

The Royal Society of Medicine

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RFS

Retired Fellows Society Newsletter



Lake Wanaka and the stunning Southern Alps of New Zealand

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Cover: Lake Wanaka and the stunning Southern Alps of New Zealand. *Photo by Ian Judson*

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Editorial:

Catherine Sarraf



At the time of writing, the government has confirmed that the restrictions the pandemic has caused to be imposed on us will indeed be relaxed from July 19th. Events of course change, and as we have seen over this year and a half, restrictions might be re-imposed at very short notice. Sadiq Khan has already announced that we will still be required to wear face masks on London transport. We have become accustomed to restrictions, and in some cases have found a kind of solace in the quieter lifestyle. With a daughter and her family living abroad, my personal loss has been being unable to see them for such a long time. Hopefully, this will settle soon, for us and others like us.

Ian Judson has provided the cover photo of this issue of our journal and some others that you will see in future issues. He had a wonderful time in New Zealand and reminds us that it is a beautiful country and he and his wife will always treasure the memories of their time there, while working.

Thinking of friends living in Northern Ireland (you know who you are!) my concerns are that we here on the BIG island, have not been giving enough thought to the results of Brexit. When



Covid regresses, will more Brexit gremlins be revealed? Looking on the bright side though, summer is here and we can roam our land to our hearts' content. Take your *RFS Newsletter* with you – excellent reading!

As ever Fellows, I invite you all to submit a few paragraphs to our *Newsletter*. What have you been doing to keep yourselves amused over these lockdowns? Or at other times? Everyone has a story in them, and the rest of us are fascinated by the experiences of others. There is no peer review for publication here! Your revelations will look well on the printed page!

Announcement

Rest in Peace

Dr Jean Colston, 1931 - 2021

With great sadness we announce the passing of Dr Jean Colston. Dr Jean Ross Colston, FRCPE, retired consultant rheumatologist at the Central Middlesex Hospital (1971 to 1992), was born in London on the 15th of February 1931. After a short illness she passed away in St Mary's Hospital, Paddington, on the 15th of May 2021. An obituary will follow in the next issue of this *Newsletter*.

Forthcoming meetings

Intramural meetings

At the moment, we are planning for all intramural events and Camera Club meetings to be held 'in person' at 1 Wimpole Street, but depending on restrictions at the time this might change. In which case we will inform Fellows of any alterations as soon as any decision is made

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| Aviva Burnstock, The technical study of paintings | Thu 21 October 2021 |
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Extramural events

At the moment, planning extramural tours remains difficult. The latest extension of Covid restrictions after June 21st has held up our opportunities; at the time of writing I am still waiting cautiously for 19th July. Sadly, exploring a range of websites for potential venues I've found them somewhat less than helpful, tending to be vague. Presumably they also are waiting and watching warily in case of viral surges thanks to football matches and/or other mass gatherings.

This being so, a programme is being formed and I shall notify our Fellowship of extramural events, on our RSM RFS website, once potential excursions have been confirmed.

Rosalind Stanwell-Smith - *External Events organizer*

Extramural excursions

Walks with Sue Weir 2021

Eastern reaches of the river Thames

Wed 1 September 2021

Enjoy more exploration of the banks of the river Thames from Wapping *via* Shadwell and Limehouse basins - finally reaching the dramatic architecture of Canary Wharf, passing *en route* the Prospect of Whitby pub - a long but fascinating walk.

Meet: Wapping station exit (East London line)
return Canary Wharf underground station

Times: 11:15am and 2:15pm

Tour Length: 1hr 45mins - 2hrs

Places available: 20 **Cost per person:** £15

Surprises in Regent's Park

Wed 29 September 2021

Elegant Nash terraces, a grand boulevard, a royal college, a hidden garden, roses to perfume the air, water birds to be admired, and the conservation/wild life area - the delights of Regent's Park are ours to be explored and enjoyed.

Meet: Great Portland Street underground station,
return *via* the same.

Times: 11:15am and 2:15pm

Tour Length: 1hr 45 minutes.

Places available: 20 **Cost per person:** £15

Fitzrovia

Fri 8 October 2021

Adventure into William Hickey's 1940s Bohemian London - a neighbourhood of the creative arts with their "racy" pubs, bars and restaurants, new design studios and the luxury flats of the former Middlesex Hospital.

Meet: Warren Street underground station exit, finishing at Oxford Circus underground

Times: 11:15am and 2:15pm

Tour length: 1hr 30 minutes

Places available: 20 **Cost per person:** £15

Adventures with Sue Weir

Sue's tour to **Shetland** and **Orkney** - the Northern Isles 16-24 September 2021 'Discover the history that encompasses Neolithic times, the Bronze and Iron Ages, the Picts and the Vikings and continues to the modern day.' These dramatically beautiful isles are rich in history and culture, bird life and wild flowers. Come and join the discovery! info@jonbainestours.co.uk

The **Cruise on the River Seine** is now scheduled for May 2022, from Thursday 5th to Thursday 12th, aboard the luxury *AMA Lyra*. Travel by Eurostar to Paris and join us for a relaxing cruise with visits to the pretty harbour at Honfleur, the British and Canadian Normandy Landing Beaches, medieval Rouen, Monet's gardens at Giverny, and other sites of interest. All visits are included in the cost plus the standard class rail journey, transfers, wine, beer and soft drinks at lunch & dinner, complimentary pre-dinner cocktails and free Wifi. Prices from: £3,192 per person for Riverview cabins, £4,037 per person for French Balcony cabins. Single prices on request.

Contact: sally.collicott@fredholidays.co.uk or speak to Sue Weir as she will be your 'mother hen' on:

Tel: 01252 783265

Email: sue.weir@btinternet.com

Camera club programme and report

Programmes for Autumn 2021 and Spring/Summer 2022, all meetings starting at 11AM. Topics to be announced. All planned to be held at the RSM, but if Covid restrictions demand it they will be via Zoom.

Autumn 2021

| | |
|-----------------------------------|------------------|
| Camera Club: Members' meeting | Fri 24 September |
| Camera Club: Members' meeting | Mon 25 October |
| Camera Club: Presentation meeting | Thu 25 November |

Spring/Summer 2022

| | |
|-----------------------------------|------------------|
| Camera Club: Speaker | Wed 19 January |
| Camera Club: Members' meeting | Fri 25 February |
| Camera Club: Presentation meeting | Mon 14 March |
| Camera Club: Speaker | Thu 28 April |
| Camera Club: Members' meeting | Mon 16 May |
| Camera Club: Presentation meeting | Fri 24 June |
| Camera Club: Speaker | Wed 21 September |

Camera club report

The Club adapted well to the Zoom environment, which in some ways was just as good as a physical meeting - technical matters and details of processing procedures seemed easier to follow on a computer screen. It has been suggested that we continue occasional Zoom meetings in the future - in addition to the other advantages travel would be no barrier, and Zoom facilitates the attendance of members who live at a distance, as well as allowing us to invite speakers from anywhere in the country (or even abroad!). This will be discussed by the Steering Group at an appropriate time.

The last October meeting was anticipated in a previous report (published in our *Newsletter*) and exceeded expectations. Kevin Elsby recently retired from his busy General Practice, but along the way had acquired a BSc in Earth Sciences and an MA in Wildlife Conservation. He is also not only a Fellow of the Royal Photographic Society (FRPS, a considerable distinction - indicating

the highest level of technical ability along with a 'high level of understanding of the craft artistic presentation') but he also sits on the assessment panel for those who seek a distinction in Nature photography. The 25 attendees were not disappointed, many felt this was the best nature photography presentation they had ever attended. His website gives an example of his oeuvre: www.wildlifeontheweb.co.uk.

On the 26th November last, members enjoyed a presentation from Louis Berk (www.louisberk.com) who is a retired secondary school teacher from Whitechapel and who developed a fascination for the urban landscape and a second career as a photographer. He has published 4 books and leads photographic tours of Whitechapel and Spitalfields, his presentation was of historical as well as photographic interest and I suspect several members might be tempted to attend one of his workshops (on Zoom, or to be reinstated in reality).

On the 17th December 2020, members enjoyed a presentation by our colleagues, Asim Dasgupta's *Nature Exposed* and Barry Parker's *Nature Photography in Black and White*, followed by a lively discussion. Asim discussed the effect of post-processing on the final result, and Barry showed that B&W could provide arresting images of wildlife and is not always inferior to colour.

21st of January 2021 our own Hermon Dowling ARPS discussed Safari photography as a learning experience with the 23 members attending, describing three safaris he had been on while giving hints on tours and equipment. Again we had a feast of superb photography, and advice that will benefit us all and while he induced an almost irresistible urge to travel - now - in most attendees.

On the 10th of February we had a talk by Paula Davies FRPS *My Life in Photography*, with an audience of 26. She described herself as a 'Butterfly photographer' because she flits from subject to subject taking photographs of anything that attracts her. Her website (www.pixelfoto.co.uk) includes some of the

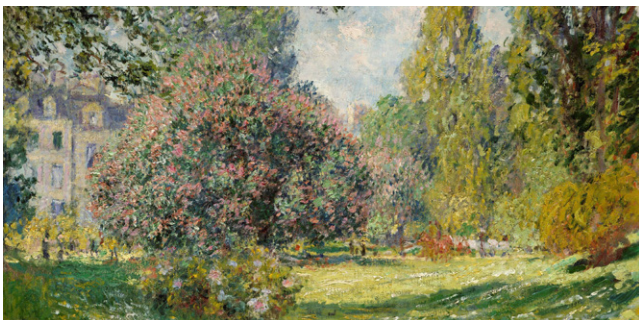
images she presented to us.

On the 1st of March Peter Highton ARPS gave a talk *Before and After* showing how good processing can turn a 'discard' into a prize winner. He is at present the programme secretary of Richmond and Twickenham Photographic Society, and had recently served as its President. Some of the work he described can be viewed at www.rtps.org.uk/rtps-photographic-exhibition-2021/, and then click on his name.

Ian Judson, a recently retired Professor and oncologist from the Royal Marsden hospital gave another superb talk on the 31st March. He had travelled to New Zealand as a locum and helped set up a service to treat sarcoma there. Fortunately, he had enough time to travel throughout the islands, and illustrated his travels, and the wildlife there and elsewhere, with some wonderful photographs (see cover photo of this journal).

We have a full programme for the remainder of the year, but precise details and arrangements will depend on government advice and covid-19 activity.

Biographies of Autumn and Spring speakers



The technical study of paintings

Lecture by Professor Aviva Burnstock

Thu 21 October 2021

Biography

Aviva Burnstock is a Professor in the Department of Conservation at the Courtauld Institute, London, where she took a PhD (1991) and a Postgraduate Diploma in the Conservation of Easel Paintings (1984). She was a Joop Los Fellow at the Institute for Molecular Physics (FOM/AMOLF) in Amsterdam, Netherlands (2003-5). From 1986-1992 she worked in the Scientific Department of the National Gallery, London after a year as a conservator in Australia, with the Regional Galleries Association of New South Wales. She also has a BSc. in Neurobiology from the University of Sussex, England. She has published widely in the field of painting techniques and materials and aspects of conservation practice.

Abstract

This lecture will introduce selected examples where the technical study of paintings has contributed to questions concerning their making, materials and change, and the approaches taken for their conservation and display. The lecture will aim to illustrate how technical and scientific methods can inform historical questions related to paintings.



