

Report

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The King's College London annual REPORT reviews the university's work each year by featuring a sample of the research and teaching currently taking place at King's. It is the President & Principal's report to the College Council. This edition of the REPORT covers the year 2013-14.

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King's College London is one of the top 20 universities in the world and among the oldest in England. In 2013-14 King's had nearly 26,000 students (of whom some 10,600 were graduate students) from some 140 countries worldwide, and some 7,000 staff.

King's has an outstanding reputation for world-class teaching and cutting-edge research. It was ranked sixth nationally in the 'power' ranking in the 2014 Research Excellence Framework (REF), and is in the top seven UK universities for research earnings. In the year ending July 2014 it had an annual income of more than £600 million.

King's has a particularly distinguished reputation in the humanities, law, the sciences (including a wide range of health areas such as psychiatry, medicine, nursing and dentistry) and social sciences including international affairs. It has played a major role in many of the advances that have shaped modern life, such as the discovery of the structure of DNA and research that led to the development of radio, television, mobile phones and radar.

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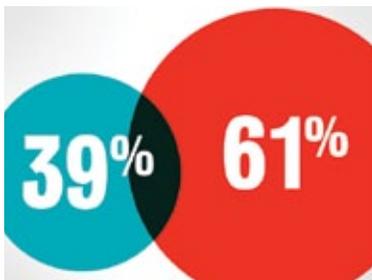
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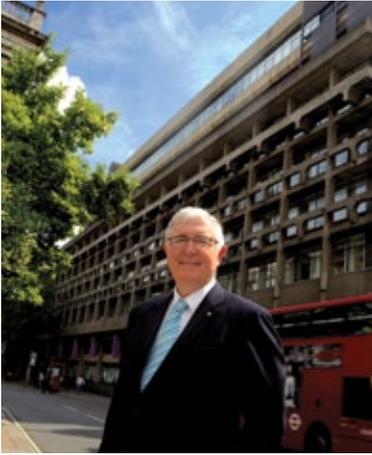
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Professor Edward Byrne AC
Principal & President

I was delighted to join King's in September 2014: a great university with a long tradition of excellence that I have followed for many years.

It is a particular testimony to the leadership of my predecessor, Professor Sir Richard Trainor, that in the latest QS university rankings King's has advanced from 19th to 16th place in the world, while in the Research Excellence Framework, published in December 2014, King's research was rated sixth for power in the UK, and seventh for quality. His report which follows reflects on the changes and advances of the ten years of his principalship.

I am committed to building upon this impressive legacy in order to achieve a secure and consolidated

position for King's amongst the global elite universities for education and research. Building on a decade of undoubted success, we will move forward with confidence, clarity of purpose, and at a pace aligned with external challenges and opportunities, to secure an enduring position for King's among the world's top 20 universities.

This will involve reviewing the size and academic shape of the university; ensuring we strike the right balance between research and education, and being clear about how we choose to respond to the opportunities a global market brings. We need to be aware that the higher education world is changing rapidly: with funding policy, technology, global competition, greater collaboration and a requirement to demonstrate 'impact' all driving change and acting as disruptive forces upon the sector.

All of these represent not only a challenge to King's but also great opportunities. King's has all the building blocks in place to aspire to this vision. It has a great tradition. It is renowned internationally. It has wonderful academic strengths in many key areas. It is right at the heart of London, at a time when London has again consolidated its position as one of the world's greatest cities. I believe King's has massive opportunities to rise with London, to become a London university second to none, and to consolidate a position among the very greatest of the world's universities.

Professor Edward Byrne AC

was President and Vice-Chancellor of Monash University, the largest university in Australia, from 2009 to 2014. Whilst there he established a new campus in Suzhou, China, and fostered a major alliance with the University of Warwick, and during his tenure Monash's position in the global university rankings rose significantly. From 2007 to 2009

he held the positions of Executive Dean of the Faculty of Biomedical Sciences, Head of the University College Hospital and Royal Free Medical School and Vice Provost at University College London.

A neuroscientist and clinician by background, Professor Byrne has held many prestigious clinical and research positions in Australia and the UK, as well as advisory roles for a number

of charitable bodies relating to his clinical and scientific expertise. He received the AO (Officer of the Order of Australia) in 2006 and the AC (Companion of the Order of Australia) in 2014. He has wide interests in the arts and has written several books of poetry.



**Professor Sir Richard Trainor
Principal & President 2004-14**

Professor Sir Richard Trainor was Principal & President of King's from 2004 to 2014. Here he looks back over the major events and developments of the decade.

Perhaps the most memorable single event for me was the visit of The Queen and The Duke of Edinburgh for the opening of the Somerset House East Wing in February 2012: not only because this was a spectacular occasion by anybody's standards, but also because, as a historian, I was especially aware that this was the culmination of more than 180 years of the College's attempts to secure this major objective. I am proud that the East Wing now provides a highly prestigious new home for The Dickson Poon School of Law, and a base for the Cultural Institute at King's, including a fine space for exhibitions and performances in the Inigo Rooms.

Such opportunities to welcome distinguished visitors to King's have been a great pleasure for me, and I remember with particular satisfaction the visits of our most celebrated alumnus, Archbishop Desmond Tutu, and of other major figures such as former UN Secretary General, Kofi Annan; Dr Rowan

Williams when he was Archbishop of Canterbury; King's alumnus and 2013 Nobel Physics Laureate Professor Peter Higgs; US Defense Secretary Leon Panetta; Tony Blair and Gordon Brown when each was Prime Minister, and the former Prime Minister Sir John Major, distinguished Chairman of our fundraising campaign and, since November 2013, an honorary doctor of King's. The frequency and importance of these visitors demonstrates the considerable and rising prominence of King's during the last decade.

Besides Somerset House East Wing, important capital developments in this decade include the creation at the Denmark Hill Campus of the Maurice Wohl Clinical Neuroscience Institute; the Cicely Saunders Institute of Palliative Care & Rehabilitation and the James Black Centre, where much of the work is in cardiovascular research. At the Strand Campus there have been major refurbishments to the King's and Strand Buildings. During these years the College acquired a lease on the Virginia Woolf Building in Kingsway, and there have been major improvements at the Institute of Psychiatry at Denmark Hill. Also at Denmark Hill, the completely reconfigured and much expanded Champion Hill Residence offers magnificent new

accommodation for students from September 2014, while work has begun to develop the former Mulberry Business Park at Canada Water, London SE16, to provide 770 new student rooms and office and other premises.

Fundraising success

Another great source of satisfaction for me is the spectacular success of our World questions|KING'S *answers* fundraising campaign, the largest such campaign for any UK university outside Oxbridge. Thanks to the generous contributions of our alumni, friends and supporters, and the excellence of our fundraising team, we met our target of £500 million some 18 months sooner than we had expected. King's campaign efforts will continue in earnest, however, as there remains much still to be done to address some of the world's most challenging problems, particularly in the areas of cancer, child health, neuroscience and mental health, leadership and society, and the emerging world order. The campaign also provides financial support for scholarships, bursaries and many students' organisations. Building on the success of the past four years, King's is looking to raise an additional £100 million by the end of 2015. I am particularly delighted to have been able to



01 Recent visitors to King's have included former UN Secretary-General, Kofi Annan.



02 HM The Queen opened the Somerset House East Wing in 2012.

thank many of our donors and supporters for their help, at events around the world. Greatly assisted by my wife Marguerite Dupree (and occasionally by our daughter Meg), and by a range of colleagues in Fundraising and in External Relations, I was able to hold events for our enthusiastic and loyal alumni on all six inhabited continents!

One of the factors that has undoubtedly contributed to the success of the campaign is the College's increased international reputation. In particular, the College's ranking in the prestigious QS global table of universities (which measures academic reputation, employer recognition, academic staff to student ratio, citations per academic and the proportion of international academics and students) has risen from the 90s to 16th, establishing King's as a major international academic player. This standing has been confirmed by King's extremely successful performance in the 2014 Research Excellence Framework. The proportion of international students at King's has risen from about one in five in 2004 to more than one in three now, with 40 per cent of the academic staff coming from outside the UK. As an American (now a dual national) who took over from an Australian, and who has now handed over to another Australian, I can say that this internationalism

is good not only because it boosts the global status of King's, but also because it helps to prepare King's students for an increasingly globalised world.

Internationalisation has also been a major theme of the College's activities: in particular through King's new global institutes, which provide world-leading opportunities to research and study some of the world's most important emerging powers, including India, China, Russia and Brazil. It was a great pleasure for me to visit Brazil at the end of July 2014, in order to open a new international office in São Paulo and to conduct alumni events there and in Rio. At the same time, King's continued to develop its partnerships with a number of prestigious universities around the world – in the USA, Hong Kong, India, Singapore and Brazil – in order to enhance research, enable the transfer of knowledge and provide opportunities for staff and student exchanges.

Rise in students

The increase in our international student numbers has taken place as part of a significant growth in the College's student population overall, which has risen by over one-third in the last 10 years, to stand at nearly 26,000 in 2014. Thanks to the development of innovative and wide-ranging

postgraduate courses and PhD programmes, including, from 2012, the King's Interdisciplinary Social Science Doctoral Training Centre (a major postgraduate training initiative funded with some £6 million from the Economic and Social Research Council), the number of postgraduate students has nearly doubled, from around 5,400 to 10,600, while the number of undergraduate students has also increased by over 1,300 to more than 15,000.

The foundation of King's in 1829 preceded that of the University of London by some seven years, and the relationship between the College and the University has changed and developed greatly during the past 180 years, and especially during the last 20. One of the most important developments during my tenure as Principal, reflecting the College's increasing stature and autonomy, was King's acquisition in 2008 of its own degree-awarding powers. To mark this event King's commissioned new and unique graduation gowns and hoods from the designer Vivienne Westwood. Dame Vivienne took what is essentially mediaeval costume and gave it a colourful and elegant update for the 21st century, contributing greatly to the stylishness of our graduation ceremonies.

Heart of London

King's is located in the heart of London, and another area of the College's development which has been important to me is in the strengthening of our relations with what is arguably the world's greatest city, and with the great London institutions among which King's finds itself: in particular, through our partnerships in health and culture. 2008 also saw the foundation of King's Health Partners (KHP) as one of England's first five Academic Health Science Centres: a pioneering collaboration between the College and the three NHS Foundation Trusts in southeast London, bringing together world-class research, teaching and clinical practice for the benefit of patients. It was very encouraging that in April 2014 KHP was re-accredited by the Department of Health for a further five years: one of only six centres to receive this status. Meanwhile, King's strong participation since 2011 in the Francis Crick Institute (formerly the UK Centre for Medical Research and Innovation), which will open in 2015 as a world-leading biomedical research institute in central London, means that the College is already attracting a number of world-class scientists excited by this ground-breaking initiative.

In cultural terms, for the last few years King's has been developing a really important role in London's vibrant arts and cultural scene through the Cultural Institute at King's. Through partnership, culture adds value to the College's research, teaching and learning programmes, while supporting the institution in widening its impact, addressing challenges and capitalising on new opportunities. Cultural Institute at King's connects the College's academic faculties with practitioners, producers, policy-makers and participants across arts and culture to drive innovation and provoke new approaches to the generation of knowledge. Culture

at King's is integral to the College's ambitions to enhance the student and academic experience, to engage a wider and more diverse public and to strengthen the College's partnerships with the impressive array of arts organisations on its doorstep and beyond. Particularly pleasurable memories for me in this area are some of the exhibitions in the Inigo Rooms, including those focusing on DNA in the 60th anniversary year of the discovery of the molecule's structure at King's in 1953, and on the work of Derek Jarman and of Beryl Bainbridge in 2014.

Widening participation

Another area I am particularly proud of is King's measures to widen the participation of students from backgrounds that have not traditionally benefited from higher education. The College's bursaries, scholarships and outreach schemes aim to ensure that lack of money does not get in the way of students who would benefit from what King's offers. This array of 'access' initiatives reduces the impact of the higher fees for UK undergraduates on the social profile of King's students and allows the College to continue to move in the direction of greater social diversity.

During the 1980s and 1990s King's grew in size and range through five major mergers. The College developed from a relatively small, single-campus institution to one which now has four Thames-side campuses in the heart of London, together with the Denmark Hill Campus and the Defence Studies Department at the Joint Services Command and Staff College at Shrivenham, Wiltshire. King's has been able to build on this rich legacy of mergers, and on excellence in its components, in order to construct a university that is much greater than the sum of its parts: firmly establishing it as a major international and national academic presence, and one which is launched

on what seems a self-sustaining rise to greater prominence and influence. King's is now a much more coherent institution than it was 10 years ago, and it is increasingly characterised by academic initiatives which link the various campuses and also, as in the case of humanities and health, or social science health and medicine, bridge the boundary between the Arts and Sciences faculties and the Health faculties.

It is much clearer in 2014 than it was in 2004 when I arrived, how rapidly higher education and its environment is changing, both nationally and internationally. In this dynamic environment, King's has become a large, complex and exciting institution with a vast range of prestigious academic activity and huge external impact. It has been a great privilege to be at the centre of all this and to help to shape the College in order to advance its role 'in the service of society'. What has been achieved has been a team effort. My work at King's depended on my immediate colleagues – and on colleagues across the institution, the chairmen and members of the College Council, students (not least the sabbatical officers and staff of KCLSU), alumni (leaders, staff and active members) and numerous other friends of King's. There is much yet to do, but I am confident that still greater heights will be scaled by the King's team under the very able leadership of my successor.

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King's student population has risen by over one-third in the last 10 years.

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Comedian Jo Brand received an honorary fellowship of King's from the Chairman of College Council, Lord Douro, and Professor Trainor in July 2014.

Tributes

Leading tributes to Professor Trainor, Lord Douro (now the The Duke of Wellington), Chairman of the College Council, described him as 'a highly distinguished leader, under whose guidance King's academic strengths have improved substantially.' Achievements highlighted by Lord Douro included the formation of King's Health Partners Academic Health Sciences Centre; the acquisition of the East Wing of Somerset House, and Professor Trainor's leading role in the great success of the King's fundraising campaign. 'On behalf of the whole College community, I extend our gratitude to Professor Trainor for his skill and commitment in progressing the College's interests since 2004,' Lord Douro said. Vice-Principal Professor Sir Robert Lechler mentioned the outstanding features of Professor Trainor's leadership:

his fairness, consistency and integrity; his wisdom and sound judgement in the many complex challenges and dilemmas facing King's; his hard work, and his consummate professionalism. 'Every visitor and every speech is approached by him with the same care and attention to detail, and with warmth and personal charm,' he said. 'The style of his leadership is reflected in the many ways in which King's is in a much stronger position than when he joined the College, and in his leaving King's in a substantially better place than he found it.'

Deborah Bull, Director of Cultural Partnerships at King's, described how 'Under Rick, the College seems to have woken up to the potential of its location here in the heart of one of the world's great international cities, recognising that King's should be renowned not just for its impressive achievements in health but also in arts and sciences. He has done a great job of connecting

King's to its neighbours and its sector stakeholders, and his support and engagement with this agenda has been crucial to its success.' She described how Professor Trainor often quoted the College's mission, to act in service of society, as a guiding principle: 'not just in areas where impact is easy to prove but in those harder to pin down areas of arts and humanities, too.'

'King's has always had heart and soul as well as intellectual achievement, but under Rick's leadership, its heart and soul have shone just a little bit brighter,' she added.

... a highly distinguished leader, under whose guidance King's academic strengths have improved substantially.

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World university

King's has received two recent confirmations of its strong and rising status for world-class teaching and cutting-edge research among the world's top universities. In September 2014 King's was ranked 16th in the world in the QS World University Rankings of the top 850 global higher education institutions, rising by three places internationally and up by one place to fifth in the UK. In the 10 years of these rankings King's has climbed 57 places, from 73rd in 2005 to 16th this year. In the 2014 Research Excellence Framework (REF, published in December 2014), King's was ranked sixth nationally in the 'power' ranking, which takes into account both the quality and quantity of research activity, and seventh for quality according to *Times Higher Education* rankings. Eighty-four per cent of research at King's was deemed 'world-leading' or 'internationally excellent' (three* and four*). The university is in the top seven UK universities for research earnings and has an overall annual income of more than £600 million.

Trainer scholarships

King's has marked the principalship of Professor Sir Richard Trainor, from 2004 to 2014, by creating 28 PhD scholarships in his name. Before Professor Trainor stepped down from King's in August 2014 to become Rector of Exeter College, Oxford, he and his wife Professor Marguerite Dupree marked the new scholarships. A gift of £1.25 million to King's from an anonymous donor from Singapore is funding the scholarships for students working in fields that reflect Professor Trainor's own interests and his long-standing passion for public engagement and service to society. Scholarships will be open to UK, EU and international applicants who will work together on themes such as cultural heritage, leadership and global governance as well as on distinctive scientific problems and methods and areas such as medical humanities and digital humanities, reflecting Professor Trainor's own scholarship and his careful nurturing of cross-boundary working at King's. The first tranche of scholarships will be awarded in 2015.

Honours

Alison Wolf CBE, the Sir Roy Griffiths Professor of Public Sector Management at King's, was created a life peer by HM The Queen in October 2014. An expert on vocational education and training and on the relationship between education, gender and the labour market, Professor Wolf was one of the small number of candidates for Cross Bench peerages personally nominated by the Prime Minister, based on their public service. Three King's academics were recognised in the Queen's Birthday Honours in June 2014. Richard Sorabji CBE, Professor Emeritus of Philosophy, was knighted for his services to philosophical scholarship. Denise Lievesley, Professor of Statistics and Head of the Faculty of Social Science & Public Policy, received a CBE for her services to social science, and Jill Maben, Professor of Nursing Research and Director of the National Nursing Research Unit in the Florence Nightingale Faculty of Nursing & Midwifery, received an OBE for services to nursing.



King's Maths School opens

Nicky Morgan MP, Secretary of State for Education, opened King's College London Mathematics School in September 2014. She described the School, based in Lambeth Walk near King's Waterloo Campus, as 'a centre of excellence that will play a crucial part in ensuring our country continues to be at the forefront of science and maths.' The specialist state-funded School is for mathematicians aged 16-19, selected for their enthusiasm for, as well as their attainment in, mathematics. Through its curriculum and its outreach activities, it is increasing the number of well-trained young mathematicians going on to study mathematics, physics, computer science and engineering. It also runs an extensive GCSE enrichment programme involving over 250 students, which aims to increase mathematical understanding and improve take up of both mathematics and further mathematics at A-level. In November 2014 a team of four students from the School were victorious in the London West heat of the Senior Team Mathematics Challenge, which pitted them against 15 other schools, testing mathematical, communication and teamwork skills.

