credited to the General Reserve.

s) Research Grants

Subject to the terms and conditions under which research grants are awarded, BBSRC makes payments for grants on the basis of pre-determined quarterly profiles. Profiles are arranged, in overall terms, to reflect the rate and incidence of expenditure at the grant-holding organisation. Payments are normally made in the period to which they relate, although BBSRC retains some latitude in timing. Grant expenditure is charged to the Statement of Comprehensive Net Expenditure on an accruals basis.

t) Deferred Income

The Council receives funding for collaborative projects to support BBSRC's research. The majority of this funding is received from the UK public sector. Some of the funding may involve payment for the collaboration a number of years in advance of the accounting period to which it relates. Where there is a variance between work done in the accounting period and received funding, income will be deferred if the contract or agreement includes key conditions relating to the repayment of surplus funds.

u) Insurance

In line with Government policy, BBSRC carries its own risk in respect of employment of staff, buildings and equipment, except where there is a statutory requirement to insure.

v) Critical Accounting Estimates and Judgements

The Council makes estimates and assumptions that affect the reported amounts of assets and liabilities in the next financial year. Estimates and judgements are continually evaluated and based on historical experience and other factors, including expectations of future events that are believed to be reasonable under the circumstances at the reporting date. The estimates and assumptions that have a significant risk of causing a material adjustment to the carrying amount of assets and liabilities within the next financial year are discussed below.

Estimates

The useful life of each of the Council's items of property, plant and equipment and intangibles is estimated based on the period over which the asset is expected to be available for use. Such estimation is based on experiences with similar assets and practices of similar businesses. The estimated useful life of each asset is reviewed periodically and updated if expectations differ from previous estimates due to physical wear and tear, technical or commercial obsolescence or legal or other limits on the use of an asset. An increase in the estimated useful life of any item of property, plant and equipment and intangibles would decrease the recorded operating expenses and increase non-current assets.

Judgements

IFRS requires that an asset impairment review be performed when certain impairment indicators are present. Property, plant and equipment, intangible assets and financial assets are subject to an annual impairment test or whenever there is a strong indication that the asset will be impaired. Management is required to make estimates and assumptions to determine the future cash flows to be generated from the continued use and ultimate disposal of these assets in order to determine the value of the assets. While the Council believes that the assumptions used are reasonable and appropriate, these estimates and assumptions can materially affect the financial statements. Future adverse events may cause the management to conclude that the assets are impaired and may have a material impact on the financial condition and results of operations of the Council.

w) Capital and Reserves

The Council has three reserves: the General Reserve, the Revaluation Reserve and the Gates Reserve. The General Reserve is used to account for accumulated surpluses. The Revaluation Reserve is a specific reserve used only to reflect the unrealised balance of cumulative indexation and revaluation adjustments to fixed assets. Increases in valuation are credited to the revaluation reserve. Losses on revaluation are debited to the Revaluation Reserve to the extent of the gains previously recorded and then to the Statement of Comprehensive Net Expenditure. The Gates Reserve is a restricted reserve created for funds from the Bill & Melinda Gates Foundation. This reserve is ring-fenced for use on specific grant applications from 2012 onwards.

x) BBSRC-Sponsored Institutes

BBSRC's scientific remit requires research that is most appropriately delivered at mission-oriented institutes with specialist facilities, alongside that conducted in university research departments, and new multi-disciplinary and 'virtual' centres.

y) Administration Costs and Programme Costs

BBSRC analyses the total of other administration costs and programme costs as shown in the Statement of Comprehensive Net Expenditure in a separate note to the financial statements. This disclosure includes the individual components of non-cash items and an analysis of other significant expenditure items.

z) Currency Risk

BBSRC mitigates the risk of foreign exchange rate movements on its foreign currency transactions through the use of forward contracts. The agreed cost of the contracts is fair valued using the mid-market rate ruling at the period end and the difference is credited to the reserves.

2. ANALYSIS OF RESEARCH GRANTS AND TRAINING AWARDS BY BUSINESS SEGMENT

The primary format used for segmental reporting is grant expenditure, where the key funding data is split between research funding, training, administration, and other, which reflects BBSRC's internal management structure and reporting. BBSRC's assets and liabilities are shared across all the operating segments, and therefore it is not possible to separately identify which segment they relate to.

Research

BBSRC funds, promotes and supports high-quality basic, strategic and applied research relating to the understanding and exploitation of biological systems to advance knowledge and technology (including the promotion and support of the exploitation of research outcomes) which meets the needs of users and beneficiaries (including the agriculture, bioprocessing, chemical, food, healthcare, pharmaceutical and other biotechnological industries), thereby contributing to the economic competitiveness of the United Kingdom and the quality of life.

In March 2011, Research Councils UK (RCUK) published a report detailing plans to drive efficiency in research funding, in response to the Wakeham Review conducted by Sir William Wakeham and published in June 2010. All savings made in research funding remain within the ring-fence and are reinvested within science and research. The savings achieved to date are therefore included within the Research figures below. These are also reported within the Annual Report at the front of this document. Further details, including the RCUK report, can be found on the Research Councils UK website.

Training

BBSRC supports postgraduate training to help ensure the flow of highly qualified people into research careers and seeks to optimise the quality, volume and style of postgraduate and postdoctoral training for the needs of academia and industry and other user communities.

Office

The costs for the administration of the BBSRC office, including BBSRC's share of the costs associated with the UK SBS. Office costs do not equate to BBSRC's administration budget, as there are some office costs which are divided between programme and administration budgets (e.g. staff costs, which are classified on the basis of the role of the team).