Victory over disease in the Crimean War: a reassessment

Lecture by Dr Mike Hinton

Thu 18 November 2021

Biography

Following graduation in Veterinary Science from Bristol University in 1966, Dr Mike Hinton spent forty years working principally as an academic and a civil servant, retiring in 2006. His fascination in the Crimean campaign was kindled during the

90s when he discovered that one of his two great grandfathers served throughout that war. Dr Hinton was a Reader in Veterinary Public Health at the time; his principal research interest was infectious diseases and clearly this category of disease shaped the course of the campaign. After retirement he studied for a second PhD under Professor Andrew Lambert at King's College London and the resulting thesis formed the basis of a book entitled *Victory over Disease: Resolving the Medical Crisis in the Crimean War, 1854–1856*.

Dr Hinton is a member of the Crimean War Research Society, Victorian Military Society, Society of Genealogists, Veterinary History Society, and the Royal Society of Medicine. He has published over sixty articles on various aspects of the Crimean War in the journals of these and other societies. His research now concentrates more on relationships of participants and memorials, surviving or otherwise, in churches, cemeteries and public places.

Abstract

Catastrophic collapse in health of the British Army during the winter of 1854/55 was followed by a gradual improvement starting early in the New Year. This was due principally to progressive enhancement in troops' living standards - by provision of adequate food, clothing, fuel and shelter. These improvements, coupled with development of facilities for health care in the Crimea, were combined with more satisfactory arrangements for evacuation of invalids from the Crimea to Turkey and beyond. Principal problems that beset the Army were at the front, and not in Turkey - but it was there that matters were rectified. Specifically, improvements in survival of patients at Scutari can be largely explained by improved prognosis for the men selected for evacuation. There is little evidence that Florence Nightingale and the Sanitary Commissioners - who were sent out by the government to investigate matters on the spot - significantly influenced improvement in health of the main Army in the Crimea. Rather, it represented involvement of people in many walks of life who worked, possibly unwittingly, for a common purpose, and with such gratifying results.



2021 Recent Advances in Medicine and Surgery

An All-Day Symposium

Thu 2 December 2021

This one-day meeting held annually, aims to provide a series of brief reviews of clinical topics in which there have been recent advances either in pathogenesis, investigation or treatment, given by speakers who are authorities in their fields. Among the subjects to be addressed this year are 'Air pollution and health', 'Battlefield surgery', 'Multiple sclerosis' and 'Post COVID syndrome - pathogenesis and treatment'.

The meeting is designed to deliver broad, accessible and stimulating updates on topics of key clinical importance and current interest, of direct relevance to physicians, surgeons, GPs and others involved in healthcare.



Petty Officer Edgar Evans - Scott's 'giant worker' and 'invaluable assistant'

Lecture by Dr Isobel Williams

Thu 17 February 2022

Biography

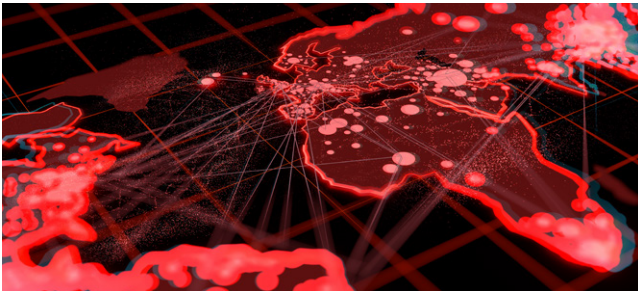
Dr Isobel Williams attended Kings College in the Strand for pre-clinical studies and after passing the 2nd MB, moved to St Georges Hospital at Hyde Park Corner; she married a fellow student before qualifying. They did midwifery in Oldham Hospital with Patrick Steptoe who later delivered the first test-tube baby. After qualification, Dr Williams progressed to become a Consultant Respiratory Physician, working with the NHS.

Dr Edward Wilson, Robert Falcon Scott's friend and confidant had trained at St George's some seventy years previously and there were many of his iconic paintings to study in the medical school. Dr Williams became fascinated by Wilson's many achievements and wrote the biography of this remarkable man. Wilson, and subsequently Dr Williams, became interested in the lives of the men of the 'lower deck' - in the contrast between their education, pay and prospects in comparison to those of the officer class. Edgar Evans, a petty officer, was one of Scott's loyal followers. Dr Williams determined to research his life and wrote a biography of this man who was much maligned after his death. Her blog, primarily on Antarctic subjects, is: www.isobelpwilliams.com

Abstract

Edgar Evans, Scott's 'giant worker' and 'invaluable assistant' went with his leader on both the British Antarctic expeditions in the early 1900s - these were the *Discovery* expedition of 1901 and the *Terra Nova* expedition of 1912. He distinguished himself in both expeditions and was chosen by Scott to be one of the team accompanying him to the Pole. Tragically the 'Welsh Giant' was the first to die on the team's ill-fated return, and posthumously, Edgar was blamed in some quarters for being responsible for the deaths of the whole party. Some suggested that his failure was due to his relative lack of education. In this presentation I provide an account of his life and repudiate this suggestion.

Please note that the AGM will take place during this meeting.



How can we make pandemic warnings work?

Lecture by Dr Carina Fearnley

Thu 17th March 2022

Biography

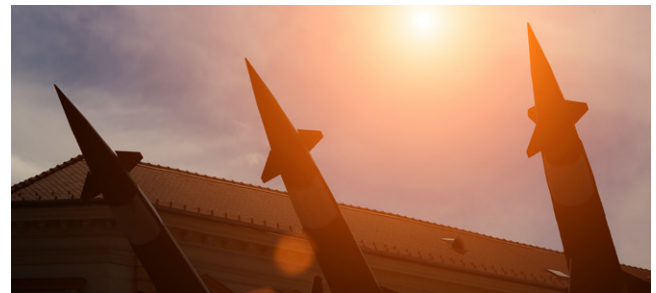
Dr Carina Fearnley is Director and founder of the UCL Warning Research Centre, Associate Professor in Science and Technology at the UCL Department of Science and Technology Studies and an Honorary Research Associate at the UCL Hazard Centre. She is an interdisciplinary researcher, drawing on relevant expertise in the social sciences, on scientific uncertainty, risk, and complexity, to focus on how natural hazard early warning systems can be made more effective, specifically alert-level systems. She is also interested in the transdisciplinary potential of art and science collaborations around environmental hazards.

Carina studied Geology and Mining at Imperial College London prior to working in London City's financial sector. She completed her PhD at the UCL Hazard Research Centre before lecturing at Aberystwyth University. She is a regular consultant for Bournemouth University Disaster Management Centre, and frequently appears on national and international media following significant hazard events. Carina also established the World Organisation of Volcano Observatories Volcano Alert Level Working Group, and edited the first publication dedicated to Volcanic Crisis

Communication Observing the Volcano World: Volcanic Crisis Communication (Springer). She frequently conducts public engagement activities such as Science Showoff, Soapbox Science, Pint of Science, Athena SWAN initiatives, and more recently MUSO IMPROPERA.

Abstract

'Past warnings of a pandemic were often ignored, despite mounting evidence...' stated Mami Mizutori, Head of United Nations for Disaster Risk and Radiation (UNDRR), in April 2020. Just over a year later in May 2021 the WHO-commissioned report *Covid-19: Make it the Last Pandemic* argued the global alarm system needs overhauling to prevent a similar catastrophe. Why do we keep ignoring warnings? Isn't it clear they matter after COVID-19? This talk explores the role of warnings of pandemics and what we can identify from other hazardous and threatening events, to develop better health warnings for the future, by exploring three key aspects. Together these three help highlight why warnings matter, what they mean, and how we can stop ignoring them to build a better prepared and resilient community.



Guided missiles – a pictorial visit to the surface-to-air missile 'zoo'

Lecture by Professor Anthony C Davies

Thu 21 April 2022

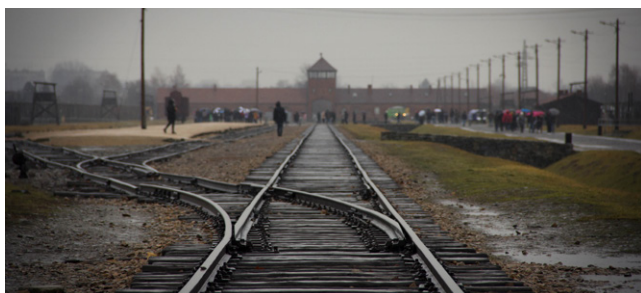
Biography

Born in Rainham, Kent, 1936. Military service: British Army, Royal Electrical and Mechanical Engineers (1955-7), trained as Telecommunications Mechanic, and the last year as a Leading Artisan Sergeant. B.Sc(Eng) Electrical Engineering, 1st Class Hons (1963) Southampton University, MPhil (1967) University of London, PhD (1970) City University London. Then, General Electric Co. in Coventry (1961-63): Lecturer (1963), Reader (1970) and Professor and Director, Centre for Information Engineering (1982) at City University London. Professor, Department of Electronic Engineering, King's College London (1990-9). Lecturer, University of British Columbia (1968-9); Visiting Full Professor, Purdue University (1973-4); Royal Society Fellowship, British Aerospace, Army

Weapons Division, Stevenage (1987-8). Short course teaching including courses on microprocessors for George Washington University in London, Berlin and Washington DC (1979-1981); Consultant to Admiralty Underwater Weapons Establishment, Portland, Dorset. Former Visiting Professor (from 2002) and now member of Industry Advisory Board, Kingston University, Surrey, England. Fellow IET, Life Fellow IEEE, Member BCS, Chartered Engineer. IEEE Region 8 Director and member of IEEE Board of Directors (2003-2004)

Abstract

This talk will look at the historical development of surface to air missiles: names and types, mode of operation and methods of avoiding them, to provide an understanding of present status and likely future. The talk will be illustrated with many photos, and an explanation of missiles' operation, but no practical demonstrations are intended. The talk aims to provide an interesting background and to enable the audience to have better understanding of reports they may see in the news/media. A very brief mention of what may be expected in future may be included (such as Directed Energy Weapons).



Music on the brink of destruction

Lecture by Professor Shirli Gilbert

Thu 19 May 2022

Biography

Shirli Gilbert is Professor of Modern Jewish History at University College London and Director of the Sir Martin Gilbert Learning Centre. She holds a DPhil in Modern History from the University of Oxford and was a Postdoctoral Fellow in the Society of Fellows at the University of Michigan. Before coming to UCL, she was Karten Professor of Modern History and Director of the Parkes Institute for Jewish/non-Jewish Relations at the University of Southampton. She has written widely on the Holocaust and its legacies, modern Jewish identity, and Jews in South Africa, and her publications include *Music in the Holocaust* (2005; National Jewish Book Award finalist), *From Things Lost: Forgotten Letters and the Legacy of the Holocaust* (2017;

British Association for Jewish Studies Book Prize special mention) and most recently, with Avril Alba, *Holocaust Memory and Racism in the Postwar World*.

Abstract

An extraordinary range of musical activities, both forced and voluntary, took place in the Nazi ghettos and camps, from the earliest internment centres established in 1933 until their liberation in 1945. The musical works created there by prisoners are extraordinary documents of the time: fragments recovered from the rubble of war and genocide. In this talk, Shirli Gilbert will present original songs from this period, including some rare post-war recordings. The songs offer rich insight into victims' experiences, conveying the uncertain and shifting perspectives of prisoner communities as they made sense of lived reality.



