# The Joint Mathematical Council of the United Kingdom 

A Charitable Incorporated Organisation

Registered with the Charity Commission for England and Wales, Registered Charity Number: 1171223 Registered Office: De Morgan House, 57-58 Russell Square, London, WC1B 4HS

## Minutes of the General Meeting held at the Royal Statistical Society on Friday 9 June 2017

## Present

Officers

Chair
Secretary
Treasurer
Representatives of Participating Bodies
Adults Learning Mathematics
Association of Mathematics Education Teachers
Association of Teachers of Mathematics
British Society for Research into Learning Mathematics
British Society for the History of Mathematics
Conference of Heads of Departments of Mathematical Sciences
Edinburgh Mathematical Society
Institute of Mathematics and its Applications
London Mathematical Society
The Mathematical Association
Mathematics in Education and Industry
National Association for Numeracy and Mathematics in Colleges
National Association of Mathematics Advisors
National Numeracy
NRICH representing the Millennium Mathematics Project
Operational Research Society
Royal Academy of Engineering
Royal Statistical Society
STEM Learning
United Kingdom Mathematics Trust
Wales Institute of Mathematical and Computational Sciences
Co-opted Members
Chair of the BCME Committee
UK Representative to the
International Commission on Mathematical Instruction
Representatives of Observing Bodies
Advisory Committee on Mathematics Education
Department for Education [England]
Department of Education [Northern Ireland]
Education Scotland
Higher Education Academy
National Centre for Excellence in the Teaching of Mathematics
National College for Teaching and Leadership
Office for Standards in Education
The Office of Qualifications and Examinations Regulation
The Royal Society

## Visitor

Department of Education [Northern Ireland]

Paul Glaister
Peter Thomas
Paul Harris

Jeff Evans
Helen Farmery
Sue Pope
Alf Coles (deputy)
June Barrow-Green
Stephen Langdon (deputy)
David Pritchard
Nigel Steele (deputy)
Alice Rogers
Jennie Golding
Charlie Stripp
Sally Barton
-
Derek Huby
Ems Lord
-
-
Scott Keir (deputy)
Stephen Lyon
Bill Richardson

David Martin
-

Jeremy Hodgen
-
Julie Harris
Stuart Cathro
Steve McCormack
-
-
Alison Tonkin (deputy)
Rebecca Veitch

Susan O'Boyle

## 1 Introduction

1.1 Welcome The Chair welcomed those present.
1.2 Practical Arrangements As the Secretary had read out the procedure for emergency evacuation at the preceding Special General Meeting of the Joint Mathematical Council of the United Kingdom, he did not read them out again.
1.3 Apologies for absence Apologies for absence were received from Sue Gifford (BSRLM), Jan van den Heuvel (HoDoMS), Chris Chipperton (IMA), Jane Jones (Ofsted), Janet Holloway (Ofqual), Matt Lewis (NAMA), Jane Imrie (NCETM), Charlene Timewell (ORS), Neil Sheldon (RSS) and Sofya Lyakhova (WIMCS).

## 2 Minutes of the meeting held on Tuesday 28 February 2017

2.1 Approval The minutes of the meeting held on Tuesday 28 February 2017 were approved.
2.2 Matters arising not elsewhere on the agenda None.