Freedman's *Strategy* 'tour de force'

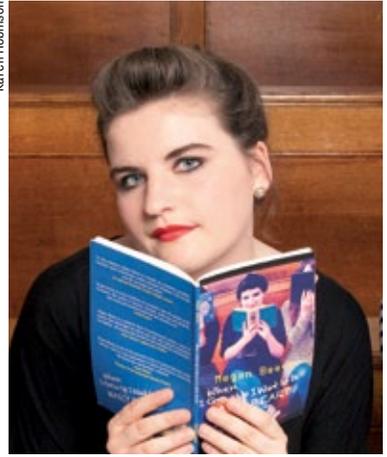
Strategy: A History by Professor Sir Lawrence Freedman, who is one of the world's leading authorities on war and international politics, has won the 2014 WJM Mackenzie Book Prize of the Political Studies Association. *Strategy* weaves together fields as diverse as evolutionary biology, rational choice, counter-insurgency theory, game theory, corporate strategy, behavioural economics, and the New Left. It analyses a huge array of historical events and social, political and economic phenomena as 'strategy', breaking them down to their essential elements in order to understand why some succeed and others fail. The judging panel of top political academics and journalists described the breadth of Professor Freeman's scholarship as 'breathtaking' and the book as 'an intellectual tour de force', describing *Strategy* as 'the fitting culmination to a lifetime of thinking and teaching in this field.' Sir Lawrence Freedman has been Professor of War Studies at King's since 1982, and retired after 11 years as Vice-Principal (*Strategy & Development*) at the end of 2014. He was appointed Official Historian of the Falklands Campaign in 1997, and is serving as a member of the Chilcot Inquiry into Britain and the 2003 Iraq War.

King's Ebola team

The King's Sierra Leone Partnership, made up of volunteers from King's Health Partners, is at the heart of the Ebola outbreak in west Africa. Established originally to help build and strengthen Sierra Leone's healthcare system, the team, led by alumnus and staff member Dr Oliver Johnson, has played a vital role in responding to Ebola since the virus first reached the country in May 2014. Its role has rapidly extended beyond the initial management of a 16-bed isolation unit at Connaught Hospital. Working closely with the Sierra Leone Government and local and international partners, the team has helped to establish an Ebola Command Centre in Freetown. This Centre manages the deployment of ambulance services and, with support from the UK Government, the collection of laboratory tests and distribution of results, the co-ordination of burial teams, and the distribution of medical supplies and deliveries to isolation units. The team is not only saving lives but also bringing about lasting change by working with local partners to implement policy to build long-term resilience within an extremely fragile healthcare system. Visit kslp.org.uk/fighthebola to support their work.



Karen Robinson



Most influential Londoners

Dr Oliver Johnson is one of the inspirational people from King's named in the *Evening Standard's* list of 'The 1,000 most influential Londoners' for 2014. Other King's people, whose talents span the arts, business, science and medicine, include Deborah Bull (Director, Cultural Partnerships) who was recognised as a science innovator; Jamie Ritblatt, a member of the College Council and Chairman of the Estates Strategy Committee, who was recognised alongside planners and architects responsible for 'reshaping the capital'; Comfort Momoh, a Guy's and St Thomas' midwife, recognised for her pioneering work in campaigning against female genital mutilation (FGM), and Dr Robert Bentley, Director of Trauma at King's College Hospital, whose team came to national prominence through the award-winning Channel 4 documentary series '24 hours in A&E'.

Student media successes

King's College London Students' Union (KCLSU) is celebrating multiple successes for its student media in national competitions in 2014. In July 2014 KCLSU was judged 'best in the country' at the Ents Forum Awards for university student union staff, winning first prize in the newly introduced Student Media of the Year category. The KCLSU newspaper *Roar!*, King's TV, KCL Radio and Photosoc all finished in the top three in the same category at the National Union of Students' Awards. King's TV also won two awards in the 2014 National Student Television Association competition for its marketing video and sports show.

Poetry of passion

Student poet Megan Beech published her first collection *When I Grow Up I Want to be Mary Beard* in 2013 when she was in her second year reading English at King's, and is emerging as a powerful voice through her presence in the performance poetry scene. She uses her poetry to challenge the status quo and especially gender inequality and misogyny. The winner of the SLAMBassadors national youth slam 2011 and the Poetry Rivals UK under-18 slam in 2011, she has performed at venues including the Southbank Centre, Glastonbury, Latitude and Larmer Tree Festivals as well as for institutions including the British Museum, Keats House, and the University of Cambridge. On the acknowledgements page of her book she describes the King's English Department as 'a great supportive force'. King's has a long tradition of creative writing, with alumni including John Keats, Virginia Woolf, Thomas Hardy, WS Gilbert, Susan Hill, Hanif Kureishi and Michael Morpurgo.



What did the Romans do for teeth?

The Roman-British population from around 200-400 AD appears to have had far less gum disease than we have today, according to a study of skulls at the Natural History Museum, led by Professor Francis Hughes from the Dental Institute at King's. The study, published in the *British Dental Journal*, examined 303 skulls from a burial ground in Poundbury, Dorset, for evidence of dental disease. Only five per cent of the skulls showed signs of moderate to severe gum disease, compared with today's adult population of which around 15-30 per cent have chronic progressive periodontitis, usually arising from smoking or conditions such as diabetes. The ancient skulls did, however, show signs of infections and abscesses, and half had caries (tooth decay), as well as the extensive tooth wear expected from a diet rich in coarse grains and cereals.

Take some dressing with your salad

A diet that combines unsaturated fats with nitrite-rich vegetables, such as olive oil and lettuce, can protect you from hypertension, suggests a new study led by King's. The findings help to explain why some previous studies have shown that a Mediterranean diet can reduce blood pressure. The Mediterranean diet typically includes unsaturated fats found in olive oil, nuts and avocados, along with vegetables such as spinach, celery and carrots that are rich in nitrites and nitrates. When these two food groups are combined, the reaction of unsaturated fatty acids with nitrogen compounds in the vegetables results in the formation of nitro fatty acids. The King's study used mice to investigate the process by which these nitro fatty acids lower blood pressure. It concluded that the protective effect of the Mediterranean diet, combining unsaturated fats and vegetables abundant in nitrite and nitrate, comes at least in part from the nitro fatty acids generated which inhibit soluble epoxide hydrolase to lower blood pressure.

Recognising excellence

More than 20 members of staff and alumni received King's Awards for their outstanding achievements at a ceremony in November 2014, including Dr Trudi Darby, former Deputy Head of Administration (Arts & Sciences), who received the Principal's Award from Vice-Principals Professor Evelyn Welch and Professor Sir Robert Lechler. More than 240 nominations for the awards were submitted, almost twice as many as last year, and three new awards were introduced, including 'Excellence in Customer Service' which recognises those who have consistently exceeded customer expectations. John Kampfner, journalist and lay member of the College Council, joined Professors Welch and Lechler in hosting the ceremony in the elegant setting of the newly refurbished Great Hall at the Strand Campus.



British Academy fellows

Two King's academics were elected as Fellows of the British Academy in 2014, in recognition of their distinction in the humanities and social sciences. Professor Paul Gilroy of the Department of English and Professor Francesca Happé of the Institute of Psychiatry were elected by the Academy in July for their achievements in publication and research activity. Paul Gilroy, Professor of English & American Literature, is an expert in postcolonial studies, the literature and cultural politics of European decolonisation, African American intellectual history, literature and philosophy and the formation and reproduction of national identity. Francesca Happé is Professor of Cognitive Neuroscience and Director of the MRC Social Genetic & Developmental Psychiatry (SGDP) Centre. Her research focuses on Autism Spectrum Disorders, and studies the neuro-cognitive basis of typical and atypical social cognition.

Achieving Athena SWAN

The 'Meet the professors' photographic frieze and website were unveiled at King's in November 2014. They mark progress towards a better gender balance at King's, featuring female professors who provided an insightful commentary on the challenges and achievements they have faced in their careers and personal lives.

The King's Faculty of Natural & Mathematical Sciences and five divisions in the Faculty of Life Sciences & Medicine have achieved Athena SWAN awards from the Equality Challenge Unit. These awards recognise commitment to advancing women's careers in science, technology, engineering, maths and medicine in higher education and research. Successful applicants need to undertake detailed analysis of their practices, enabling them to plan measurable action that makes a real impact. The work of the Cardiovascular Division and the Division of Women's Health was recognised with a silver departmental award, while the Faculty of Natural & Mathematical Sciences, the Division of Palliative Care, Policy & Rehabilitation, the Division of Asthma, Allergy & Lung Biology and the Division of Imaging Sciences & Biomedical Engineering all achieved bronze departmental awards.

Honorary doctorates 2014

Dr Navanethem (Navi) Pillay, the United Nations High Commissioner for Human Rights from 2008 to 2014, and the former President of Portugal, His Excellency Jorge Fernando Branco de Sampaio, were among six distinguished recipients to be awarded an honorary doctorate of King's College London at its Honorary Degree Ceremony in November 2014. The other new honorary doctors are Professor Sir Christopher Bayly FBA FRSL, former Vere Harmsworth Professor of Imperial and Naval History and Director of the Centre for South Asian Studies at the University of Cambridge; Nobel Prizewinner and King's alumnus Professor Michael Levitt FRS; Professor Timothy Mitchison FRS, Hasib Sabbagh Professor of Systems Biology and Deputy Chair of the Department of Systems Biology at Harvard Medical School; and Dr Paul B Rothman, Dean of the Medical Faculty, Vice President for Medicine of Johns Hopkins University, and Chief Executive Officer of Johns Hopkins Medicine.



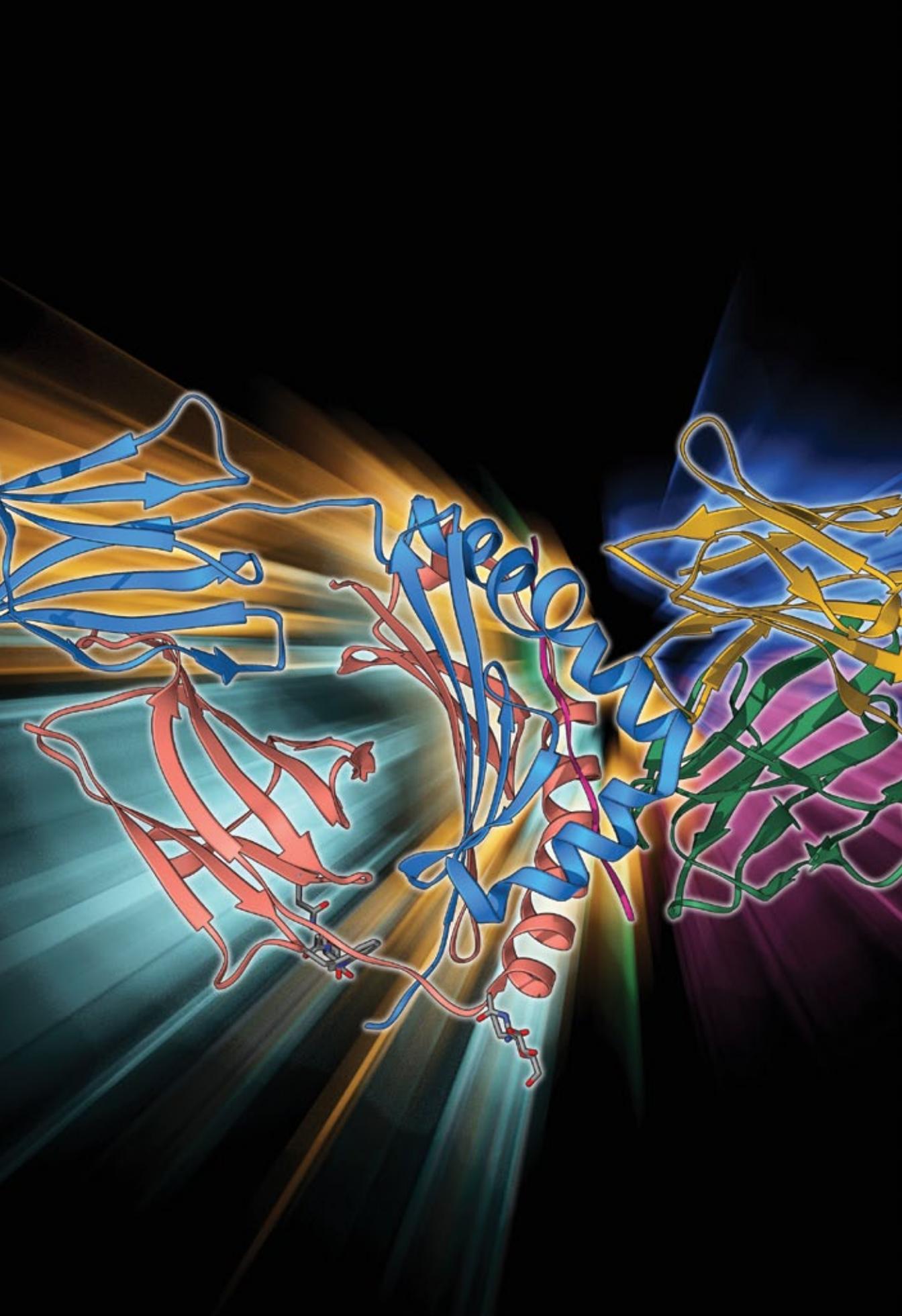
David Trendell

The announcement of the death of David Trendell, College Organist, Director of the Chapel Choir, and Senior Lecturer in Music, was met with great sadness at King's in October 2014. As College Organist, he was responsible for all the music in the College Chapel at the Strand, from playing at the daily services of morning prayer, directing the Choir at the weekly choral services of evensong and College eucharist, to several large annual events. During his 22 years in post he led the Choir to international recognition, reflected in a series of warmly-reviewed CDs featuring music by the composers of the English and Spanish Renaissance, which he particularly loved, as well as discs of Allegri, Rogier, Shchedrin, Strauss, and most recently Desenclos and Poulenc. Many of his former students and choir members went on to become performers and members of the most prestigious church and cathedral choirs. His contribution to the King's musical tradition in many parts of the world was unstinting.

Future Indian leaders at King's

A respected India-UK exchange programme hosted by King's enabled 14 Indian professionals from all walks of life to develop their leadership skills in London. The three-month Chevening Gurukul Programme is the UK Foreign and Commonwealth Office's flagship fellowship scheme for India and is aimed at mid-career and high-flying young professionals from diverse backgrounds with strong leadership potential. The 2014 group of Gurukul fellows included people from the rail industry, start-up businesses, banking and finance, law and disability rights, sustainable energy, healthcare and policing. They were each given 'mentors' at King's, joined lectures and were provided with a varied programme enabling them to meet major figures in UK business, government and the public sector. Nine upcoming Indian Parliamentarians were also hosted by King's as part of the Chevening Parliamentary Leadership programme in 2014, designed to give them the opportunity to engage in discussions on key international issues, politics,

industry and civil society. The group met with top UK opinion formers and decision-makers in academia, government, politics, industry and civil society; joined lectures by King's academics and heard talks by representatives from the Prime Minister's Office, the *Financial Times* and the Royal United Services Institute. They also visited the House of Lords, the Royal College of Defence Studies, the British Library and the House of Commons and spent time at King's India Institute, Department of War Studies, and across the university.





T cell receptor-antigen complex Science Photo Library

Harnessing the power of *regenerative medicine*

*King's is a leader in
cell therapy research.*

From the early days of bone marrow transplants in the 1960s, cell therapy – treatment that involves injecting cellular material into a patient – has developed to become of huge potential benefit to a wide range of medical conditions.

Cell therapy works in two main ways. In the first, stem or other cells are grown in the laboratory or introduced directly to the site of the damaged organ or tissue, and they then integrate into the site of injury to provide long-term replacement cells and improve the function of this tissue. In the second, the cells delivered to the patient remain viable for only days or weeks, but have the capacity during this period to release soluble factors which facilitate self-healing of the organ or region. At present, it is often not possible to tell which of these two processes is at work in a particular treatment or condition. Research at King's focuses on both types of therapy.

Stem cells

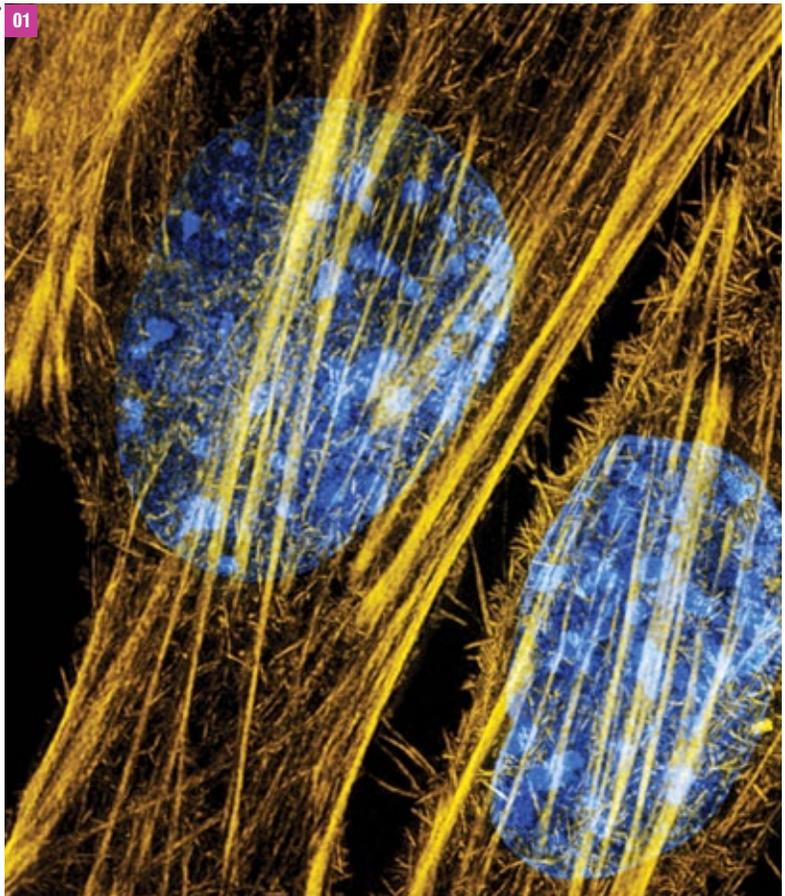
The use of stem cells in regenerative medicine is emerging as a key priority for research in the UK, and the Centre for Stem Cells & Regenerative Medicine at King's, established in 2011 at Guy's Hospital, is becoming a world leader in this field, providing the ideal multi-disciplinary and collaborative environment in which to translate fundamental stem cell research into real patient benefit. The Centre acts as a nucleus for a vibrant research community spanning the whole of King's and the NHS Foundation Trusts of King's Health Partners (KHP) Academic Health Sciences Centre.