Worth a thousand words: an introduction to the botanical art collections in the RHS Lindley Library

Lecture by Charlotte Brooks

Thu 16 June 2022

Biography

Charlotte Brooks has been working with the art collections at the Lindley Library for 18 years. She is Secretary for the Botanical Art Judging Panel, which sees artists from around the world exhibit in the hope of gaining RHS medals. Charlotte has contributed to numerous short papers and articles, and her first book *RHS Botanical Illustrations: The Gold Medal Winners*, was published in 2019. Her next book on the RHS orchid paintings is due out in 2022.

Abstract

The worlds of science and art come together in art collections of the RHS Lindley Library. Representing 400 years of botanical illustrations, the heritage collections are complemented by works from contemporary award-winning botanical artists. What are we seeing when we look at a piece of botanical art? What makes a Gold medal picture?

Meetings reports

Archaeological remains and industrialisation: *impacts on London's health from skeletal remains*

Lecture by
Jelena Bekvalac



On the 18th of March by Zoom, Jelena Bekvalac (pictured above) spoke to us about archaeological remains found in London, this time related to impact of the industrial revolution on health of the urban population. Jelena is the Curator of Human Osteology at the Centre for Human Bioarchaeology at the Museum of London. Before joining the museum, she worked on a variety of archaeological sites in the UK, including the extraordinary Spitalfields Market excavation. Abroad, she has worked in Jordan, Russia and the Czech Republic, concerning a wide range of osteological collections.

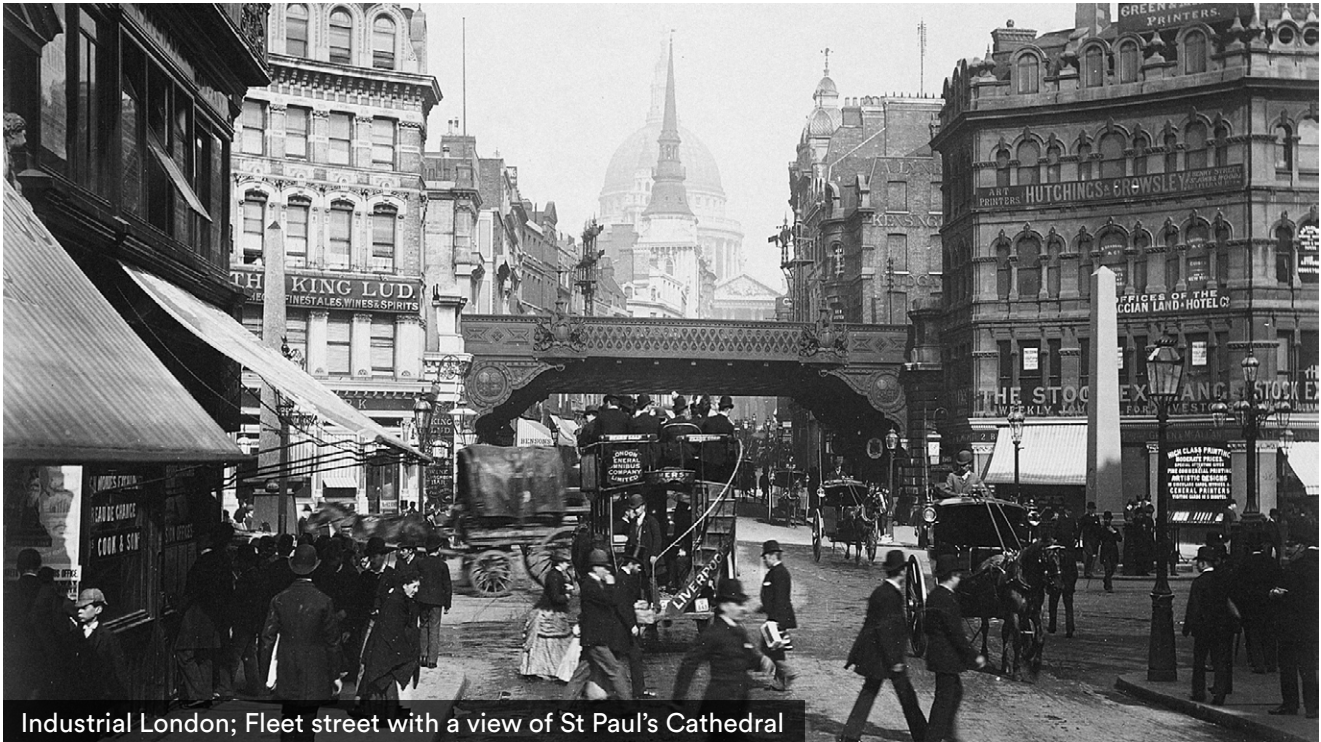
She has been at the Museum of London since 2003, first as a research osteologist on the team funded by the Wellcome Trust, establishing the Centre for Human Bioarchaeology; she then became Curator of Human Osteology in 2008. This post involves caring for the extensive archaeologically derived skeletal remains, recording and analysing osteological data. She also assists and supports researchers, works with volunteers, teaches, presents talks, leads collaborative research projects and participates in outreach events for schools and students. She was part of the original team for the 2008 Wellcome Collection exhibition *Skeletons: London's Buried Bones*, and more recently the regional tour of the exhibition *Skeletons:*

Our Buried Bones. Her specialist interests include palaeopathology, radiography and post-medieval bioarchaeology. She is currently working on a collaborative project investigating the impact of industrialisation on London's health.

Archaeological Skeletal Remains and Industrialisation

Jelena began by describing her work at the Museum of London, curating over 20,000 stratified human skeletal remains from archaeological excavations encompassing 2,000 years of London's history, with contextual information giving a unique insight into the population, with osteological data recorded in large, searchable datasets, using digital radiography, CT scanning and 3D modelling with synthesis of osteological and clinical data.

Her current project on the impact of industrialisation, spans the period 1750-1900, the pivotal period of London's rapid expansion to be the largest city in Europe, and accommodation of half of England's urban population. Improved manufacturing efficiency led to increasing wealth but also increasing dependency on technology to supply food and material to the ever-growing population. At the same time, social divisions had serious effects on health and life expectancy. The project involved collection of osteological, archaeological, historical, environmental and modern data from a large sample of adults from both London and non-metropolitan sites across England. The sample included both male and female skeletons from young, middle-aged and older adults. Five themes were researched, comparing and contrasting the health of Londoners with other areas in England over time: Trauma and



Industrial London; Fleet street with a view of St Paul's Cathedral

hazardous environments for both work and living, pollution, cancer, obesity and ageing.

Seven conditions associated with industrialisation, urbanisation, enriched lifestyle and old age were selected: hyperostosis frontalis interna, osteoporosis, joint disease, trauma, neoplastic disease, lung inflammation associated with rib disease and smoking, and diffuse idiopathic skeletal hyperostosis (see figures below). Direct digital radiography was performed on the cranium, lumbar vertebrae, left femur, pelvis and second metacarpals.

The population of London increased from 1 to 4.5 million over the study period. In rural areas most males were employed in agriculture, with an associated risk of trauma, while mechanisation and machinery in London's industries increased hazards from dangerous equipment and toxic work environments. Men usually worked with machinery while skilled labour was employed in heavy industry and construction; low-status women worked as

cheap labour in industry and manufacturing, often from home, and middle-class women had roles in retail, book-keeping and correspondence. Most skeletal trauma seen was caused by falls or blows. Ribs were most commonly affected, followed by the hand and lower arm. The upper arm, hip & thigh were least common, suggesting that high impact injuries were relatively uncommon in all groups. Blunt or sharp cranial injuries were found at a low level compared with today. Industrialisation in London significantly increased the risk of fracture, particularly in low status and older individuals of both sexes. Outside London, age was a factor but industrialisation was not.

Air pollution was prevalent in pre-industrial London, as recorded by John Evelyn and John Gaunt in the seventeenth century, from coal and wood burning, smoking and the working environment. This increased with industrialisation, culminating in the Great Smog of 1952 and the Clean Air Act of 1956. Visceral surface rib lesions increased from 2.9 to 19.5% in industrial London during the study period, particularly in young males and lower status individuals. Evidence of smoking, such as pipe facets on teeth indicated that smoking was less important than environmental pollution, which posed a dramatically higher risk to health compared with areas outside the city.

Cancer levels, most commonly of lung, bowel, breast and prostate in older age groups, were increasing and are the second most common cause of death in London. Lifestyle and

Cancer levels, most commonly of lung, bowel, breast and prostate in older age groups, were increasing and were the second most common cause of death in London.

environmental factors were involved in 95% of cases, but human skeletal evidence of cancer in the past is restricted to bone metastases, shown by radiography and CT scanning. Treatment in the past was limited and prognosis was always poor. Only a small number of such results have been detected in this project, but levels were highest in industrial London, increasing over time.

Diffuse idiopathic skeletal hyperostosis (DISH) and hyperostosis frontalis interna (HFI) are possible representations of metabolic syndrome and a potential means of detecting obesity from skeletal remains. Older males have a predisposition to DISH, and HFI is most common in post-menopausal women. Overweight and obesity increased in the industrial period and was influenced by high status, in contrast to today where there is an association with social deprivation.

Estimates of life expectancy in the past are difficult to assess, but Edwin Chadwick in 1842 reported an average of 16 years for labourers in Bethnal Green and 26 years in Kensington. Bills of mortality and census records suggest increases over time, especially after 1870 and following the second world war. Different factors were involved in the pre-industrial and industrial periods, including famine, disease, public health measures and environmental and social conditions. Osteology provides limited age estimates and identifies fewer old age adults than burial records and coffin plates. Women show higher levels of severe osteoarthritis than men, with an increase in

arthritis of the knee in both urban and rural areas, but no difference in levels in low or high-status individuals. Men were more prone to arthritis of the hip, with consistently higher levels outside London in both pre-industrial and industrial periods. Overall, pre-industrial rural populations had considerably higher levels of joint degeneration in middle age.

Osteoporosis was assessed by types of fracture pattern and radiographic methods. Factors involved include malnutrition and famine as well as age. Radiogrammetric analysis was carried out on over 1,000 individuals with whole and well preserved second metacarpals. This showed the highest levels in old age females, with levels in London twice that in non-metropolitan areas in the industrial period. Younger age groups were more involved in the pre-industrial period and in mediaeval mass burials in Spitalfields, probably as a result of poor nutrition.

The conclusions of the study were that industrialisation has been an assault on the health of Londoners, but not uniformly across all areas and communities, with significant geographical differences in levels of ageing and age-related diseases closely linked to variations in lifestyle economic status, and greater numbers affected by osteoarthritis and osteoporosis. The change from largely agrarian, rural lifestyles to those based on heavy industry and technology affected many aspects of health in London and across the UK.