At 31 March 2014

	Research £'000	Training £'000	Office £'000	Other £'000	Total £'000
Research Grants	312,888	-	-	-	312,888
Capital Grants	119,462	-	-	-	119,462
Postgraduate Awards	-	44,461	-	-	44,461
Fellowships	-	7,846	-	-	7,846
Staff Costs	-	-	11,615	-	11,615
Other Operating Costs	-	-	7,014	-	7,014
Staff Restructuring	-	-	-	2,132	2,132
Depreciation	-	-	-	7,904	7,904
Impairment and Other	-	-	-	5,058	5,058
Total Operating Expenditure	432,350	52,307	18,629	15,094	518,380

At 31 March 2013

	Research £'000	Training £'000	Office £'000	Other £'000	Total £'000
Research Grants	307,896	-	-	-	307,896
Capital Grants	106,752	-	-	-	106,752
Postgraduate Awards	-	43,287	-	-	43,287
Fellowships	-	8,994	-	-	8,994
Staff Costs	-	-	11,393	-	11,393
Other Operating Costs	-	-	17,636	-	17,636
Staff Restructuring	-	-	-	6,273	6,273
Depreciation	-	-	-	8,053	8,053
Impairment and Other	-	-	-	10,964	10,964
Total Operating Expenditure	414,649	52,281	29,029	25,290	521,249

3. STAFF NUMBERS AND RELATED COSTS

BBSRC hosts a number of Joint Service Units (JSUs) on behalf of all of the Research Councils. The costs of these Joint Services Units (JSUs) are recharged to all of the Research Councils, including BBSRC. Figures below show both BBSRC Office and the JSUs hosted by BBSRC.

For 2012-13, also included in the staff costs figures are the permanent and temporary staff costs for the Biosciences IT service (BITS) which was the common service provider of Information Communication Technology (ICT) services to BBSRC. BITS closed its operations in April 2012.

	2013-14	2012-13
	£'000	£'000
Salaries and Wages	11,013	10,265
Social Security Costs	861	755
Other Pension Costs	2,574	2,394
Other Fees and Honoraria	351	290
	14,799	13,704
Less UK paid Joint Service Staff	(3,163)	(2,292)
Less Overseas paid Joint Service Staff	(88)	(194)
Administrative and BITS Staff on Payroll	11,548	11,218
Temporary Administration and BITS Agency Staff	67	175
Total	11,615	11,393

AVERAGE NUMBERS OF PERSONS EMPLOYED

	2013-14	2012-13
Administrative	247.6	217.5
BITS	0.0	0.7
Administrative and BITS Staff on Payroll	247.6	218.2
UK Paid Joint Services staff	77.8	60.4
Overseas Paid Staff	4.0	4.0
Staff on Payroll	329.4	282.6
Temporary Agency Staff	1.0	4.0
	330.4	286.6

JSUs include: the Audit and Assurance Services Group, the Joint Business Office Services, the Joint Superannuation Services and the UK Research Office.

No staff costs have been capitalised in 2013-14 or 2012-13

During 2013-14 BBSRC uplifted the minimum pay for pay bands B to G, which includes all staff except Executive Directors and those on personal contracts. The uplift in pay band minima came into effect from 1 January 2014.

In 2013-14 BBSRC ran a graduate training programme, taking on an additional 13 graduate staff for a 12 month programme providing meaningful paid work experience on a science organisation.

4. SUPERANNUATION

The employees of the Council are members of the Research Councils' Pension Schemes (RCPS) which are defined benefit schemes funded from annual grant-in-aid on a pay-as-you-go basis. The benefits are by analogy to the Principal Civil Service Pension Scheme, except that while the schemes provide retirement and related benefits based on final or average emoluments, redundancy and injury benefits are administered and funded by the Council. The scheme is administered by the Research Councils' Joint Superannuation Service with the associated grant-in-aid managed by BBSRC. The schemes' accounts are prepared by BBSRC, on behalf of the BBSRC Chief Executive as the Accounting Officer for the RCPS. Separate accounts are published for the Pension Schemes. Employees' contributions vary between 1.5% and 5.9%. The employer's contribution is agreed by the RCPS Board of Management on the recommendation of the Government Actuary's Department (GAD) and is set at 26.0% of pensionable pay.

For 2013-14 employers' contributions of £2,574K were payable to the RCPS (2012-13: £2,394K) at 26.0% (2012-13: 26.0%) of pensionable pay, based on the salary bands. Employer contributions are reviewed every four years following a full scheme valuation by GAD. The contribution rates reflect benefits as they are accrued, not when the costs are actually incurred, and reflect past experience of the scheme.

5. REPORTING OF CIVIL SERVICE AND OTHER COMPENSATION SCHEMES-EXIT PACKAGES

Exit package cost band	Number of compulsory redundancies	Number of other departures agreed	Total number of exit packages by cost band
<£10,000	0 (8)	3 (20)	3 (28)
£10,000 - £25,000	7 (24)	14 (22)	21 (46)
£25,000 - £50,000	4 (15)	11 (24)	15 (39)
£50,000 - £100,000	0 (1)	1 (5)	1 (6)
£100,000-£150,000	0 (0)	0 (0)	0 (0)
£150,000-£200,000	0 (0)	0 (0)	0 (0)
Total number of exit packages by type	11 (48)	29 (71)	40 (119)
Total resource cost £	322,160 (1,057,343)	721,458 (1,591,713)	1,043,618 (2,649,056)

Comparative figures for 2012-13 are in brackets

Redundancies and other departure costs have been paid in accordance with the provisions of the Research Councils Compensation Scheme which is in analogy to the Civil Service Compensation Scheme. Exit costs are accounted for in full in the year in which departure is agreed. Where the BBSRC has agreed early retirements, the additional costs are met by BBSRC and not by the Research Councils Compensation Scheme. Ill-health retirement costs are met by the pension scheme and are not included in the table.

