Year 6 Extracting DNA from strawberries

Year 6 recently took part in a science outreach session looking at DNA. Not only was the DNA topic, supporting presentation and investigation perfectly pitched to appeal to all abilities and interests, it was also wonderful to see our more able students being *stretched and challenged* as they were given the opportunity to ask quite probing scientific and philosophical questions and benefit from detailed subject knowledge on DNA, inheritance and future food production methods. My favourite question was 'Would vegetarians feel OK about eating meat tissue produced in a laboratory if no animals were used or killed in the process of its production?' A super and fascinating question still to be debated for many years to come...

The children came out buzzing and it certainly was a super way to reinforce that science is great fun and also a rewarding area to take further into university and a possible career for both boys and girls.

Mr J Grundmann

DNA makes us who we are. We get it from our parents. We were visited by Nottingham University, they came to teach us about DNA and to also extract it from strawberries. Firstly they showed us a power point to explain to us what DNA is. After they showed us the slide show we did an experiment on extracting DNA. Firstly we took the top off the strawberry and then we put it into a bag, we squashed it so it had no lumps. We poured a glass of detergent and mixed it all up. After we did that we got the cup and put some filter paper in it, we poured the squashed up strawberry and detergent into the coffee filter and let it filter. After it had about a centimetre of extract we put it into the test tube with nothing in it.









Rosie F, 6G

DNA makes us who we are. We get our DNA from our parents. We get the Y chromosome from our dad and the x chromosomes from our mum. DNA is made up of 4 bases ATCG in a certain order and it is different for everybody. We crushed the strawberries because we needed to expose the tissue cells because they contain the DNA and put them in a bag with some detergent, the detergent would separate the DNA from the tissue cells so we could extract it. We put some ethanol into the filtered strawberries because the DNA is separated and the ethanol sticks it together. Adhi D, 6G

First we crushed up a strawberry to expose its cells. Next we added some washing up liquid to help separate the DNA and then added salt to group the DNA together.

After that we put the strawberry, fairly liquid and salt into a test tube and added some ethanol and that made the clumped together DNA float to the top. One of the ladies that came works in a lab specialising in fermentation. I asked if meat was grown would vegetarians eat it?

Samantha B, 6G