

A year in the life of a space school - Stewards School

Leading space education programme

Just over a year ago Stewards Science Specialist School was accepted onto the Leading Space Education Programme. Here we outline where the journey has taken us and a taste of things to come for the future.

At Stewards, we have been involved in this programme for a little more than a year and it is incredible to think that writing a bid so close to the end of a summer term (3 days to be precise!) would bring about such a wealth of opportunities. Our initial aim was to secure funding to improve the quality of teaching around Space, to incorporate more Space activities into our science club and to continue to build up our links with the Space community. This project has allowed us to all of this and even more.

It has to be stated that this project fitted neatly with our science specialism and it needed to do just that, so that we were not overstretching ourselves and therefore producing something of quality and longevity.

We have managed to improve the quality of teaching by attending a variety of excellent CPD sessions, for example, 'Teaching Physics with a Space Theme' and the ISSET visit to Kennedy Space Centre (October 2009)

"What an experience to witness a rocket launch firsthand, dine with an astronaut and to practice experiments at the Kennedy Space Education Centre"

Attendance at these events has been shared out amongst the staff (teaching and technical) and they have been cascaded via meetings to the rest of the department and to staff from our partner secondary schools. Not only have they been a huge motivator for staff, they have provided us with ideas for new resources, interesting experiments along with establishing new contacts.

Our pupils have benefitted from this because they have had all sorts of exciting events organised for them ranging from 'in class' experiments, lectures from visiting speakers, such as Jerry Stone, who talks about Mars and astronomers who attend the Moon watch and Jupiter watch events. These have been well attended by parents too and they have been well received by our partner primary and secondary schools. We have run competitions for our own pupils about Space and we ran a town wide competition for all primary schools which was really successful and the prizes were funded via the bid. We are just about to send out our next challenge.

A group of pupils were also invited to attend the Society for Popular Astronomy (SPA) Convention at Cambridge (specifically because of our involvement in the Space programme) on a sunny Saturday in March where they attended a series of really interesting lectures about meteors, got to ask experts questions about Space and received a free telescope. Daniel De Franca really enjoyed the presentations; he learnt 'that there are three types of meteors, a) Iron/nickel b) Iron/Nickel/Rock and c) Rock and none of them contain water!'

Many of these events have been able to go ahead because we have created a unique role within school as part of the science specialism which facilitates this very type of work and that is a Curriculum Development Manager. Her work enables us to co-ordinate events and to improve links.

One of our main achievements was to run a Family Space Day in July 2009. Not only did it attract a lot of visitors of all ages, but it allowed scope for our pupils to act as science ambassadors and to run the

experiments for themselves. This has led us to taking up the STEM Leadership scheme to reward young people for their participation and commitment. The event attracted partners from Science Alive who brought along their inflatable Planetarium, EADs Astrium who provided a free balloon rocket workshop and local astronomers who were on hand to show their telescopes and to give talks. We are just about to do our next family event in November 2009.

As part of our commitment to science enhancement for able and gifted pupils, we have used Space as the theme to run CREST bronze activities for pupils from our school and partner secondary schools and we have prepared a two day Edge into Space package for Year 9 that focuses on 'Rockets and Space travel'. This proved to be really popular and went down extremely well when the young scientists exhibited their rockets and their video diaries to an audience of teachers, parents and local dignitaries.

It has been quite a year and we could not have anticipated just how much we would do or what opportunities would arise from this. It has all been worthwhile though. For the future, our plans include an emphasis on teamwork, a series of space workshops for our primary partners, the development of cross-curricular projects with a space focus, further CPD, sharing our expertise with others via our website, setting up Astronomy GCSE and putting on more space related visits for our pupils and their parents (who knows another trip to Kennedy Space Centre could be on the cards?).
