

CSO bulletin

Medical
Respiratory Physiology
Clinical Engineering
Cellular Sciences
Respiratory Physiology
Infection Sciences
Blood Sciences
Modernising Scientific Careers

Diary date
CSO Conference 2010
23 & 24 November London
Please mark these
dates in your diary

Good communication sits at the heart of exploration, understanding and relationships. It is something that requires commitment and effort from all parties to make it successful and it is never more so than for the healthcare science workforce as they respond to the future challenges in the NHS.

The CSO Bulletin is one of the main vehicles for getting messages across and our plan for the next year includes moving to a more frequent production and increasing the subscriber base. This issue is being distributed much wider than before and we hope it stimulates both interest and discussion.

The response to the UK consultation on Modernising Scientific Careers – *Modernising Scientific Careers: The UK Way Forward* together with the independent analysis of the responses carried out by IPSOS Mori is now published and available electronically on the DH website. This will be followed by the England Action Plan. In recognition of the need for regular updates on progress towards

implementation, there will be a new specific newsletter – *MSC Matters* – which will be included in future issues of the CSO Bulletin and distributed through SHAs and professional bodies.

The CSO webpages will play a key role in ensuring all of the information is in one place and regularly updated. The CSO pages are located at: www.dh.gov.uk/cso

This particular issue of the Bulletin is mainly dedicated to the CSO conference attended by over 250 frontline staff and once again superbly hosted by Vivienne Parry. The conference provided a unique blend of cutting edge science as well as focused discussions on the NHS and quality and innovation. Where permission has been given, the speeches, films and presentations from the 2 days are available to access by clicking on the boxed links.

One of the highlights of the conference was the presentation of the annual Healthcare Science Awards which is also covered in this issue. Congratulations

to all the winners and runners up. You truly do make a difference. Finally, in this issue there is a focus on quality and productivity and the role of clinicians in the NHS.

Your views are important to us so please email any feedback to cso.bulletin@dh.gsi.gov.uk

**Kind regards
Professor Sue Hill OBE,
Chief Scientific Officer (CSO)**



Professor Sue Hill OBE,
Chief Scientific Officer (CSO)

View from Sue

Future of the NHS & Delivering High Quality Care for All

Chief Scientific Officer, Professor Sue Hill OBE, NHS Chief Executive David Nicholson and Professor Sir Bruce Keogh, NHS Medical Director outlined their visions for the future of the NHS and the role of the Healthcare Science workforce in helping to realise this.



"The healthcare science workforce needs to be better integrated, and really recognised for their contribution to care"

Professor Sue Hill OBE, Chief Scientific Officer, Conference Introduction

"This is an important time for the NHS, and an important time for Healthcare Scientists".

"Quality should be the organising principle of the NHS. Identifying quality as effectiveness, safety and patient experience has been a really important part of our journey".

David Nicholson CBE, NHS Chief Executive, Keynote Address

David Nicholson
Keynote Address

Professor Sir Bruce Keogh
Speech

Quality

This was the overall theme of the Conference. Speakers talked about what Quality means to Healthcare Scientists, and the importance of patient outcomes, system regulation, patient experience, leadership and regulation.

"I'm a detective. I look for patterns and link them to information about symptoms from doctors to arrive at a diagnosis."

Nuthar Jassam, Senior Clinical Biochemist, Leeds Teaching Hospital Trust

"Quality assurance is at the absolute heart of what you do as a Healthcare Scientist."

Dr Mark Goldman, Chief Executive, Heart of England NHS Foundation Trust. Talking about 'Quality – the importance of leadership'