6. OTHER EXPENDITURE

	2013-14 £'000	2012-13 £'000
UKSBS Operating Costs	686	5,670
Professional Fees and Management Consultancy	1,232	3,921
Computing Expenses	585	1,729
Travel, Subsistence and Hospitality	1,191	1,136
Other	1,484	1,680
Office Supplies	239	252
Rent, Rates and Insurance	7	74
Maintenance, Repairs and Cleaning	768	2,513
Internal Audit	303	267
Staff Training	434	309
External Audit	85	85
Total	7,014	17,636

Ownership of UK SBS transferred from the research councils to BIS on 6 March 2013. From 1 April 2013, the cost of UK SBS's services to BBSRC ceased to be a monthly charge and instead was deducted from BBSRC's allocation. In order to accurately reflect the cost of using UK SBS's services in the annual accounts, the charge has been shown as a notional cost on the Statement of Comprehensive Net Expenditure and has been written back to the General Reserve.

7a. OTHER OPERATING INCOME

	2013-14 £'000	2012-13 £'000
Property Rentals	535	541
Contributions to Grants	-	57
Other	951	73
	1,486	671

7b. OTHER RECOVERIES

	2013-14 £'000	2012-13 £'000
Recovery of hosting Joint Service Units (JSUs)	71	530
	71	530

7c. NET FUNDING FROM OTHER BODIES

	2013-14 £'000	2012-13 £'000
From Other Research Councils	5,773	7,380
From Other Government Departments	5,735	8,051
From Other Bodies	1,808	1,328
From EU	699	1,623
Net Funding	14,015	18,382

8. ANALYSIS OF NET EXPENDITURE BY PROGRAMME AND ADMINISTRATION BUDGET

	2013-14			2012-13		
	Programme £'000	Administration £'000	Total £'000	Programme £'000	Administration £'000	Total £'000
Expenditure						
Research and Capital Grants	426,708	5,642	432,350	414,649	-	414,649
Training Awards and Fellowships	52,307	-	52,307	52,281	-	52,281
Staff costs*	3,907	7,708	11,615	3,409	7,984	11,393
Other Operating Costs**	1,086	5,928	7,014	1,558	16,078	17,636
Research Institute Staff Restructuring***	2,132	-	2,132	6,273	-	6,273
Non-cash items****:	-	-	-	-	-	-
Depreciation	7,724	154	7,878	7,911	155	8,066
Amortisation	-	26	26	-	(13)	(13)
(Profit) or loss on disposals and demolitions of non-current assets	(2)	-	(2)	-	160	160
Impairment	5,608	-	5,608	8,940	-	8,940
(Profit)/Loss on Joint Venture and Associates	(548)	-	(548)	-	1,864	1,864
Income						
Other Operating Income	(956)	(547)	(1,503)	(245)	(426)	(671)
Other Grant Income	(14,089)	74	(14,015)	(18,099)	(283)	(18,382)
Other Recoveries	-	(54)	(54)	-	(530)	(530)
VAT recovered	-	6	6	-	(40)	(40)
Net Expenditure after Interest	483,877	18,937	502,814	476,677	24,949	501,626

*Staff costs are classified as administration or programme on the basis of the core functions of teams.

**Other operating costs are mainly classified as administration as these relate to items such as UK SBS costs, computing expenses and office supplies. The programme element relates to costs associated with BBSRC's Knowledge Exchange and Commercialisation activities and BBSRC's usage of JANET, the UK's education and research network.

***Research Institute Staff Restructuring is classified as programme since these costs relate to one-off exercises to restructure the BBSRC-funded institutes following the changes to governance arrangements between BBSRC and the institutes. Note 9 provides more detail.

****For non-cash items, costs associated with IT and UKSBS assets are classified as administration, costs associated with land and buildings and scientific equipment are classified as programme. Costs associated with Swindon office are classified as administration.

9. RESEARCH INSTITUTE STAFF RESTRUCTURING

	2013-14 £'000	2012-13 £'000
Annual Compensation Payments (ACP)	1,187	1,465
Redundancy Payments**	4,241	6,888
	<u>5,428</u>	<u>8,353</u>
Recoverable ACP and Redundancy Payments	(448)	(505)
Recoverable ERLS	(1,115)	(1,139)
Provided for (note 10)	(1,269)	(1,405)
	<u>2,596</u>	<u>5,304</u>
Increase Provision for ACP and Restructuring Cost (note 10)	1,969	1,101
Release from Existing Restructuring Provisions (note 10)	(2,433)	(132)
Net Cost	<u><u>2,132</u></u>	<u><u>6,273</u></u>

The total number of redundancies during 2013-14 was 41 (2012-13: 119).

** In 2012-13 the Department for Business Innovation and Skills (BIS) allocated BBSRC a ring-fenced budget of £8.0M to cover restructuring costs. These funds could only be used for the stated purpose of restructuring, and BBSRC was required to demonstrate to BIS that the terms of any redundancy payments arising were consistent with the new Civil Service Compensation Scheme. No such budget was allocated for 2013-14.

Please see note 5 'Reporting of Civil Service and other compensation schemes - exit packages' for details on compensations agreed in 2013-14.

10. PROVISIONS FOR LIABILITIES AND CHARGES

PROVISIONS

	Annual Compensation Payments £'000	Major Institute Restructuring £'000	Total March 2013 £'000
At 1 April 2013	4,198	2,583	6,781
Amount provided in year	195	1,774	1,969
Amount released in year	(258)	(2,175)	(2,433)
Amount expended in year	(1,189)	(80)	(1,269)
Total Provisions At 31 March 2014	<u><u>2,946</u></u>	<u><u>2,102</u></u>	<u><u>5,048</u></u>

PROVISIONS

	Annual Compensation Payments £'000	Major Institute Restructuring £'000	Total 2012-13 £'000
At 1 April 2012	4,812	2,405	7,217
Amount provided in year	791	310	1,101
Amount released in year	-	(132)	(132)
Amount expended in year	(1,405)	-	(1,405)
Total Provisions At 31 March 2013	<u><u>4,198</u></u>	<u><u>2,583</u></u>	<u><u>6,781</u></u>

Annual Compensation Payments (ACP) are payments to early retirees in advance of their pension entitlements under the Research Councils' Pension Schemes.