Ian Stephen



Seven conditions selected for study

Go to the bee and be wise:

how AI can learn from the honeybee

Lecture by
Professor
James Marshall



On Thursday 15th of April, by Zoom, Professor James Marshall (*pictured above*) made us a fascinating presentation on how honeybee brains can be reverse-engineered to be able to apply their neural concepts to artificial intelligence (AI). Professor Marshall by background is an engineer, who has become a multidisciplinary scientist by dint of also learning a great deal about neurobiology, computer modelling and insect physiology and psychology, and applying these to his research project. He is Professor of Theoretical and Computational Biology at the University of Sheffield, along with leading a five year collaboration with members of other universities, funded by the Engineering and Physical Science Research Council (EPSRC). Throughout his lecture, Professor Marshall gave full credit to all his named collaborators, at every stage. Outcomes of the research project are being brought to market by Opteran, a spinout company of the University of Sheffield.

I feel fairly safe in saying that to our audience, constructing computer models of brains and then rendering them into physical automata is a new avenue of achievement. However, Professor Marshall's talk was expertly planned and delivered as described below.

With reference to **honeybees**, there are four basic points to consider:

1. Humans have studied apiculture since prehistoric times (there are cave paintings showing honey collection).
2. The European industrial revolution inspired our communities to wonder at the diligence of insect co-operation.
3. Insects in general, work as 'collectives', honeybees though, more than ants.
4. As groups or colonies, they display a variety of intelligence specific to this life form.

With reference to **artificial intelligence** there are three basic points to consider:

1. We perceive AI to be about involving very complicated equations, this is not so, it is mainly concerned with physical recognition.
2. Perhaps a new term for us is 'Deep-learning'; this requires immense data availability. Input of vast amounts of minute data that need to be accessed immediately and precisely from huge computerisation.
3. Deep-learning is not at all comparable to general intelligence.

When Alan Turing asked 'How to imitate a human mind?' he suggested starting with a human mind at birth, it then needs to be educated, plus subjected to further experience (Turing, *Mind LIX* 1950). Since then, further workers have suggested that holograms would be able to substitute actual presence of individuals in as little as ten years after their invention (still hasn't happened!) or else

When Alan Turing asked ‘How to imitate a human mind?’ he suggested starting with a human mind at birth, it then needs to be educated, plus subjected to further experience.

that modelling the mouse brain would be a good starting point. Computational immensity available, these suggestions and others are yet too immense and expensive to be put into action in 2021. Simpler brains of simpler organisms need to be investigated initially.

So we come to laboratory experiments. These need to be designed in the first place with real animals, dealt with in such ways that their activities can be closely and accurately monitored. Results need to be recorded electronically and in fine detail. Professor Marshall described to us how an Australian team has been able to teach tasks, such as image recognition, to captive honeybees. At Queen Mary, University of London, a further team has succeeded in tracking wild bees with 3D harmonic radar, revealing aerial views of how they perceive a site. Yet another group has investigated the exact properties of the honeybee compound eye. The animals are expert navigators, clearly demonstrating their ability to learn the exact location of nectar, how to get it home and how to communicate its location to their fellows. In the laboratory, experiments have been performed (humanely) on animals performing tasks and readings are taken from their brains, during the activities.

Experimentally, real bees are trained to fly down experimental tunnels, whose spatial clues (designs, dimensions, colours) can be changed. What the bee brains experience can be digitally captured. Concerning early visual processing, very basic (static) robot bee brains have been built that can display some sensory abilities, compound eyes have been experimentally reproduced and reconstructed. Input and capture of the same visual information that real bees have experienced is reproduced. The next step, is to compute results of such research into virtual reality for modelling. Once models have been ‘constructed’ the parameters can be tested in virtual environments. The next step is to transmute these virtual results, so that they can be used to build REAL flying drones, which have

full autonomy, but using the bee-type vision flight control.

Different investigations are on elementary navigation and concept learning. The first of these employs the ellipsoid bodies of fruit flies (honeybees are not suitable for this), their neural compasses; results are investigated using 2 photon microscopy and are taken directly from actual neural recordings. Results are modelled and data from virtual experiments have been found to compare closely to biological data. On the other hand, concept learning is investigated in honeybees. This is their higher order learning and initially takes place by training honeybees to use mazes (their learning has to be observed, since sadly, one can’t interview them to discover what they’ve learnt!). Then the properties of the maze are subtly altered – the honeybees are able to remember changes and can relate to them. For example, they can distinguish between sight changes and between changes in odours. All of these things can be modelled, virtual examples experimented with and results obtained.

Dr Marshall’s final slide showed the lockdown laboratory (his bedroom) of one of his colleagues. It was enthralling to watch an actual artificial ‘honeybee’ flying around uninstructed. This was not a drone, as we have come to understand the term, it was an individual automaton, avoiding obstacles, ‘seeing’ its way. A representation was also shown of exactly what the ‘compound eye’ was seeing!

In conclusion, Professor Marshall drew together what he hoped he had shown us: that to arrive at this endpoint, there had been algorithmic and robotic development, and that these depended on initial behavioural experiments, whose neurology had been recorded. Finally, he reminded us that science was fine, indeed fascinating, but had to be translated into the real world. For this, industrial collaboration was essential and Opteran’s ‘Brains on Board’ was an important step in this direction. They have customers already.

The lecture was followed by a dozen (electronic) questions, of all sorts from the audience, which Professor Marshall answered with great enthusiasm.

We wish them well in their project.

Catherine Sarraf

Turing AM, Computing machinery and intelligence, Mind LIX 1950, 433-460.

Together we can.

Aspects of climate change

Lecture by
Professor
Chris Rapley



On the 20th of May, the Retired Fellows Society was privileged to hear an outstanding talk from Professor Chris Rapley, Chair of Climate Science at University College London, on the scientific basis, effects and possible mechanisms of mitigation of climate change.

The very significant rise in concentration in the atmosphere of the predominant greenhouse gas, carbon dioxide, particularly over the last 50 years, has led to increased heat exchange from the atmosphere to the oceans. There is loss in size and thickness of the Arctic ice cap, a consequent increase in water volume, together with increasing warmth and expansion of the oceans and displacement of water, as a result of floating icebergs. These factors all contribute to a dangerous rise in sea level. Moreover, resultant

changes in the motion of the atmosphere and oceans as a consequence of global warming, are in turn, producing a cascade of interdependent events. These include extreme weather occurrences, changes in the ecosystems both in oceans and on land affecting food and water supplies, and direct results on plant and animal species and populations, all of which give rise to economic and political consequences.

Chris Rapley then discussed the concept of counter intuitive behaviour of social systems, first reported by J W Forrester in the 1970s. This hypothesis indicated that the human mind is not adapted to interpreting social system behaviours, which are interconnected through various non-linear feedback systems. It emphasised that changes in one system do not necessarily result in the expected impact in a second system. This model of interdependent systems has been expanded, given improvement in computing powers over the last 50 years and best 'explains' current understanding of the profound influences of climate change, for example, human migrations may not primarily be consequent of climate changes, but it acts as a 'threat multiplier' exacerbating the primary reason of perhaps global insecurity, poverty, hunger and conflict.





Despite bleak possibilities, great strides have been made in environmentally conscious technology

The UK has demonstrated a decline in CO₂ emissions concomitant with a rise in GDP, indicating that economic success does not depend on fossil fuels.

Professor Rapley concluded his talk by highlighting the helplessness that may be felt by the individual faced with planetary effects of climate change, given the scientific predictions. He noted that actions to address climate change at the scale and pace necessary were proving elusive. He proposed that a more positive approach is likely to be achieved by reframing mitigation efforts as an activity, rather than climate change as a 'problem'. He further stressed that, in his opinion, despite the intrinsic economic value of fossil fuels, it is not good enough to take a stepwise approach to reduction in their use. Fossil fuels need to be banned, so that conversations could then start in every sector/institution, as to how that can be achieved as quickly as possible.

His closing remarks were optimistic:

- President Xi Jin-ping has announced that China will be carbon neutral by 2060.
- President Joe Biden has placed climate change high on his agenda.
- The UK has demonstrated a decline in CO₂ emissions concomitant with a rise in GDP,

indicating that economic success does not depend on use of fossil fuels

- The UK NHS became the world's first national health system to commit to becoming carbon net zero, backed by clear deliverables and milestones.
- The UN climate change conference in Glasgow in November 2021 (COP26) needs to be ambitious in increasing national contributions and developing plans to meet agreed goals and expand the use of alternative forms of energy from wind and solar sources.
- As Director of the Science Museum, Professor Rapley had observed the innovation drive, which is needed to lead to implementation of alternative forms of energy supply.
- The law can be used as a lever to bring change.
- Business, investment and individuals can all drive change.
- There is a moral obligation on the current adult population, whose lifestyle has driven the current climate crisis, to mitigate the effects for future generations.

Professor Rapley ended by emphasising that every individual has to determine the area in which they could add traction to climate change mitigation, as working 'together we can' achieve a sufficient critical mass of commitment to make change.

Linda Luxon

Strategy for a pandemic: *learning from Covid-19*



Lecture by Professor Sir Lawrence Freedman



Professor Sir Lawrence Freedman gave a lecture on the 17th of June 2021 to the Retired Fellows Society as a webinar. He is Emeritus Professor of War Studies at King's College, London and was Official Historian of the Falklands War and a member of the Chilcot Inquiry in to the Iraq War. While Professor Freedman acknowledged that he had no medical background he attempted to demonstrate how strategic decisions were made in terms of tackling the pandemic and how other factors came in to play.

Initially he set the foundations to a fascinating talk by conceding that making Government decisions at critical times is often followed by questions of accountability. While the now established programme of testing for Covid-19 together with a vaccine programme can be seen as major positives, lessons need to be learnt.

The speaker admitted to having no ability to assess clinical factors but his academic work leant itself to assess strategies employed to control the pandemic. Governments often develop a strategy of major significance at times of uncertainty. Such a policy is preferable to making decisions as serial events unfold.

In attempting to provide an overview for strategy, developmental key issues are usually present. These include the need to remember that the objective is not to make a plan. It may include establishing interdisciplinary decisions which may result in creating allies and opponents. Difficulties arise when dealing with issues at hand. Doctors will recognise the term 'dealing with uncertainty' and the speaker emphasised that events are not always predictable. Adjusting resources demands

Making Government decisions at critical times is often followed by questions of accountability.

a degree of flexibility and making decisions on adaptation of available instruments may create controversy. Subsequent enquiries often question accountability, what was reasonable, lessons learned, and emotive issues surrounding what should have been addressed but were left to one side.

When discussions on pandemics take place war metaphors are often used. Terms such as ‘front line’ and ‘invading’ pathogens are frequently used, while decision-makers act virtually in a ‘war cabinet’ scenario. Here, national leaders have used war metaphors to emphasise the gravity of unfolding events. China released a statement that they were involved in a ‘people’s war’ while President Macron of France advised the country to adopt a ‘war footing’ and to ‘beware of a foreign threat’. Professor Freedman warned against the use of emotive language. The virus was described by some US politicians as a ‘war opponent’. ‘Campaigns’ may dwindle and there is no ‘true enemy’. We have become accustomed to terms such as the infection ‘hiding’, sometimes ‘raging’ and occasionally ‘employing a guerrilla ambush’.