## 3 Reports from Officers

3.1 Chair The Chair said that his report to this meeting also was for the subsequent meeting of the Council of the unincorporated JMC.
The Chair reported that ACME had had its first meeting in its reformed state and the next meeting would be on 23 June 2017. The Chair said he had attended and spoken at a meeting to develop The Royal Society's response to the Smith Review. The Chair said that work was ongoing to establish ACME Contact Groups (at one time to be called Expert Groups); a first joint meeting of The Royal Society, ACME, JMC and CMS to discuss which groups might be set up, how they would be formed and how they will work, was held on 5 June 2017. The Chair said that he had also been involved in a meeting on Level 3 Mathematics at The Royal Society at which Adrian Smith had been the leading speaker; the emphasis of the meeting was on increasing participation.
The Chair said that he had met with NCTL about the approval of TSST mathematics programmes (item 9 of this agenda). Also, the JMC standing group for meetings with NCTL would meet NCTL on 19 July 2017.
The Chair mentioned several other engagements he had undertaken: STEM Learning, the Chartered College of Teaching, National Maths Hubs Forum, LMS Education Day, MEI, a reception at the House of Commons; meeting with policy teams at the Royal Society of Biology, Royal Society of Chemistry, Association of Colleges and twelve speaking and chairing commitments about post-16 mathematics, including a Westminster Education Forum event where Sir Adrian Smith was the guest speaker.
The Chair then raised three matters from the Trustees' Meeting.
The Chair said that David Martin had stood down as the JMC's representative at the OCR Mathematics Consultative Forum, Sue Pope had filled in but we were now looking for a new representative and the Secretary would send out an email requesting suggestion of possible representatives. David Martin then said what was involved. There are two meetings a year, each involves a full day in Cambridge with those attending informing OCR of reactions to ideas OCR put forward, there are also updates on policy, GCE and GCSE as well as talks from the mathematics education community. He found the days very informative with good opportunities in discussion groups to make contributions.

The Chair said that attempts had been made to set up similar links with AQA and Pearson but there had been no response from AQA and Pearson had no intention of having such a group at present; he will contact WJEC next. He also asked member bodies to let him know if they became aware in their contacts with awarding organisations of occasions where JMC input would be valuable. Alice Rogers asked what the rules of engagement were for JMC representatives to awarding organisations; she expressed some unease about giving advice to just one body. The Secretary responded that he acted as the MA representative to the OCR Mathematics Consultative Forum and that, whilst he recognised the potential conflict of interest, in practice it was rare that he felt the need to be silent; representatives need to be heedful of the sensitivity of the situation and act prudently.
The Chair said that university entrance tests remained high on his agenda and he had made sure the DfE is aware of the risks involved in the upsurge of such tests. The matter was not discussed at the HoDoMS AGM but the then Chair of HoDoMS had put out a call for information about use of such tests.

The Chair said that there had been discussions for some time about the Meeting of Mathematics Subject Associations (MMSA) becoming a Special Interest Group of the JMC. With the establishment of the CIO, that was now being taken forward. MMSA had amended its Terms of Reference to enable this. The Chair invited Sue Pope (Honorary Secretary of MMSA) to describe MMSA. She said that it was a termly meeting of five classroom-facing mathematics organisations: AMET, ATM, MA,

NANAMIC and NAMA with representatives from ACME and NCETM also present, along with other invitees from time to time. It was made clear that any statements or representations made in the name of MMSA (as opposed to being issued jointly by the five organisations) would be subject to approval by the Chair of JMC before release. The proposal had been discussed at the Trustees' Meeting and it was recommended to the General Meeting that it confirms the establishment of MMSA as a Special Interest Group of the JMC. The proposal was put to the meeting, proposed by the Chair and seconded by Alf Coles; it was agreed with fourteen votes in favour, none against and one abstention.
The Chair then invited questions.
Jeff Evans asked about the change from ACME having Expert Groups to having Contact Groups. Rebecca Veitch responded that it was to align with existing terminology regarding groups within The Royal Society. The Chair added that the terms of reference were key and they would be unaffected by the change of name.
3.2 Secretary The Secretary announced that the General Meeting in June 2018 would be on Wednesday 6 June.
3.3 Treasurer The Treasurer said that the bank account for the CIO was now open but all financial activity had been on the accounts of the unincorporated JMC and he would report on that activity at the subsequent meeting of the Council of that body.