Major Institute Restructuring comprises provisions for HR legal cases and provision for clean up costs at BBSRC sites.

Following the payment of the final compensation lump sum, provision for on-going annual compensation payments (ACP) associated with the specific institute restructuring programme is transferred from the major restructuring provision to the ACP provision.

TOTAL PROVISION FOR YEAR

	2013-14 £'000	2012-13 £'000
Restructuring	5,048	6,781
	5,048	6,781
Split as follows:		
Current Provision	1,175	587
Non-Current Provision	3,873	6,194
	5,048	6,781

ANALYSIS OF EXPECTED TIMING OF CASH FLOWS

	Annual Compensation Payments £'000	Major Institute £'000	Total Restructuring £'000
Within one year	113	1,062	1,175
Between 2015 and 2020	2,833	1,040	3,873
Between 2020 and 2024	-	-	-
	2,946	2,102	5,048

11. LOSS ON DISPOSAL/DEMOLITION OF PROPERTY, PLANT AND EQUIPMENT

	2013-14 £'000	2012-13 £'000
Receipts on Disposals of Property, Plant and Equipment	3,202	86
Less: Net Book Value of Assets Sold/Demolished	(3,200)	(246)
Profit/(Loss) on Disposal/Demolition of Fixed Assets	2	(160)

In June 2013 a dwelling surplus to requirements, which was classified as an asset held for sale at 31 March 2013, was sold with a loss on disposal of £8k. In addition a building and associated land at Pirbright that were surplus to requirements were sold with a profit on disposal of £10k.

During 2012-13, the remaining assets of BITS were disposed of, which resulted in a loss on disposal of £160K.

12. FINANCIAL ASSETS

	PBL £'000	NRP LLP	BBT	RBL	Total £'000
Valuation/cost at 1 April 2013	632	833	-	-	1,465
Additions	-	-	5,790	-	5,790
Disposal	-	-	-	-	-
Profit/(loss) at 31 March 2014	247	-	311	(10)	548
Net Book Value at 31 March 2014	879	833	6,101	(10)	7,803

In addition to the above investments, BBSRC also has an interest in the Rainbow Seed Fund (RSF) and an interest in the UK Shared Business Services (UK SBS) as detailed below.

Plant Bioscience Ltd (PBL)

110 ordinary shares at 10p each, representing one third of the issued share capital of Plant Bioscience Ltd. Plant Bioscience Ltd is incorporated in England and Wales. www.pbltechnology.com

Norwich Research Partners Limited Liability Partnership (NRP LLP)

"BBSRC's investment of £833k in the NRP LLP is an equal share of a £2.5M capital investment made by the three landowners of the Norwich Research Park (NRP) in 2011-12, i.e. BBSRC, John Innes Foundation, and the University of East Anglia. The NRP LLP was formed between the NRP Partners – which consists of the three landowners, together with the Norfolk and Norwich University Hospital, the John Innes centre, the Sainsbury Laboratories, and the Genome Analysis Centre – to formally collaborate in delivering and leveraging on the economic benefits that will be derived from the government's £26M capital investment in the facilities and infrastructure on the Park through:

- transforming the NRP into a world-leading centre for research and innovation in life and environmental sciences, creating 5000 new jobs in the Norwich area within the next ten years; and
- contributing to the Government's growth agenda, particularly in the area of bio-economy which is essential in creating economic growth and formulating effective responses to pressing global challenges."

Babraham Bioscience Technologies Ltd (BBT)

"During 2013-14 BBSRC acquired a £5.8M equity investment in the Babraham Bioscience Technologies Limited (BBT), giving BBSRC 25% of ordinary shares in the company with the remaining 75% shares being retained by the Babraham Institute. This investment was funded through a £5.8M conversion into equity of a £9.5M loan, which had been advanced by BBSRC to BBT for the development of the Babraham Biopark, with the remaining £3.7M being repaid to BBSRC in this financial year. Through this investment BBSRC will be able to ensure that stated economic benefits (i.e. economic growth and job creation) of the Government's £44M strategically important investment in the facilities and infrastructure at the Babraham Research Campus is delivered in line with expectations, and through this and future developments of the Campus will:

- increase in the impact of bioscience in the UK for the widest possible economic and societal benefit to the UK, enabling the UK economy and society to benefit from public investment in bioscience research; and
- create a vibrant and sustainable Campus that attracts the best people and companies, and delivers the best possible impact from bioscience for the UK, by bringing together leading bioscience research, life-science based businesses, and a variety of research-led and other facilities that will enable the commercialisation of research and the achievement of academic excellence.

Roslin BioCentre Ltd (RBL)

49 Ordinary Shares at 100p each representing 49 per cent of the issued share capital of Roslin BioCentre Ltd fully paid. Roslin BioCentre Ltd is incorporated in Scotland. www.roslinbiocentre.co.uk

Rainbow Seed Fund (RSF)

Partner's capital fund investment of £92. The Rainbow Seed Fund is an independently managed evergreen venture capital fund established in 2001 by the Office of Science and Innovation (the predecessor to BIS) to invest in technologies developed from publicly funded research (www.rainbowseedfund.com). In 2013-14 BBSRC provided a capital grant of £10M to support investment in the commercialisation of technology and services from publicly funded research, and ultimately support the Government's agenda for economic growth.