Sadly, nations have manipulated war and the use of pathogens; smallpox outbreaks have historically been used in a malign way. Pandemics have run alongside imperial conquests and cruel subjugation. Information campaigns have enjoyed common usage and they have been at work during the present challenges of managing Covid -19. There are positive associations, however, including the heroic image of Florence Nightingale nursing

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the troops in 1854 during the Crimean War. Her efforts resulted in both social and nursing reforms. The ‘Spanish’ Flu became known as the War Flu lasting from 1918 to 1920. Sadly disease can run alongside major conflicts and civilians become drawn into events. Historically, cholera and typhoid often raged during these times. Associations between war, pandemics and the ritual announcements of daily death rates are easily recognised in recent news coverage. As numbers start to grow use of management speak increases. Performance indicators start to develop and failure becomes associated with high death rates. The improvement of these figures alongside higher immunisation rates raises morale. Numbers can give an unreliable snapshot and raise questions of comparison amongst nations.

Just as preparations for warfare may relate to experience from past conflict, governments may similarly react to events during pandemics. This gives rise to sceptics who regularly challenge thinking and may dismiss advice. Projected mortality figures do not quite happen. Lack



of capacity for Covid-19 testing is quoted. A general complacency amongst the public may arise. Occasionally wars start by catching the enemy by surprise. Some may say the same about our preparation prior to the events unfolding in 2020. The public may be holding on to the message of learning to cope initially. The UK Government became associated, rightly or wrongly, with thinking which allowed a degree of herd immunity

Preparation for past pandemics, does not give a consistent record, rather like armies preparing for war. The SARS outbreak between 2002 and 2004 first identified in China appeared under organised control. This may relate to a more authoritative approach to management rather than investment in anticipation of rare

China employed strict levels of control while New Zealand benefitted from its geography. Sweden had a more relaxed attitude which did not hold up in the longer term.

events. Exaggerated claims about dangers associated with swine flu in 2009 -10 resulted in governments closing schools and cancelling sporting events, but did not turn out as negatively as expected. This resulted in a sceptical public which affected attitudes to opinions. Scepticism may have given rise to general complacency resulting in low levels of preparation when another pandemic arrived. Lack of capacity in terms of testing agencies may be a reflection of this.

It is accepted that the aim is to protect the public by means of herd immunity. Immunisation programmes are now established (summer 2021) but at the onset of the crisis governments were under pressure. As time passes accusations of initial complacency have been made notably in regard to care homes. When strategic decisions are made there may be an admission that not everyone can be saved. China employed strict levels of control while New Zealand benefitted from its geography. Sweden had a more relaxed attitude which did not hold up in the longer term. On a local basis, early argument against banning the public from major sporting events was countered by claims this would allow crowds to gather indoors. While we now are debating the mutation of the virus and the ability of vaccines to suppress major illness, early 2020 created a different discussion.



A man protests the very existence of Covid-19 at Trafalgar Square, September 2020

Conversation in the early months of the pandemic threw up comparisons to entering a war. Governments released death figures and political leaders framed speeches around this parameter. The (then) president of the USA entered management speak with key performance indicators. The public were alarmed, however, with a high and rising death toll. The UK also appeared to have high death rates in the early months compared with other European countries. All these factors can be seen to show similarities to modern warfare. How the population would take the messages to their behaviour became an ongoing concern. The bombs which fell on the UK in the early years of the Second World War were intended to break morale. Carrying a sceptical public is no easy task notably in the behaviour of younger citizens. Case numbers and death rates for Covid-19 remain a daily news item for the present and near future. This again can create problems for a government.

Faced by the challenge of pathogenic variants, global cooperation can only be beneficial. Ensuring people look forward remains a task at hand.

Defining an exit strategy has a strong military association, a recent decision to withdraw American forces from Afghanistan highlights difficulties. Decisions may be seen as draconian leaving a risk to the local population. Leading political figures make a conditions-based argument. The withdrawal from Iraq following the 2009 war never quite met the tests the local population needed to cope. Governments are under public pressure to free up restrictions as the pandemic appears to diminish local risks. Again, the UK is devising what appears to be an exit strategy from lockdown which includes careful monitoring of numbers. Rates of infection and death certificates listing Covid-19 are regularly reported. We need to show we are on top of testing and there is no risk to overwhelming the NHS with hospital admissions.

Despite promising reduced infection numbers we have to be prepared for future lockdowns. The government must learn that exit strategies

need to be well thought out or they may create logistical problems and overwhelm the NHS. Immunisation programmes are very promising but rates of full cover are slower in Europe than the UK. The stockpiling of vaccines is emotive and international cooperation preferred. When communicating risk, statistics often abound and may distort data. Reassurance may create a climate of overpromising and then failure to deliver - public sympathy may be lost. Deaths from Covid-19 in care homes are not only a UK tragedy. Half the deaths across Europe have a similar association which shows shared weakness in their structure. Other future challenges which need consideration relate to stockpiling capacity. This is a difficult task as we do not know when the next pandemic will arise or its nature.

Shut-down on a broad scale is a major event with major economic implications. Political opponents may sound cautious, eventually agreeing to decisions. War studies published post conflict demonstrate that often nations are ill prepared at the onset, lacking a sense of urgency even as events unfold. Having strong institutions to provide guidance is useful and the recent attempts to discredit the WHO have not helped. We need strong institutions supported by good intelligence. Inevitably self-interest will always play a part and is not helpful. Faced by the challenge of pathogenic variants, global cooperation can only be beneficial. One only needs to look at the effects of war on developing countries to see devastation. Ensuring people look forward, rather than continually focusing on past grievances remains a task at hand.

Professor Sir Lawrence answered a range of questions which had been sent by Zoom. These included queries about why we seemed so ill prepared, how can we learn from successful models of response and how to ask the right things at the start. While we may be starting to feel relaxed given promising results to mass vaccination, inevitably the world will face a new challenging pandemic in time. In an ideal future scenario nations will be more united acting together with a sense of urgency. Agreeing that everyone is faced with the same problem should deter experimental theory. This will allow us to throw maximum resources against the challenge at hand.

David Murfin

Articles

Benjamin Lay: a forgotten man

Richard Lansdown

*FORCED from home and all its pleasures
Afric's coast I left forlorn,
To increase a stranger's treasures
O'er the raging billows borne.
Men from England bought and sold me,
Paid my price in paltry gold;
But, though slave they have enrolled me,
Minds are never to be sold.*

William Cowper, *The Negro's Complaint*, 1788

Fifty years before this poem was written, a man with a deformed back (possibly suffering from scoliosis), four foot seven tall, with legs so thin that they seemed hardly able to bear his body, marched into a Quaker Meeting House in Burlington, New Jersey. He wore a military uniform, shocking to pacifist Quakers, covering a book and a sword. At an appropriate moment he rose and addressed the meeting. He declared that slave keeping was the greatest sin in the world. Throwing open his coat he cried 'Thus shall God shed the blood of those persons who enslave their fellow creatures.' At these words, he plunged the sword through the book and red liquid gushed out. There were gasps, some women fainted. The red liquid was pokeberry juice. The man was Benjamin Lay, the Quaker comet.

Lay's appearance underlined his Quaker belief: his clothes were simple, he wore no wig.

A handful of names are frequently associated with the abolitionist movement, among them Thomas Clarkson, John Newton, Harriet Beecher Stowe, John Brown and William Wilberforce. But search though I did on a range of internet sites, I found no mention in general lists of abolitionist Benjamin Lay. Those who have discovered him have called him the forgotten man of the abolition movement.



Little Benjamin (as he called himself)

Slavery in america

Slavery in America began in 1619 when 20 Africans were brought ashore in Jamestown, Virginia. It flourished for the next 250 years. Defenders of slavery saw it as part of the natural order of things, it had existed throughout history, the Greeks and Romans had had slaves. Clergy preached that slavery was the will of God, scientists 'proved' that Africans were a 'less evolved species'. Some argued that slavery actually saved lives since before its advent, Africans would kill their enemies, with slavery they sold them. Others saw slavery as the fulfilment of the curse of Canaan.

Economic and social reasons were argued for its continuance. Without it, the cotton, sugar and tobacco industries would collapse; if one freed slaves one would experience widespread unemployment and chaos.

Lay was not the first Quaker to question the practice. In 1671 George Fox, having visited Barbados, accepted that slavery existed, but urged fellow Friends to treat slaves humanely and to give them a good Christian education. (It was not until 1756 that the Society of Friends took serious steps to induce slave owners to give them religious instruction). In 1676 William Edmundson, in Barbados, argued that slavery was inconsistent with the Truth. In 1688 some German Quakers in Philadelphia sent an antislavery petition to the Yearly Meeting, the first protest by a religious body to the practice of slavery in America. 'Have not' it asks, 'these negroes as much right to fight for their freedom as you have to keep them slaves?' George Keith was disowned by the American Quaker hierarchy in 1691 and 1692 for his declaration that they had compromised themselves with a sinful world. He responded by founding a sect called Christian Quakers. In 1729 Ralph Sandiford published an attack on slavery, *The Mystery of Iniquity*. Lay, however, was one of the first, if not the very first, not only to oppose slavery but to try to do something about it.

Lay's life

He was born in Copford, near Colchester, Essex, in 1681/2. Roberts Vaux, who published a *Memoir of the Life of Benjamin Lay* in 1758, the year of his death, gives the date as 1677. (Vaux's error was probably due to his confusing Benjamin's date of birth with that of his wife), an area of England that then was known for textile production, protest and religious radicalism. His education was scant. He was apprenticed to a glove maker, worked as a shepherd on his brother's farm and, although he could have stayed in farming, left for London when he was 19, a rebel even then. At the age of 21 he became a sailor, spending the next dozen years alternately in London and at sea. At first glance it seems odd that someone of his physique would choose such an arduous way of life but it is more understandable when one realises that over 80% of sailors of the period suffered bodily injury of some form. Lay would have felt at home surrounded by men who had a patched eye, a peg leg or a hook for a hand. He was also demonstrating, to himself and others, that he could be as agile as the next man. He learned something of the evils of slavery while sailing. Two of his shipmates had been slaves themselves in Turkey or North Africa. Others had sailed on slavers, transporting human cargo from Africa to the Americas. What Lay



The Slave Trade; Part of the early 19th century visual record of the Atlantic slave trade produced on textile by Frédéric Feldtrappe. It contrasts the brutality of European slave traders with the kindness of Africans who minister to a shipwrecked European family.

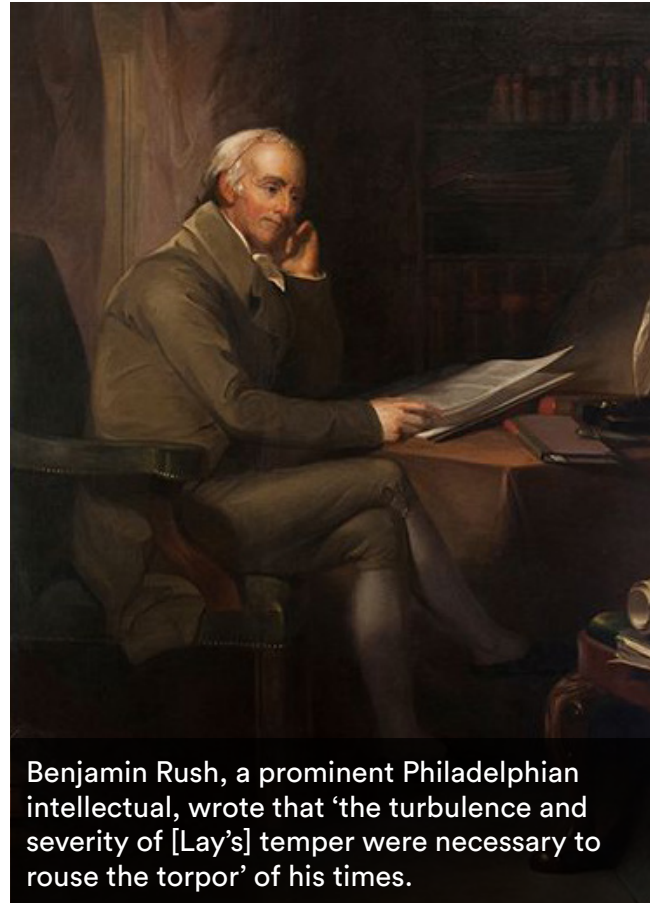
remembered most vividly about these tales was the extreme violence committed against African women on the Middle Passage.

