Welcome to the fourth edition of the...



Boolean Maths Hub Bulletin

Boolean







Get Ready for A Level Mathematics Summer School

This successful summer school will be taking place again on 22nd & 23rd August at St Brendan's Sixth Form College, Brislington, Bristol. A Level teachers from local schools and academies will come together to ensure that students are well prepared for the transition between GCSE and A Level Mathematics.

For more detailed information, to reserve spaces or to arrange an assembly at your school please contact the Boolean Maths Hub Administrator rhian.skinner@clf.cabot.ac.uk

NEW! Regional Bursary Projects

This year we are offering bursaries of up to £500 for action based research projects to deliver local needs of our hub region.

We know that sparks of innovation and valuable research can often fizzle out or not even get started due to lack of funding, time to complete and/or support to develop and embed.

Bids for bursary proposals can come from individual Hub members, faculties, TSA, local Masters/leadership programmes (e.g. NPQSL), the STEM centre etc.

Bursary projects can build on existing research and we will direct those who secure a bursary to experts within the hub region.

On completion of the projects, the results and findings regarding good practice will be shared in a variety of ways. It is expected that bursary holders will use several methods to communicate their findings as widely as possible. These methods may include the next Boolean Maths Hub Conference, the hub website, focused presentations to ITT students, presentations within faculties/ alliances and federations/local authorities, e-mails with summaries of findings to PGCE and Masters programs.

For more information as to how/when to apply please contact rhian.skinner@clf.cabot.ac.uk

Coming in our next newsletter:

- Update on the primary textbook trial
- KS3 reasoning
- Date for the Boolean Maths Hub, summer conference

Find out more (and download resources from our conference) at our website:

www.booleanmathshub.org.uk

MEI Teaching Advanced Mathematics (TAM) course

We are one of the seven Maths Hubs who will be Innovators in hosting this popular course in 2016-2017, for which Education we are now recruiting.



TAM is designed to support teachers who are teaching A level Mathematics for the first time and looking to develop their subject knowledge and pedagogy at that level.

The course includes:

- 8 course days hosted at one of ten venues focussed on A level
- Mathematics subject knowledge and pedagogy;
 2 developmental lesson observations conducted by subject specialists;
 2 years' access to MEI's 'Integral' online resources and unlimited email
- access to live and recorded online sessions; the opportunity to participate in a subsidised Applied Mathematics course days;
- the opportunity to gain Masters level credits when studying the' TAM
- with Masters course' at one of three university partner institutions; £900 bursary (or £1200 for 'TAM with Masters' courses) to participating schools on completion of the course in recognition of the support provided to participants.

Applications are now open and the application form can be found at mei.org.uk/tam along with further information and frequently asked questions.

Collaboration Counts!

The Boolean Maths Hub Conference

TV star Johnny Ball delivered two well attended workshops at our 'Collaboration Counts!' Conference which was held at UWE on Saturday 30 January. During the day 200 delegates heard keynote speeches from leading mathematicians and educationalists. Each delegate also attended three workshops of their choice.

Workshop titles included 'Why students forget what you teach them', 'Mindsets, Motivation and Maths', 'Making the grade D to C', 'Mastering early maths' and 'The new A Level'.

Presentations from the workshops are available on the Boolean Maths Hub's website: www.booleanmathshub.org.uk

All delegates enjoyed a session delivered by Rob Eastaway, author of eleven books including Maths for Mums & Dads and his latest title Maths on the Go. The day finished with a keynote speech from NCETM Director and Chief Executive of MEI, Charlie Stripp

Lisa Pollard, Boolean Maths Hub Lead said "This conference both shared the work of the Maths Hub from over the last year and provided a fantastic learning and networking opportunity for all phases of maths education professionals. Exposing teachers to local and national experts in maths education through engaging with the Boolean Maths Hub can only improve maths education and raise both attainment and the love of the subject.





Post ITT Subject Knowledge Enhancement Courses

We are currently recruiting for all three of our SKE courses: Mathematical Confidence and Growth Mindset (for primary teachers), Mastery Pedagogy (for primary teachers) and Developing Maths Teaching through Subject Knowledge Enhancement (for secondary teachers). If you or someone you know is suitable and interested in taking part please contact the Boolean Maths Hub Administrator for more information or to reserve a space on this cohort.



The successful CLF Institute TSST (Teacher Subject Specialism) course in conjunction with UWE continues throughout the summer term. If you are a teacher wishing to re-train as a Mathematics teacher please contact Rhian Skinner if you would like to join the sessions.



