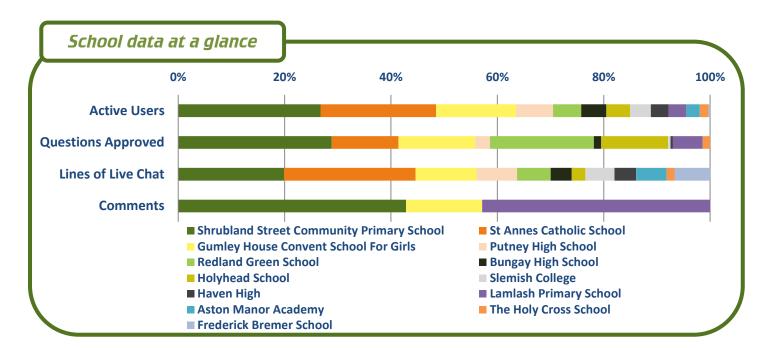


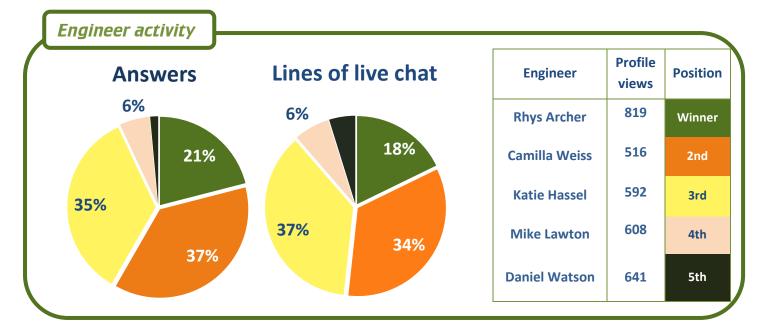




# June 2015

This was a themed zone funded by the UK Space Agency and featured engineers involved in fields that developed technologies for space or used information from spacecraft. The students in the zone wanted to know about how the work of the engineers related to space and space travel, what engineering was like as a career and who the engineers were as people. Camilla, Katie and Rhys were especially engaged during the event, and all engineers interacted well with students, discussing shared hobbies and interests as well technical science and engineering questions.









PAGE VIEWS	SPACE FOR ALL ZONE	JUNE '15 AVERAGE
Total zone	15,946	19,241
ASK page	1,569	1,490
CHAT page	2,236	3,100
VOTE page	1,340	1,437

### Popular topics

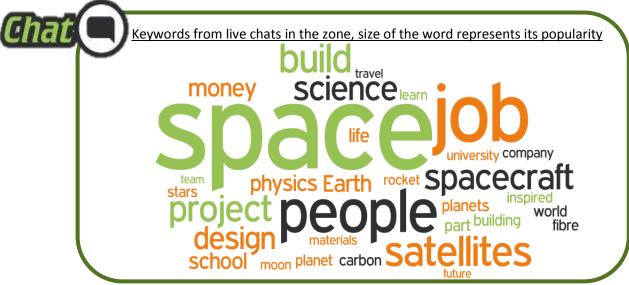
Overall the Zone was quite focused around the topic of space. Questions ranged from 'Would you want to actually go to space?' to the very technical and specific concerning particular research investigations being carried out by the engineers. These demonstrated that the students had been reading the engineers profiles. Satellites were a prominent theme

	SPACE FOR ALL ZONE	JUNE '15 ZONES AVERAGE	IAE 2012-15 AVERAGE
Students	409	413	356
% of students active in ASK, CHAT or VOTE	91%	87%	83%
Questions asked	602	727	518
Questions approved	215	229	195
Answers given	343	455	435
Comments	23	27	41
Votes	327	311	277
Lines of live chat	5,910	5,574	4,896
Live chats	19	19	16
Average lines of live chat	311	290	305
Schools	10	11	9

throughout, as the work of several engineers related to satellite design and manufacture and the students were also interested in the future of space technology.

There were some careers advice questions and these were often linked to the research or experience of the engineers. Some students also took the opportunity to ask more general physics and astronomy based questions about planets or black holes, for example.

There were also some hypothetical questions that tested the engineers' creative ideas, or referenced sci-fi pop culture, such as "Would it be possible to engineer a material like "vibranium" (captain americas shield is made of it) which is so strong".







Keywords of questions asked in the zone, length of bar represents frequency of use

5 15 0 10 20 space work **Example Questions** satellite (click for links) school rocket space travel "What is an "Why is there no engineer?" gravity in space?" carbon fibre planet "When the shuttle human lands on Pluto will it "How do you make "Are satellites earth confirm whether it is heat shields for launched in a planet or not subject rockets are they a currently it is not the UK?" special material or thought of a planet?" outreach just layered?" future "Have your engineer "How much will your "Are you a christian spacecrafts been work cost, would it and does this affect build to space or be worth money and your thinking about somewhere out of travel the start of the why?" earth?" universe?" money "Have you ever pressure "What is the most "What did you win seen something in alien sci-fi that you've used metal in the green award for rockets?" in India?" wanted to build. If so what?" "Does your job include "Where do you see "Do you think It is "Do you believe in mathematics, if it yourself in 10 possible for humans does, what kind parallel universes?" vears" to send droids to of maths does





you job include?"

Jupiter?"

## Examples of good engagement

The engineers often talked about their motivations, which allowed the students to make personal connections with the subject. This excerpt from a live chat is an example of Rhys using her personal experience to explain why she wants to be a role model in response to a searching question from a student:

"How do you think you can change the way people think about engineers?" – Student

"I think it's important that young people know about engineering and what engineers do. I know when I was little I either thought it was just for boys, or they were people that fix cars. I think a lot of young people enjoy science but think that means they have to be a physicist, biologist or chemist, when really with science you can do loads loads more than that!" – Rhys, engineer

"Thank you for answering my question I think it is sad that you only thought engineering was for boys!" – Student

"Me too! I try and do lots of events in schools so that hopefully no other girls ever feel that way!" – Rhys, engineer

# Engineer winner: Rhys Archer

Rhys' plans for the prize money: "I would create a fun leaflet to send to schools to help students learn more about science and engineering. I would also produce a leaflet for girls in science and engineering as I think it's important that young female students who want to become an engineer or scientist have positive role models to read about. With any remaining money, I would use it to pay for travel to and from schools so I could go to the schools myself and give a talk about why the leaflets are important and to meet some of the students who like science and engineering." Read Rhys' thank you message.



#### Student winner: Little Einstein

For great engagement during the event, this student will receive a gift voucher and a certificate.

#### Feedback

We're still collecting feedback from teachers, students and engineers but here are a few of the comments made during the event...

"Well now hearing from you guys I am interested in engineering" – Mursal, student

"Thank you for all your answers - the class are completely inspired" — Mrs Fyson, teacher



Another great chat with Shrubland Phiz lab this afternoon. So. Many. Questions. My fingers are tingly from all the typing!



