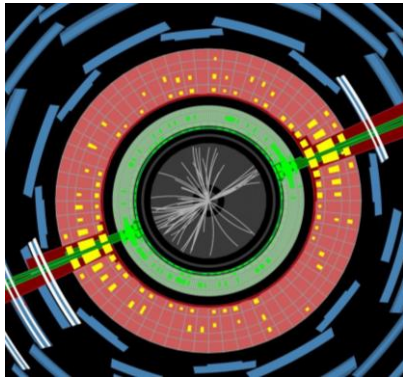


Science Writers, and Scientists who Write



Jon Butterworth
University College London



Who is this talk for?

- Well, you obviously, but who are you?
- Making some assumptions
 - Interested in particle physics
 - Interested in science communication
 - Interested in writing
- But with very different mixes amongst you
 - Some very experienced professionals*, some just starting or thinking of starting*

**in physics and/or communication*

Who am I?

- ATLAS physicist
- UK academic
- Author
 - Scientific papers
 - As part of large collaboration and shorter author lists
 - Courses and lectures
 - Undergraduate and postgraduate.
 - Not text books, so far
 - Science for the layperson
 - Blog/column/articles
 - Books
 - **Not** journalism
 - Obviously journalism is very important, but different
 - Have done many interviews with journalists



This talk

- Some personal experiences & opinions, which might be useful and/or interesting
- Focus on writing for laypeople
- Hope for some challenge/discussion from people with different experiences

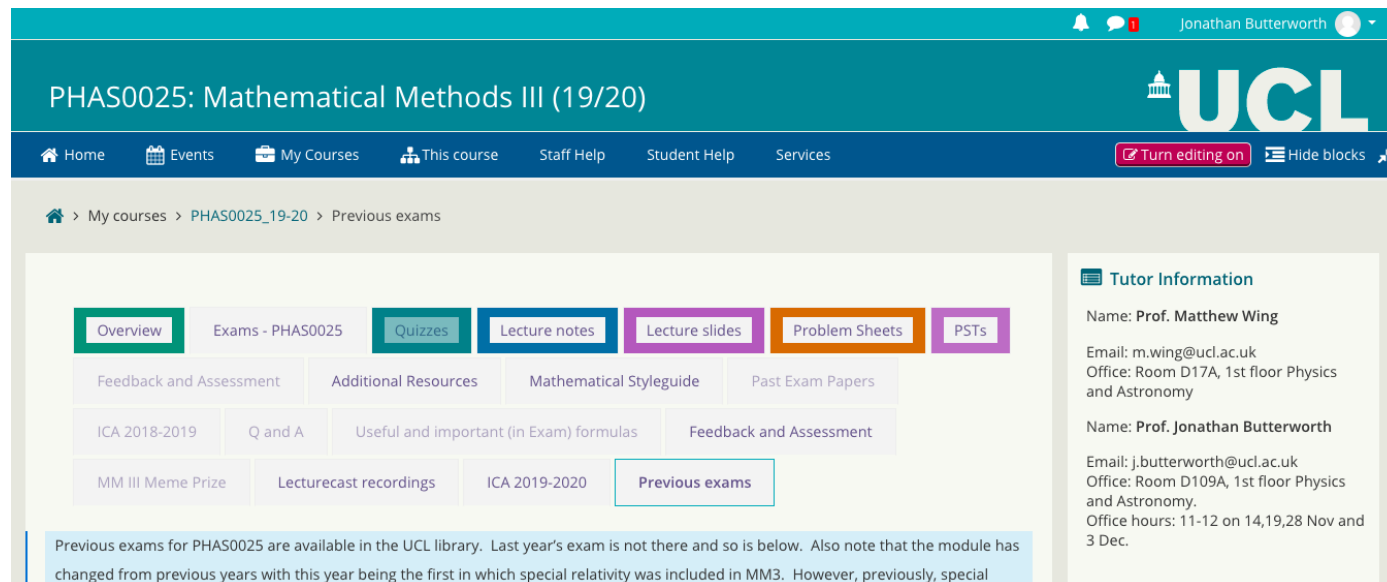
Journal Papers

- Priority is to give important detail, without ambiguity
- We should still write them as if we want them to be read/readable!
- A bit more (clearly identified) speculation and enthusiasm in the discussion parts would sometimes be good (but very difficult with a large author list).