UK Shared Business Services Ltd (UK SBS)

BBSRC has one Non Government Department (NGD) share in UKSBS with an initial cost of £1 being the nominal value of the NGD share. BIS holds one Government Department (GD) share carrying 51% of the votes, UKSBS holds one share carrying 5% of the votes, and all other stakeholders, including BBSRC, each own one NGD share with the combined voting value of all the NGD shares being 44%.

13. PROPERTY, PLANT AND EQUIPMENT

	Completed Land excluding Dwellings £'000	Completed Buildings excluding Dwellings £'000	Dwellings £'000	Buildings Under Construction £'000	Information Technology £'000	Plant & Equipment £'000	Fixtures & Fittings £'000	TOTAL £'000
Cost or Valuation								
At 1 April 2013	53,571	207,286	31,673	146,328	277	122	11	439,268
Additions					30			30
Valuation additions*		9,873		29,869				39,742
Impairment		(7,250)						(7,250)
Reclassification	(268)	5,190	(1,094)	(3,828)				-
Disposals					(46)	(20)		(66)
Revaluation	(645)	1,801	1,914					3,070
At 31 March 2014	52,658	216,900	32,493	172,369	261	102	11	474,794
Depreciation and Impairment								
At 1 April 2013	1	86,564	294	0	162	75	11	87,107
Provided during the year		7,781	53		26	11	0	7,871
Impairment		(1,642)						(1,642)
Reclassification								-
Disposals					(46)	(20)		(66)
Revaluation		(2,353)	(318)					(2,671)
At 31 March 2014	1	90,350	29	0	142	66	11	90,599
Net Book Value								
At 31 March 2014	52,657	126,550	32,464	172,369	119	36	0	384,195
At 1 April 2013	53,571	120,722	31,379	146,328	115	47	0	352,162
	Completed Land excluding Dwellings £'000	Completed Buildings excluding Dwellings £'000	Dwellings £'000	Buildings Under Construction £'000	Information Technology £'000	Plant & Equipment £'000	Fixtures & Fittings £'000	TOTAL £'000
Cost or Valuation								
At 1 April 2012	55,754	228,422	30,423	93,059	1,902	304	38	409,902
Additions	-	-	-	-	92	-	-	92
Valuation additions*	-	7,220	-	48,244	-	-	-	55,464
Impairment	(4,988)	(24,384)	-	-	-	-	-	(29,372)
Reclassification	-	(5,025)	-	5,025	(18)	(6)	6	(18)
Disposals	-	-	-	-	(1,699)	(176)	(33)	(1,908)
Revaluation	2,805	1,053	1,250	-	-	-	-	5,108
At 31 March 2013	53,571	207,286	31,673	146,328	277	122	11	439,268
Depreciation and Impairment								
At 1 April 2012	1	102,246	294	-	1,670	195	17	104,423
Provided during the year	-	7,673	312	-	53	27	1	8,066
Impairment	-	(20,432)	-	-	-	-	-	(20,432)
Reclassification	-	-	-	-	(10)	-	23	13
Disposals	-	-	-	-	(1,551)	(147)	(30)	(1,728)
Revaluation	-	(2,923)	(312)	-	-	-	-	(3,235)
At 31 March 2013	1	86,564	294	-	162	75	11	87,107
Net Book Value								
At 31 March 2013	53,570	120,722	31,379	146,328	115	47	-	352,161
At 1 April 2012	55,753	126,176	30,129	93,059	232	109	21	305,479

*Where Institutes carry out development that results in a material change in value of the Council's owned assets, this is disclosed as a fixed asset valuation addition.

The land and buildings were professionally valued as at 31 March 2011 by external valuers, Powis Hughes Chartered Surveyors, in accordance with SAVP and RICS guidance notes. In between formal professional valuations, management have used appropriate indices to revalue the land and buildings. In addition to this valuation, Polaris House was revalued as at 31 March 2010 by Powis Hughes, as part of a valuation carried out by NERC.

All assets are owned.

14. IMPAIRMENT

During the year to 31 March 2014 there were impairments amounting to £5.61M (£8.94M in 2012-13). The impairments relate to properties on the site leased to the Institute of Food Research.

In accordance with the FReM, impairments are taken through the Statement of Comprehensive Net Expenditure.

15. INTANGIBLE ASSETS

	Website £'000	Computer Software £'000	Total £'000
Cost or Valuation			
At 1 April 2013	126	113	239
Additions	-	-	-
Valuation Additions	-	-	-
Reclassification	-	-	-
Disposals	-	-	-
Revaluation	-	-	-
At 31 March 2014	126	113	239
Amortisation			
At 1 April 2013	96	74	170
Provided During the Year	6	27	33
Disposals	-	-	-
Revaluation	-	-	-
Reclassification	-	-	-
At 31 March 2014	102	101	203
Net Book Value			
At 31 March 2014	24	12	36
At 1 April 2013	30	39	69
	Website £'000	Computer Software £'000	Total £'000
Cost or Valuation			
At 1 April 2012	92	421	513
Additions	34	-	34
Valuation additions	-	-	-
Reclassification	-	18	18
Disposals	-	(326)	(326)
Revaluation	-	-	-
At 31 March 2013	126	113	239
Amortisation			
At 1 April 2012	92	364	456
Provided during the year	4	(17)	(13)
Disposals	-	(260)	(260)
Revaluation	-	-	-
Reclassification	-	(13)	(13)
At 31 March 2013	96	74	170
Net Book Value			
At 31 March 2013	30	39	69
At 1 April 2012	0	57	57

All additions to intangible assets arose from external purchases and services that were bought in. No element of intangible assets is internally generated or acquired as part of a business acquisition.