Science Futures – Regenerative Medicine

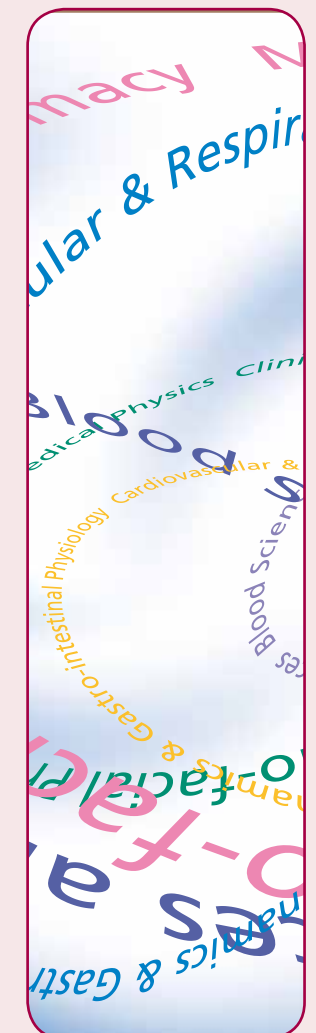
Three scientists working in the field of regenerative medicine presented their work at the Conference. It was also featured in the Independent on Sunday. The article features ground breaking work, presented at the Conference. Read more in the link to the article below, and watch the presentation by Professor Robert Brown, Director of UCL Tissue Repair and Engineering Centre on 'Rapid fabrication of living tissues'.



Professor Robert Brown

Extract from the Independent on Sunday article, 'Blood and guts: on the brink of a revolution' Sunday, 22 November 2009

Rapid fabrication film of living tissues



Science & the patient experience. Interview with Nuthar Jassam

Quality & the patient experience – Paul Streets OBE

Quality & patient outcomes – Professor Roger Boyle CBE

Quality & Regulation – Anne Close

Quality & Leadership Dr Mark Goldman

Science & the patient experience – Film of Alice

[Click here for all presentations](#)

Science, Society & Innovation

Professor Nicholas Stone, Consultant Clinical Scientist at Gloucestershire Hospitals NHS Foundation Trust, and Christopher Green, Clinical Physiologist Neurostimulation and Neurophysiology at Barts and the London NHS Trust are two leading scientists, both carrying out innovative work in Healthcare Science.

"Light making molecules dance within people"

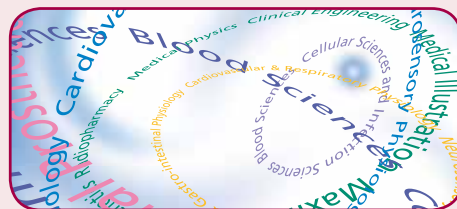
Professor Nicholas Stone

Professor Nicholas Stone has a track record in biophotonics research. He applies Raman light scattering to distinguish cancerous cells from normal cells. Clinical trials show strong evidence in early detection of cancer of the breast and oesophagus. He heads the Science board at the Institute of Physics and Engineering in Medicine.

Christopher Green jointly runs a neurostimulation clinic with neurologists and neurosurgeons. Neurostimulation involves a programmable device, similar to a pacemaker, which delivers an electric impulse through one or more electrodes which are implanted surgically. Deep brain stimulation (DBS) is used to treat a number of neurological diseases, principally those causing tremor and Parkinson's.

"I've seen patients transformed from shaking uncontrollably to being able to drink a glass of water without spilling it"

Christopher Green



David Kester, Chief Executive, Design Council

Sir Roland Jackson, Chief Executive of the British Science Association spoke to delegates about the case for wider public involvement in science. David Kester, Chief Executive of the Design Council spoke eloquently about his work with Healthcare Scientists to reduce hospital acquired infections of *C.difficile* through innovative, yet simple design.

Dr Tim Wreghitt OBE, Regional Microbiologist in the East of England,

led influenza testing during the recent swine flu epidemic and his talk to the Conference was enthusiastically received. His work in this area was recognised with the 'Healthcare Scientist of the Year Award'.

In a session on 'Science Futures – Diagnostics', Billy Boyle, the Director of Owlstone Nanotech Inc, gave an inspirational talk titled 'Labs in a Box', which is available for viewing, below:

[Innovation in Research – Neurostimulation](#)

[Interview with Professor Nicholas Stone & Christopher Green](#)

[Wider Public Involvement in Science](#)

[Innovative Design](#)

[Swine Flu – developing the diagnostic test](#)

[Labs in a Box](#)

[Click here for all presentations](#)

Healthcare Science Awards 2009

Healthcare Scientists are a workforce that often prefers to remain in the background. However, their extraordinarily diverse skills and work which pervade every facet of the patient experience in the NHS deserve not only wider recognition, but celebration. We had a large number of high quality entries for the 2009 awards which made judging the eventual recipients a difficult but exciting task given the variety of work. Set up by the Chief Scientific Officer, Professor Sue Hill OBE, below are the year's worthy winners below.



