

## Rolls Royce Science Prize- December Diary

*December has been dominated by Christmas- since our trip to the panto on the 3<sup>rd</sup>! However we have had some time for STEM.*

### **Craigmillar Clean-up**

The big event this month relating to our community STEM was the Craigmillar Clean-up, organised in Partnership with our Rota Kids Club and local Rotarians. The children identified that our local area had a lot of litter and decided to work collaboratively to tackle the problem. The litter pick was their first community event and was only the start, now the children have seen the scale of the problem they are thinking of STEM solutions to



this key issue in our community.

### **Christmas STEM Activities.**

Classes have been keeping the STEM activities going throughout the Christmas season. Here are some highlights:

P6 created bicarbonate soda crystals and event designed and made their own stress balls, testing different materials to fill them. These were the biggest hit in the whole fayre and raised lots of money for the class to spend on more STEM equipment.

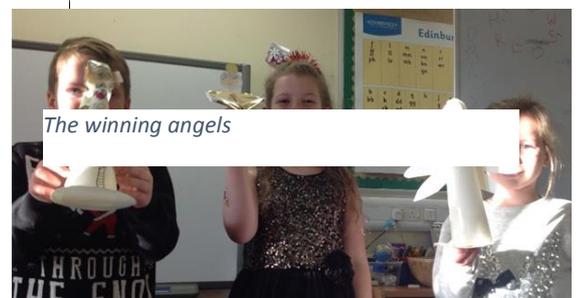
P7 have been making Bath Bombs from our Home Lab book- ordered for each class from our Rolls Royce money. The pupils were looking at the book and chose to make them. We saw how the water started the chemical reaction between the cream of tartar and the bicarbonate of soda. We also had a lovely Christmas gift to take home at the end! P7 have also started to make a Space Lab so they follow their own research interests.

P3 and P7 had a joint challenge morning to see who could make the best flying angel. The children had to work in mixed aged groups, it was lovely to see the teamwork between the classes and some innovative results.



*P3 and P7 teamwork!*

### **Science Club**



*The winning angels*



Our first block of science club is nearly finished and our children have worked so hard on their challenges. A highlight was making our own toothpaste and testing to see which chemicals worked best to make a good toothpaste! We also made rockets which taught us about forces and even aerodynamics. Lots of pupils enjoyed it so much that they showed people at home how to do ti-passing on the learning. We then thought about helicopters and how the size of wings impacts on flight. We looking forward to our next block where we will have Physics students from the nearby university working with us in one of our clubs. This opportunity arose through a contact with a local Physicist who lives a five minute walk from the school. It will be so good for the kids to see that Scientists do live in their community- this goes to the very heart of our project, the idea that ‘people like me can be scientists’!

*Testing our helicopters*

**Mentor Visit**

At the end of November our Mentor Tony visited us. He got to see our school and the challenges facing us and our local community, specifically the high levels of deprivation and poverty of ambition. Tony saw our STEM Through Play learning in P2, which is now so respected that other schools are visiting to see it! He met lots of classes and told them about what it is like to be an engineer and even made model engines with two classes. He also got an amazing tour of Craigmillar Castle by our Junior Tour Guides, this gave him a great sense of our school ethos. We had a productive meeting with him and our Science team.



*Figure 1 Building our model Rolls Royce engines with Tony*

**Outdoor Classroom Update**

The contractor has visited and has located a site where the container can be placed. We hope to have it in position in March 2019!

**Spending Update**

Item	Cost
Homelab and Usborne Sciecne 365 books for each stage- these are to be used for activity ideas relating to STEM curricular areas and will be linked to our planners.	<b>£181.86</b>
Science Club resources	<b>£76.00</b>
<b>Running Total Spend</b>	<b>£257.86</b>