National Collaborative Project 5: Development of Primary **Maths Teaching for Mastery Specialists**

Each Maths Hub has recruited four primary Mastery Specialists; the Boolean hub Mastery Specialists teach in schools in Thornbury, Bristol, Weston Super Mare and Corsham. This year, each Mastery Specialist is developing teaching mathematics for mastery in their school supported by a training programme led by Debbie Morgan, Primary Director of the NCETM. In addition to this, they will work collaboratively with teachers from other schools in pilot Teacher Research Groups (TRGs) between January and June

Each TRG will be led by a Mastery Specialist and involve two teachers from each of five other schools, with one of each pair being the subject leader. The half termly meetings will start after Christmas and will normally include a pre-lesson discussion; lesson observation, and post-lesson discussion.

The aim of the pilot TRGs is to support participating teachers in developing teaching for mastery in their own school. As a pilot, it will also be important to learn lessons about the use of TRGs, so that the process can be refined for future use.

Although we have filled the places for this year, during the next academic year the Primary Mastery Specialists will be running a new series of TRGs. If you think your school would like to be involved in this from September 2016, then please contact Rhian Skinner, and we will put you on the list to be notified once we start recruiting for these.

Upcoming events

UKMT Team Maths Challenge (TMC) for students in Years 8 and 9 is taking place at Royal High School in Bath on Monday 18 April 2016. Places are still available. To register your team go to www.ukmt.org.uk/team-challenges/team-challenge

Mastery Maths in Action days for primary and secondary teachers. Spaces still available on 3rd May and 14th June 9.00am - 3.00pm. Contact Rhian Skinner

8th National Dyscalculia Conference is taking place in London on 29th June 2016. To book your place or for more information contact www.dyscalculia-maths-difficulties.org.uk

Get Ready for A-Level Mathematics! Free Summer School at St Brendan's Sixth Form College on 22nd & 23rd August 2016. To meet with the workgroup lead, request assemblies or for further details, please email rhian.skinner@clf.cabot.ac.uk

Bristol Maths Conference. All day conference on June 14th. Key speakers include Debbie Morgan and Marcus du Sautoy. To book your place please contact: tradingwithschools@bristol.gov.uk or call (0117) 9222444

National Maths teacher Day - June 28th







Core Maths - the assessment issue

By Carrie Martin (Core Maths Lead)



Now that our Yr13 students are approaching the final run in to the first core maths exams in May 2016 we are trying to do as much as we can to prepare them. It isn't an easy task given that there are a limited number of sample assessment materials from the exam boards and nothing resembling anything like textbooks or revision guides. We have to be flexible and use whatever we can. For example, we used questions from functional skills, Use of Maths Level 2 and Use of Maths Level 3 for recent internal assessments.

The national core maths assessment group have written a mock paper that is appropriate for all three main exam boards. Centres with a Year 13 cohort have taken the mock in January, and we are collating the results ready to see what insights we can gain from them. At the regional meeting in November we worked through some of the questions to get a feel for how the students might cope with the paper.

When we met as a cluster recently we also started thinking about trying to come up with predicted questions based on the preliminary material. We will put this suggestion forward to the assessment group too. If we start to try predicting core maths questions using the preliminary material from exam boards other than our own or from the Use of Maths resources then we can fully prepare our students ahead of those first core maths exams in May.

CALL FOR EXPRESSIONS OF INTEREST FROM PRACTITIONER-**RESEARCHERS IN MATHEMATICS EDUCATION**

BSRLM and BERA are holding a conference for Practitioner Researchers (e.g. teachers and teaching assistants undertaking their own projects) from all phases of mathematics education on 16th July 2016 in Exeter.

The organisers are looking for practitioners to present their work, in a supportive environment, at the conference. Further information and online bookings can be found here:

https://www.bera.ac.uk/event/learning-from-the-classroom-practitioner -research-in-mathematics-education-2

ACTION RESEARCH VIDEO CLUB 2016

Would you like to join a collaborative group of teachers exploring and sharing aspects of classroom practice?

The club will meet six times, from 5-7pm, at 35 Berkeley Sq, Bristol BS8 1JA, on Wed 20th April; Thurs 5th May; 19th May; 9th June; 23rd June; Wed 29th June.

If you are would like more information about the Conference or the Video Club please contact Alf Coles, at the University of Bristol: University of BRISTOL alf.coles@bris.ac.uk,.

For further information about the Boolean Maths Hub or to join our mailing list please contact rhian.skinner@clf.cabot.ac.uk

Don't forget to visit our website for updates between newsletters http://www.booleanmathshub.org.uk/