He gave up the sea in 1710 when he settled in London where he met Sarah Smith, a Quaker, equally small, similarly deformed. She was constantly of good standing within the Quaker movement, being recognised as a Minister, that is someone acknowledged to have a special gift for speaking out at Friends' meetings. They married in 1718 and were happy together until her death 17 years later. In London Lay's reputation as a trouble maker began when he took to interrupting Friends' meetings, calling out those he saw as corrupted by worldly wealth. Although based in London, he had to go to Boston to seek from local Quakers a certificate of approval to allow him to marry Sarah Smith. The Boston Quakers asked Lay's home congregation for certification that he was a Friend of good standing, and they replied that he 'was clear from debts and from women in relation to marriage' but they added 'We believe he is Convinced of the Truth but for want of keeping low and humble in his mind, hath by an Indiscreet Zeal been too forward to appear in our publick Meetings'.

Benjamin and Sarah, uncomfortable in England, moved to Bridgetown, Barbados where he opened a general store. Later in life he sold books. (The exact date of the move is contested, Lay himself implied that it was in 1718.) Barbados, a British colony, was founded in the early 17th century, sugar being the primary product. Quakers were powerful figures in the community, they were men who had come to do good and had done very well, for themselves. Their prosperity depended to a large extent on owning slaves who accounted for three quarters of the population; they were slaves who were worked very hard. It was there, when he saw a slave commit suicide rather than take any more punishment from his master, that Lay began his campaign against slavery, and it was against the Quaker owners that his ire was particularly turned. He saw himself as a small David combatting large Goliaths.

His vocal opposition to slavery was matched with his kindness towards the slaves themselves who soon became aware of his views. Several hundred would surround his house on the Sabbath receiving advice, and food, from the little man. No doubt the two dwarf Lays also provided something of a spectacle.

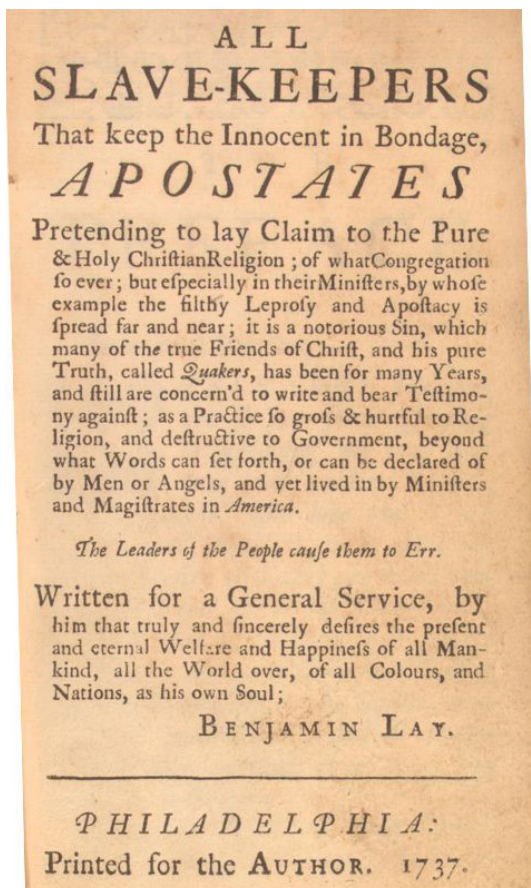
His noisy opposition to slavery (he was small



Benjamin Rush, a prominent Philadelphia intellectual, wrote that 'the turbulence and severity of [Lay's] temper were necessary to rouse the torpor' of his times.

but had 'a thunderous voice') made him once again intensely unpopular and he and Sarah moved back to England in 1720. After two years in London, having been disowned by Quakers there following his disturbing of meetings, he moved back to Colchester, where the pattern of disruptive behaviour continued for some ten years. Sarah, on the other hand, travelled widely in Britain in the company of other female Quaker ministers. Presumably the pressure on Lay to mend his ways got too much for him and in 1732 he moved back to America, to Philadelphia, at that time North America's largest city, home to the world's second largest Quaker community. Ten percent of the population were slaves.

Although the treatment of slaves in Philadelphia was less barbarous than in Barbados, Lay's beliefs continued and his behaviour was repeated. As Isaac Hopper, a 19th century radical Quaker put it 'Benjamin gave no peace to slave owners. As sure as any character attempted to speak.....he would start to his feet and cry out 'There's another negro-master'. Eventually the elders appointed a 'constabulary' to keep him out of meetings, in and around Philadelphia. He once stood in the snow with no coat and one foot bare, saying that slaves had to work outdoors in winter with inadequate clothing. On another occasion he more or less kidnapped the six-year-old child of slave owners



to give them an inkling of the feelings of slave parents who were separated from their children.

In 1734 the couple moved to Abington, eight miles from Philadelphia. Both applied for membership of the Philadelphia Yearly Meeting but only Sarah was accepted. Benjamin remained on the outskirts of membership for the rest of his life. The Abington Monthly Meeting ordered 'that Benjamin Lay be kept out of our Meetings for Business, he being no member but is a frequent Disturber thereof'.

In 1735 Sarah, his beloved wife, died of an undiagnosed illness. Perhaps as a reaction, Lay spent two years writing a book, published in Philadelphia in 1737, titled *All SLAVEKEEPERS that keep the Innocent in Bondage, APOSTATES* (pictured above). His education had been rudimentary and his book is not easy to read. It does not mince words; slave keeping was filthy, gross, hellish, the greatest sin in the world. Slave keepers bore the Mark of the Beast, they embody Satan on earth and should be cast out of the church.

The Quaker Overseers were not happy. The book, they proclaimed, contained gross abuses, not only against some of the members in particular, but against the whole Society. He was disowned by the Philadelphia Friends in 1738. (In all, four Meetings disowned him, two in Britain, two in America).

Both Benjamin and Sarah were vegetarian. He had loved being a shepherd and saw animals as God's creatures. Thomas Tryon's 1683 book *A Way to Long Life and Happiness* was a favourite of his, it is in his hand in the portrait shown above. They lived simply, drinking only milk and water, refusing to partake or use anything derived from slave labour, even sugar which was 'made of the blood of enslaved workers'. Following his 1738 expulsion he moved near 'a fine spring of water' where he built himself what has been described as a small cottage in a natural excavation in the earth, sometimes referred to as a cave. It was not that small, having room for 200 books and a spinning jenny. He continued to abstain from anything that involved the exploitation of others, a near vegan, well before his time. He grew his own vegetables and made his own clothes from flax that he had grown and spun. In 1757, when he was 75, Lay's health began to deteriorate.

The following year, a visitor brought news. The Philadelphia Yearly Meeting, after much agitation from below, had initiated a process to discipline and eventually disown Quakers who traded slaves. Slaveholding itself was still permitted - and would be for another 18 years - but the first big step toward abolition had been taken. Lay fell silent. After a few moments he is alleged to have said, 'Thanksgiving and praise be rendered unto the Lord God.' A few moments later he added, 'I can now die in peace'. He asked to be taken to the home of his friend Joshua Morris in Abington. There he died, on February 3, 1759, at the age of 77. He was buried in an unmarked grave, near his cherished Sarah, in the Quaker burial ground in Abington.

What made him tick

As a third generation Quaker in a time when religious belief was central to most people's lives, Lay's faith underpinned all his actions. Throughout his life he used Plain Speech calling everyone thou, referring to months and days by their number: Sunday 1st February was First Day of Second Month. He made religion the bedrock of his attacks, quoting Acts 17:26 'God made of one blood all nations of men'. These attacks were not only on slavery but on capitalism, misused wealth and avarice, and in so doing he aligned himself with Biblical figures and religious mystics. Thomas à Kempis's *Imitation of Christ* was the second most widely read Christian text after the Bible. Lay referenced à Kempis in his book and furthermore followed him in his spartan lifestyle.

Although a man of little formal learning, he read widely and deeply and was influenced by the Cynics, radical philosophers of ancient Greece and Rome, who declared it a moral imperative to stand up to powerful people and to speak the truth. It was Diogenes who coined the phrase A love of money is the root of all evil. Alongside all this was his antinomianism, the belief that no one had either right or power to control the human conscience. The radical Protestants, Levellers, Ranters, Diggers and Quakers who preached equality and democracy at the time of the English Revolution, who could be called the fathers of the abolitionist movement, were role models, not only in their ideas but in their actions; the occasional Quaker practice of publicly setting a Bible alight in order to emphasize the power of the inward light, was the street theatre that Lay loved. He was no doubt saddened to see, as the pamphleteers Hepburn and Coleman had, that the Quaker sect had become impure, indulging in luxuries like painting their faces, wearing ruffles and wigs, with idle children, all at the expense of the slaves. Writing opposed to slavery was suppressed until it became 'as scarce as a Phoenix egg'. Lay's response to his critics was that they were attacking someone whose message was from God.

Nathaniel Kogan has made a strong case for an association between Lay's physical state and his psychology; he and the slaves were perceived as physically and socially deviant. Reflecting on his days in Barbados, Lay recalled that the slaves there had a special affinity with him and Sarah 'they seem to love and admire us, we being very much alike in Stature and other ways'. The 'other ways' could have included pain. Lay witnessed the 'starving, whipping, racking, hanging, burning, scalding, roasting and other hellish torments' meted out to slaves, he, too, would probably have been in pain much of the time as a result of his twisted spine.

Kogan concludes thus: 'Both Lay and his contemporaries recognized his body as unconventional, non-normative, and something that set him apart from the larger Quaker body politic both in England and Philadelphia. These characteristics, while marginalizing Lay socially, also empowered him to empathize with and then fight to stop the bodily violence and social ostracism that chattel slavery inflicted on enslaved Africans'.

Many thought him mad. The American historian David Brion Davis, writing in the 20th century, depicts Lay as 'mentally deranged...' with a

crushing sense of self-hatred..... someone who actually devoted remarkably little attention to the negro'.

Why forgotten?

Rediker (1917) makes a case. The accepted story is that opposition to slavery was the work of the enlightened, middle and upper class, rational white men. Lay was an ill-educated, radical firebrand, the wrong class, the wrong size, the wrong shape.

Conclusion

Although of little formal schooling (he described himself as a man of little learning, a poor common sailor) he published, as well as his one book, more than 200 pamphlets, mostly polemics against social institutions of the day, slavery of course, but also capital punishment, the prison system and the Quaker élite. His eccentric behaviour enraged many but history must judge him kindly, it cannot be denied that he was a key figure, at least in his part of the world, in the abolition of slavery; a man well before his time. Lay might be forgotten by many today but the physician and signer of the Declaration of Independence, Benjamin Rush, Lay's first biographer, declared 'There was a time when the name of this celebrated Christian Philosopher.....was familiar to every man, woman, and to nearly every child in Pennsylvania'.

