Qualifications and career history

2017-Present   Senior Lecturer and co-director of the Centre for Mathematical Biology in the Department of Mathematical Sciences, University of Bath.

2014-2017   Lecturer in the Department of Mathematical Sciences, University of Bath.

2011-2015   Junior Research Fellow (independent researcher), Christ Church, University of Oxford.
                   Associate Research Fellow on the 2020 Science Project.

2007-2011   D.Phil. (PhD) at the Oxford Systems Biology Doctoral Training Centre and the Centre for Mathematical Biology

2006-2007   M.Sc. in Mathematical Modelling and Scientific Computing – Distinction Somerville College, University of Oxford

2003-2006   Mathematics BA - 1st class honours. Somerville College, University of Oxford

Relevant publications

2022

1. C. Pagel, and C.A. Yates, "Role of mathematical modelling in future pandemic response policy" (2022) British Medical Journal. 378, e070615.
2. D. Gurdasani, C. Pagel, M. McKee, S. Michie, T. Greenhalgh, C.A. Yates, G. Scally, and H. Ziauddeen. "Covid-19 in the UK: policy on children and schools" (2022) British Medical Journal. 378, e071234.
3. C. Smith, C.A. Yates and B. Ashby "Critical weaknesses in shielding strategies for COVID-19" (2022) PLoS Global Public Health 2, 4, e0000298.
4. M. McKee, D. Altmann, A. Costello, K. Friston, Z. Haque, K. Khunti, S. Michie, T. Oni, C. Pagel, D. Pillay, S. Reicher, H. Salisbury, G. Scally, K. Yates, L. Bauld, L. Bear, J. Drury, M. Parker, A. Phoenix, E. Stokoe, and R. West "Open science communication: The first year of the UK's Independent Scientific Advisory Group for Emergencies" (2022) Health Policy 126(3).
5. D. Gurdasani, A. Akrami, V. C. Bradley, A. Costello, T. Greenhalgh, S. Flaxman, M. McKee, S. Michie, C. Pagel, S. Rasmussen, G. Scally, C. Yates, H. Ziauddeen "Long COVID in children" (2022), The Lancet Child and Adolescent Health. 6(1).

2021

6. D. Gurdasani, S. Bhatt, A. Costello, S.C. Denaxas, S. Flaxman, T. Greenhalgh, S. Griffin, Z. Hyde, A. Katzourakis, M. McKee, S. Michie, O. Ratmann, S. Reicher, G. Scally, C. Tomlinson, **K. Yates**, H. Ziauddeen, and C. Pagel, "Vaccinating adolescents against SARS-CoV-2 in England: a risk-benefit analysis" (2021) Journal of the Royal Society of Medicine (JRSM). 114(11).
7. C. Pagel, and **C. A. Yates,** "Tackling the pandemic with (biased) data" (2021) Science. 374, 6566.
8. D. Gurdasani, J. Drury, T. Greenhalgh, S. Griffin, Z. Haque, Z. Hyde, A. Katzourakis, M. McKee, S. Michie, C. Pagel, S. D. Reicher, A. Roberts, R. West, **K. Yates** and H. Ziauddeen, "Mass infection is not an option: We must do more to protect our young" (2021) The Lancet. 398, 10297

9. C. Pagel, J. Drury, T. Greenhalgh, S. Griffin, D. Gurdasani, Z. Haque, A. Katzourakis, M. McKee, S. Michie, G. Scally, R. West, **K. Yates** and H. Ziauddeen "Government's plan recklessly exposes millions in the UK to infection when they could be vaccinated" (2021) British Medical Journal – Opinion Piece
10. **K. Yates** "The dangers of allowing exponential growth" (2021) The British Medical Journal. 374(1770) – Opinion Piece
11. D. Pimenta, **C.A. Yates**, C. Pagel, D. Gurdasani "Delaying the second dose of covid-19 vaccines" (2021) British Medical Journal 372(710).

2020

12. D. Gurdasani, L. Bear, … C.A. Yates, (2020) "The UK needs a sustainable strategy for COVID-19" The Lancet 396 (10265).

2. An outline of when you participated in Independent SAGE, the role that you performed and any matters that you advised on.

I joined Independent SAGE in October of 2020. I have been a member since then, although I took a break from active involvement in the organisation from September 2021 until April 2022 and again from September 2022 to present.

My primary role on Independent SAGE was to prepare and present data on covid indicators (e.g. cases, hospitalisations, deaths, vaccinations, hospital performance, variant prevalence etc) at our weekly Friday briefings. A fully comprehensive record of these briefings can be found on the Independent SAGE YouTube channel: https://www.youtube.com/channel/UCqqwC56XTP8F9zeEUCOttPQ

I have also contributed to the reports that independent SAGE have produced which can be found here on the independent SAGE website broken down by category in the sidebar: https://www.independentsage.org/

3. A summary of any reports and/or articles you have written, interviews and/or evidence you have given regarding the work of SAGE and/or its subcommittees and/or the UK's response to the Covid-19 pandemic. Please include links to those documents where possible.

I do not have any privileged insights into the workings of SAGE and its subcommittees or possesses any information that is not in the public domain.

