

KINC'S MATHS SCHOOL

AUTUMN TERM 2022

Shining bright

It's been an exhilarating autumn term. Our King's Kulture programme comprised ten illuminating outings. It's thanks to the Friends of KCLMS charity that students can attend such world-class Bushcraft trips (photo above) were a blast. Important race work has been taking place in Personal Development lessons, and we are grateful to the meaningful input of our DEI reps Nadia, Karan and Marcus to the DEI committee led by Ms Woods-Shepherd. This is, sadly, Mr Abramson's final year and we expect to announce his successor in January. We have been delighted to work closely with King's College London's lecturers. They have helped students prepare for mathematical Olympiad competitions, and will teach more Curriculum X courses. We enjoyed welcoming 1000 (a new record) prospective KCLMS students to London Excel for the Sept 2023 entry admissions test.

Maths schools

We are delighted to be a leading force in the development of the University Maths Schools Network, now called U-Maths. We hope to inspire similar success and impact across the country. Enabling the 11 cultural events at no cost. Our schools to share best practice, the network is a valuable collective voice for us all. We've enjoyed getting to know our sister schools. Mr Pereira visited Exeter to judge their Physics competition. In January 2023, staff from all maths schools will gather at the newly opened Lancaster University School of Mathematics to get to know each other better. Congrats to Lancaster whose opening event was a success!

Chase the Moon

Following the popularity of the Mini-Marathon, and building on the fabulous foundations set up by Gayathri and Leo in Running Club, a group of students have been participating in the Chase the Moon runs in Battersea Park. One can complete 5km or 10km. Well done gang!

Competition time

34 students took part in the Senior Kangaroo and 37 sat the British Mathematical Olympiad Round. This follows our best ever set of results in the Senior Maths Challenge. 68% earned Gold; every student earned at least Bronze. Fifteen Y13 students tackled the British Physics Olympiad Round 1, a 3 -hour long paper. Y12s and 13s also attempted the Astro Challenge exam - a mix of astronomy and astrophysics. Congrats to our students who won the 1st round of the U19 National Schools Chess Championship.

Student pride

We had important guests visit us including key stakeholders from King's College London. Thank you to Charlotte, Ved, Aastha, Talia, Soumya, Nadia, Marcus, Cara, Lizzie C, Yassir, Isabella, James Y, Nico and Lelana who met with them. We often receive uplifting feedback from visitors. They note how courteous and well-rounded our students are. Also that they show such positive attitudes to learning.



Left: Ashmole Primary hard at work on their Magic Squares. Right: Learning about Christmas in Ukraine.

The Pause

The Pause continues to thrive as a wellbeing activity. Highlights have included an interactive play about mental health, Harm's Way, from the talented UpFront Theatre Company. Our students found it enlightening. The quiz was thought-provoking too. We hope our students learnt meaningful strategies for dealing with issues such as depression, anxiety and self-harm. Another high point was staff and students taking part in the London Mini-Marathon on a radiantly sunny afternoon. We enjoyed walking, moving and running for 30 minutes. Bravo all! Great team work.

Speakers

We welcomed a range of speakers such as Devie Mohan who spoke about the disruptive world of FinTech and the trends around startups, banks and investors. Nyasha Chiwereza from The Worshipful Company of Actuaries talked about her work in Reinsurance. Fab to see how maths can be applied to so many interesting professions.

Outreach success

Our outreach work has a big impact on hundreds of students and teachers across London and beyond, in both mathematics and physics. We regularly look at ways to introduce new programmes and fine-tune the current ones. For instance, we have changed our fortnightly sessions to weekly ones. Our Royal Institution Maths Masterclasses in collaboration with Oval Learning with local primary schools have been a hit. St Jude's Primary noted that their "adventurous mathematicians loved investigating Patterns in Prime numbers using multi link cube towers." Ashmole Primary (photo above) thanked us for introducing them to the world of the Möbius strip and that pupils were "blown away by super mathematical learning."

Culture Week

Culture Week showcased different types of cultural expression. The photocollage workshop and gallery trips proved popular. Film Club ran a special screening. The visual arts recommendations from students and staff were fantastic.

Assemblies

Students delivered a range of assemblies. Highlights included Marcus with an insightful celebration of Black history, touching on powerful African empires and the Ancient Egyptians' accomplishments. Viktoriia, Tony, Katya, Daniel K, and Sofiia, who joined the school on our Sanctuary for Ukraine scheme, highlighted the significance of St Nicholas' Day - a very special holiday in Ukraine. They discussed traditions and ways in which students can support Ukraine. Another key assembly was on the International Day for the Abolition of Slavery. We discussed how slavery is not a part of the past. In fact, it is around us in the present. We defined what modern-day slavery is and what we can do to help.

WEEKLY MATHS CHALLENGE

If $4xy^2 + 8xy = x^2 + 4$, find all the solutions for (x, y) for which both

x and y are integers.