Postscript: the abolition of slavery

Lay opposed slavery, not just in America but throughout the world, almost three generations before the anti-slavery movement began generally to emerge. The United Kingdom outlawed the international slave trade in 1807, the slavery Abolition Act was passed in 1833 (although India was exempt). The Northern states of America abolished slavery between 1780 and 1804 but it was not until 1865 that all states fell into line.

FURTHER READING

David Brion Davis (1966) The Problem of Slavery in Western Culture Cornell University Press

Kogan N.S. (2016) Aberrations in the Body and the Body Politic: The Eighteenth Century Life of Benjamin Lay, Disabled Abolitionist. Disability Studies Quarterly vol 36

Marcus Rediker (2017) The Fearless Benjamin Lay: the Quaker Dwarf who Became the First Abolitionist Bloomsbury Publishing

Retired musings from the sideline

Memo Spathis

PART 1 Boyhood

He was young, less than three years old, perhaps nearer two. He was standing in the large front room of their small house as he had done so often before, in front of a large glass-fronted cabinet, above which was a stern photographic portrait of his father whom he had not yet met. It was not the books on the higher shelves that interested him (that was to come later) but his grandfather's instruments on the shelves below. A small pestle and mortar, gleaming bronze like the 'brazen helmets and spearheads' of his distant ancestors; a larger one for grinding the herbs, roots and medicaments that added to the odour of camphor and spirit that was so characteristic of pharmacies and doctors' rooms then; a couple of stethoscopes and a pinard horn; silver-shining obstetric forceps of various kinds and sizes; metal and rubber catheters; palette knives, scoops, and, in a leather covered rolled cloth case, secured by a clasp, the various scalpels, razors, surgical and aural curettes, and blunt, fine, and toothed forceps, needles and silk thread that were the necessary everyday instruments for a home visit, when there was no other medical facility nearby.

The cabinet was usually locked fast, but to his surprise on this occasion it opened and he reached inside for the leather covered roll. His grandmother screamed, his mother rushed over, but his grandfather simply smiled then held out his hand. 'That could cut you and I might need it soon. But when you are older, it will be yours, as will everything in the cupboard, my child'. He knew then, as he handed it back, that he would be a doctor too, one day.

The next year his grandfather retired and they all left the house and the village of Sami (where half a decade later, Captain Corelli would play his mandolin, the town being destroyed in the earthquake of 1953) and went to stay in his parents' house in Piraeus, situated on a promontory separated from the sea by the remnants of the old stone walls of Athens - no

ship could enter the port without being seen from the veranda. Here he eagerly awaited the return of his father with whom they would soon sail back to India where he worked. He was frustrated by the numerous ships that passed every day, but which they told him were not carrying his father.

When it came, on the voyage out there, he enjoyed playing with the many other children, even though he was the youngest. Later his mother asked him about his new friends. 'They are very nice,' he said 'but you can't talk to them - no matter what you say, they just reply bar... bar... bar...' How could he imagine that within two years he, too, would speak this barbarous language, an Anglophone no longer able to speak Greek?

Greek connections with India date from the time of Alexander the Great. The future Emperor Chandragupta Maurya may well have served in his army, and after Alexander's retreat, Chandragupta established what was to become the largest empire in South-East Asia, after defeating an attempted invasion by Seleucus I Nicator (before abdicating and becoming a Jain monk).

Ralli Brothers itself was more recent. Created by 5 Chian brothers just before the Greek War of Independence and the Chios massacre of 1822, they were soon trading world-wide (not just in the Black sea and Russia as was customary for Chian merchants then) with their headquarters in London. As a major company with a reputation for Victorian probity they were leaders of the Anglo-Grecian community (one of the brothers was responsible for building the Greek Cathedral of Agia Sophia in Moscow Road, London). The company was well placed to supply jute bags for transport during the Crimean war, so much so that they were invited by the British Government to supply all the jute for sandbags during the First World War (making their fortune, while alienating their fellow British merchants in Calcutta).

Since Odysseus in the twelfth century BC, Kefalonians have long had a reputation for travel. However, his father had barely finished school when he travelled to India to join Ralli Brothers, but, self-taught, worked his way up until he was one of their cotton experts. Not for him the status and high salary of a director at headquarters. He was stationed up-country in the field and was responsible for quality assessing, negotiating and buying the cotton, and then ginning and baling it. The extracted seeds were pressed for oil and the residues used



A Ralli Brothers calendar depicting Mary of Teck, who was Queen consort and concurrently Empress of India from 1910 - 1936

as animal food. Later groundnuts were also used to produce oil - cheaper than that from olives - for the soap industry. These processes entailed heavy machinery in special factories, for which he was also responsible, in fact many of the senior managers and future directors were sent to act as his assistants for a year or so while they learnt the trade.

The boy had no recollection of the family's arrival in Bombay, but many years later the Gateway to India seemed strangely familiar. His first recollection was playing in Hubli with a pet roe deer, his only companion. Fairly soon they moved to Bellary where the Collector (District administrator and Magistrate) became a good friend of the family and often exchanged visits. He remembered meeting the Collector's mother, a diminutive sari-clad figure with regal bearing and offering a charming welcome. But she was nowhere to be seen at lunch, even though all the rest of her family were there. Her son explained that though she was delighted to meet us, as a high caste Hindu she would eat in her own room. If he wanted to visit her there after eating with us he would have to bathe thoroughly and change his clothes. The Raj was a two-way process, apparently.

Eventually they lived in Guntakal, still in the cotton belt, a small town but large railway

junction on the Madras & Southern Maharata Railway from Bombay to Madras. The line ran along the side of their compound - he was soon on waving terms with all the drivers. The prospect of visitors became an exciting highlight, since it promised a journey to the station, the home of Higginbothams book shop which, as he got older, served as a replica of paradise as he rummaged through its contents while his parents greeted their guest. The books were an eclectic mix, faux-leather bound Milton's Poetical Works and Palgrave's The Golden Treasury were welcome additions to a medley of cheap fiction and a regular diet of classics summarised in the Reader's Digest (so ensuring that he never need read the originals).

His father's work necessitated frequent travel, and he often accompanied his parents, staying at so called Dak or Traveller's Bungalows, These were isolated, often in beautiful areas with wild animals in the surrounding forests. Tigers were rumoured to prowl there, leopards were often seen as were flocks of deer, peacocks and guinea fowl. On the way, if they met it and were quick enough, they would shoot their supper, which usually delighted the cooks - especially if the driver managed to jump out in time to fulfil halal requirements, so that all the servants could also share it, a welcome addition to their regular diet of vegetables or egg curries.

The boy soon became accustomed to the peculiar habits needed in the tropics, particularly rural India. Water was never drunk from the tap, it always had to be boiled and filtered. All vegetables, even those grown in the compound and kitchen garden had to be washed in potassium permanganate, and all fruit peeled. Every morning shoes had to be shaken out and examined before use, scorpions or small snakes might have taken refuge overnight. For the same reason, one had to be careful where one trod when walking on rough ground, and not to lean against or touch piles of stones. All windows and doors in the house had thin wire netting externally, and windows were temporarily shut at dusk during the routine 'fitting' of the house, even though everyone slept under mosquito netting anyway. One twirled the dials of short wave radios until one found a static free station with news. All houses also had backup generators, also an adequate supply of kerosene lamps. Even if one had a refrigerator, it had to stand in saucers or bowls of water as did all cupboards and chests of drawers, to prevent invasion by ants and other insects. It took many years to break these habits when the family returned to Europe!

Apart from the short relationship with the deer, he had no companions of his age (remember the Raj was at its pinnacle). The onset of WW II prevented the family's planned return after three years, to Greece, whose subsequent invasion made it an unrealistic proposition even in the future. The immediate solution was boarding school to which the boy was sent at about the age of 4. For the first few terms his mother stayed nearby, but was never away for more than half the year. The most suitable schools were in the Nilgiri Hills, centred around Snooty Ooty (Ootacamund, or nowadays Udagamandalam).

St Mary's Convent in Kotagiri was run by dedicated and fun-loving Franciscan nuns, who sometimes felt the need to use a rap over the knuckles with a round ruler, or twist the hair behind their ears trying to get information into the children's heads. But it was a supportive and loving environment overall. The boy enjoyed the religious rituals and could recite Hail Marys faster than anyone else in the School, possibly in all the Nilgiris. But when he asked his mother (a devout and patriotic supporter of the Greek Orthodox Church) why he could not become a Christian, words were had with the Mother Superior! But he enjoyed his time there and would always look back with great affection at the nuns.

When he outgrew the convent he went to a small boy's school in Conoor. This was chiefly memorable for the excellence of a Mr Jones who taught mathematics there. He would spend ten minutes with Mr Jones, who would explain the subject and then send him off to work his way through the book, and see him again at the end to check he had understood the problem. The boys would stand next to Mr Jones by the desk, who would sometimes tap their back to drive a point home. In retrospect it is surprising that a teacher of Mr Jones' calibre would find himself in India, the boy simply developed a lifelong gratitude and indebtedness to Mr Jones for his wonderful teaching.

At the end of the war, the school closed as most families returned to Britain, and as a temporary measure he transferred to the Lawrence Memorial Royal Military School for a few months. This was a much larger and slightly rougher school, with less segregation. It was here that he learnt to make a sharp 'Army bed', stand up to bullies, and to mirror-shine his boots and belt. He also learnt to distrust Authority - who, in their right mind, would insist on getting a particular spectacular shine on their boots when they knew they were shortly to embark



on a forced route-march through swamps and marshes?

Picking a school in Britain was difficult, particularly if you had never been there! The 'Athens of the North' had a strong scholastic reputation among Greeks, but after seeking advice from anyone in a position to offer it, his parents decided on The King's School Canterbury both for its endurance (founded 597AD) and reputation educating clerics (the Greek Orthodox clergy had maintained the dream and the soul of the Hellenic nation throughout the nearly five centuries of Ottoman occupation). That Thomas Linacre, Christopher Marlowe and William Harvey also went to the school rightly played no part in their considerations.

In some subjects he was at least two or three years behind his contemporaries and never really mastered French or Latin (any more than was necessary for matriculation). But Mr Jones' mathematics lessons proved their worth, top of the top set, he continued in the back row to work through the syllabus, occasionally being asked to help others who were at the top of the set, but temporarily struggling. Physics proved just as easy, and also a subject he never needed to revise, finding it easier to work out all problems from first principles. Cricket remained boring (perhaps handicapped by the late discovery and correction of myopia) but he enjoyed rugby and rowing. The athletics coach noticing his running style, suggested he undertook special coaching and practice for the 220 yard hurdles, but fearing he would have little time for the other sports, he declined. He early discovered that specialising, though satisfying, entailed giving up all the

things he so enjoyed and he preferred being a generalist.

However, all these sports were performed forbidden when he perforated a duodenal ulcer while preparing for O levels. At that time a 'white diet' was inevitable, as was an increasing dislike of crumbly white fish, lumpy mashed potatoes and overcooked cabbage. He took up fencing - a blend of psychology and demanding technique - which he discovered he loved, and eventually became captain of the team. His best match was against St Paul's School. He had beaten the two St Paul's fencers, who in turn had beaten his team-mates. But both his teammates had defeated their captain, who was about to become the Public Schools Champion! He was incandescent with shame, and, with the match in balance, this made him invincible. Despite his losing it, the boy would remember this match with joy all his life, exulting in the excellence of his opponent.