'King's is becoming a leading centre in the UK for cell therapy

in several disease contexts,' comments Professor Sir Robert Lechler, King's Vice-Principal (Health) and Executive Director of King's Health Partners Academic Health Sciences Centre. 'This is one of the reasons that Innovate UK chose to locate their National Cell Therapy Catapult in the Guy's Tower and to invest £50 million in developing these therapies.' Stem-cell populations are established in 'niches': specific anatomical locations that regulate how they participate in tissue generation, maintenance and repair, and the goal of the Centre is to bring together researchers with diverse skill sets and a common interest in understanding how the niche regulates stem cell behaviour.

'To promote this, we've opened a "Stem Cell Hotel" where researchers from all over the world can access specialist equipment and technical support to study stem cell behaviour at single cell resolution,' explains Professor Fiona Watt FRS, who joined the King's Centre as its first Director in 2012. 'We benefit from interactions with scientists across London, including those at the new Francis Crick Institute at King's Cross, while the UK Technology Strategy Board's Cell Therapy Catapult, housed at Guy's Hospital, has brought in pharmaceutical and other businesses interested in developing new products and services in this area on a commercial scale.'

Dr Lothar Schermelleh/ Science Photo Library





01

A 3D-structured illumination micrograph of fibroblast cells.

02

Eczema causes itchy blisters on the palms and soles of the feet.

Professor Watt is also Director of a new research 'Hub' for regenerative medicine, led by King's in partnership with four other leading UK universities, with a £2.3 million investment from three research councils. 'This unique combination of expertise will help us to discover ways of ensuring that cell-based therapies survive in the patient after transplantation, which represents a significant barrier in bringing regenerative medicine to the clinic,' Professor Watt explains.

Fibroblasts

Professor Watt has a particular research interest in the development and renewal of skin stem cells. In 2013, her study reported in *Nature* showed that, contrary to widespread belief, the skin has not one but at least two types of the cells known as fibroblasts, each with unique properties: one, in the upper layer, required for hair growth, and the other, in the lower layer, responsible for making most of the skin's collagen fibres and for repairing skin wounds. In mice, the researchers found that the quantity of the repairing fibroblasts can be increased by signals from the overlying epidermis, and that an increase in fibroblasts in the upper layer of the skin results in hair follicles forming during wound healing.

'Older skin is more prone to injury and takes longer to heal, but if we can find a way to stimulate these upper fibroblasts to grow and restore the skin's elasticity, we might also stimulate hair growth and reduce scarring,' Professor Watt points out.

'This could pave the way for treatments to repair injured skin and reduce the impact of ageing on skin function. We're currently preparing to start clinical trials to examine the effectiveness of injecting different types of fibroblasts into the skin of humans.'

Eczema may reduce cancer risk

In May 2014 another study by Professor Watt's research team showed that having the common skin condition, eczema, could actually reduce the risk of developing skin cancer.

A study funded by the Medical Research Council, the Wellcome Trust and Cancer Research UK demonstrated that the immune response triggered by eczema could help prevent tumour formation by shedding potentially cancerous cells from the skin.

'Eczema can result from the loss of structural proteins in the outermost layers of the skin, leading to a defective skin barrier,' explains Professor Watt. 'Our research compared the effects of two cancer-causing chemicals in normal mice

and mice lacking three skin barrier proteins, and found that the number of benign tumours was six times lower in the mice lacking the barrier proteins than in normal mice.

'This suggests that defects in the epidermal barrier protected these mice against benign tumour formation. The findings are also important in a wider context, because they support the view that modifying the body's immune system is an important strategy in treating cancer.'

This could pave the way for treatments to repair injured skin and reduce the impact of ageing on skin function.

Bone marrow to repair skin

Understanding the molecular and cellular basis of inherited skin diseases such as epidermolysis bullosa, which causes painful blisters, and translating this understanding into clinical benefits for patients is the research focus of John McGrath, Professor of Molecular Dermatology and head of the Genetic Skin Disease Group at King's.

Working with colleagues at Japan's Osaka University, Professor McGrath has identified specific bone marrow cells (about one in every 450 such cells) that can transform into skin cells to repair damaged skin tissue.

'We discovered that damaged skin can release a distress protein called HMGB1 that can mobilise the cells from bone marrow and direct them to where they are needed,' Professor McGrath explains. 'Mice with skin grafts express high levels of HMGB1 in their blood that can drive the bone marrow repair process. Our findings show that skin grafts do not simply cover wounds, but act as bioreactors that can kick-start regenerative skin repair.' Professor McGrath is currently conducting a number of clinical trials to explore potential new stem cell-based treatments to repair damaged skin.



T-cells play an essential role in immunity by scanning the body for cellular abnormalities and infections and also by eradicating cancer cells.

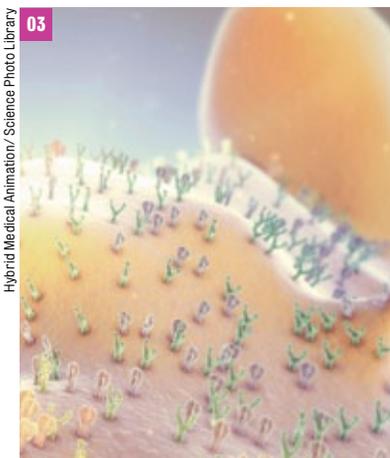
CAR mechanics

T-cells are a type of white blood cell generated in the bone marrow, so called because they mature in the thymus. They play an essential role in immunity by scanning the body for cellular abnormalities and infections and also by eradicating cancer cells. The most potent immunotherapy available for malignant disease is achieved when tumour-specific T-cells are administered to patients, but a key obstacle to more widespread use of this treatment is the difficulty in generating large numbers of such cells.

To circumvent this, a research group led by Dr John Maher, Clinical Senior Lecturer in Immunology at King's, is using T-cells that have been genetically engineered to provide them with a tumour-targeted receptor: the molecule on the T-cell's surface that 'recognises' and binds to a particular tumour. In pre-clinical tests, T-cells were grafted with a specific chimeric antigen receptor (CAR) and then mixed overnight with tumour cells.

'When they come into contact with the tumour cells, the T-cells become highly activated and rapidly destroy the tumour cell monolayer,' Dr Maher explains. 'The clumps that result contain a mixture of activated T-cells together with dead and dying cancer cells. Over the next seven to 10 days the T-cells proliferate, leading to a five- or 10-fold increase in T-cell numbers. These T-cells can now be placed on a fresh tumour monolayer where the same process occurs once again. By contrast, none of these events result when control T-cells are mixed with tumour cells.'

Dr Maher's team is now carrying out pre-clinical testing of CARs in models of several malignancies, including breast cancer, ovarian cancer, malignant mesothelioma, prostate cancer, selected lymphomas, acute myeloid leukaemia and pancreatic cancer. Their first clinical trials of CAR-based immunotherapy launch in June 2015 in patients with recurrent head and neck cancer.



T-cells to promote transplant tolerance

A sub-population of T-cells known as regulatory T-cells (Tregs), and their role in protecting transplant recipients from organ rejection, is the focus of research by Professor Giovanna Lombardi, Head of the Department of Immunoregulation & Immunointervention at King's.

Currently, patients who have received a transplant have to stick to a strict regimen of potent drugs that pacify their immune system in an attempt to prevent rejection of the donated organ. However, because these drugs suppress the immune system, they sometimes bring serious health complications, such as infections and some types of cancer. '25 years ago I contributed to the discovery of human regulatory

T-cells, and since then I've built a research programme to understand more about the biology of these cells and to develop treatment to prevent an individual's immune system from becoming over-active and rejecting a transplanted organ,' Professor Lombardi explains.

'Animal studies have already shown that regulatory T-cells can effectively prevent a transplant from being rejected, and we're currently identifying ways to "grow" these cells from the blood of healthy individuals in the laboratory, without them losing their ability to suppress other immune cells. We have just started two phase one clinical trials in which we are testing whether Tregs can be used to prevent kidney and liver transplant rejections.'

03 Receptors on the surface of a T-lymphocyte white blood cell.

04 Regulatory T-cells can help prevent transplanted organs such as kidneys from being rejected.

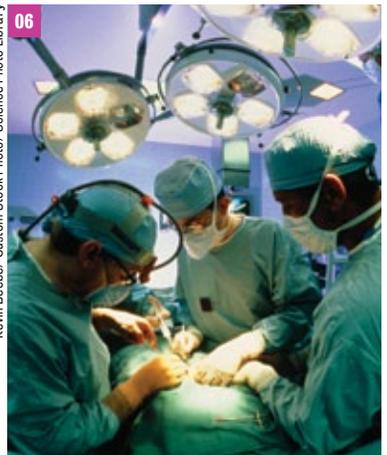
05 Electron micrograph of T-lymphocyte white blood cells. They originate in the bone marrow but mature in the thymus gland.

06 Surgeons performing a kidney transplant operation.

Stefan Diller/ Science Photo Library



Kevin Beeger/ Custom Stock Photo/ Science Photo Library



We are testing whether Tregs can be used to prevent kidney and liver transplant rejections.

Mesenchymal stromal cells

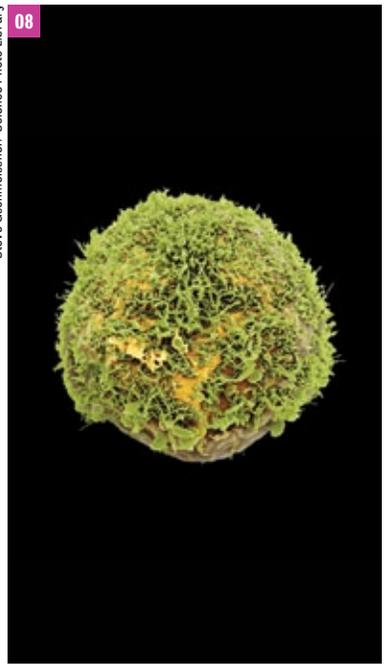
Although inflammation is the body's beneficial response to different injuries, it is a response that must be controlled in order to enable damaged tissue to repair itself. One of the key populations of cells that bring about such a regulatory function in tissues are mesenchymal stromal cells (MSCs). Professor Francesco Dazzi was one of the first to discover that MSCs have the ability to alter or regulate immune functions. He joined King's from Imperial College in 2014 as Professor and Head of Regenerative & Haematological Medicine and as King's Health Partners Lead for Cellular Therapies. His research is focused on identifying the mechanisms by which MSCs co-ordinate tissue stability by inactivating the inflammatory response and assisting tissue repair in the body.

'MSCs are a functionally adaptable population which, when exposed to certain types of inflammation, acquire a potent immunosuppressive activity. It is therefore essential to identify the signals used by the tissue microenvironment that instruct MSCs to acquire these properties,' Professor Dazzi says.

'MSCs establish a critical interaction with a type of blood cells, named macrophages, also involved in tissue regeneration. A better understanding of this interaction will pave the way to a more efficacious use of MSCs in the clinical setting'.

Professor Dazzi has initiated a national clinical programme based on MSC infusions to treat patients affected by diseases caused by the immune system. Whilst graft-versus-host disease was the first to be treated, more autoimmune conditions (such as Crohn's disease of the bowel and multiple sclerosis) as well as transplantation are now involved. 'I run the clinical programme as a joint venture between King's and Imperial. More than 100 patients have been treated so far, and the results are extremely encouraging. The research programme will help to identify exactly which patients to treat and at which stage,' he says.

Steve Csicsmeisner/ Science Photo Library



More than 100 patients have been treated so far and the results are extremely encouraging.

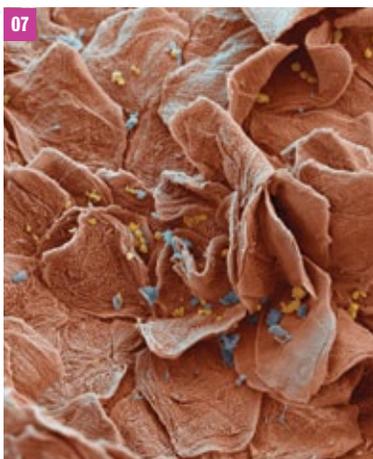
New approach to psoriasis

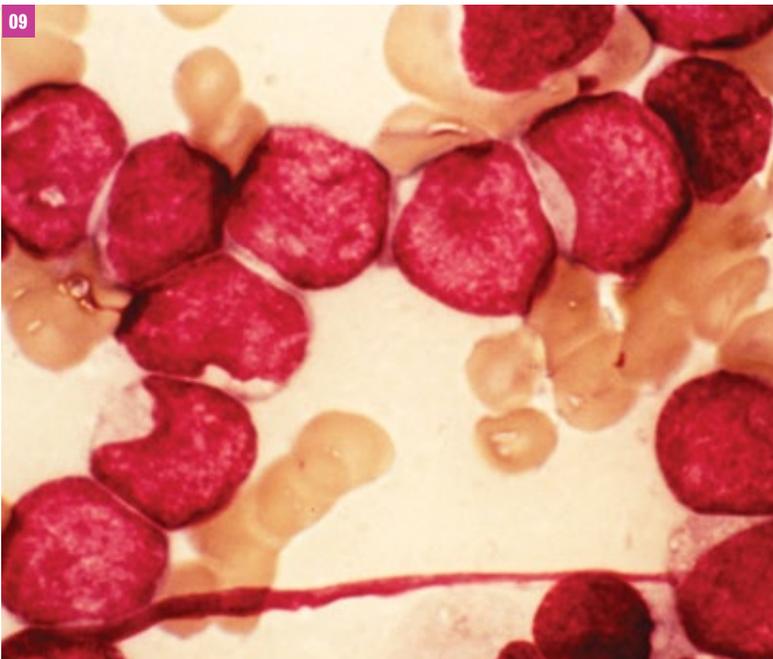
Another autoimmune disease, psoriasis, which affects around two in a hundred people in the UK, is the target of research led by Frank Nestle, Mary Dunhill Professor of Cutaneous Medicine & Immunotherapy at the St John's Institute of Dermatology. He and his team have identified a new gene (PIM1), which could be an effective target for innovative treatments and therapies for the condition. 'It's believed that psoriasis is caused by a problem with the body's immune system, in which new skin cells are created too rapidly, causing a buildup of flaky patches on the skin's surface,' Professor Nestle says.

'Our study, published in February 2014, highlighted for the first time the role of PIM1 and the IL-22 cytokine – a protein that sends messages between cells – in skin inflammation such as that seen in psoriasis patients.

'We've been able to confirm that IL-22 causes inflammatory changes in human skin contributing to psoriasis. Moreover, our detailed analysis of genes induced by IL-22 in skin allowed us to uncover a novel treatment target for this disease. We're therefore hopeful that our research will lead to the development of new approaches for the treatment for this common and irritating skin condition.'

Eye of Science/ Science Photo Library





07
Skin cells affected by psoriasis. The condition affects some two per cent of the UK's population.

08
Mesenchymal stem cells are multipotent stromal (connective tissue) cells that can differentiate into a variety of cell types.

09
A light micrograph of blood cells from the bone marrow of a patient with acute myeloid leukaemia.

10
Professor Ghulam Mufti. His team is developing a treatment to prevent the return of acute myeloid leukaemia.



This cancer of the white blood cells affects around 7,200 patients a year in the UK.

A 'vaccine' for leukaemia?

A team in King's Division of Cancer Studies led by Professor Ghulam Mufti is developing a treatment to prevent the return of acute myeloid leukaemia (AML). This cancer of the white blood cells affects around 7,200 patients a year in the UK, and is becoming increasingly common as people are living longer. While it is treatable through a bone marrow transplant, over half of patients who are 60 and older will relapse, and around 4,300 die from the disease annually.

'AML cancer cells do not stimulate a major immune response, despite producing a number of important immune-activating molecules,' Professor Mufti explains. 'One reason for this may be that they do not produce CD80, a protein that is an important precursor in the series of complex reactions that leads to an immune response. In the laboratory, we have genetically modified AML cells to produce CD80. Other AML cells were modified to produce another immune-stimulating protein, interleukin-2 (IL-2), as well as CD80.'

'We found that particular immune cells (both T-cells from healthy donors and cells from patients in remission) that had been stimulated with modified AML cells (ie those that produced CD80 or both IL-2 and CD80) were better at destroying unmodified cancer cells. While exposure to both types of modified cell increased the immune cells' ability to "kill" unmodified cancer cells, exposing the immune cells to AML cells that produced both CD80 and IL-2 led to the greatest increase in their ability to destroy the cancer cells.'

'Building on our extensive pre-clinical studies, we've now initiated a phase 1 clinical study to test this process in patients with AML,' Professor Mufti says.





Artwork by Toni Ramsell

Magna Carta *then & now*

King's is taking a lead in exploring the significance of Magna Carta in its 800th anniversary year.

'Magna Carta', sealed by King John in June 1215, is seen as the basis of British legal and political life and as an important influence on the American Constitution. Eight hundred years on, King's experts are involved in elucidating and reflecting on the Great Charter from many different angles.

Magna Carta – online

King's researchers have been collaborating on a landmark investigation into the context, production and reception of Magna Carta.

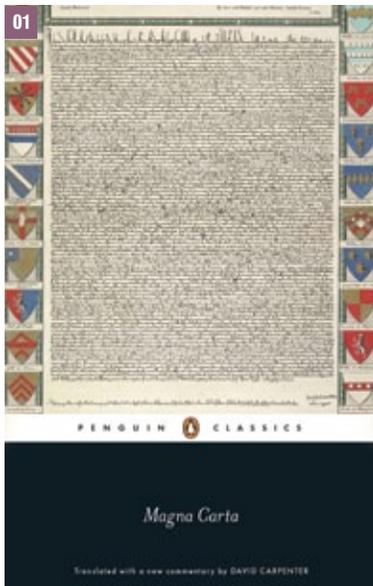
A team of historians from King's, the British Library and the universities of East Anglia, Oxford

and Christ Church, Canterbury, with nearly £1 million funding from the Arts and Humanities Research Council (AHRC), have been scouring over 300 archives in the UK and abroad, investigating who wrote the manuscript, whether the clauses were obeyed, and the document's role in marking a watershed between a lawless and lawful government.

The Magna Carta Project website magnacartaresearch.org provides the original Latin texts of Magna Carta 1215, with new English translations, expert commentaries and versions available for schools, the general public and scholars. Professor David Carpenter, Emeritus Professor in Medieval History at King's, is particularly involved in finding the copies that were made of the 1215 charter in the rest of the 13th century. 'Many of these, I've discovered, turn out not to be copies of the final charter at all, but instead preserve rival versions

'No free man is to be arrested, or imprisoned, or disseised, or outlawed, or exiled, or in any other way ruined, nor will we go against him or send against him, except by the lawful judgment of his peers or by the law of the land.'

of clauses proposed but ultimately rejected during the negotiations at Runnymede,' he says. 'This finding casts altogether new light both on those negotiations and on what the political community knew about Magna Carta in the 13th century.'