Lectures & Courses

- Similar to papers in that it is about communicating detail
- More emphasis on engaging the enthusiasm (and activity!) of the audience



PHAS0025: Mathematical Methods III (19/20)

Home Events My Courses This course Staff Help Student Help Services Turn editing on Hide blocks

My courses > PHAS0025_19-20 > Previous exams

Overview Exams - PHAS0025 Quizzes Lecture notes Lecture slides Problem Sheets PSTs

Feedback and Assessment Additional Resources Mathematical Styleguide Past Exam Papers

ICA 2018-2019 Q and A Useful and important (in Exam) formulas Feedback and Assessment

MM III Meme Prize Lecturecast recordings ICA 2019-2020 Previous exams

Previous exams for PHAS0025 are available in the UCL library. Last year's exam is not there and so is below. Also note that the module has changed from previous years with this year being the first in which special relativity was included in MM3. However, previously, special

Tutor Information

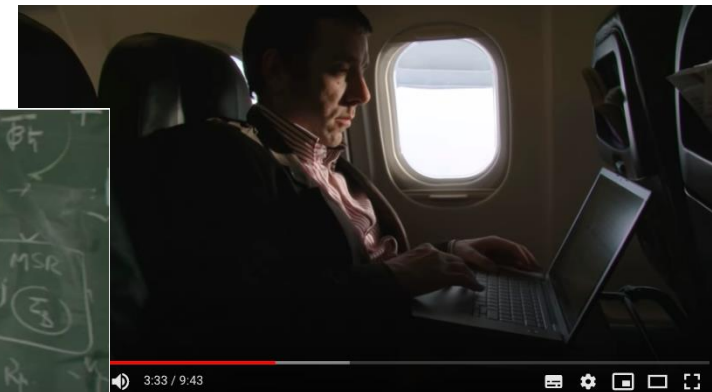
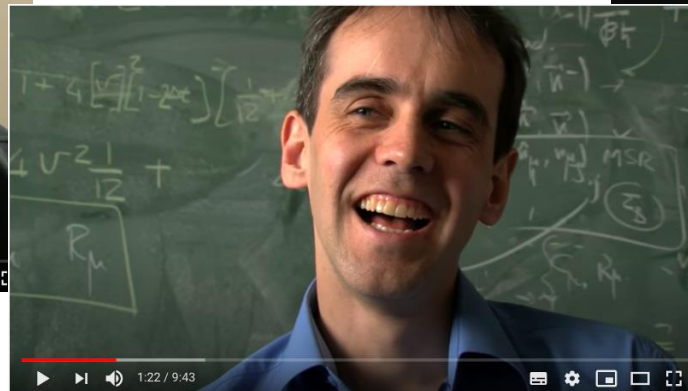
Name: Prof. Matthew Wing
Email: m.wing@ucl.ac.uk
Office: Room D17A, 1st floor Physics and Astronomy

Name: Prof. Jonathan Butterworth
Email: j.butterworth@ucl.ac.uk
Office: Room D109A, 1st floor Physics and Astronomy.
Office hours: 11-12 on 14,19,28 Nov and 3 Dec.

For the lay person

lifeandphysics.com (wordpress blog)

- Stimulated by “Colliding Particles” videos (see vimeo.com/groups/collidingparticles)
 - STFC-funded video (Mike Paterson) with Adam Davison, Gavin Salam, Mathieu Rubin
 - Started in run up to LHC turn on, finished just after Higgs discovery. Aimed at “how science works”
 - Blog started to try to explain more of “what the science is”, but ended up doing both (including some politics)
 - Still writing it occasionally
 - Lots of feedback from readers



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Life and Physics
Science

Life, Physics and Everything

When the Guardian's science blog network closes, Life & Physics will have been here for eight years. Physics has come a long way in that time, but there is (as always) more to be done...

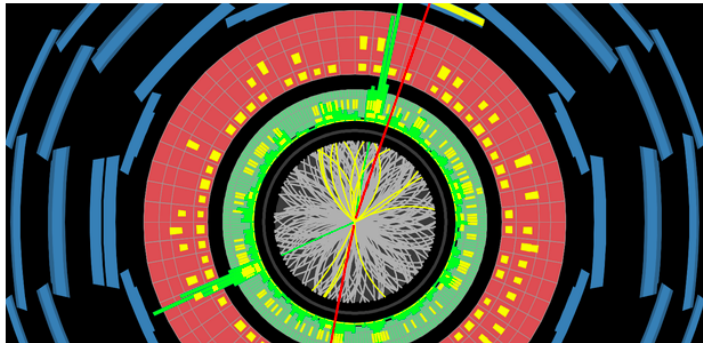
Jon Butterworth

@jonmbutterworth

Mon 13 Aug 2018 07:34 BST



40



most viewed



Live UK coronavirus live:
Tory revolt continues to
build over Dominic
Cummings' lockdown trip