His brush with the medical profession had increased his respect for doctors, but reduced his confidence in his own ability to be one, and he prepared for life as a physicist, possibly in astrophysics since he suspected Mr Jones' mathematics might not be advanced enough for the preferred experimental physics.

During the summer holidays he visited Sami again after an absence of fifteen years, occasionally revising for impending exams. One afternoon while sitting in the same front room, reading AJ Ayer's *Language, Truth and Logic*, he noticed that a lorry seemed to be revving outside. Soon the room shook and the cabinet rocked, it was not until he heard the concrete roof bouncing on the walls that he realised this was an earthquake.

The next few days were spent outside camping in the garden; small and large tremors continued; rumours spread of great chasms opening up in remote villages and giant waves and tidal pools overwhelming fishing boats. In subsequent tremors most remaining houses were demolished, and a small church high above the village fell and all the coffins from its cemetery were scattered over the hillside. Few people were killed, but amongst them was the only doctor who had been examining a pregnant patient and who had rushed out to see what was happening as the house collapsed; his patient survived.

No Greek would dream of not seeing a doctor for any problem that might be medical, anymore than he would consider following to the letter the doctor's advice, which would act simply

as the basis for family and friends to discuss what really should be done. But the death of the doctor caused consternation; there was no advice to follow or act against, and any trauma necessitated the transfer of the patient over many miles of destroyed roads to another town, without any assurance that treatment would be forthcoming. It was then the boy realised that any doctor was better than no doctor. When no one was looking he crept back into the house, opened the cabinet and took out his grandfather's roll of instruments.

A few days later they left on the same ferry that had brought them there two weeks before. The front of the house had collapsed, and his father's photograph had slipped, and now seemed to be smiling. In the evening, the captain of the ferry shone his searchlight on Sami, no house was standing intact, save for one that had inadvisably been built on a sandy beach and originally had tilted, making it uninhabitable and deserted, and its builder a laughing stock. It was now upright and straight – the solitary house still standing.

In those days, Oxbridge scholarship and entrance exams were held just before Christmas and again after A levels. He had entered his name for the earlier one, as a trial run. Colleges were in groups of five, but he ticked them all. The interview at Magdalen had gone badly, the interviewer having an idiosyncratic view on diet which he had inadvertently challenged unleashing a fierce response. The exams themselves were interesting, even if unexpected ('The gift of a bicycle would make him happy. A gift of two bicycles would make him twice as happy'. Discuss.) He passed what he later realised was a melaena. He had had another one following the last series of exams (A levels and State Scholarship) followed weeks later by a dramatic haematemesis and partial gastrectomy. At least he wouldn't have to stay on a White Diet the rest of his life.

He was waiting on the station platform at the end of term. Suddenly a junior boy rushed over opposite. 'Has anyone seen...' He recognised his name and waved. Breathlessly the message was given: 'You've won a scholarship to Exeter College.' 'But I was applying to Oxford!'. 'Never mind,' was the response, 'we'll still have a whole day's holiday next term!'

1 <https://economictimes.indiatimes.com/blogs/onmyplate/ralli-brothers-the-history-remains-as-a-reminder-of-entrepreneurial-abilities-of-economically-shattered-greeks/>; and https://en.wikipedia.org/wiki/Ralli_Brothers

2 https://en.wikipedia.org/wiki/Dak_bungalow

3 https://en.wikipedia.org/wiki/Lawrence_School,_Lovedale

Potassium permanganate, the 'pill' and the passing of paternalism?

Mike Vaile



Protest by the women's liberation movement, United States, 1970

'Women may be able to buy Pill over the counter'. This recent headline probably attracted little notice or surprise in 2021, but imagine the horror, disbelief, or just bewilderment had it appeared in the early 1960s. For me though it was striking as a reminder of massive social change during one medical career.

A few vignettes may illustrate:

Medical students at St Thomas' Hospital were exposed to some of the best consultant teaching, many opportunities for learning about sometimes obscure conditions, along with some unfortunate arrivals from the debating chambers across the river. It sometimes seemed a rather rarefied experience.

That is where the Lambeth Hospital came in. Formed originally as an infirmary attached to the Renfrew Road workhouse, much damaged in World War II, by the 1950s and 60s it was Lambeth's local hospital. For students it was the place you went to experience real patients, real conditions, real poverty, real desperation. No patient more so than a woman in her thirties as I recall, who was dying after a botched abortion. She had had potassium permanganate inserted, probably as far as her uterus, and no amount of surgery and packing could stop the

progressive destruction and bleeding from her pelvic organs. Hers was the most severe case of the many attempted abortions we learned of, whether using instruments or many and various abortifacients. A lifelong and terrible lesson of the sheer desperation which many such women suffered.

Now spin on a few years and the arrival of the first oral contraceptives, a massive advance. Prior to their arrival and approval in the UK the provision of contraception was confined to the work of the charitable sector, notably the Marie Stopes and Family Planning Association (FPA) clinics. Developed in the 1950s by Pincus in the United States and on trial in Britain in 1960, the 'pill' was approved for prescription on the NHS in late 1961. The FPA became the initial source of supply from 1961, but, given the sensitivities of the time, for married women only. GP services were notably reluctant to be involved at the outset, perhaps more for workload rather than moral reasons. However, because medical advice before prescription was required, individual GPs and practices soon responded to the demand with varying cautions put in place. These requirements meant that women had to jump through various hoops, most notably to show a marriage certificate. This was the situation as I

joined as a junior in a medical practice. Those of us more sympathetic to the needs of the unmarried, could write private prescriptions.

Many years later during a social evening, a retired pharmacist in the town where I had worked told me about the ledger in which he had to record all the private prescriptions dispensed. Having extracted promises of absolute discretion I could have a look. There were my own prescriptions as well as those of my then colleagues. Fascinating indeed was the sight of well-known and highly respectable ladies' names, those brave enough to ask for prescriptions, including those who came from elsewhere for a private prescription rather than see their own GP.

Now we arrive at 27th October 1967; the momentous day when the Royal assent was given to an 'Act to amend and clarify the Law relating to termination of pregnancy by registered medical practitioners'. The Act came about in response to well-known widespread evidence of unsafe illegal abortion and the maternal mortality and morbidity that inevitably resulted – (perhaps 15% of maternal deaths). Although famously introduced as a Private Members Bill by David Steel, it was supported by the government who had appointed the president of the Royal College of Obstetricians and Gynaecologists, Sir John Peel, to chair a medical advisory committee that reported in favour of passing the bill. There was prolonged and heated political and moral debate within and without Parliament, but it passed on a free vote, coming into force on 27th April 1968. The Law provided for a certain range of grounds for abortion with many restrictions. The requirement for medical 'supervision' was absolute and the opportunity for practitioners to opt out was made clear by subsequent regulations.

Prior to the new Act the relevant pieces of legislation were 'The Offences against the Person Act' of 1861 (providing for life imprisonment) and 'The Infant Life Preservation Act' of 1929. This latter did nothing to clarify whether there might be any legal circumstances where abortions might be carried out in the interests of the mother, particularly before 28 weeks. It took the 1938 landmark case of Dr Alex Bourne to set case-law precedent. He was acquitted of having performed an illegal abortion on a 14-year old gang-raped girl who was suicidal. The result of this was that, provided there was a psychiatrist's approval, and the fees could be paid, some women were able to get a safe abortion. This obviously inequitable

state of the law meant that the unsafe 'back street' abortions still occurred and the clamour for change continued, led particularly by the Abortion Law Reform Association, through the 50s and 60s.

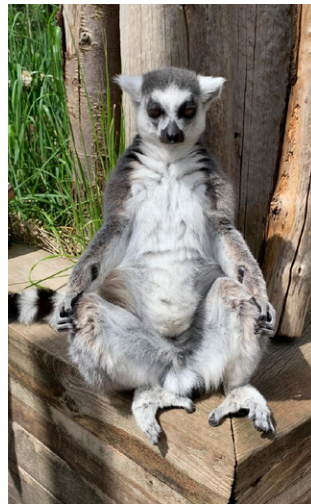
For sympathetic GPs it did now become possible to support some very distressed patients. To facilitate this, it was useful to have contact details of willing specialists, often passed around by word of mouth, which had the air of a cloak and dagger procedure. One such very helpful name was a Harley Street gynaecologist who gave me his 'messaging' call sign 'Scarlet One Zero', which seemed a bit too appropriate. He operated in various private hospitals, including, on the face of it rather oddly, St Saviour's Convent Hospital in Hythe. In fact, not so odd because this was the successor to a long-established Anglican charity hospital of that name founded at Osnaburgh Road (Euston Road), London, to assist 'Ladies of Limited Means'. I digress.

In the 54 years since the passing of the Abortion Act doctors have become more liberal, the public more accepting and access to abortions easier - despite regular attempts in Parliament and elsewhere to move in the opposite direction. The 'paternalism' of the title of this piece does however still linger on.

PS The pharmacist mentioned above died not long ago. I wonder if he destroyed the private prescriptions ledger? Grandchildren of the distinguished and caring, now elderly ladies, whose names were recorded, might be rather fascinated, if not astonished, at the part their seniors played in the 'swinging sixties', the era of free love and women's liberation!

PPS On arrival to work in Malawi in the mid-seventies, I was interviewed by the Minister of Health in person. It wasn't too arduous a task for him as there were only 70 doctors in the country at that time. It was a courteous and welcoming talk. But during it he stressed that I should on no account provide or advise contraception. The President- Dr Hastings Banda (a former GP in Notting Hill Gate) - was strongly against it, as he believed that there were too few Malawians.

On returning to the country in 2015 for a work party, the result of that policy was obvious. The population had more than trebled and deforestation was devastating. Of course, that is overly simplistic, but arguments for contraception, not only for demography but also for education and general liberation were and are so striking.



Above: Charming photos from London Zoo taken by Jeffrey Rosenberg

Information for Authors

There are three issues per year of the Retired Fellows Society *Newsletter*, which appear in April, August and December. Articles may be submitted at any time, and accepted ones are compiled into the next available issue space.

Each manuscript should bear the title of the article, name, address and email address of the author. Please write in Arial Narrow, 12 point, 1.5 spaced and do not justify the text. Spelling needs to conform to the Oxford English Dictionary.

Text **MUST** be submitted electronically, as a fully editable Word document.

Accepted articles for the newsletter:

- Solicited articles, on a topic agreed with the editor, and should be 1,500 to 2,000 words in length.
- Articles submitted by readers - 500 to 1,500 words.
- Reports of presentations at meetings of the Retired Fellows Society - 500 to 1,500 words, the author invited by the Chair of the corresponding day.
- Reports of extramural events of the Retired Fellows Society - 500 to 1,000 words, the author invited by the leader of the event.
- Reports of Retired Fellows Society tours - 1,000 to 2,000 words, the author invited by the leader of the tour.
- Short 'fillers', text and/or photographs. Poems, quotes, amusing items, brief - under 200 words.

Imagery:

With reference to submission of images (which is encouraged), it is important that each image is accompanied with a title, description and photographer acknowledgement.

Photographs should be uploaded digitally and be as high resolution as possible.