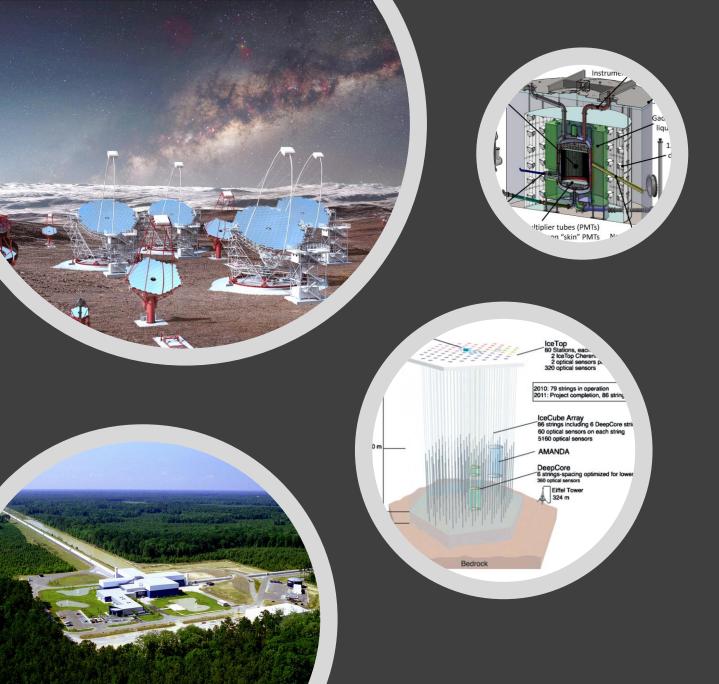
Particle Astrophysics Town Hall Meeting

PAAP: Sergey Burdin, Ed Daw, Stephen Fairhurst, Laura Kormos, Jon Lapington, Chris McCabe

STFC: Ailsa Johnstone, Jenny Hiscock

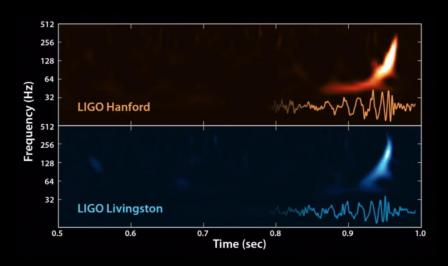


Town Hall Goals

- Bring together the UK Particle Astrophysics Community
- Hear about recent scientific highlights in Particle Astrophysics
- To begin the process of updating the UK Particle Astrophysics Roadmap

Roadmap for UK Particle Astrophysics

STFC Particle Astrophysics Advisory Panel Report - 2016 Chamkaur Ghag, Ruth Gregory, Julian Osborne, Patrick Sutton, Lee Thompson





Astroparticle physics is the fascinating field of research at the intersection of astronomy, particle physics and cosmology. It simultaneously addresses challenging questions relating to the micro-cosmos (the world of elementary particles and their fundamental interactions) and the macro-cosmos (the world of celestial objects and their evolution) and, as a result, is well-placed to advance our understanding of the Universe beyond the *Standard Model of particle physics* and the *Big Bang Model of cosmology*.

Roadmap Timeline



PAAP town hall meeting



Invite contributions from the community



First draft of roadmap



Second round of comments from the community, including discussion with other advisory panels



Final version: Summer 2021

10:00 Welcome Prof. Stephen Fairhurst 10:00 - 10:05 View from Science Board Prof. Tara Shears 10:05 - 10:20 **Dark Matter** Prof. Kostas Nikolopoulos 10:20 - 10:35 Prof. Paula Chadwick Gamma-rays 10:35 - 10:50 **Gravitational waves** Dr Laura Nuttall 11:00 10:50 - 11:05 **Neutrinos** Dr Teppei Katori 11:05 - 11:20 **Break** 11:20 - 11:30 Prof. Sean Paling **Boulby** 11:30 - 11:40 QTFP Prof. Ian Shipsey 11:40 - 11:50 Prof. Pete Clarke Computing 11:50 - 12:00 12:00 **Break** 12:00 - 12:10 What is Particle **Funding Challenges in** Priorities for the next Infrastructure needs Priorities for the next **Astrophysics Particle Astrophysics** 5 years 20 years for PA Reports from breakout sessions 12:35 - 12:55 Closeout Dr Laura Kormos 12:55 - 13:00

Today's Timetable

Meeting etiquette

- Please mute unless speaking
- Save questions for the end of talks and use hand up or chat to ask.
- The timeline is quite tight, so apologies in advance if we don't get to all questions

Breakout rooms

- After the break, you will be placed in one of 5 breakout rooms:
 - What is Particle Astrophysics
 - Funding Challenges in Particle Astrophysics
 - Priorities for the next 5 years
 - Priorities for the next 20 years
 - Infrastructure needs for PA
- PAAP members will act as moderators, each room will have a rapporteur to take notes and report back
- 25 minutes for discussion, followed by 20 minutes of reports back to the full meeting