The truth about why
Cummings hasn't gone:

- Guardian is one of the UK's leading national newspapers, with presence also in US and Australia
 - Guardian science team 2010-ish, Alok Jha (keen on starting a blog network), Ian Sample (keen on the Higgs – author of “Massive”)
 - They saw my wordpress blog, initiall bought some articles, then offered to host it
 - Great experience; 2011-2018 (new editor closed the network in 2018)

Other media

- Getting in journalists contact lists means they may come back to you with other stories (sometimes not related/appropriate)
- Writing New Scientist, Nature news & views, Aeon, various others
- Interviews (different thing! Less control)
- Not just print media
 - TV/radio news programmes
 - Podcasts
 - BBC Horizon
 - “Chat show(s)”...



Professor Jon Butterworth is a physics professor at University College London and a researcher on the ATLAS experiment at CERN. Jon's blog focuses on the latest discoveries in physics and the work that has led to them.



RECENT POSTS



3D Printing on Mars & Space
Plasters – Science in Zero G:
Episode Two



A Nurse Explains



Science Shambles Q&A – May
24th



Livestream Shows



Sea Shambles – Catch Up

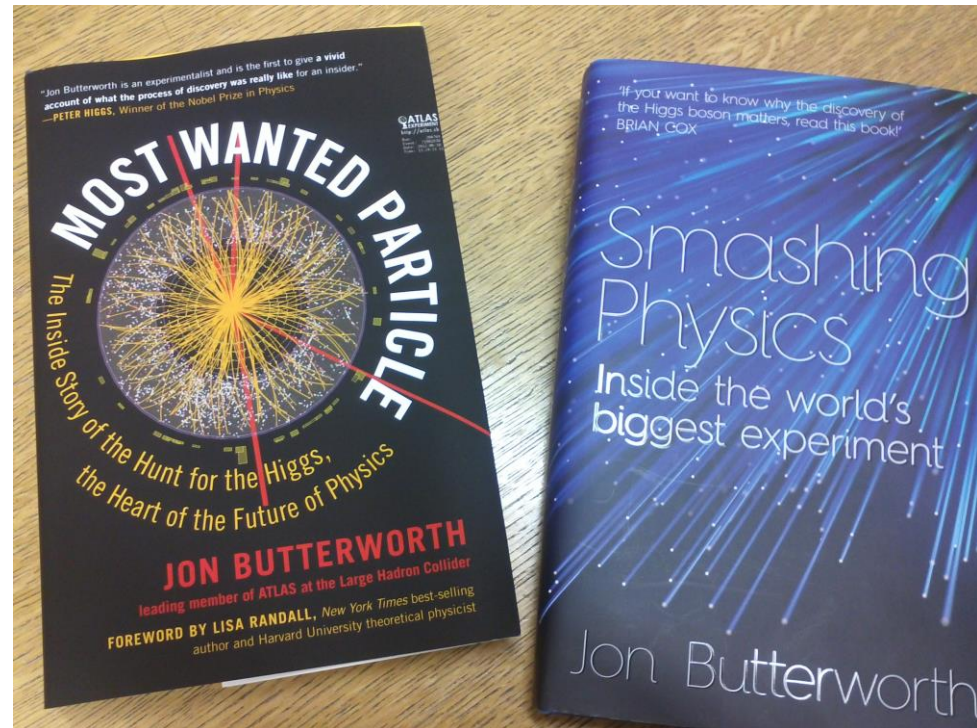
- Robin Ince, Trent & Melinda Burton
- Many contributors in common with “Infinite Monkey Cage” (Robin+Brian Cox, BBC Radio)
- Mix of science, music, comedy. (Very active during lockdown)
- Now hosting several of the old Guardian blogs, including some of mine.

