

March 2020

The Flerovium Zone was a general science zone for secondary schools, funded by STFC. Six scientists took part:

- Tom Dally is a Postdoctoral Researcher using sound and radar to identify and track insect numbers and uses data from STFC facilities.
- Rebecca Wong is a Safety Case Consultant at Wood plc, an STFC partner company, assessing hazards on nuclear sites.
- Emily Goddard is a PhD student investigating how to use salt to make heating your home greener and cheaper and uses data from STFC facilities.
- Elspeth Keating is a Research Fellow in lightweight materials and manufacturing and uses data from STFC facilities.
- Ben Cropper, the winner of the Flerovium Zone, is a PhD student funded by STFC studying particle physics.
- Antoine Bourget is a Theoretical Physicist at Imperial College London funded by STFC, who is trying to understand how the world works at a fundamental level.

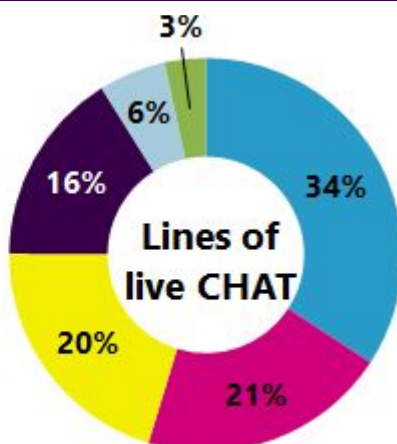
Key figures

This zone had 20% more students logging in, and 70% more questions in ASK than the average of other zones in March 2020.

Due to the effects of coronavirus, many schools reported a large number of staff and student absences, which had an impact on their participation in the second week. Students could still access the chat from home so we still opened bookings, but there were a lower number of chats than we would normally see, and they were quieter on average.

	FLEROVIUM ZONE	MAR '20 ZONES AVERAGE	2012-19 ZONES AVERAGE
Schools	7	7	10
Students logged in	351	300	385
% of students active in ASK, CHAT, VOTE, or comments	80%	86%	87%
Questions asked	427	251	637
Questions approved	252	154	284
Answers given	421	287	512
Comments	65	27	66
Votes	227	204	301
Live chats	14	14	16
Lines of live chat	3624	4869	5,722
Average lines per chat	259	358	357

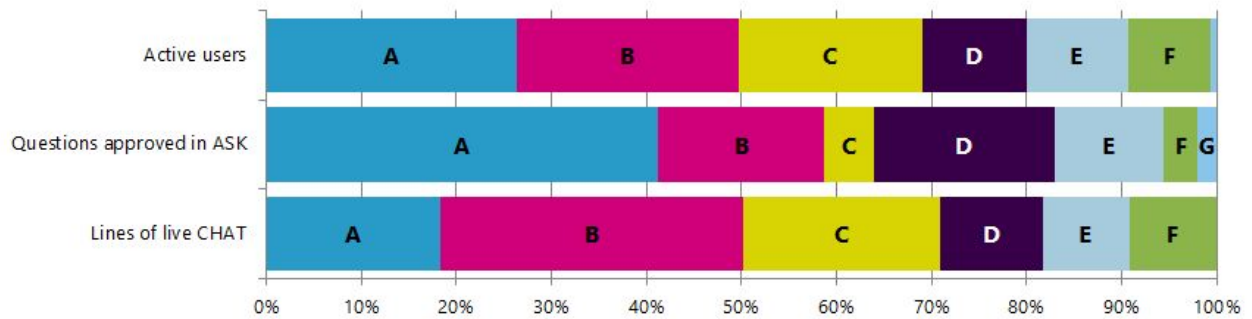
Scientist activity



PLACE

Ben Cropper	1st
Tom Dally	2nd
Emily Goddard	3rd
Rebecca Wong	4th
Antoine Bourget	5th
Elspeth Keating	6th