Professor Sue Hill OBE, Dr Tim Wreghitt OBE and Sir Roland Jackson

Young Healthcare Scientist of the Year Awarded to

Timothy McLean

Specialist Biomedical Scientist
Northwick Park Hospital, Harrow

[Click to access the video](#)

Runner-up

Katie Fitzsimmons

Biomedical Scientist
Clatterbridge Hospital, Wirral

Research & Development Award Awarded to

Professor Nicholas Stone

Consultant Clinical Scientist
Gloucestershire Hospitals NHS Foundation Trust

[Click to access the video](#)

Innovation & Technology Award Awarded to

Professor Andy Beavis

Head of Medical Physics
Hull & East Yorkshire NHS Trust

[Click to access the video](#)

Delivering Quality Award Awarded to

Dr Robert Elles

Consultant Clinical Scientist
Northwest Regional
Molecular Genetics Service

[Click to access the video](#)

Leadership Award Awarded to

Dr Val Davison

Director, West Midlands Regional
Genetics Laboratory

[Click to access the video](#)

Healthcare Scientist of the Year Awarded to

Dr Tim Wreghitt OBE

East of England
Regional Microbiologist
Health Protection Agency

[Click to access the video](#)

Lifetime Achievement Award Awarded to

Dr Alan McKenzie

Director of Medical Physics and
Bioengineering, Bristol Haematology
and Oncology Centre

[Click to access the video](#)



Professor Sue Hill OBE and Dr Alan McKenzie

What people thought of the Conference

Thank you to all those who completed evaluation forms on the Conference. Your feedback ensures we continually improve the event and enables us to respond as far as possible to what you would like to see at future events. One of the suggestions which we will look at taking forward is to have more networking opportunities for junior Healthcare Scientists with more senior Healthcare Scientists at the Conference.

88% felt that the content of the programme addressed the current Healthcare Science priorities for the health service

89% valued the opportunity to learn from other organisations

86% said that the Conference gave them time to focus on their development needs

89% said that they would do something different in their work as a result of attending the Conference

91% would consider returning to next year's Conference.

After the Conference...

As those of you know, who heard the wonderful Professor Heinz Wolff speak, the Conference does not end when you all go back to base. The work continues and in future issues of the CSO Bulletin, we will be following up on some of the pledges that delegates made at the Conference on quality and on how they would progress these back in their workplace.

Here are some of them...

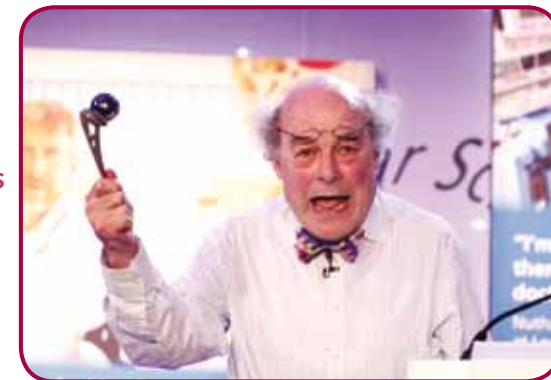
I PLEDGE TO...

"Monitor, maintain and improve (if necessary) the service I deliver despite very difficult times ahead in respect of large changes in very tight timescales"

"Ask patients questions instead of waiting for them to speak.
– Is there anything they want to know?
– How are they feeling?
– What are they looking for from this procedure?"

"Improve quality in productivity by matching the skills and training of the workforce to the most suitable tasks"

"Train people of all grades in the basics of good leadership and then enable them to exercise these skills"



Professor Heinz Wolff, after dinner speaker at the conference



Recent Events



Calling all healthcare scientists

Healthcare Science Week 2010
March 12-21
 Put it in your diary

The Chief Scientific Officer needs YOU to support Healthcare Science Week by:

- enthusiasing
- inspiring
- helping
- informing

Please... tomorrow's healthcare scientists

- register as a Healthcare Science Ambassador at www.stemnet.org.uk and help us to engage with local schools for the 'Diagnose It' competition
- put up posters or give a lunchtime talk to other health professionals
- tell patients how important you are!