Teaching Magna Carta

Professor Carpenter is a leading authority on the history of Britain in the central middle ages. The master's course module he teaches at King's on Magna Carta & Medieval Monarchy examines the causes of Magna Carta, analyses the Charter of 1215 and the later versions of 1216, 1217 and 1225, and considers their defects as well as their achievements. His book *Magna Carta* was published by Penguin Classics in January 2015.

01

The cover of Professor Carpenter's book shows an engraving made in 1733 of the original of Magna Carta, once preserved, as this book demonstrates for the first time, at Canterbury Cathedral. The shields in the margins, supplied by the engraver, John Pine, depict the coats of arms of the barons appointed in 1215 to enforce the Charter. The Canterbury Magna Carta, much damaged since 1733, is now in the British Library: Cotton Charter xiii. 31a. The engraving shown is one in the British Museum: 1861,0513.331 Photograph © The Trustees of the British Museum.

02

The UK Parliament has launched a major consultation into the shape of our democracy, through its Political and Constitutional Reform Select Committee.

A new Magna Carta for the UK?

Should the UK have a written constitution, rather than the ‘sprawling mass’ of diverse laws and unwritten conventions by which it is currently governed? This is the question addressed by Robert Blackburn, Professor of Constitutional Law in King’s Dickson Poon School of Law, through a major programme of research for the House of Commons Political and Constitutional Reform Committee.

The Committee’s report, *A new Magna Carta?*, published in July 2014, is almost entirely the work of Professor Blackburn. Providing the basis for a national consultation on the shape of British democracy today, it sets out different visions of what a documentary UK constitution could be and gives three blueprints for how it might work. It details the arguments for

and against a written constitution, and the legal, political and administrative options for the processes by which a written constitution might be drawn up and brought into effect.

‘This is a cross-party issue,’ Professor Blackburn explains. ‘Support or opposition for a written constitution is not a matter of being Left or Right. Leading politicians from across the political parties have supported the idea of a written constitution in recent times.

‘A written constitution would enable everyone to know what the rules and institutions were that governed and directed ministers, civil servants and parliamentarians in performing their public duties.

‘We will not sell, or deny, or delay right or justice to anyone.’

My report points to the sprawling mass of common law, Acts of Parliament and European treaty obligations, surrounded by a number of important but sometimes uncertain unwritten conventions that are impenetrable to most people. A written constitution would replace this with a single document of basic law dictating the working and operation of government in the UK, easily accessible for all.’

Magna Carta, religion and law

Links between religion and Magna Carta – ranging from 1215 to now – were the focus of an important international conference heralding the Charter’s 800th anniversary, organised by The Temple Church in association with the King’s Institute of Contemporary British History, The Dickson Poon School of Law and the Department of Theology & Religious Studies.



The keynote speaker, King's Dickson Poon Distinguished Fellow and Visiting Professor the Rt Hon the Lord Judge, former Lord Chief Justice of England, described how religious affairs played a vital part in the original making of the Charter. 'Magna Carta came into existence in an age when in this country the divinity of Jesus Christ and the immortality of each individual's soul was an unquestioned article of faith,' Lord Judge reminded the distinguished audience in the Inner Temple Hall, close to King's Strand Campus, and to the Temple Church which was the site in 1215 of many of the discussions leading to formation of the Charter. In the first chapter of Magna Carta, under pressure from the rebel barons, King John bound himself and his heirs to agree 'forever that the English Church shall be free and shall have her rights entire, and her liberties inviolate.'

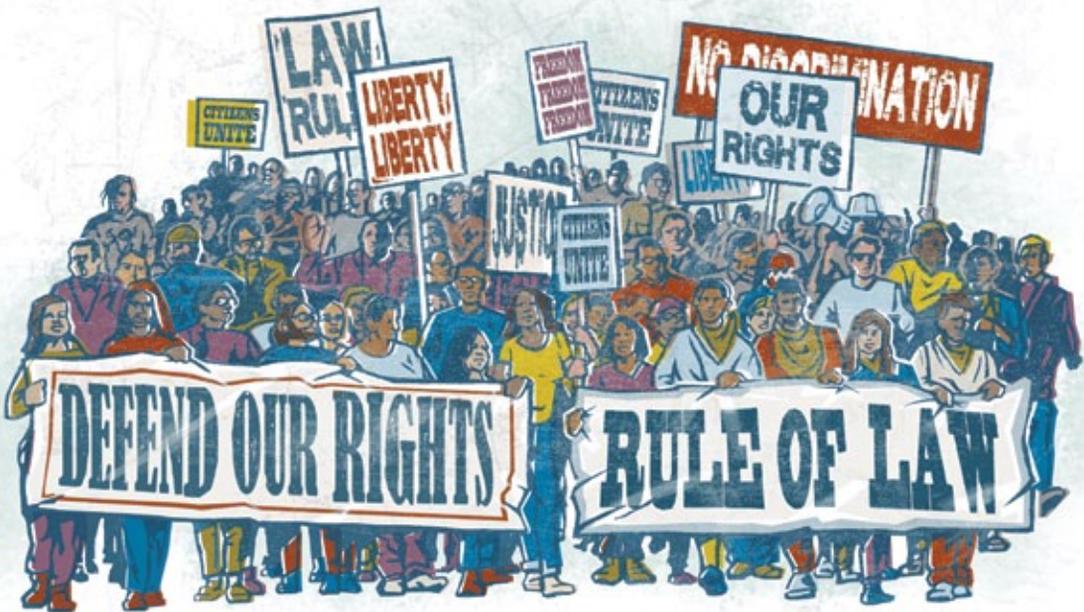
'Quite what freedom meant, and quite what the "rights" included was a little unclear,' Lord Judge commented, pointing out that Pope Innocent III immediately annulled the charter, claiming that the barons had been inspired by Satan. Anyone who sought to enforce it was to be excommunicated.

Speakers

Convened by Robin Griffith-Jones, Master of the Temple and Senior Lecturer in Theology at King's, Mark Hill QC, Bencher of the Inner Temple, and Professor Robert Blackburn of King's, the conference brought together an extraordinary array of talent and expertise to focus on the importance of the Magna Carta for religious communities both historically and today. Speakers from many traditions, including four from King's Dickson Poon School of Law, considered how the principles enunciated in Magna Carta have

influenced the State's approach to religion, and how religions can and should be participants in civil society.

'We have first of all granted to God, and by this our present charter confirmed, for ourselves and our heirs in perpetuity, that the English Church is to be free, and to have its full rights and its liberties intact, and we wish this to be observed accordingly.'



King's Law Professor Maleiha Malik discussed the relevance of Magna Carta and the rule of law as animating ideas to challenge the abuse of power against vulnerable minorities. 'In public debates, Magna Carta may have a positive role in promoting the rule of law that is of crucial importance for all citizens, especially religious minorities,' she said.

Religious minorities

She pointed out, however, that Magna Carta had on occasion been used as a symbol of Englishness to attack religious minorities. 'In the past it was used to exclude non-Christian minorities such as Jews; in the present it has been used to argue that Muslims are a threat to British values. It is, therefore, also important to emphasise that this positive role for Magna Carta is only possible if it functions as an inclusive symbol for the rule of law that acts as a shield

for all citizens, rather than an ethno-nationalist sword that is used to attack or exclude racial, cultural and religious minorities.' As well as considering the application of Magna Carta's principles to protecting religious minorities from state persecution, Professor Malik also drew attention to the relevance of these principles in protecting groups, such as women, gays and lesbians, against the arbitrary power of religious authorities who persecute their own weaker adherents.

'It is often argued that individuals such as these choose to remain members of a religious group despite the fact that the rules and practices of their community undermine their interests,' Professor Malik observed. 'The ideas of the rule of law and challenge to arbitrary power that are associated with Magna Carta provide an important re-statement

'And we have also granted to all the free men of our kingdom, for ourselves and our heirs in perpetuity, all the following liberties, for them and their heirs to have and to hold of us and our heirs.'

03



Magna Carta anniversary

Professor Blackburn is Director of the Centre for Political & Constitutional Studies at King's and a leading member of several organisations involved in the Magna Carta anniversary. He is on the Magna Carta Trust's 800th Anniversary Committee, its law sub-committee and its academic/education sub-committee, which meets at King's. The 800th Committee is chaired by Sir Robert Worcester, Visiting Professor of Public Opinion & Political Analysis at King's ICBH, and founder of the major opinion polling and social research organisation Ipsos-MORI.

'After the death of her husband a widow is to have her marriage portion and heritance immediately and without difficulty.'

03
Effigy of William Marshal, 2nd Earl of Pembroke, in The Temple Church.

of the principle that all citizens have the right to protection by reference to the law. These individuals are both members of a religious group and also citizens. Magna Carta provides a powerful idea that they should be able to use the law to challenge not only state authority (for example, where the state interferes with their right to religious freedom) but also the power of their group (for example, where their religious organisations breaches their right to equality or non-discrimination).’

‘No widow is to be distrained to marry while she wishes to live without a husband.’

World Justice Forum at King’s

One of Magna Carta’s most important principles – the rule of law – will be at the heart of the fifth World Justice Forum hosted by King’s in the summer of 2016.

This is the first time that this biennial international event for the advancement of the rule of law has taken place in the UK, and also the first time that the World Justice Project, which organises the Forum, has partnered with an academic institution.

‘The week-long Forum brings together some 600 participants from more than 100 countries to explore and debate the challenges facing the rule of law,’ explains Professor David D Caron, Dean of The Dickson Poon School of Law at King’s. ‘It’s a unique, powerful mix of leaders from government, business, civil society, the judiciary

‘And the city of London is to have all its ancient liberties and free customs, both on land and water. Moreover we wish and grant that all other cities, boroughs, towns and ports are to have all their liberties and free customs.’

and academia who join forces with local leaders working “on the ground” on rule-of-law projects, often in less developed countries.’



Transnational Law

The Forum is highly congruent with King's role as a centre of excellence in transnational law and London's world city status in this respect. 'We live in a period of economic globalisation, witnessing the convergence of humanity around fundamental rights and values and the demands of shared challenges such as climate change,' Professor Caron says. 'Clearly, a legal education driven by a particular national perspective would be incomplete in today's world. While King's students are deeply rooted in the law of England and Wales, the School also works on the principle that a legal education should be complemented by transnational themes: for example, what does the rule of law mean from one locality to the next? Transnational

law needs to be present root and branch in the way we think about and teach law today.'

King's has recently appointed Professor Peer Zumbansen, a leading international scholar in this field, as its inaugural professor of transnational law and the founding director of The Dickson Poon Transnational Law Institute. The university's Transnational Law LLM programme addresses real-world global challenges in areas including refugee law, criminal law and corporate governance.

'We will not appoint justices, constables, sheriffs or bailiffs except from such as know the law of the kingdom and are willing to keep it well.'

Magna Carta reading

Lord Judge of Draycote (Igor Judge) became the second former Lord Chief Justice of England at King's when he joined Lord Phillips of Worth Matravers as a Dickson Poon Distinguished Visitor in 2013-14. The post has enabled Lord Judge to engage with students, sharing ideas and considering the deeper issues involved in legal practice, as well as contributing to the School's research and teaching culture. His book with Anthony Arlidge QC, *Magna Carta Uncovered*, was published by Hart Publishing in 2014.

Professor Maleiha Malik is a barrister and the co-author of the leading 2008 text *Discrimination Law: Theory and Practice*. With Dr Jon Wilson from King's Department of History she co-ordinates the AHRC project on 'Traditions in the Present' which explores the relevance of 'tradition' in contemporary societies.

A book reflecting contributions to the conference, including those of Lord Judge and Professor Malik, will be published by Cambridge University Press in 2015. *Magna Carta, Religion and the Rule of Law* is edited by Robin Griffith-Jones and Mark Hill QC. From January 2015 the Round Church of the Temple Church will house a special exhibition on Magna Carta, curated by Robin Griffith-Jones.



Seizing the *opportunity*

*A new fund is helping
students to maximise their
experience of university.*

More and more university students are looking for ways to make the most of their studies.

King's Student Opportunity Fund (SOF) provides financial help to enable students to add experiences that augment their degree course learning. Open to both undergraduate and postgraduate students, and to individuals or groups, the fund offers small grants for activities that make a positive addition to students' academic experience. This year's funding supported projects from sessions about careers in gastroenterology to attendance at a clown workshop. It helped to finance conferences in specialist areas organised by students themselves; it assisted an undergraduate legal outreach programme offering guidance to secondary pupils interested in a career in Law; it backed the production of a student play, and it funded a public conference on the future of democracy. It also provided travel grants enabling students to present their work at international conferences, helped to print a student-written journal, and covered the cost of translation master-classes. Karen O'Brien, Vice-Principal (Education) commented: 'It's remarkable how much energy and enterprise has been unleashed by us directing just a small amount of funding towards students themselves. King's students have shown how exceptionally imaginative and enterprising they can be. We are so grateful to alumni who have made this possible, and we plan to increase the Opportunity Fund as rapidly as possible.'



Mentoring

Two SOF grants went to students offering mentoring and guidance to secondary school pupils who are considering going to university. LLB undergraduate Yee Rou Quah received nearly £500 to help run a legal outreach programme, involving some 50 student volunteers offering guidance to GCSE and A-level pupils interested in venturing into a career in Law, while £1,000 went to third-year mathematics student Sunny Vaghela and the King's Team Up programme, which aims to improve social mobility and transform the prospects of bright young people through a student volunteer tutoring programme. Now a national UK organisation, Team Up was co-founded by its CEO Sharla Duncan in 2008, when she was a BSc undergraduate student at King's.

The 'Social Brain'

A unique series of seminars aided by the Fund brought four early-career researchers who had recently completed their PhDs to the MRC Social, Genetic & Developmental Psychiatry Centre at the King's Institute of Psychiatry, Psychology & Neuroscience (IoPPN) to speak about their research, participate in informal discussion and give career advice to postgraduate students. The seminars attracted some 100 participants, including some of the IoPPN's 'famous names', such as Professors Sir Michael Rutter and Francesca Happé. 'Our speakers (an experimental psychologist, a neuroscientist, a geneticist and two child psychologists) were asked to pitch their talks for a general audience, and did so extremely well', says Punit Shah, who led the team of 10 student organisers. 'The seminars provided opportunities for social and career networking, as well as project management experience for us as the organisers. We far exceeded our original objective, and we now plan to continue the "Social Brain" Seminars "brand" next year and to see its objectives and legacy continue for many years to come.' See punitshah.webs.com/social-brain-seminars for more details.



Trauma

A national undergraduate student conference on trauma, supported by £1,000 from the Fund, addressed an unmet need in the medical curriculum, according to its organiser from the King's College London Surgical Society, fourth-year medical student Irfan Bin Anwar Ali. 'Our conference acknowledged a budding medical speciality and gave attendees a theoretical and practical appreciation of it, as well as advice on how to practise it,' he points out. The conference, which included a careers panel session, benefited not only the 80 students who attended, but also the committee who helped organise the event, and laid a firm foundation for students attending future events on this topic.



This expedition to the Pyrenees developed medical skills in a mountain environment.

Wilderness medicine

The KCL Wilderness Medicine Society (WMS) describes itself as 'about medicine and research in places where others won't go'. The Society teaches keen students the skills needed for research in extreme environments, by organising weekend trips trekking and climbing. 'We aim to see these skills used in major expeditions around the world and encourage students of all academic backgrounds to get involved', explains Francis Bonomaully, Treasurer of WMS. A grant from the Fund helped the Society to run evenings on military, Antarctic and high altitude medicine, and 'wild trials' culminating in an expedition to the Pyrenees whose aim was to develop medical and practical skills in a remote mountain environment. Life-saving skills are first taught indoors and then put into practice in a series of moulages (mock injuries) on the mountainside. These grow in complexity, culminating with a four-man, casualty scenario with the entire group working as a team to recover the 'patient'.

Model International Criminal Court

Support from the SOF enabled English Law & German Law undergraduate Joshua Fisher to pursue his dream of becoming a teacher of law by acting as an assistant teacher at the Model International Criminal Court in Krzyowa (Poland). This week-long international course teaches the core principles of human rights and humanitarian law to high-school and university students by taking them through a simulation of trials before the International Criminal Court. 'This was a once-in-a-lifetime opportunity for me', Joshua comments. 'It gave me the chance to acquire both a knowledge of international law and important methodological skills such as time management and team work. It was a great feeling being a teacher, and I learned so much about the past, for my present situation and for my future.'



The clown within

For Philippa Swallow, a student on the MA in Theatre & Performance Studies, the Fund supported her attendance at a workshop with the famous clown and teacher, Philippe Gaulier. 'It was the most extraordinary experience I've ever had and without a doubt the toughest,' she says. 'Gaulier is pretty much the living authority on clowning and, as a student of Jacques Lecoq, one of the last links to an amazing physical theatre tradition in France. Every day of the course was a challenge. If you took yourself seriously he would bang his drum and you were sent off stage. He gave us characters that we had to find the clown within: I was given the difficult task of 'The Baby' and I had to dress every day in a giant nappy. For most of the course he said I was terrible, but one day I did something he liked and it made me feel I'd really exceeded my objectives. I think opportunities like this are essential not only to inform my scholarship but also to grow as an artist, and it was a special chance to try something very different and very difficult. It made me think essays were a snitch in comparison to being told I was so bad Mrs Gaulier wanted to kill me.'



Philippa Swallow attended a workshop with famous clown and teacher Philippe Gaulier.



Copenhagen

One of the largest grants from the Fund supported students led by third-year Physics & Philosophy student William Nash, third-year History student Alister MacQuarrie and second-year English student Aja Garrod, who came together to present Michael Frayn's famous play *Copenhagen*, which deals with quantum physics, the nature of memory and the responsibility of nuclear scientists for the atom bomb, combining the science and the human implications. The production received very favourable reviews and audience responses, and the grant allowed the team to offer free tickets to secondary school pupils.

Writing politics

Dialogue, the journal of the King's College London Politics Society, has become one of the College's most renowned student publications, with average readership of some 1,500 per issue, and a recent request from the think-tank American Enterprise Institute to republish one of its articles. 'The journal is not only a successful way to advertise our Society's activities, but also a non-partisan platform where students can express their ideas on topics of interest, while at the same time improving their skills as critical writers, gaining journalistic experience and becoming more engaged with the College community', points out Errikos Klopfer, third-year student in International Politics and Treasurer of *Dialogue*. A grant from the Fund enabled the Society to run a workshop on the journal's design, editorial and management opportunities, and a skills session on writing contributions, which demonstrated suggestions for credible research sources and how to evaluate them; how to structure an argument and how to employ critical and analytical skills.