16. ASSETS CLASSIFIED AS HELD FOR SALE

	2013-14 £'000	2012-13 £'000
1 April 2013	3,933	3,933
Additions and capital improvement	-	-
Revaluation	(163)	-
Reclassification	-	-
Disposal	(3,200)	-
31 March 2014	570	3,933

The assets held for sale as at 1 April 2013 include a site that became surplus to requirements during 2012-13. The site was valued at £3.1M and was sold in January 2014. In addition, the opening balance includes several buildings at Skedsbush and one building at Compton that are surplus to requirements. The building at Compton was sold in October 2013 and the remaining assets are expected to be sold in 2014-15.

17. TRADE RECEIVABLES AND OTHER CURRENT ASSETS

	2013-14 £'000	2012-13 £'000
Amounts falling due within one year		
Trade Receivables	2,653	6,960
Other Receivables	4,670	4,769
Repayment of Early Retirement Lump Sums*	678	1,115
	8,001	12,884
Prepayments and Accrued Income		
Research Grants	-	-
Training Awards	10,537	10,733
Other	5,678	6,044
	16,215	16,777
	24,216	29,621
Amounts falling due after one year		
Repayment of Early Retirement Lump Sums	980	1,571
Other Receivables **	-	9,657
	980	11,228
Total Receivables	25,196	40,849

* Cash received from the Research Councils' Pension Schemes (RCPS) in 2013-14 in repayment of Early Retirement Lump Sums (ERLS) was £1,115k (2012-13: £1,139k)

17a. TRADE RECEIVABLES AND OTHER CURRENT ASSETS BY SOURCE

	2013-14 £'000	2012-13 £'000
i) Amounts falling due within one year		
Other Central Government Bodies	6,843	11,592
Bodies External to Government	17,373	18,029
Total	24,216	29,621
ii) Amounts falling due after one year		
Other Central Government Bodies	980	1,571
Bodies External to Government	-	9,657
Total	980	11,228

18. TRADE AND OTHER PAYABLES AND OTHER CURRENT LIABILITIES

	31 March 2014 £'000	31 March 2013 £'000
Amounts falling due within one year		
Trade Payables	11,998	8,635
Deferred Income	5,251	5,662
Other Payables	585	570
	<u>17,834</u>	<u>14,867</u>
Accruals		
Research Grants	21,215	20,117
Other	9,992	27,277
	<u>31,207</u>	<u>47,394</u>
	<u><u>49,041</u></u>	<u><u>62,261</u></u>

18a. TRADE AND OTHER PAYABLES BY SOURCE

	31 March 2014 £'000	31 March 2013 £'000
Current		
Other Central Government Bodies	10,122	13,003
Bodies External to Government	38,919	49,258
	<u>49,041</u>	<u>62,261</u>
Total	<u><u>49,041</u></u>	<u><u>62,261</u></u>

19. NET PARLIAMENTARY FUNDING

	2013-14 £'000	2012-13 £'000
Amount provided by BIS - Capital Funding	111,900	103,300
Amount provided by BIS - Revenue Funding	331,033	421,350
Animal Licences Provided by BIS	125	125
	<u>443,058</u>	<u>524,775</u>
Net Parliamentary Funding	<u><u>443,058</u></u>	<u><u>524,775</u></u>

20. NOTES TO THE CASH FLOW STATEMENT

	31 March 2014 £'000	31 March 2013 £'000
Reconciliation of movement in cash to movement in net funds		
Cash as at 1 April 2013	56,950	5,784
(Decrease)/Increase in cash in the year	(48,783)	51,166
Cash as at 31 March 2014	8,167	56,950
Breakdown of Balances	31 March 2014 £'000	31 March 2013 £'000
Citybank	5,747	54,426
Lloyds/Barclays Bank PLC	2,420	2,524
	8,167	56,950

21. FORWARD COMMITMENTS ON APPROVED RESEARCH GRANTS

	31 March 2014 £M	31 March 2013 £M	31 March 2012 £M
2012-13	-	-	239.9
2013-14	-	240.1	162.3
2014-15	250.3	178.3	83.6
2015-16	181.5	100.3	19.5
2016-17	104.3	58.0	4.6
After 2016-17	55.4	0.0	0.0
	591.5	576.7	509.9

22. CAPITAL COMMITMENTS

The majority of capital expenditure funded by BBSRC is on contracts let by sponsored institutes. Capital commitments as at 31 March 2014, for which no provision has been made, are as follows:

	2013-14	2012-13
	£'000	£'000
Authorised for contracts to be let, in some cases subject to full business case	190,227	232,223
Funding approved in principle:		
BBSRC contribution to capital equipment for strategically funded institutes	3,000	3,000
BBSRC contribution to backlog maintenance and dilapidations on BBSRC estate	2,000	2,000
	195,227	237,223

Capital commitments for 2013-14 are £42M lower than in 2012-13 for two reasons: (i) several of BBSRC's major capital investment programmes are ending in 2014-15; and (ii) BBSRC has not yet received capital allocations beyond 2015-16, as these will be determined as part of the next comprehensive spending review.

23. OPERATING LEASE COMMITMENTS

BBSRC has one annual operating lease commitment under non-cancellable agreements as shown below:

	2013-14	2012-13
	£'000	£'000
Within 1 year	46	46
Between 2 and 5 years	92	-
After 5 years	-	-
	138	46

This is a lease held by UK Research Offices (UKRO) in Brussels as office accommodation. The lease is a 9 year lease, commencing 1 June 2011 with a break clause every 3 years. The rental amount is €55k per annum.