Get involved - email us now at diagnoseit@dh.gsi.gov.uk

Diagnose it!

Healthcare Science Week 2010

Become a Healthcare Science Ambassador

- **Healthcare Science Week 2010** took place during National Science and Engineering week 12th–21st March 2010. The national schools competition – ‘Diagnose it! – in the NHS’ links Healthcare Science Ambassadors across the 45 specialisms to their local schools so they can raise the profile of the amazing work carried out by Healthcare Scientists in the NHS. Entries close on the 31st of May 2010. There will be a further update on Healthcare Science Week in the future.

- **The Big Bang Fair 2010** took place from 11th–13th March in the Manchester Central Convention Complex. It was a great success and was very well received by students, teachers, parents and science employers. It was a fantastic opportunity to promote Healthcare Science and with 6,000 visitors each day, reached out to more people than ever before. At the Event, the Office of the Chief Scientific Officer came together with nearly fifty organisations from the public and private sectors to help support the Fair. The feedback from teachers was that this year’s Healthcare Science Week competition called ‘Diagnose it! – in the NHS’ was ideal as many children were looking at new ways of deciding upon their careers. A big thank you to all those who worked so hard to make the Event such a success. As a result, there is now much follow up work to be done on carrying forward the momentum of how Healthcare Science is promoted both inside and outside the NHS. More news on the Fair is available at www.thebigbangfair.co.uk

- **The Chief Scientific Officer** is creating a national network of Healthcare Science ambassadors in collaboration with STEMNET (Science, Technology, Engineering and Mathematics Network), to support schools’ science activities and to raise awareness of the diversity of career opportunities that Healthcare Science professions provide.



Girls at the Big Bang Fair



Quality, Innovation, Productivity & Prevention

The quality, innovation, productivity and prevention (QIPP) programme is setting up a joined-up system for change at a local, regional and national level. Led by Jim Easton, National Director for Improvement and Efficiency, the programme aims to help the NHS identify and release £15–20 billion of efficiency savings while protecting and improving the quality of care delivered to each and every patient.

The programme kicked off by meeting NHS staff and our partners to find out where they wanted us to start to make a difference. These discussions informed the creation of the first QIPP workstreams which began work last month. Jim has asked leaders from the NHS and its partner organisations with relevant and specialist experience to drive the workstreams.

There are elements of each workstream that will involve healthcare scientists but in particular the work on safe care and clinical support rationalisation, which is starting with pathology, will have the most relevance at first.

The safe care workstream is led by Dr Maxine Power, National Improvement Adviser in the QIPP team and the clinical support workstream is led by Ian Barnes, National Clinical Director for Pathology.

[Click here for the full list of workstreams and leads](#)

Introduction to QIPP for Clinicians

The NHS has one more year of guaranteed growth. In 2010/11 funding will rise by 5.5%, after that funding will rise only in line with inflation. This means there will be less money to continue to deliver the high quality care that has been achieved in the NHS in recent years.

The quality, innovation, productivity and prevention (QIPP) challenge is a programme of activity that protects the funding that NHS staff need to deliver high quality care by eliminating waste and making cash savings.

The future of the NHS and the ability for it to continue to deliver healthcare free at the point of delivery depends on frontline staff taking action now to make cash savings while at the same time protecting and improving their ability to deliver quality care to all patients in all care settings.

Introduction to QIPP is a document written by clinicians, for clinicians. It explains the economic reality of funding over the next five years. It also uses real life examples of where staff are already meeting the QIPP challenge and *demonstrates the quality and financial benefits they are making.*

Introduction to QIPP is just the start of a process of transformative change. It will inspire clinicians to look at how they and their team work and make lasting and positive changes.

Introduction to QIPP is available on the DH website.

www.dh.gov.uk/qualityandproductivity