People power

Jon Alexander and Iris Schoenherr, students on the Global Ethics & Human Values MA, received £500 from the Fund to organise a public debate on 21st-century people power. The event was held in St Mary's Church, Putney – a birthplace of modern democracy and universal suffrage – and hosted speakers from Cambridge University, from YouGov, from the Danish social enterprise Borgerlyst and from the Phoenix Education Trust. 'The day showed there are many people who believe in the possibility of a more participatory society, and we came up with many ideas that express people power in the 21st century,' says Jon Alexander, who gave the opening speech of the conference and led the debate. 'The event was an opportunity not only for people from a wide range of backgrounds, including of course students, to raise their voices in the discussion but also to get to know people who are already working to make change happen.'



The public debate was held in St Mary's Church, Putney – a birthplace of modern democracy.

Organised crime in conflict zones

This highly topical subject drew 200 people to a conference organised by Melisa Tezcan, a student on the Conflict, Security & Development MA course, and supported by £1,000 from the Fund. 'The project gave us the chance to interact in a new way with both our peers and our lecturers,' Melisa comments. 'It also opened doors for us in terms of our careers: building up contacts in the fields we're interested in pursuing and leading to further potential projects.' The success of the event means that it is likely to be run again for next year's War Studies students.

Gastro

Nominated as best new society of the year, the student-run Gastro Society at King's aims to inspire and support medical and nursing students interested in careers in gastroenterology and gastrointestinal surgery. Thanks to the Fund, the Society has organised talks on being a surgeon and on life as a medical registrar; a session on how to get published in a medical journal, and a theatre skills workshop. 'Some 100 students directly benefited from the award', reports Gastro Society President third-year Medicine student Yukiko Kubota-Sjogren. 'And the doctors who volunteered also appreciated the opportunity we created to enhance their teaching skills. Some of us also learnt a lot about running a society in our spare time, enhancing our ability to multi-task, prioritise and manage last minute crises such as cancellations and broken equipment!'

The project gave us the chance to interact in a new way with both our peers and our lecturers.







Artwork by ArtYulia

Linking the *mind & the brain*

Psychiatry, psychology and neuroscience are working together to address both the brain and the mind.

The Institute of Psychiatry at King's has become the Institute of Psychiatry, Psychology & Neuroscience.

Historically, the brain and the nervous system have been investigated and treated by a great variety of separate disciplines, including neuroscience, neurology, psychiatry and psychology. Investigative methods have ranged from clinical scans to behavioural studies and social and philosophical approaches, and treatments from neurosurgery to psychotherapeutic counselling.

Now these disciplines are increasingly working together to address both the brain and the mind: a change that is reflected in the new name for the Institute of Psychiatry (IoP) at King's, which has become the Institute of Psychiatry, Psychology & Neuroscience (IoPPN).

'The new name is catching up with the reality of what's going on at the Institute, and the great breadth and depth of expertise in this area at King's and its partner NHS Trusts,' explains Professor Shitij Kapur, Dean of the Institute. 'Our name may have hidden our reality. The IoP has always been broader than just a place for psychiatrists. But over the last few years there has been a substantial expansion in the area of brain sciences and psychological sciences here, and we want to explicitly acknowledge that and build on the two basic sciences at the heart of mental health practice –

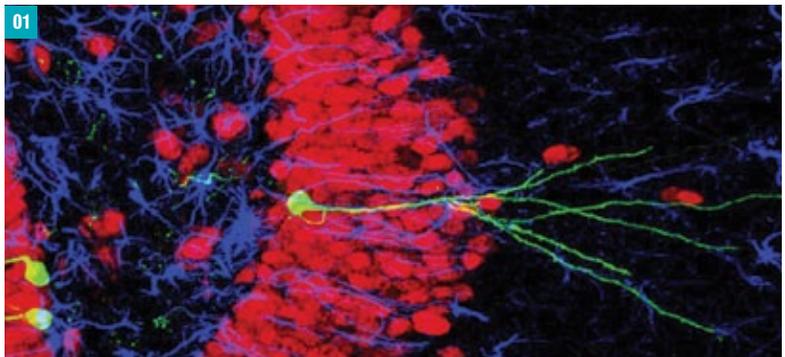
psychology and neuroscience. 'The new name also emphasises that we're not only doing basic investigative scientific research but that we are also using our research findings to develop treatments for patients. Bringing together the basic biomedical and the psychological sciences with the clinicians opens up many new opportunities in areas such as dementia and childhood neurodevelopmental disorders including autism.'

Diagnosing autism

Working closely with partner hospitals, researchers from the IoPPN have developed a pioneering new method for the diagnosis of Autism Spectrum Disorder (ASD). By studying the complex and subtle make-up of grey matter in the brain, scientists can use biological markers to help assess whether or not a person has ASD. An MRI scanner is used to take pictures of the brain's grey matter and a separate imaging technique is then used to reconstruct these scans into 3D images that can be assessed for structure, shape and thickness. Using this method, a 15-minute brain scan can, alongside other diagnostic methods, help to identify adults with ASD with over 90 per cent accuracy, and could lead to the screening for these disorders in children in the future.



Dr Sandrine Thuret



Synthesis of mind and brain

Increasingly, Professor Kapur points out, people in general are beginning to link functions that were previously thought to be just about the mind to physical structures and circuits in the brain. 'Society is being presented with a sort of "neuro of everything",' he says, instancing the way in which newspapers and television show brain images of people when they are making moral decisions, or the brain circuits involved in making financial calculations. 'However, this is often a shallow and sensational view of neuroscience. One of our challenges at the IoPPN will be to bring these fields of science into confluence in a rigorous and scholarly fashion.' King's has global prominence in the field of

psychiatry and psychology, ranking second only to Harvard in terms of citations and papers: an extraordinary feat for a non-US organisation since, as Kapur points out, the overall resources per scientist are some two or two-and-a-half times more in the US than in the UK.

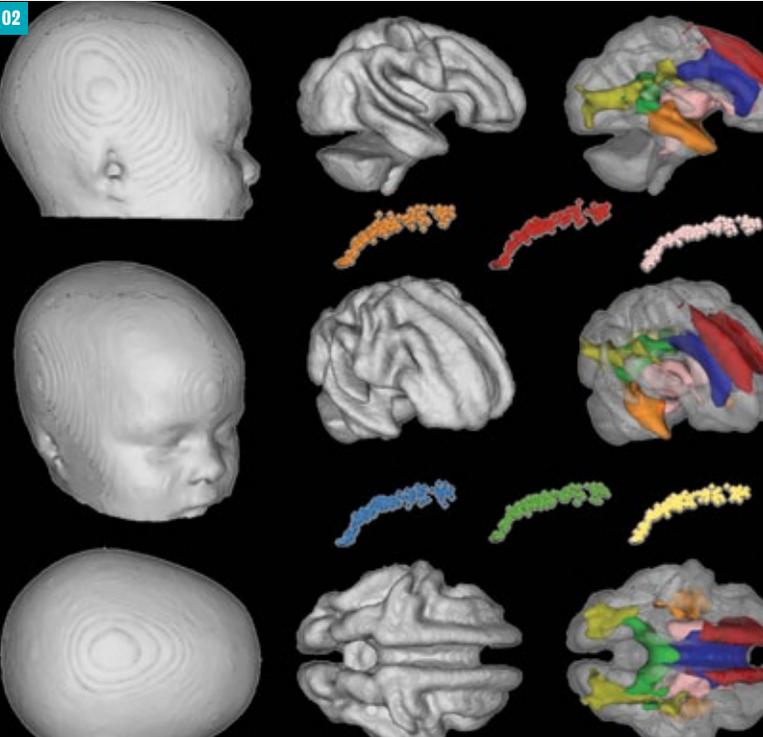
In neuroscience, King's is amongst the world's top 25 and wants to move higher. 'Our hope is that, by bringing together neuroscience, psychology and psychiatry, we will not only consolidate the position of psychiatry and psychology, but also enhance our neuroscience profile,' he says, drawing the analogy with the Institute's historical partnership with the Maudsley Hospital. 'Putting together

the resources of the hospital with those of the university allows us to do translational research of the kind that wouldn't have been possible otherwise, taking our findings from the laboratory bench to the bedside and so having much greater impact on treatments for patients.

Data mining

'For example, because we work very closely with the Maudsley, we've been able to establish one of the largest electronic health record research databases in the world, where the records for all the patients in the Maudsley system (with appropriate anonymisation) are updated daily and become available for data mining.

Dr Jonathan O'Muircheartaigh



01
New neurons (green)
born in the adult brain.

02
Imaging white matter and
myelin in the developing brain.

This is now increasingly being linked to genetic imaging and giving rise to an unprecedented opportunity to connect the biological with the clinical.

‘On a micro scale, by working with the hospitals we’ve been able to use positron emission tomography (PET) imaging to identify early brain changes in Huntington’s disease, almost two decades before a patient manifests the illness. This is leading to a fundamental breakthrough in the understanding of how the illness develops and also opening up the possibility of intervening much earlier than anyone could have imagined.

‘We now want to have a much more active and synergistic relationship with King’s College Hospital, just across the road. There’s actually a concrete manifestation – in fact, a steel and glass manifestation – in the form of two important new research centres opening this year

at Denmark Hill: the NIHR and Wellcome Trust King’s Clinical Research Facility and the Maurice Wohl Clinical Neuroscience Institute. It’s my hope that, in the next decade or so, these will become as prominent in their field as the Maudsley/IoP partnership is in psychiatry.’

It’s the circuitry that matters

Because of the complexity of brain disorders, and because you cannot simply biopsy brain tissue, Professor Kapur explains, developing drugs in this area is much more difficult than for, say, cancer or psoriasis, where the tissue you are trying to treat is directly accessible. ‘And anyway the brain is not just a tissue,’ he points out. ‘Even if you could biopsy a part of it, it actually wouldn’t tell you anything about the circuitry around the brain, and it’s the circuitry that matters.’ As a result of these challenges,

the drug companies have largely withdrawn from new drug development in this area.

‘However, what we’re doing at King’s is hosting the largest number of European Union-funded Innovative Medicine Initiatives (IMIs). We’re leading IMIs in the area of pain, in autism and in schizophrenia and depression. So, while we still can’t biopsy the brain, we’re developing technologies that allow us to look at the brain, its circuitry and its function, and thereby enhance the development of new medications and interventions.

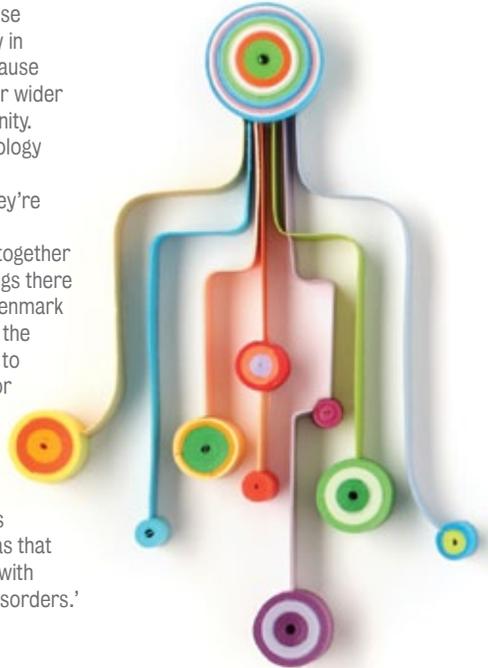
‘We’re hoping to rekindle the interest of the pharmaceutical companies in the area of brain disorders, because these are going to be the single largest area of growing morbidity for patients in the UK and Europe over the next 25 years.’

State-of-the-art clinical space

The NIHR and Wellcome King’s Clinical Research Facility (CRF) is a unique, world-class medical research facility focusing on three areas of activity: experimental medicine, clinical trials and cell therapy. Supported by King’s Health Partners and jointly funded by the National Institute for Health Research (NIHR) and the Wellcome Trust, King’s CRF provides a state-of-the-art clinical space where trials for drug devices and psychotherapy interventions can be carried out in a highly rigorous and standardised fashion, and the effects of new medicines not as yet available in the pharmacy can be studied using brain imaging such as electroencephalography (EEG), PET and newer techniques that make multiple observations possible.

Professor Peter Goadsby is Director of the CRF and Professor of Clinical Neuroscience at the IoPPN. ‘Conditions such as stroke, epilepsy, mood disorders and headache are hugely costly because there are so many people suffering from them,’ he points out. ‘There are some 8.5 million migraine sufferers

in the UK alone, for instance. These conditions are expensive not only in terms of treatment, but also because of the loss of work days, and their wider effect on society and the community. ‘The tendency has been for neurology to do neurology while psychiatry does psychiatry. And although they’re addressing the same organ – the brain – they really haven’t come together enough to see what common things there are to learn. Now, at the King’s Denmark Hill site, there’s the organisation, the integration and the collaboration to offer real, tangible opportunity for progress.’ ‘We’re uniquely placed here. We have a focus on neuroscience and the clinical translational infrastructure in place to make use of it. There’s nowhere else in the world that has that kind of neuroscience interaction with mental health and neurological disorders.’



Why and how

Peter Goadsby, Professor of Clinical Neuroscience at the IoPPN, explains that the two great areas of development in neuroscience over the last decade have been in genetics and in functional imaging. 'Genetics enables us to identify the "why" – "Why do I have this? Why am I depressed? Why do I have headache, a tremor? Why me?" 'And answering the "how" question with functional imaging has also been incredibly important for mental health and neurology, because the organ of interest – the brain – is inaccessible. You can't just peer into the brain or chop bits out of it, so imaging is crucial,' he says. Added to these is the third dimension of translating these advances through neuro-pharmacology and therapy into new treatments for patients.

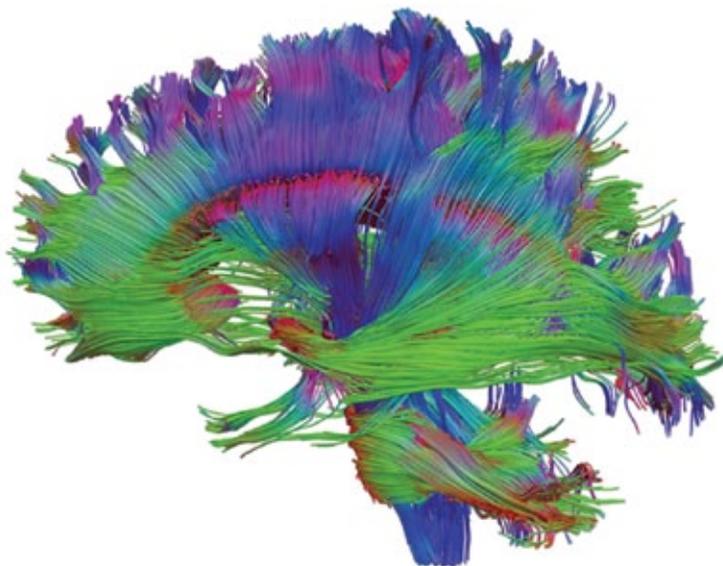
Taking headache seriously

Goadsby is himself a world-leading research expert in headache disorders. 'Our understanding of headache has changed enormously in the last two decades,' he points out. 'When I started in this field, it was considered to be primarily a psychological problem. Patients were told it must be their anxiety that was causing their headache. That sort of nonsense is being slowly eliminated as we begin to understand the biology. The genes for hemiplegic migraine were identified about 20 years ago, and once you've identified the genetics of something you just can't say it's down to being a slightly unhappy person in the suburbs.'

Patients were being told it must be their anxiety that was causing their headache.

There are 8.5 million migraine sufferers in the UK alone.

Dr Marco Catani 03

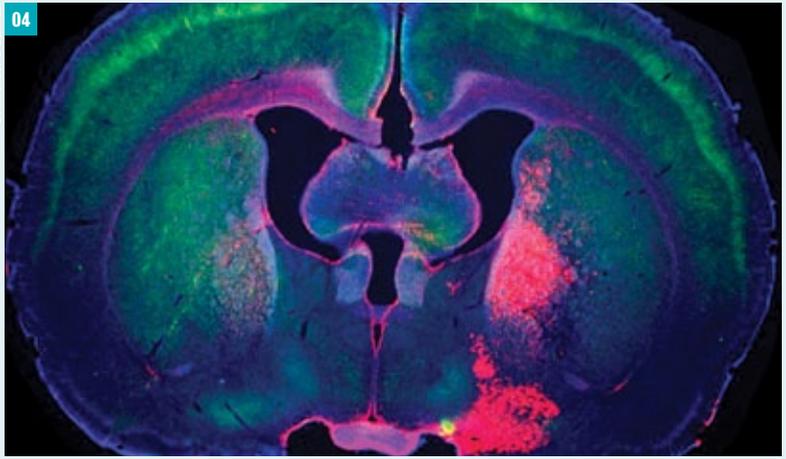


03
A connectome, or map of neural connections in the brain

Similarly, on the imaging side. If you've got a bad headache, your mood changes – but you don't get much sympathy for that and it's difficult for people to see what's going on. But functional imaging allows us to see what parts of the brain are active or inactive and to identify patterns of change that correlate with the disorders, leading to a change in attitude to patients.

'The third arm is neuropharmacology. In the labs we've been able to turn that understanding into real, tangible new therapies. It's become a virtuous cycle, and we've been able to develop new therapies, ask questions about how they work, realise that we could do better and then develop newer therapies that give us a better insight into the disorder. That cycle is tremendously exciting to me.'

Dr. Michael O'Sullivan



Super resolution

Professor Shaw, Director of the Maurice Wohl Clinical Neurosciences Institute, agrees that the neurological sciences have traditionally been hard to study. 'But now the revolution in genetics and microscopy means that we can put some disease-specific

gene mutations into cultured nerve cells and small animals to explore the effects they have over time, in a way we can't really do with our human patients. So the big change has been the ability to grow brain cells and study disease processes in living cells.' That requires highly-specified laboratory conditions.

Bench to bedside

Set to be one of Europe's leading centres for interdisciplinary neuroscience research, the new £42 million, 7,600-square-metre Maurice Wohl Clinical Neuroscience Institute is located at the heart of King's Denmark Hill Campus. It brings together a network of clinicians, researchers, patients and carers to advance the understanding of the mechanisms of diseases such as Alzheimer's, Parkinson's and motor neurone disease, epilepsy and stroke and to develop new therapies through innovative research.

The lead gift for establishing the Institute came from the Maurice Wohl Charitable Foundation, with the Wolfson Foundation, King's Medical Research Trust, Maudsley Charity and the Garfield Weston Foundation all providing generous support for the project.

Simon Toppi



‘This is a very expensive building,’ he agrees. ‘It has the infrastructure to support a very large animal breeding facility – only rats and mice, no larger animal experimentation – and fruit flies. We can manipulate the genes in those species so that we can study human disease. There’s now a range of new microscopes that allow us to see not just whole cells but also disease processes in living cells, and not just in cells grown in a dish but living cells in the brains of animals. Super-resolution microscopes can see events happening on a single molecule level, which was inconceivable some years ago. There’s a whole new world that we can see through the microscope.’