24. CONTINGENT LIABILITIES

The former BBSRC sponsored Roslin institute transferred to the University of Edinburgh on 13 May 2008. Should the university experience a fall in programme grant income between the transfer date and May 2015, BBSRC agreed to contribute to the cost of any redundancies that arise as a direct result of the transfer. The level of BBSRC's contribution is dependent upon both the size and year of income reduction. BBSRC also agreed to provide indemnity for any potential costs that arise as a result of past actions of the institute and indemnity for any fall in grant income of the Neuropathogenesis Unit as a result of the transfer. The proportion of settlement BBSRC will fund declines on an annual basis and is limited to claims up to May 2023.

As part of the transfer of the former BBSRC sponsored IGER institute to the University of Aberystwyth, certain key staff from IGER moved to Nottingham University. BBSRC agreed to underwrite a sum of £340K over a 5 year period starting in 2011-12, in case the newly formed Research Group fails to win additional grant funding in this time. BBSRC has encouraged this strategic link between Nottingham University and IBERS at the University of Aberystwyth to maximise the potential synergies, particularly between work on wheat, grasses and roots.

As part of a Sale Agreement relating to a previous BBSRC site, BBSRC agreed to indemnify the purchaser against contamination resulting from dangerous substances. The indemnity was over a 10-year period and was capped at £3M.

25. RELATED PARTY TRANSACTIONS

The BBSRC is a Non-Departmental Public Body sponsored by the Department for Business, Innovation and Skills (BIS).

For the purposes of IAS 8, BIS and its partner organisations are regarded as related parties. During the year, the BBSRC has had various material transactions with BIS and entities for which BIS is regarded as the parent department, including: Arts and Humanities Research Council, Economic and Social Research Council, Engineering and Physical Sciences Research Council, Medical Research Council, Natural Environment Research Council, Science Technology and Facilities Council, Technology Strategy Board, UK Space Agency, the Higher Education Funding Council of England.

BBSRC also had a number of related transactions with the UK Shared Business Services Ltd (UK SBS), as set out in the notes to these accounts.

During 2012-13 BBSRC's previous Chief Executive and Accounting Officer, Professor Douglas Kell, (appointment: 1 October 2008 - 18 October 2013) attended BBSRC Council as the Deputy Chair, whilst also continuing to work one day a week with the Manchester Interdisciplinary Biocentre (MIB), part of the University of Manchester. Professor Kell abstained from any discussions with relation to the University of Manchester while working for BBSRC. All BBSRC grants where Professor Kell was the principle investigator were transferred from Professor Kell prior to his employment with BBSRC, with the exception of one grant where the final payment of £48K was paid on receipt of the final report, which occurred after 1 October 2008.

On 21 October 2013 Professor Jackie Hunter became BBSRC's Chief Executive and Accounting Officer.

The accounts provide disclosure of all material transactions with those who are recognised as key management personnel as per IAS 24 'Related Parties'. This is taken to be those members of staff who are included under Executive Directors' remuneration in the Remuneration Report and all Council members.

During the year BBSRC did not undertake any material transactions with any Directors, however during the year, the following material payments with Council members' organisations took place in respect of research and training grants funded by the BBSRC:

	<u>Awards</u>	<u>£</u>
Professor Sir Tom Blundell FRS	1	22,983
Professor Anne Dell CBE FRS	1	268,104
Professor Sarah Gurr	1	136,831
Professor Carole Goble	2	207,830
Professor David Richardson	1	30,742

The following Council members held positions on the Governing Bodies of sponsored research institutes:

Dr David Lawrence	Rothamsted Research
Mr David Gregory	Institute for Food Research

Registers of interest for Council, Boards and Committees can be found at www.bbsrc.ac.uk

The following Council staff held positions on the Governing Bodies of sponsored institutes and centres

Mr Paul Gemmill	The Pirbright Institute
Mr Steve Visscher	Norwich Research Partners LLP
Mr David Parfrey	Colney Innovations Ltd /BBT Ltd
Dr Celia Caulcott	Plant Bioscience Ltd

BBSRC sponsors six research institutes, which conduct long-term, mission-orientated research using specialist facilities that are in line with BBSRC's priorities. BBSRC provides Strategic Programme Grants to the institutes to fund specific research programmes. The sponsored institutes have separate charitable status and an independent governing body oversees the institutes' activities.

	Grants		Receivables (including loans)		Payables		Major Provision In Year	
	13-14	12-13	13-14	12-13	13-14	12-13	13-14	12-13
	£M	£M	£M	£M	£M	£M	£M	£M
Transactions with BBSRC-Sponsored Institutes								
Babraham Institute*	28.80	32.10	0.03	-	0.90	3.28	-	-
The Pirbright Institute *	44.30	66.80	0.07	0.19	5.23	5.86	-	-
Institute of Food Research*	17.90	12.70	0.14	-	0.48	0.18	-	-
John Innes Centre	33.30	32.60	1.39	1.67	0.87	1.60	-	-
Rothamsted Research	32.90	27.20	0.22	0.13	1.44	4.77	-	-
The Genome Analysis Centre	7.40	9.20	-	-	0.13	0.90	-	-
	164.60	180.60	1.85	1.99	9.05	16.59	-	-
Transactions with former BBSRC-Sponsored Institutes								
Institute of Grassland and Environmental Research	10.50	8.40	-	-	3.71	0.50	-	-
Roslin Institute	8.70	11.60	-	-	-	0.08	-	-
	19.20	20.00	-	-	3.71	0.58	-	-
Transactions with other related parties								
Babraham Bioscience Technologies Ltd	16.80	-	-	9.53	0.26	0.56	-	-
Norwich Research Partners Limited Liability Partnership	16.40	-	-	-	2.40	-	-	-
Rainbow Seed Fund	-	-	-	-	-	-	-	-
UK SBS	-	-	0.14	0.80	0.36	0.53	-	-
	33.20	-	0.14	10.33	3.02	1.09	-	-
Total	217.00	200.60	1.99	12.32	15.78	18.26	-	-

*Institutes occupying BBSRC-owned estate at peppercorn rents.