I have however, commented on the UK's response to the pandemic in a number of fora:

1. Opinion editorials in newspapers
   I have written for
   a. The Guardian: https://www.theguardian.com/profile/kit-yates
   b. The independent: https://www.independent.co.uk/voices/covid-new-wave-variant-hospitalisations-numbers-b2123850.html
   c. The Express: https://www.express.co.uk/life-style/health/1633607/Covid-latest-new-wave-coronavirus-variants
      https://www.express.co.uk/comment/expresscomment/1537886/covid-omicron-fourth-wave-rishi-sunak-pubs-restaurants
      https://www.express.co.uk/comment/expresscomment/1379763/National-lockdown-latest-tier-5-restrictions-boris-johnson
   d. The Huffington post: https://www.huffingtonpost.co.uk/author/kit-yates
   e. The New Statesman: https://www.newstatesman.com/author/kityates

     f.   The Conversation: https://theconversation.com/profiles/christian-yates-199844/articles

     g.   British medical journal:
https://blogs.bmj.com/bmj/2021/07/13/kit-yates-the-dangers-of-allowing-exponential-growth/
https://blogs.bmj.com/bmj/2021/07/16/kit-yates-how-can-we-reach-herd-immunity/
https://www.bmj.com/content/376/bmj.o1
https://www.bmj.com/content/376/bmj.o743?utm_source=etoc&utm_medium=email&utm_campaign=tbmj&utm_content=weekly&utm_term=20220401
https://www.bmj.com/content/376/bmj.o776

2. Appearances on TV and radio:
I have appeared on TV and radio interviews discussing the UK's response to the pandemic and have been quoted in many media outlets. Many of these interviews may not available retrospectively, but a fairly comprehensive list has been generated by the media department at the University of Bath and can be found in the attached spreadsheets. This list is not exhaustive. Particularly, only items which mention both the University of Bath and Kit Yates will be included.

3. Independent SAGE reports:
I contributed to a range of reports produced by independent SAGE over the period of my membership of the group. As stated above, they can be found here on the independent SAGE website broken down by category: https://www.independentsage.org/

4. Academic articles:
I have written a number of academic papers which are pertinent to the pandemic summarised in the section above.

4. Your views as to whether the work of SAGE and/or its subcommittees in responding to the Covid-19 pandemic (or the UK's response more generally) succeeded in its aims.
We have previously invited independent members of SAGE and its subcommittees to address this issue by reference to the matters set out below. You may find them of assistance, although we recognise that some are likely to be beyond your knowledge. Please address this issue as you see fit.

    a.   **The composition of the groups and/or their diversity of expertise;**

I have written about how I believe the expert input to SPI-M was sometimes too narrow in the following BMJ inquiry series paper "*Role of mathematical modelling in future pandemic response policy*". Specifically in the section entitled "Expert input was sometimes too narrow".

Further than that I am not qualified to comment on the composition of SAGE or its subcommittees.

    b.   **The way in which the groups were commissioned to work on the relevant issues;**
I'm not in a position to comment on this.

    c.   **The resources and support that were available;**
I'm not in a position to comment on this.

    d.   **The advice given and/or recommendations that were made;**

Generally (but not always) Independent SAGE were in agreement with SAGE advice (rather than in opposition to it). We sought to amplify their advice where appropriate. For example, in autumn of 2020 when SAGE suggested a two week "circuit breaker" we wrote the

following document which drew directly on their advice:
https://www.independentsage.org/emergency-plan-for-stopping-the-spread-of-covid-19-in-england/

e. The extent to which the groups worked effectively together;
I'm not in a position to comment on this.
f. The extent to which applicable structures and policies were utilised and/or complied with and their effectiveness.
I'm not in a position to comment on this.

5. Your views as to any lessons that can be learned from the UK's response to the Covid-19 pandemic, in particular relating to the work of SAGE and/or its subcommittees. Please describe any changes that have already been made, and set out any recommendations for further changes that you think the Inquiry should consider making.

I have no detailed recommendations relating to the work of SAGE and its subcommittees as I am not in a position to comment.

In March 2021 on the first anniversary of the UK's first national lockdown I wrote an article for the conversation entitled "Six lessons the UK should have learned, one year on from its first lockdown".

These can be summarised as

1. Act quickly
2. Act decisively
3. Trust people to follow the rules
4. Communicate clearly
5. Tackle inequality
6. Be prepared

I will not recapitulate the details on each of these suggestions here, as they can be found in the article: https://theconversation.com/six-lessons-the-uk-should-have-learned-one-year-on-from-its-first-lockdown-157518

In addition, with regards modelling, I have co-authored the aforementioned article **"*Role of mathematical modelling in future pandemic response policy*"** in the BMJ inquiry series, which makes suggestions for the sorts of questions the inquiry might like to ask of the modelling process:

1. How can we ensure all the right disciplines and perspectives are included in the modelling efforts?
2. How can data be generated and shared within and between modelling groups to sustain a more egalitarian and robust modelling environment?
3. Would better public communication of modelling processes and underlying assumptions improve usefulness, and how can this communication be resourced?
4. How helpful were pandemic projections looking a year or more ahead?

More detail on each of these points can be found within the paper itself.

6. A brief description of documentation relating to these matters that you hold (including

soft copy material held electronically). Please retain all such material. I am not asking for you to provide us with this material at this stage, but I may request that you do so in due course.

All the relevant documents I have relating to these matters can be found online at the sources detailed above.