‘And of course, there’s an extraordinary new revolution in genetics. Fifteen years ago the first map of the human genome – which was pretty incomplete, to be honest – was published, and that

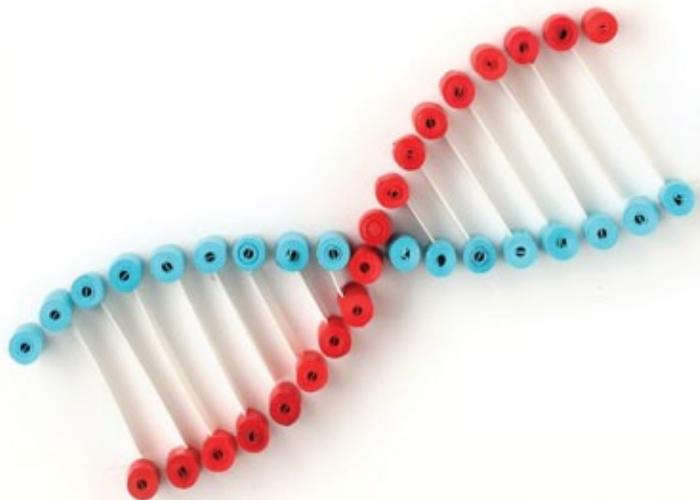
had taken something like 15 years and cost £250 million. That can now be done in a week for about £1,000. Things that were unimaginably complicated, painstaking and expensive are now relatively trivial in terms of the technology to generate the data. We now need to be able to store these massive datasets and analyse them with powerful software programmes, and that’s coming on line as well. Soon we’ll be able to map each individual’s entire genetic code, and look at what diseases they might be genetically susceptible to. And, ultimately, for people who are at high genetic risk, there will hopefully be the option of pre-symptomatic treatment.’

Motor neurone disease

Professor Shaw’s own group has been hunting disease-causing genes for motor neurone disease (MND) for the last 20 years. ‘And we’ve found a few, which is good news,

because as soon as you discover a gene you can take it into the clinic and people can be tested for it. People with a family history of MND who might have chosen not to have children can now use pre-implantation genetic diagnosis to make sure they have children who are not carrying the gene. There is in fact a little boy, born about a year ago, who is free of the disease that has killed his uncle and his grandmother, and of the gene that his mother carries. I have known this family for nearly 15 years and for them this has been hugely important. Sadly the uncle, who was only 30, saw his nephew just a few weeks before he died. But he knew that MND, which has caused such devastation in his family, will stop in his generation.’

Professor Chris Shaw, Director of the new Institute, points out that it unites 250 clinicians and scientists previously dispersed over 14 different sites across four campuses. ‘The Institute will put them in the same laboratory and in the same cafeteria,’ he says. ‘We’ve designed the building specially to bring together groups who previously might not have met or talked or worked together. We have a café with bench seating rather than small tables so that people sit down next to people they don’t necessarily know. The idea is to make connections between clinicians and scientists and become more than the sum of our parts.’



04
Neural stem cells (pink) transplanted to repair stroke damage.

05
Mutations which cause motor neurone disease.

STEP INTO YOUR P



PUBLISHED BY THE PARLIAMENTARY RECRUITING COMMITTEE, LONDON — POSTER NO 104

PRINTED BY

This recruitment poster, published in 1915, reflects the fact that, unlike in previous wars, the professional classes (including students) were expected to fight. Compulsory conscription was not introduced until January 1916.

PLACE



BY DAVID ALLEN & SONS LTD, HARROW, MIDDLESEX. W. 2846. 40H-517

King's College London Archives

WWI at *King's*

Dr Christine Kenyon Jones

The First World War had a major impact on the entire King's community: not only those who went to fight.



In a remarkably prescient sermon in September 1914, the Dean of the College, Revd Alfred Caldecott, described this conflict as ‘the first time in modern English history that the pressure of war has been turned directly on the whole youth of the nation.’

Whereas fighting forces had previously been drawn solely from ‘the upper levels of the nation for officers, and from the labour levels for the rank and file’, the ‘great intermediate levels from which professions, and therefore students, are mainly drawn’ had, he said, ‘been but little touched.’

But now, he foresaw with grim accuracy, ‘it may perhaps be found that the whole youth of the Nation is called. It is indeed “Nation against Nation” now.’ Students would, he said, be called to ‘devote not only physical strength but intellectual capacity’ to national service.

According to FJC Hearnshaw, the College’s 1929 historian, 1,567 King’s students and staff were engaged in military service during the War; with about half the College’s staff away fighting or doing other war work. Two young King’s alumni were awarded the Victoria Cross: Captain Archie White, a recent President of KCLSU, and Revd Noel Mellish, the first chaplain to win this honour in the War. Exceptionally, both of them survived; but 239 other King’s staff and students were killed.

The women arrive

With fortuitously good timing, the arts and science faculties of King’s College for Women in Kensington were merged with the all-male King’s College at the Strand in 1915, and the arrival of women staff released many male lecturers for military service, while the absence of men helped to give women a new prominence in the life of the College.

There was a risk that the College buildings would be seized by the War Office, but Principal Ronald

Burrows was able to prevent this by demonstrating the extensive war-work being done by staff. This included research enabling English firms to supply specialist glass (previously only available from Germany) for lenses and other purposes; training thousands of munitions workers and aeronautical inspectors; testing field-glasses and telescopes for military operations; investigating the nutritive properties of various kinds of new foods, and providing intensive linguistic courses





01/02

Courses in 'trench cookery' were run by the King's Department of Household Science to assist women at the front who might need to find 'the best way of dealing with a quarter of a bullock or a whole sheep handed over to them by the Army Service Corps'.

03/04

The 'Roll of Honour' in the entrance hall at the Strand Campus commemorated King's staff and students who were killed. At least 239 members of the College were lost.

Imagery credit: King's College London Archives

for interpreters and liaison officers. Professor William Bottomley invented a 'bacterised peat' which went into immediate commercial production to help increase the output of land.

Under Dr Burrows, King's became what has been described as 'a powerhouse of academic propaganda in favour of national self-determination for the peoples of eastern Europe'. Professor Tomas Masaryk, in exile from Bohemia, became Professor

of Slavonic Studies, enabling him to foster the creation of the Czechoslovak Republic, of which he became the first President. Through his contacts with Eleftherios Venizelos, Prime Minister of Greece, Dr Burrows helped to bring Greece into the war on the side of the Allies.

King's also became the pre-eminent London centre for public lectures, drawing huge audiences among lawyers, bankers and City workers on their way home, with topics including 'The Spirit of the Allied Nations'; 'The War and the Problems of Empire'; 'The University and the Nation', and 'The Visions of a World Peace'.

The arrival of women staff released many male lecturers for military service.



Trench cookery

Meanwhile the Department of Household Science, in Kensington, ran courses in 'trench cookery', to assist women at the front who might need to find 'the best way of dealing with a quarter of a bullock or a whole sheep handed over to them by the Army Service Corps,' as the lecturer put it.

Student numbers fell from around 3,500 in 1913-14 to some 1,850 in 1915-16. 'There will be no Athletic Sports this year,' the *College Review* reported; 'there have been no debates, no socials, no ping-pong, no theological tub-thumping in the Common Rooms ... no excitement, no nothing.' Zeppelin raids cut lectures short, or meant they had to be rescheduled.

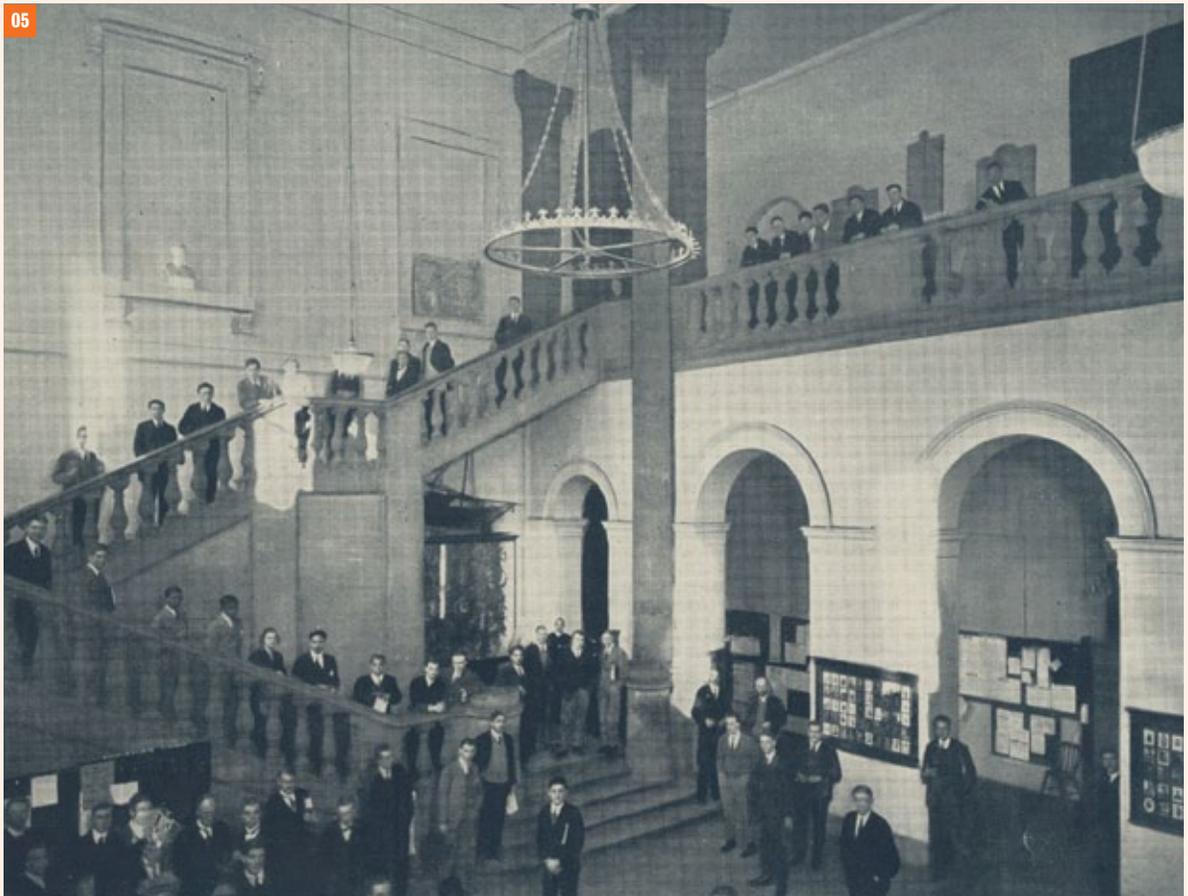
Even before the Armistice in November 1918, however, numbers were starting to recover, rising to over 4,000 in 1919-20. The men who came back from the war were considerably above the normal student age, and they engaged in particularly violent 'rags' with UCL students over mascots and trophies.

King's probably owes its continued existence as a separate

institution to the War. In 1912 the Royal Commission on the organisation of the University of London recommended that all the University's teaching resources should be re-grouped by faculty and subject in a new centralised system replacing the various existing colleges, and that King's activities should be moved from the Strand to a new 'University quarter' in Bloomsbury (then regarded as 'the back of beyond' in terms of London districts).

The Chairman of the Commission was Richard (Viscount) Haldane, Liberal Lord Chancellor 1912-15, a graduate of Göttingen University, who wanted London University to become an English version of the Technische Hochschule at Charlottenburg.

In 1913 the government set up a committee to determine how to enact the Haldane Commission's proposals, but this ceased because of the outbreak of war. During the war Haldane was forced to resign from government because of his supposed (unproven) German sympathies, and once peace returned his proposals were considered too 'Germanic' to be pursued. The success of its public lecture programme which drew in workers from the new business areas around the Aldwych helped King's to make the case that it should stay at the Strand.



06



05
The entrance hall at the Strand Campus, before the arrival of the statues, showing the 'Roll of Honour' boards.

06
A captured German gun at King's Strand Campus after the War.

07
Second Lieutenant Isaac Robinson studied in the Faculty of Arts at King's, 1915-16. He served in the East Lancashire Regiment and was killed on the Somme in October 1916, aged 20.

08/09
Captain Archie White, a former President of the King's Students' Union, and Revd Noel Mellish, a recent graduate, both won the Victoria Cross, and both survived.

Imagery credit: King's College London Archives

WW1 research at King's

King's is a global leader in the study of war in all its aspects, with substantial and interdisciplinary academic expertise and important archives including the Liddell Hart Centre for Military Archives and the Foyle Special Collections Library.

'King's staff are involved in research and commentary on all aspects of the causes, conduct, culture and consequences of the War', says Professor Sir Lawrence Freedman, Vice-Principal (Strategy & Development). 'We are marking the centenary with events (many of them open to the public) addressing the large questions that still surround the War. These include: "Could it have been avoided?"; "What might the world have been like if it had been?"; "Why did the belligerents fight as they did?"; and "Is there any sense in which the results of this war was worth the sacrifice?"' For further details visit <http://www.kcl.ac.uk/firstworldwar/index.aspx>

'Lest we forget': the war memorials website of King's College London, Guy's and St Thomas' Hospitals celebrates the lives of the more than 700 students and staff from King's and its partner institutions who were killed in twentieth century conflict, with detailed biographies which serve as a permanent reminder of the personal sacrifices of students and staff. The website <http://www.kingscollections.org/warmemorials/home> is the result of a year of research by a team from the University of the Third Age, drawing on original source material held by King's College London Archives and on externally held records such as those of the Commonwealth War Graves Commission.





Giving *to King's*

*Turning university
fundraising on its head has
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World questions | KING'S answers
campaign.*

Principal Professor Sir Rick Trainor with Dickson Poon Scholars. The Dickson Poon scholarship programme offers generous scholarships to outstanding new law students and is the largest such programme for undergraduate law students in Europe.

Jim Winslet

King's publicly launched its World questions | KING'S *answers* campaign in November 2010, with the ambitious goal of raising £500 million by 2015.

Thanks to the generosity of alumni, friends, staff and students, that goal was reached 18 months before schedule, and the campaign has now set another ambitious target of raising a further £100 million by the end of 2015.

Gemma Peters, King's Executive Director of Fundraising & Supporter Development, talked to REPORT about the campaign and the reasons for its success.

R: I've heard that King's fundraising is something of a role model for other UK university campaigns. Why is that?

GP: Fifteen years ago King's was bold in terms of first professionalising its office, and continuing to invest in that really has paid dividends. We're evidence that you don't need to be Oxford or Cambridge to raise a lot of money.

R: Why do you think the campaign has been so successful?

GP: It's a happy coalition of several different things. At the forefront is the fact that what we're raising money for is really compelling. The concept of World questions | KING'S *answers* essentially turns the traditional university campaign on its head. Traditional campaigns say 'Give to us, because we're a great institution, and if you give us more money we'll get better.' But what the World questions |

KING'S *answers* campaign says is, 'Don't give to us because we're a great and old institution. Give to us because we care about the things you care about, and we can make a difference in the world on those issues.'

This has really captured the zeitgeist. Rather than presenting research that might take generations before there's a benefit, we've chosen to focus on projects at King's that could change the world in the next 10 years, if we have the money.

R: Are there other reasons?

GP: Another striking comparison for me, in terms of our previous campaign, was that whereas about two and a half per cent of our alumni were giving to King's, some 70 per cent of them were giving to a UK charity that in turn gave money to King's. So, for instance, our alumni were giving to Cancer Research

The World questions | KING'S *answers* campaign has provided critical funding for a range of initiatives, from student-centred programmes such as scholarships and clubs, to research that will have global impact in multiple fields, including cancer, neuroscience and children's health. Thanks to the generosity of alumni and friends, King's academics, researchers and students all have opportunities to answer some of the world's most challenging questions. Please visit kcl.ac.uk/kingsanswers

Greg Funnell



Sir Dickson Poon CBE

The Dickson Poon School of Law at King's, in Somerset House East Wing, is named after the School's most important donor, Sir Dickson Poon CBE FKC.



UK, and Cancer Research UK were passing on that money to our researchers to do the research. So it seemed that other organisations were making the case for our work better than we were making it ourselves, and people were choosing to give to them, rather than us, because of the way they were telling their stories. So we needed to step up the story about the impact of the people who work at King's.

The other great reason for success is that King's leadership really believes in philanthropy. Professor Rick Trainor's role has been crucial, because the Principal is the person in whom leadership is embodied. The fact that Rick and his wife Marguerite (Professor Marguerite Dupree) gave such time and energy, and built personal friendships with the donors, has been critical to our success. And one of the first things Professor Ed Byrne did when he arrived as Principal in September

2014 was to announce that he was donating his first month's salary to the campaign. That's a great example of his commitment, and an indication of how important that leadership role is.

Third, we've got a great professional team who have been able to support academic colleagues in their fundraising. That's made a big difference. In some institutions you see the kind of mistrust that makes academics think: 'I'm not going to talk to you fundraisers about this piece of work, because I don't trust you to write about it in a particular way, or want you to be with me at that meeting.' But here there's a real trust and partnership between the academics and the professional staff in my team.

R: Is the Campaign Board an important factor?

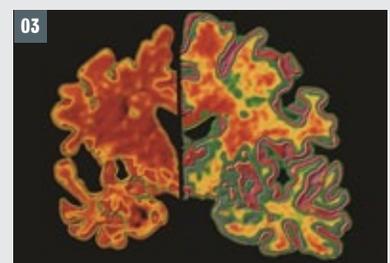
GP: Yes, the quality of our Campaign Board has been transformative in this campaign. They've been able to help us enormously: by introducing people, by enabling us to have conversations, by approaching people about supporting the College. The Board has about 50 per cent alumni and 50 per cent non-alumni, and it's been chaired by Sir John Major who isn't himself an alumnus. This means we have senior volunteers who are standing up and saying 'Well, I didn't go to King's, but I'm on this Board because I really care about what King's is doing, and I think this is the best place in the world if you're interested in (say) autism or terrorism.' That adds such credibility to the story. However credible our fundraising staff or our academics are, people know

Detecting birth defects

A radical new approach to screening fetuses, largely removing the need for experts to interpret the images, will allow the initial scans to be done in a few minutes and provide a consistently higher detection rate for major abnormalities. The joint Wellcome Trust and EPSRC Innovative Engineering for Health scheme is providing £10 million to help Professor Reza Razavi and his colleagues at King's to develop a fully automated, computer-guided ultrasound system which will allow midwives to quickly acquire three-dimensional images of the whole baby in much higher resolution than is currently possible. 'Current ultrasound scans are relatively crude, and many serious abnormalities are not detected', points out Professor Razavi. 'This system will reduce the substantial delay after birth before diagnosis and allow these babies to be transferred much more quickly to a specialist centre for appropriate treatment.'