	Receivables		Payables	
	13-14	12-13	13-14	12-13
	£M	£M	£M	£M
	(see note 17)		(see note 18)	
Non-Institute:				
Within the WGA Boundary				
Other Research Councils	1.30	5.23	1.46	2.60
Other Government Organisations	1.13	0.83	2.92	3.90
Research Councils' Pensions Schemes	5.18	6.31	0.15	0.12
Non WGA				
Other Debtors (including Universities)	15.59	16.16	28.74	37.38
	23.20	28.53	33.27	44.00
BBSRC-Sponsored Institutes & Other Related Parties	1.99	12.32	15.78	17.70
	25.19	40.85	49.05	61.70

26. DERIVATIVES AND OTHER FINANCIAL INSTRUMENTS

As the cash requirements of BBSRC are met through Grant in Aid provided by BIS, financial instruments play a more limited role in creating and managing risk than would apply to a non-public sector body. The majority of financial instruments relate to contracts to buy non-financial items in line with BBSRC's expected purchase and usage requirements and BBSRC is therefore exposed to little credit, liquidity or market risk.

CURRENCY RISK

The Council's exposure to foreign currency risk was not significant during the year.

Through the use of forward contracts, the Council seeks to mitigate its risk of foreign exchange rate movements on its foreign currency transactions.

For 2013-14 a contract with an agreed cost of £1.275M has been fair valued (using the forward rate ruling at 31st March 2014) at £1.204M with the difference being debited to the General Reserve.

	Amount	Settlement date	Cost	Fair Value at 31 March 2014	Fair Value at 31 March 2013	Difference to reserves
	US\$			£	£	£
Contract date						
24/11/2011	2,000,000	23/05/2014	1,275,104	1,204,819	1,310,101	70,285
			1,275,104	1,204,819	1,310,101	70,285

27. EVENTS AFTER REPORTING PERIOD

There have been no material events between the Statement of Financial Position date and the date the accounts were authorised for issue, requiring an adjustment to the financial statements. The date the accounts were authorised for issue is interpreted as the date of the Certificate and Report of the Comptroller and Auditor General.

BBSRC Institutes and Centres

- Babraham Institute
- Institute of Biological, Environmental and Rural Sciences at the University of Aberystwyth
- Institute of Food Research
- John Innes Centre
- Roslin Institute at The University of Edinburgh
- Rothamsted Research
- North Wyke Research
- The Genome Analysis Centre
- The Pirbright Institute
- BBSRC Sustainable Bioenergy Centre
- Centre for Integrated Systems Biology of Ageing and Nutrition
- Centre for Integrative Systems Biology at Imperial College
- Manchester Centre for Integrative Systems Biology
- Centre for Systems Biology at Edinburgh
- Centre for Plant Integrative Biology
- Oxford Centre for Integrative Systems Biology

Our current strategic partners are:

- Imperial College, London
- The University of Edinburgh
- University of Cambridge
- The University of Nottingham
- University of Oxford
- University of Bristol
- The University of Warwick
- University of East Anglia
- Aberystwyth University

Acronyms

AFRC	Agricultural and Food Research Council	IFR	Institute of Food Research
AHRC	Arts and Humanities Research Council	INRA	Institut National de la Recherche Agronomique
ARC	Animal Health Research Club	IWYP	International Wheat Yield Partnership
ATP	Advanced Training Partnership	JIC	John Innes Centre
BBSRC	Biotechnology and Biological Sciences Research Council	LLHW	Life Long Health and Wellbeing
BI	Babraham Institute	MRC	Medical Research Council
BIS	Department for Business, Innovation and Skills	NC3R	The National Centre for the Replacement, Refinement and Reduction of Animals in Research
BRIC	Bioprocessing Research Industry Club	NDPB	Non-Departmental Public Body
CIMMYT	International Maize & Wheat Improvement Center	NERC	Natural Environment Research Council
	Advanced Training Partnership	NFU	National Farmers Union
CIRC	Crop Improvement Research Club	NIBB	Networks in Industrial Biotechnology & Biocenergy
CPD	Continuing Professional Development	NRP LLP	Norwich Research Partners Limited Liability Partnership
DBT India	Department of Biotechnology of the Indian Ministry of Science and Technology	NSF	US National Science Foundation
Defra	Department for Environment, Food and Rural Affairs	PBL	Plant Bioscience Ltd
DFID	Department for International Development	RBL	Roslin BioCentre Ltd
DRINC	Diet and Health Research Industry Club	RCUK	Research Councils UK
EEID	Ecology and Evolution of Infectious Diseases	RI	Roslin Institute
ESRC	Economic and Social Research Council	RRES	Rothamsted Research
EPSRC	Engineering and Physical Sciences Research Council	SAGARPA	Secretariat of Agriculture, Livestock, Rural Development, Fisheries & Food of Mexico
FoF	Follow on Fund	SCRI	Scottish Crop Research Initiative
GFS	Global Food Security	SERC	Science and Engineering Research Council
HEFCE	Higher Education Funding Council for England	sLoLas	Strategic Longer Larger grants
HEI	Higher Education Institution	STFC	Science and Technology Facilities Council
HSE	Health and Safety Executive	TGAC	The Genome Analysis Centre
IBBE	Industrial Biotechnology & Biocenergy	TPI	The Pirbright Institute
IBERS	Institute of Biological, Environmental and Rural Sciences	TSB	Technology Strategy Board
IBTI	Integrated Biorefining Research and Technology Club	UK SBS	UK Shared Business Services Ltd
		USAID	US Agency for International Development
		WT	Wellcome Trust