School activity



	YEAR GROUP(S)	CLASSES
A Haverstock School, London (WP)	9	4
B The Sir Robert Woodard Academy, Sompting	9,10	3
C Robert May's School, Hook (U)	8,9	2
D Queen Elizabeth's Grammar School, Blackburn	9	2
E Heathfield Community School, Taunton (U)	9	1
F Greenacre School, Chatham (U)	13	1
G Towers School, Ashford (WP)	9	1

We have found that schools that are more than 30 minutes travel time from their closest Higher Education Institution are less likely to receive visits and benefit from engagement activities. We give priority to underserved (U) and widening participation (WP) schools when allocating places. Find out more about our research at <https://about.imascientist.org.uk/2017/school-engagement-in-stem-enrichment-effect-of-school-location/>

Popular topics

In this zone students were interested in the scientists' individual research areas. For example, they asked Tom about how he used sound and radar to find out whether insect populations were healthy, why he wanted to work with insects and whether insects could carry the coronavirus.

General discussions were about education and schooling, and what degrees the scientists jobs required. Students were also interested the day to day aspects of the scientists' jobs such as whether they find their work stressful, or if anything embarrassing has happened to them which working.

Students also asked questions about the scientists hobbies including video games, and whether they spoke any foreign languages.

Examples of good engagement

Students were very interested in the individual research areas of the scientists, and they often linked conversations to what they had been learning about in school, such as this conversation with Rebecca about Chernobyl:

*"what have you found out so far about operating nuclear power plants safely?" - **Student***

*"There is a lot of learning from the mistakes and accidents from the past, like Chernobyl and Fukushima. It's about having lots of engineered controls in place like interlocks so people can't just walk into dangerous areas." - **Rebecca, Scientist***

*"We learnt about Chernobyl the other day in Science, it interested me about how you can make it safer" - **Student***

*"Yeah it is very interesting! They sort of went against a lot of protocols at Chernobyl but I'm confident that won't happen again, shouldn't happen anywhere across the world (fingers crossed)" - **Rebecca, Scientist***

*"what sort of protocols did they go against?" - **Student***

*"They were doing some testing, moving the control rods around I think, when they shouldn't have been allowed. The control rods control the rate of the reaction" - **Rebecca, Scientist***

*"thanks for your answer :)" - **Student***

There were lots of discussions about education, what education the scientists had, and what was essential for the role:

*"what degree did you have to do to get this job?" - **Student***

*"I have a biology degree, a masters degree in conservation biology, and a PhD in insect conservation. But *all* of that isn't necessary to be a scientist. I also volunteered a lot with conservation organisations :)" - **Tom, Scientist***

*"Wow thanks for replying!" - **Student***



Scientist winner: **Ben Cropper**

Ben's plans for the prize money: *"It is important for people to be educated on energy sources, so I would like to make some Top Trumps-style cards. The idea is that the pupils who play against each other would pit the advantages and disadvantages of various types of power against each other, and through that learn them!"*

Read Ben's [thank you message](#)

Student winner: **jazz391end**

As the student winner, jazz391end will receive a certificate and a gift voucher.

Feedback

We're still collecting feedback from teachers, students and scientists but here are a few of the comments made about March's *I'm a Scientist*...

All our students have thoroughly enjoyed the experience, learned a lot and had something positive to cling to this past week
— **Teacher**

I would highly recommend I'm A Scientists to my colleagues, as I had an incredible experience. The ability for high school students to ask questions (including some real tough ones) directly is a fantastic outreach tool, and I feel privileged to have taken part.
— **Scientist**

I think this is a pretty unique method of science engagement! You get the chance to get to know and help some of the students, particularly in the evening chats!
— **Scientist**

Thank you for answering every question no matter what the challenge!
— **Student**

This has been really useful. Thank you for taking time to answer us! :)
— **Student**

Thank you for giving up the time and answering our questions you have informed us with a lot of cool and amazing information
— **Student**