Testing drugs for dementia

Developing and trialling a new drug can take up to 15 years before it reaches the market but, with people living longer, the need to tackle dementia is urgent, and it is possible that existing drugs may be useful to slow or stop the impact of the disease. Researchers at the Institute of Psychiatry, Psychology & Neuroscience (IoPPN) at King's are therefore deploying improved diagnostic techniques and clinical trial design to screen King's library of more than 4,000 drugs to determine if any can be repositioned for treating dementia. So far, they have found nine that hold promise, including liraglutide, a diabetes drug that is being tested for side effects.



01
Gemma Peters. Executive Director of Fundraising & Supporter Development.

02
Sir Dickson Poon CBE FKC

03
A brain affected by dementia (left), compared to an unaffected brain.

that we're paid to be good advocates – but someone outside the institution saying it carries a very different weight.

Alumni are a really important part of this campaign and they make up the vast majority of the number of gifts we've received so far, and that will still be true at the end of the campaign. But the vast majority of the money actually comes from people who are not alumni. These are people for whom the work King's does is important, but they don't necessarily need to have had a pre-connection with King's, such as being a member of staff or an alumnus or alumna.

When I arrived and analysed the data from the previous, very successful, *Campaign for King's*, it became obvious that most of the money was coming from non-alumni. And so the fact that we were talking to all our donors as though they were alumni didn't

make any sense. So we built the new campaign around the idea of making a difference in the world, rather than basing it on what is good for King's. Design consultancy Johnson Banks helped us to come up with a 'look and feel' for that concept, and the name we chose for the campaign: World questions | KING'S *answers*

R: Is King's combination of university fundraising with hospital fundraising unique among UK universities?

GP: Yes. The way we fundraise for clinical care as well as research, across all our NHS partner trusts as well as at the university, is something I don't think any other institution in Europe would be able to say they do: certainly not on the scale of the trusts that we work with. It is relatively common in the US, because it's much more usual there for universities to own hospitals. It's been hugely beneficial for

us, because we've been able to talk to donors about projects that bring together genuinely cutting-edge research with clinical care.

The reason that most people support something in the medical arena is that they have a personal link to it, and they tend to care both that the next generation isn't going to suffer from that condition, as well as that patients with it today will see some benefit. So being able to put in truly integrated proposals to people, and providing opportunities for them to talk to doctors and patients and researchers all at the same time, is I think a key part of our success.

Understanding foreign Syria fighters

What motivates young men to leave their home and fight in Syria? The International Centre for Radicalisation at King's is undertaking an extensive study of foreign fighters participating in the Syrian conflict, particularly those from North America, Europe and Australasia. Using pioneering social science methods, researchers have developed an extensive database of several hundred fighters, monitoring their social media footprint, and they are also travelling to Turkish-Syrian border towns to interview fighters. The project's outcomes have already informed policy in the UK, Belgium, Germany, the US and Australia, and staff from the Centre have provided advice to the United Nations regarding the recent UN Security Council Resolution on foreign fighters.

Creating new cancer treatments

The new Cancer Centre at Guy's, opening in 2016, will offer patients personalised medicine by choosing bespoke therapies based on sophisticated molecular information about each patient's tumour, and will increase the number of treatment options available for individual patients. Using the latest technologies in imaging, genetics and molecular and cellular biology, the Centre will discover the drivers underlying different tumour types, and will apply this knowledge to improve patient care. Separating patients into those who respond to a certain treatment and those who do not will allow trials to be designed around groups where the majority will respond, thus accelerating the development of new drugs. A longitudinal view will aid researchers to solve puzzles such as why men from African and Afro-Caribbean backgrounds are three times more likely to suffer from prostate cancer, or why subtypes of breast cancer (such as triple negative or lobular cancer) behave very differently from other more common types of this disease.



R: Is one of the strengths at King's the breadth of what we do?

GP: Definitely. It often happens that we might engage with a potential donor in one area, and then discover that, while they're a bit interested in that area, they're much more interested in another area that wasn't on our list. And it's part of our strength that we've always been given the flexibility to bring that conversation back to the College or one of our partner trusts and say, 'Although we went to talk to them about student support, they're really interested in diabetes, and obviously we're doing great work in diabetes, so can we involve the diabetes people and work something up?' We've always had that flexibility, and the breadth of what we do gives us an advantage over other institutions.

R: Most of the campaign was run during a recession, and yet people gave generously. Do you have a theory as to why this was so?

GP: The way people's giving changed because of the recession was that they became much more acutely focused on impact: 'Will my money make a difference?' People tended to reduce the number of organisations they were giving to, but not to reduce the amount that they were giving to particular institutions. In fact, there's quite a lot of evidence to suggest that people actually increased the amount they were giving to a smaller number of institutions. So the organisations that were able to actively demonstrate that the donor's money was making a massive difference – where it wasn't just going into a pot, but it was changing something, and without their money that something would stop – tended to do well. Since our income has gone up year on year

throughout the whole period of recession, I think we've been able to show impact very well.

We've also been increasingly successful – and I hope this will continue – in attracting gifts at the very highest level, and, according to sources like the Coutts' Million Dollar Donors Report, during that period the number of people who were giving at the very highest levels of a million pounds or more actually increased, as did the number of gifts at that level. I think the reason King's succeeded in that period is that we do well at having big ideas, and this has protected us somewhat from the fact that other people were having a harder time financially, and had less disposable income.

Eliminating a hereditary disease

Research by Professor Chris Shaw of King's Institute of Psychiatry, Psychology & Neuroscience, supported by the campaign, has identified the gene for motor neurone disease and enabled Linda's son to become the first child in the UK to be conceived through preimplantation genetic diagnosis for this disease, which has tragically passed through three generations of Linda's family.

Suki Dhandia



04
The new Cancer Centre at Guy's Hospital will open in 2016.

05
Linda's son is the first child to be conceived through preimplantation genetic diagnosis for motor neurone disease.

R: It seems that there has been a particularly generous response from donors outside Europe. Can you say why?

GP: There certainly seems to be some evidence that the further away you are geographically from King's the more warmly you feel about it! The amount of alumni giving, and also the regularity of their contact, how active they are, how many alumni events they come to, and how prepared they are to volunteer – all these go up, the further the distance they travelled to come to King's, or indeed, the further the distance they've now moved away from London (so it applies to ex-pats as much as it does to people that were not British citizens at the time that they came to King's).

And there are some communities – such as in Hong Kong, on the East Coast and the West Coast in the USA, and in Canada – where there are small groups of influential

alumni, who are very well connected with each other, and very significant lead gifts from those regions have triggered other gifts. So, for instance, I believe the Dickson Poon gift of £20 million to the School of Law caused other people in Hong Kong to think about King's in a different way.

R: To what extent do you think the fundraising agenda should impact on a university's overall strategy?

GP: This is a chicken-and-egg situation. The fundraising strategy shouldn't drive the university strategy – that should be driven by the leadership of the university. However, institutions which go out into the world and say 'These are the problems, and we know all the answers and these are they; this is our strategy, and we're not going to flex that for anyone' don't do very well. A much better approach is: 'We're going to seek advice from experts in a number of different

ways about whether or not this is the right approach, and where we think we've got something to learn, we'll learn it.'

And one of those audiences that you want to test your proposition with, assuming that you're reliant on philanthropic support, is donors. The donors of very large gifts tend to be wealthy for a particular reason: they tend to be pretty experienced philanthropists; they tend to have some ideas about things, and they want to be involved in shaping an agenda, not just being told what the answer is. I think we've done really well in creating a genuine partnership with our donors, which has meant that our donors recommend King's to others as a place to support, and that many of the donors who've given at a high level to us over the last five years have subsequently given again, and I hope will continue to do so in future.

Supporting Santander style

Support for projects ranging from an investigation of the effects of pollution on children's lungs to an analysis of Brazilian films from the early twentieth century, has come from funding provided by the Spanish banking group Santander to promote innovative research that strengthens the links between King's and academics in countries within the Santander network. Santander's support extends to entrepreneurial initiatives such as the student-run KCL Business Club and funding scholarships and paid internships for 43 students in the current year, including 18 who are studying abroad.

Gift of £7 million

The Yeoh Tiong Lay gift was made to The Dickson Poon School of Law, King's College London, in 2013 by the family of Dato' Mark Yeoh, alumnus of King's. The gift of £7 million is funding new LLM scholarships as well as the new Centre for Politics, Philosophy & Law and academic posts in the School. The donation is the largest from a Malaysian family to any UK university.

The donation is the largest from a Malaysian family to any UK university.



R: If you were embarking on the campaign again, is there anything you would do differently?

GP: We held the public launch of the campaign within three months of merging with the fundraising teams from our NHS partner trusts, and the pressure that put on the leadership of the institutions and on my team was huge. At the time it felt as if there was no way to pull those things apart and not do them so close together. I also got married at the same time, so there was a nightmare six months! If I was doing it again, I would try to do those things separately – even in different years.

But I definitely wouldn't change where we've ended up. We didn't know we could raise £500 million: we really hoped we could, but we didn't know where it was coming from, and it was a real leap of faith.

We certainly had no idea we were going to get there 18 months early!

R: What are your hopes for the remaining part of the campaign? And for King's fundraising in the future?

GP: We'll stick with the original time-frame, which is the end of 2015, and we'll try and raise an additional £100 million. So my first hope is we can do that. It's a tall order. Even though the jump from £500 to £600 million maybe doesn't sound like a big one, to raise £100 million in 18 months, when you've already pushed pretty hard with the people that you know well, is going to be a challenge. It's going to be tough, and I won't know whether we're going to be able to do it probably until the end of November 2015. So my first hope is that we'll close this campaign successfully.

My hope going forward is that it has changed the mind-set of the institution, so that King's is really used to working with outside partners in all its big endeavours. There's now a very large group of people who aren't King's alumni but who are donors, and making sure that those people feel part of the King's family is really important – not just for the success of King's fundraising but also for our success in all sorts of different fields, in terms of our reputation and networks, the students that we recruit and our influence with governments and industry. So my hope is that those people become adopted by the institution way beyond my team – that they are genuinely part of the King's family.

World questions | KING'S *answers*

King's £600 million fundraising campaign, is supporting world-leading academics, researchers and clinicians who are solving some of the biggest challenges facing humanity. With the generous help of alumni, trusts, foundations and other friends, we are improving the lives of students and staff on our campuses and funding projects that have a global impact, particularly in the areas of cancer, child health, neuroscience & mental health, leadership & society and the emerging world order. This year, we would like to recognise those individuals and organisations who supported the campaign at an exceptional level during the 2013-14 financial year. We extend our appreciation to the following, as well as those supporters who wish to remain anonymous.

- A G Leventis Foundation
- Arcadia Fund
- Avantha Group
- Basil Samuel Charitable Trust
- British Private Equity & Venture Capital Association
- Carnegie Corporation of New York
- Charles Sykes Epilepsy Research Trust
- Chong Hing Bank Ltd
- CMS Cameron McKenna
- County Air Ambulance Trust
- The Daiwa Anglo-Japanese Foundation
- Denplan Ltd
- Dorset Foundation
- The Marquess and Marchioness of Douro (now the Duke and Duchess of Wellington)
- Enid Linder Foundation
- Florence Nightingale Foundation
- Foundation of European Nurses in Diabetes
- Gapper Charitable Trust
- The Great Britain Sasakawa Foundation
- Guy's & St Thomas' Charity
- Henry Schein Inc.
- Herbert Smith Frechills LLP
- Mr Klaus Heymann
- Hop Wai Foundation Limited
- The Inman Charity
- The Japan Foundation
- The Jerusalem Trust
- Mr Changqun Ji
- John S Cohen Foundation
- Jordan Jay Trust
- J.P. Moulton Charitable Foundation
- Lady Keswick
- Konrad Adenauer Stiftung
- Mrs Marie-Christine Lee FKC
- Lily Safra Hope Foundation
- The London Law Trust
- John D & Catherine T MacArthur Foundation
- Mayer Brown JSM
- Ministry of Culture, Government of India
- Mr SF Ng & Mrs Gloria Ng
- Oak Foundation
- The Peter Sowerby Charitable Foundation
- Mr Dickson Poon CBE FKC (now Sir Dickson Poon CBE FKC)
- Procter & Gamble
- Prostate Cancer Research Centre CIO
- Santander Universities
- The Schilizzi Foundation
- Sino British Fellowship Trust
- Stavros Niarchos Foundation
- T&J Meyer Family Foundation
- Tropical Health and Education Trust
- The Vandervell Foundation
- Vattikuti Foundation
- The Waterloo Foundation
- Ms Gillian Wells
- The Felicity Wilde Charitable Trust
- Winton Capital Management
- The Maurice Wohl Charitable Foundation
- The Lord Leonard and Lady Estelle Wolfson Foundation
- P C Woo & Co
- Worshipful Company of Barber Surgeons
- Mr Alvin Yeo
- The Yeoh Family

Sebastian Debrouwere reflects on his year as President of King's College London Students' Union (KCLSU).

Summarising my year at the helm of our Students' Union is quite a challenge. I vividly remember the night that I submitted my manifesto to run for President of KCLSU. I was on a semester abroad at Georgetown University in Washington DC. Little did I know it was the beginning of a testing and rewarding year-long journey.

As a student, I'd had the most marvellous time studying International Politics at one of the country's most renowned faculties. My time at university had been marked by a great involvement in all the extra-curricular and political activities King's has to offer. I'd represented fellow students in my department, protested against tuition fee rises and led Britain's first student-led policy institute,

the KCL Think Tank Society. Like the other candidates, I was thrilled by the prospect of representing my fellow-students and working hard for the changes we believed in.

Fast-forward to March when election mania traditionally takes root at King's. A dozen or so candidates and their supporters eagerly flock around the King's campuses, flyers in hand, winning smile switched on. We were all keen to make sure that every single King's student has a fulfilling student experience, and spent countless hours convincing our peers that we were worthy of their vote. Winning the election was tough and came at the cost of quite a lot of sleep. But little did my three newly-elected vice-presidents and I know we were at the beginning of one of the most testing and challenging years of our lives.

Handover

In July, we started the handover from the previous President's team. Thomas Clayton and his vice-presidents had had a great year: they'd worked with the university on extending library times, won

£300,000 more per year in bursaries and convinced the College to keep Wednesday afternoons free for sport. Together with the staff team at KCLSU they made it their task to prepare us for the year ahead. I jotted every piece of advice down in my notebook, read and re-read every paper I was given and probably made Thomas go mad with my endless questions. But by the time August came around, my team and I felt ready. We had plans. We had dreams. We had stamina. And we couldn't wait to ride the rollercoaster that is a year at KCLSU.

The academic year took off to a flying start. We rented the Barbican Centre to host our biggest ever Freshers' Fair, featuring nearly 300 sports clubs and activity groups. Every one of them showcased the best they had to offer in order to welcome new students and have them sign up for their activity. Our Cheerleading team gave a live performance. The American football team turned the exhibition hall into a pitch, and the Hindu Society put on a live dance. Even though it was my fourth year at King's, I still found it hard to take



Supporters eagerly flock around the King's campus

Student *diary* 2014

We had dreams. We had stamina. And we couldn't wait to ride the rollercoaster that is a year at KCLSU.



Think Tank Society

in how many different activities our students run every week, as volunteers, simply because they are passionate about King's and its students. Some societies even run their activities far beyond the confines of King's. The Diwali Show, for example, raises many tens of thousands of pounds for charities by running a full show with over a hundred performers. Our Islamic Society also runs a variety of charitable initiatives, my favourite being their 'Acts of Random Kindness' – a project which focuses on giving back to the local community in tangible ways.

Campaigning

Sadly, I've never had the talent or the skills to be a creative performer. My passion is campaigning for change and a better world, so it was really thrilling to meet so many students who wanted to join our campaigns. The College has been really supportive of us in this area: together, we agreed to get rid of re-sit fees for all students and introduce a massive upgrade to the wireless network at King's. We've also worked with

300

Sports clubs & activity groups

£20k

Community Fund, thanks to alumni



We believe our work only has significance if it is driven by the voice of our members and by their passions

the College to get a further £5,000 to support student opportunities and, with alumni, to create a £20,000 Community Fund that supports a variety of initiatives – ranging from the History Society’s outreach programme to raise aspirations in disadvantaged London Schools to Breakin’, KCL’s one-day Street Art festival at Guy’s Campus.

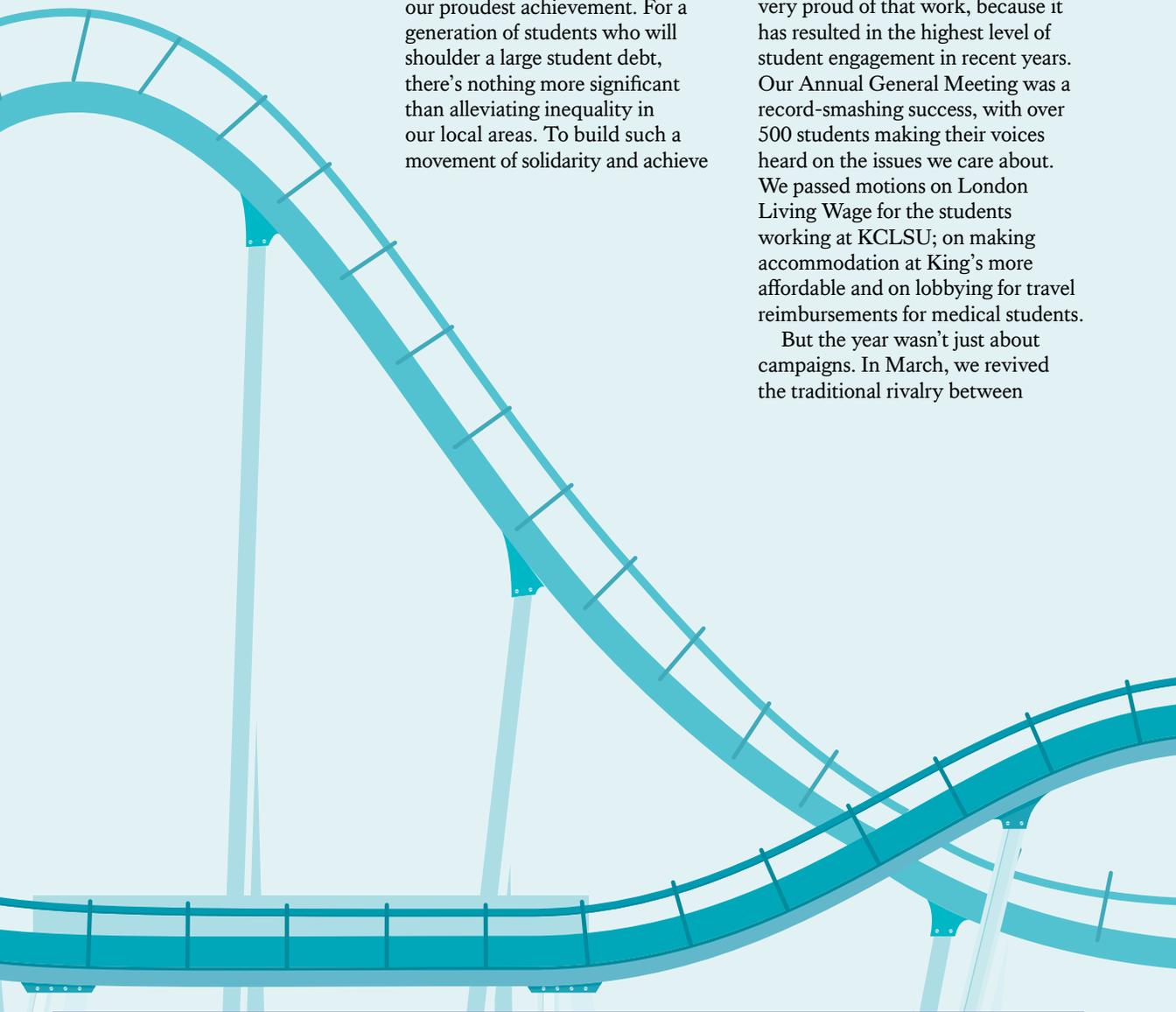
Our students have also successfully campaigned alongside cleaners and trade unions to ensure that all staff at King’s, including those employed by sub-contractors, receive a London Living wage. That, and the fact that KCLSU has become an accredited London Living Wage employer, is probably our proudest achievement. For a generation of students who will shoulder a large student debt, there’s nothing more significant than alleviating inequality in our local areas. To build such a movement of solidarity and achieve

that change we dreamt of together with the College is empowering and of historic significance.