Books

- Get an agent
 - Mine came because of the blog/Guardian
 - ➔ so if you want to write, **start writing**

Smashing Physics (Most wanted particle)

- Memoir/personal account of the Higgs discovery
- Drew heavily on the blog
- Hachette/Headline, UK; The Experiment, US; German, China, Taiwan
- Concept already well-defined, quite “hands-off” editor, but very helpful

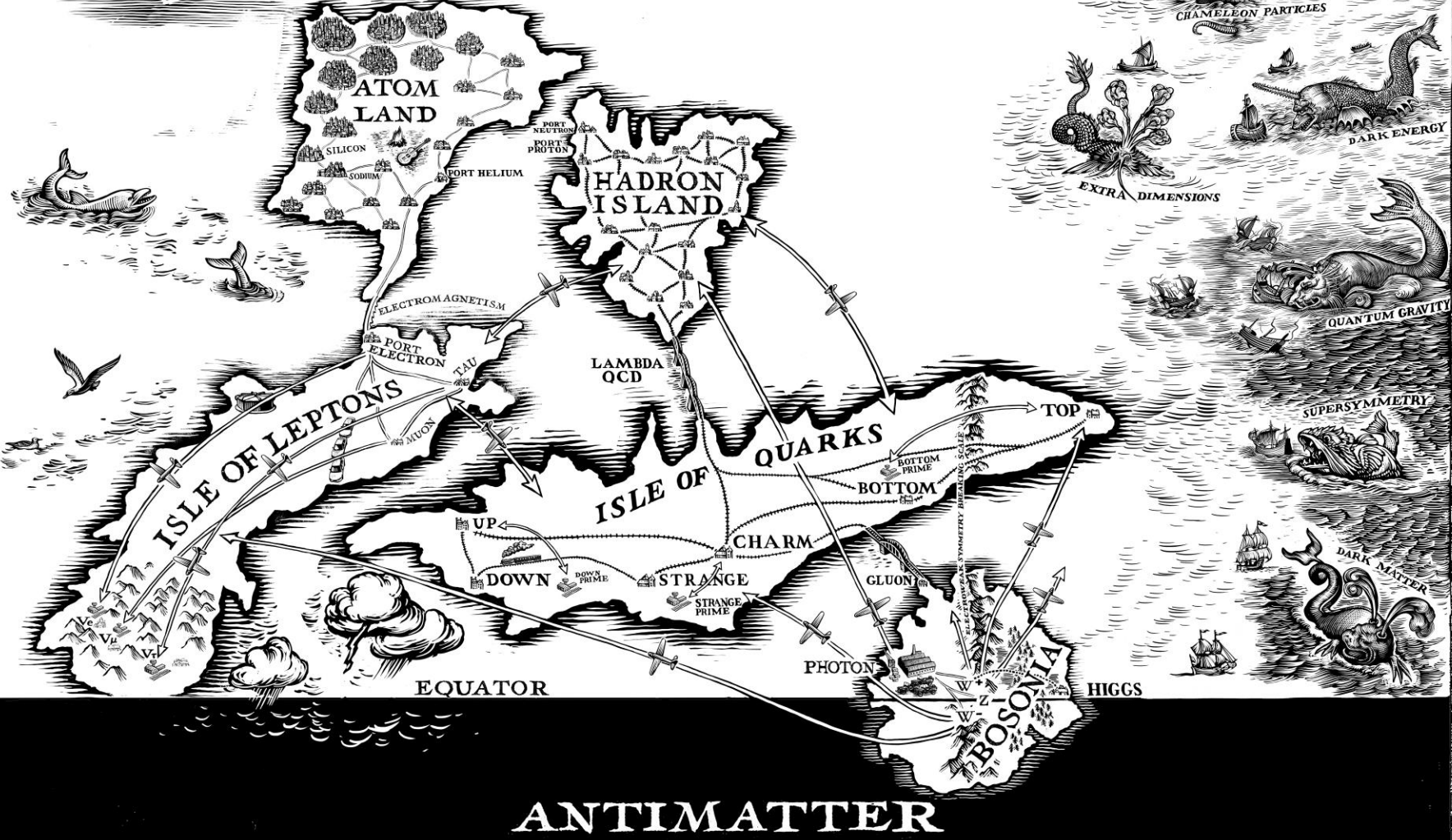


A Map of the Invisible (Atom Land)

- Playful journey through particle physics
- Exploration as a metaphor
 - Penguin/Heinemann, UK;
 - The Experiment, US;
 - Hoepli, Italy;
 - Quanto, French;
 - Russian;
 - China,
 - Taiwan
- Concept developed more together with editor (and illustrator)



A MAP OF THE
INVISIBLE
FAR EAST



ANTIMATTER

Thoughts and Conclusions

- Writing for the public: Hard work but enjoyable
- Interesting to see professional editors, journalists, agents, publicists at work. (Particle physicists can't actually do everything, it turns out)
- Personally I find writing code/papers competes directly with other writing, whereas as "management" does not
- Respect for writers who research new areas then write about them. I only write about my own research, really.