Engagement

What makes students’ unions unique is that they are entirely membership-led organisations. For our team, that’s hugely important. We believe our work only has significance if it’s driven by the voice of our members and by their passions. To better engage with our membership, we set out to conduct a huge research project into the concerns of our students and how they wish to be represented. In particular, we set out to better understand and cater for health students. We’re very proud of that work, because it has resulted in the highest level of student engagement in recent years. Our Annual General Meeting was a record-smashing success, with over 500 students making their voices heard on the issues we care about. We passed motions on London Living Wage for the students working at KCLSU; on making accommodation at King’s more affordable and on lobbying for travel reimbursements for medical students.

But the year wasn’t just about campaigns. In March, we revived the traditional rivalry between



UCL and King's in a brand new Varsity series. In the past, Varsity consisted just of an epic rugby game between the King's and UCL teams. This year, sportswomen and men competed in seven sports: hockey, netball, Muay Thai kickboxing, water polo, taekwondo, fencing and rugby. King's led the series for most of the week, and only narrowly lost 8 – 5 after the rugby games at Allianz Park. Another highlight in the King's sporting calendar is the Macadam Cup, when the College's sports teams, divided into KCL and GKT (Medical and Dental School students) compete in a variety of sports. After a fun-filled day in which we went head-to-head in 11 sports, KCL were crowned the winners – for only the second time in the Cup's history.



King's and UCL teams competed in the Varsity Series in seven different sports

Looking forward

We spent a whole year working on the Union's strategy for the next five years, affectionately known as 'Big Plan'. Our vision is to support students to better help themselves and build their communities, through increased advice, more targeted campaigning and fostering representation structures at faculty and department level, amongst other things.

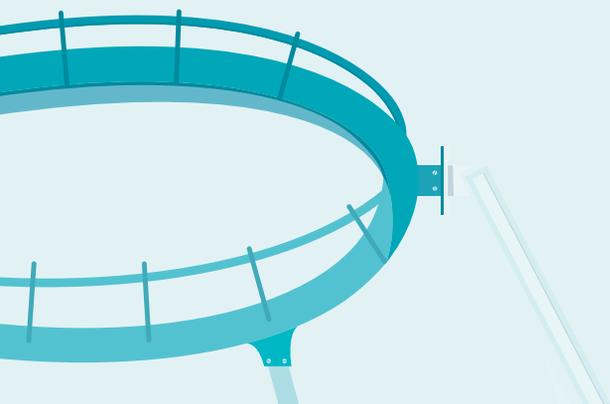
All of these are a reflection of the lessons we learned as a team in the last year. We understood that you can achieve more as a collective voice than as individuals. We felt a huge kinship and responsibility for the students that we're proud to represent – they are 'our people', and we'll go through fire for them if we have to. And we learned the importance of being leaders, each in our own way.

The 2014-15 year is a very important one. For one thing, it's an exciting new period as we welcome a new Principal, Professor Ed Byrne. Professor Byrne will make his mark on the College with an ambitious new vision that builds on the excellent foundations laid by his predecessors. We believe that student involvement is

key to writing, and implementing a strategy for a world-class institution with outstanding education, and we're looking forward to working with him and his Vice-Principals on this. Of course, there is also a General Election coming up in May. It's fair to say that the last General Election and the reforms to educational funding left a bit of a trauma in the collective minds of students across the country. At KCLSU, we want to be at the forefront of ensuring that much-needed decisions on accessibility and the nature of higher education reflect the needs of students, and we'll campaign to get as many students taking part in the Election as possible. And finally, we're in the first year of implementing our Big Plan – which means that we're rolling out quite a few exciting new projects.

Three out of the four officers in our team decided to commit a second year to students at King's. I'm proud that we have done so, and cannot wait to update you all on the successes of our second term in office next year. Keep tuned!

The fact that KCLSU has become an accredited London Living Wage employer is probably our proudest achievement.



King's has a strong international community from some 140 countries worldwide

15,000
undergraduates

10,600
postgraduates

7,000
members of staff

Consolidated income & expenditure account for the year ended 31 July 2014

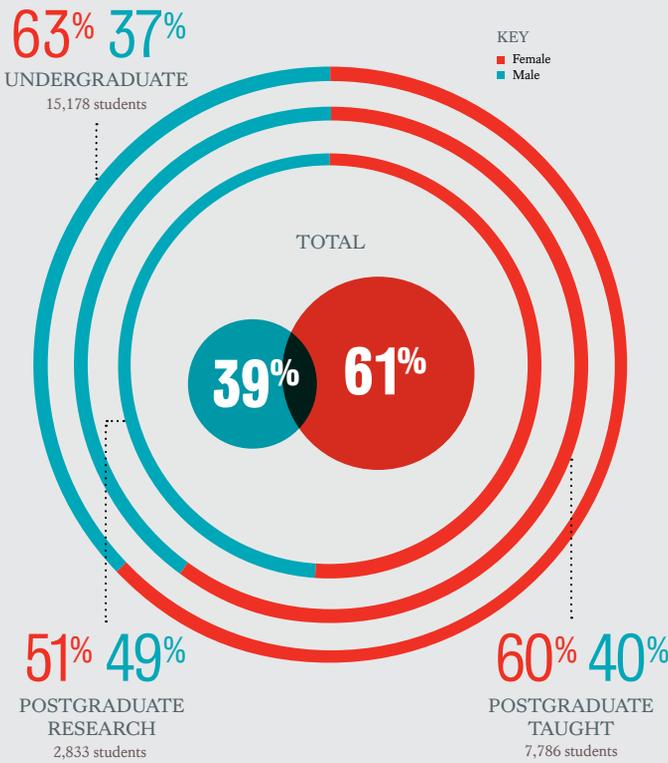
	2013-14 £000	2012-13 £000
Income		
Funding body grants	122,426	130,671
Tuition fees and education contracts	201,076	174,581
Research grants and contracts	171,547	164,025
Other operating income	102,845	111,276
Endowment and investment income	5,774	6,395
Total income	603,668	586,948
Expenditure		
Staff costs	376,770	349,889
Other operating expenses	189,880	190,659
Depreciation	26,946	24,602
Interest payable	12,213	12,233
Total expenditure	605,809	577,383
(Deficit)/surplus on ordinary activities	(2,141)	9,565
Taxation	-	-
(Deficit)/surplus on ordinary activities after taxation	(2,141)	9,565
Receipts from property transactions	5,963	-
Surplus after depreciation of assets at cost and tax	3,822	9,565

Facts, figures & finances 2013-14

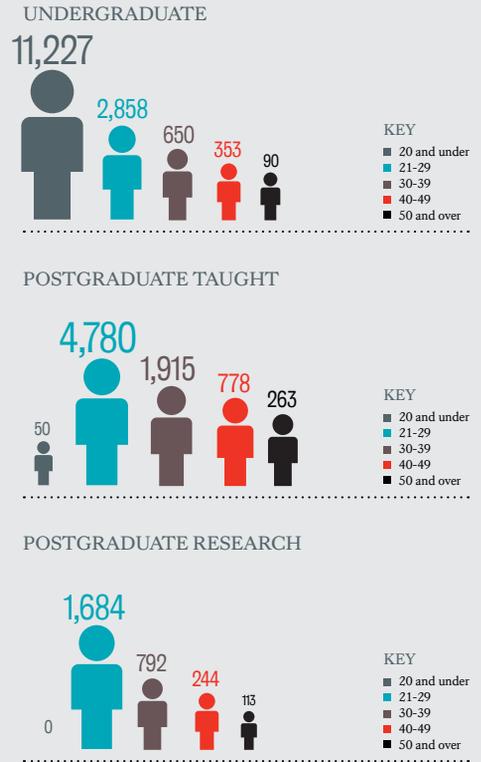
Student numbers by gender 2013-14

Gender	Number of students			Total	% of total
	Undergraduate	Postgraduate taught	Postgraduate research		
Female	9,548	4,693	1,448	15,689	61%
Male	5,630	3,093	1,385	10,108	39%
Grand Total	15,178	7,786	2,833	25,797	100%

Student numbers by gender 2013-14



Student numbers by age at start of programme 2013-14



Student numbers by age at start of programme 2013-14

Age	Number of students			Total	% of total
	Undergraduate	Postgraduate taught	Postgraduate research		
20 and under	11,227	50	0	11,277	44%
21 to 29	2,858	4,780	1,684	9,322	36%
30 to 39	650	1,915	792	3,357	13%
40 to 49	353	778	244	1,375	5%
50 and over	90	263	113	466	2%
Grand Total	15,178	7,786	2,833	25,797	100%

Students' country of domicile 2013-14

Domicile	Number of students	% of total
United Kingdom	17,143	66%
European Union	3,504	14%
Other international	5,150	20%
Total	25,797	100%

Students' country of domicile 2013-14



Members of staff on 1 January 2014 excluding senior students, honorary and occasional staff

School	Academic & Research staff	Other staff	Number of employees
Arts & Humanities	388	415	803
Biomedical Sciences	376	182	558
Dental Institute	283	95	378
Institute of Psychiatry	715	260	975
Global Centres & Institutes	39	13	52
Law	74	99	173
Medicine	1,041	365	1,406
Natural & Mathematical Sciences	182	89	271
Nursing & Midwifery	125	71	196
Social Science & Public Policy	363	250	613
Professional Services	46	1,580	1,626
Grand Total	3,632	3,419	7,051

Student numbers by School and level of study

Headcount on 1 December 2013

School	Campus	Undergraduate	Postgraduate taught	Postgraduate research	Total	% of total
Arts & Humanities	Strand	3,136	912	619	4,667	18%
Biomedical Sciences	Guy's, Waterloo	1,943	308	216	2,467	10%
Dental Institute	Guy's, Strand, Denmark Hill, Waterloo, St Thomas'	757	400	119	1,276	5%
English Language Centre	Strand	190	0	0	190	1%
Global Centres & Institutes		0	177	84	261	1%
Institute of Psychiatry	Denmark Hill	67	723	346	1,136	4%
King's Learning Institute		3	502	12	517	2%
Law	Strand	809	849	64	1,722	7%
Medicine	Guy's, St Thomas', Denmark Hill	2,505	670	456	3,631	14%
Natural & Mathematical Sciences	Strand	1,298	221	247	1,766	7%
Nursing & Midwifery	Waterloo	2,049	802	53	2,904	11%
Social Science & Public Policy	Strand, Waterloo	1,967	2,164	610	4,741	18%
Incoming Study Abroad students*		454	58	7	519	2%
Grand Total		15,178	7,786	2,833	25,797	100%

* The full-year enrolment for Incoming Study Abroad Students in 2013-14 is 809.

Because of its distinction, connections and central London location, King's attracts many eminent visitors and speakers.

Among those who visited in 2014 were the Secretary of State for Education, **Nicky Morgan MP**; the Minister for Defence Personnel, Welfare & Veterans, **Anna Soubry MP**; US Ambassador to the UK, **Matthew Barzun**; former UN Secretary-General, **Kofi Annan**;

the Sports Minister of Brazil, **Aldo Rebelo**, and the Chief Justice of Brazil's Supreme Court **His Excellency Joaquim Barbosa**; former French Prime Minister, **Alain Juppé**; former Leader of the Labour Party, **Rt Hon Lord Kinnock**; former Leader of the Liberal Democrats, **Rt Hon Lord Ashdown**; former Home Secretary and Foreign Secretary, **Rt Hon Lord Hurd**; former Home Secretary and Foreign Secretary, **Rt Hon Jack Straw MP**; Chief Medical Officer **Professor Dame Sally Davies**; former Chief of the Defence Staff, **Field Marshall the Lord Guthrie**; the Bishop of Salisbury, **Rt Revd Nicholas Holtam AKC FKC**; comedian

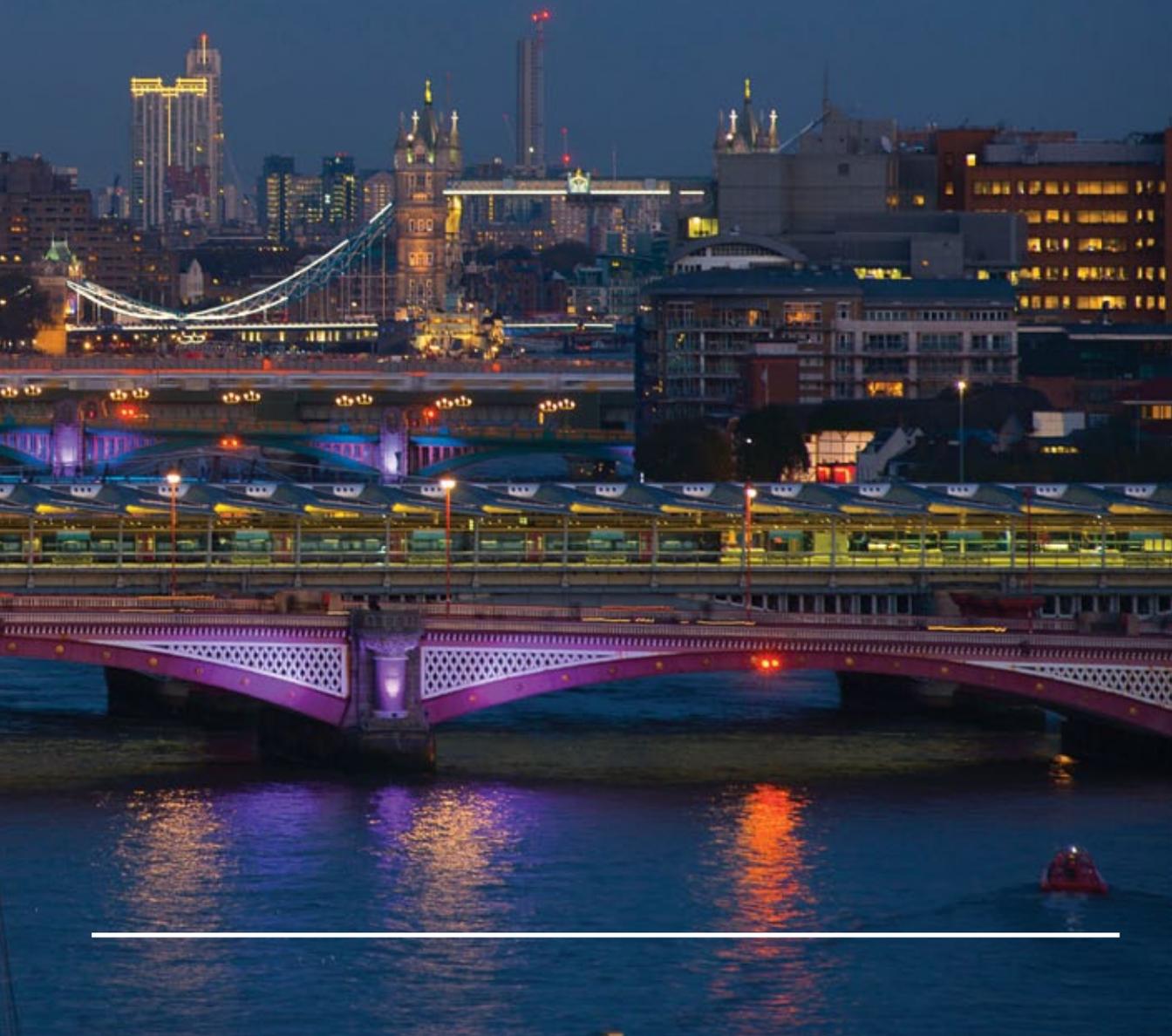


Visitors to *King's*

Jo Brand FKC and Monty Python stars **Terry Jones** and **John Cleese**; leading architect **Lord (Richard) Rogers**; editor, historian and author **Sir Max Hastings**, and business leaders including **Roger Saul** (founder of Mulberry), **Duncan Cheatle** (CEO of the Prelude Group), **Baroness Dido Harding** (CEO of the TalkTalk Group), **Cath Kidston MBE** (Founder and Creative Director of Cath Kidston), **Dr Ulrich Bez** (CEO of Aston Martin) and **Richard Reed** (Founder of Innocent Smoothies).

King's distinguished visiting professors and appointed visitors include **Rt Hon David Willetts MP**, former Minister for Universities and Science; **Lord Adonis**, former Secretary of State for Transport; **Sir Nicholas Macpherson**,

Permanent Secretary to the Treasury; **Professor John Rentoul**, Chief Political Commentator for the *Independent on Sunday*; **Sir Kevin Tebbit**, former Director of GCHQ and former Permanent Under Secretary of State in the Ministry of Defence, and **William Keegan CBE**, Senior Economics Commentator for the *Observer*. The former Lord Chief Justice of England **Lord (Igor) Judge** was a Dickson Poon Distinguished Visitor to King's in 2013-14. The former Chief Rabbi of the United Hebrew Congregations of the Commonwealth, **Rabbi Lord Sacks**, gave his inaugural lecture in March 2014 as Professor of Law, Ethics & the Bible at King's.



Report

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