## 4 Reports from Committees

4.1 BCME Committee David Martin (Chair of the BCME Committee) said that the BCME account had now been opened, apart from some final details which would be settled on 9 or 12 June 2017. He said this was welcome news as the account was needed for payments through the website. He added that the contract with the University of Warwick had been signed (in the name of the new CIO) and he circulated a flyer for BCME9. The committee was currently encouraging individuals and bodies to propose sessions.
The Chair of the JMC thanked the BCME Committee for its hard work, so far and in prospect, extending particular thanks to the Chair of the BCME Committee.
Jeff Evans asked how many were expected at BCME9. David Martin replied that they were expecting 400 residential delegates and 100 non-residential delegates.
The Chair asked whether the Chartered College of Teaching was engaging with BCME. David Martin replied that it would be leading a session.
Sue Pope then drew the meeting's attention to the closing date of 31 July 2017 for proposals of sessions and said that the programme would be published in September or October 2017. Sue Pope said that some organisations were sending out specific messages about BCME (rather than just including it in general mailings) and this was very helpful. She asked all organisations to alert their membership to the conference. She said that any queries about sessions should be addressed to her, as Chair of the Programme Committee; in particular, she was happy to give advice about leading sessions.
4.2 ICME Bursaries Committee No report.
4.3 GCSE Working Group No report.

## 5 Election of Treasurer

There being no questions to the two candidates, Jennie Golding and Sue Pope, then withdrew to permit an opportunity for discussion of their candidacies; they then re-joined the meeting and a secret ballot was taken. The votes having been counted by the Secretary and Treasurer, the Chair declared that Jennie Golding had been elected to serve as the next Treasurer of the JMC. Sue Pope then withdrew as a candidate for the election to be held later for Honorary Treasurer of the unincorporated JMC.

## 6 Co-option of Co-opted Trustees

The Chair said that the Trustees at their meeting on 28 February 2017 had discussed adding to the Trustees and that both Matt Lewis and David Pritchard had accepted the Trustees' invitations. David Pritchard then left the room and there was an opportunity for discussion.
6.1 The co-option of Matt Lewis as a Co-opted Trustee was then proposed by the Chair and seconded by Helen Farmery; it was agreed with fifteen votes in favour, none against and one abstention.
6.2 The co-option of David Pritchard as a Co-opted Trustee was then proposed by the Chair and seconded by Jennie Golding; it was agreed with seventeen votes in favour, none against and one abstention.

David Pritchard then re-joined the meeting.

## 7 Transition from the Joint Mathematical Council of the United Kingdom to The Joint Mathematical Council of the United Kingdom

The Chair introduced the following three resolutions proposed for passing by the voting members at the General Meeting of The Joint Mathematical Council of the United Kingdom (the "Charity") duly convened and held at the Royal Statistical Society, 12 Errol Street, London EC1Y 8LX on 9 June 2017 immediately after the Special General Meeting of the Joint Mathematical Council of the United Kingdom that will be held at $11 \mathrm{a} . \mathrm{m}$. on that day in that place.

1. The Charity shall accept receipt of the entire undertaking and all assets and liabilities of the Joint Mathematical Council of the United Kingdom (henceforth referred to as the "Council"), with effect from 1 August 2017, or such other date determined by the Executive Committee of the Council (the "Transfer").

The above resolution, proposed by Paul Glaister and seconded by David Pritchard, was agreed with 19 votes in favour, no votes against and no abstentions.
2. In particular, the Charity shall accept all benefits and liabilities of the Council relating to the Memorandum of Understanding between the Council and the Association of Teachers of Mathematics and The Mathematical Association regarding the British Congress of Mathematics Education in 2018.

The above resolution, proposed by Paul Glaister and seconded by Sally Barton, was agreed with 19 votes in favour, no votes against and no abstentions.
3. The Trustees of the Charity are hereby authorised and instructed on behalf of the Charity to do all such things and to incur such reasonable costs to give effect to the Transfer as are required, including the following:
a. The Chair of the Charity shall be authorised to accept the certificates of the Honorary Secretary and Honorary Treasurer of the Council that the Council has been dissolved in accordance with the resolution for dissolution of the Council passed at the Council's Special General Meeting on 9 June 2017;
b. The next General Meeting of the Charity after the dissolution of the Council shall consider for approval a final report of the Council and final accounts for the Council, the final accounts having been audited in the manner prescribed for the auditing of the annual accounts of the Council;
c. The next General Meeting of the Charity after the dissolution of the Council shall consider for approval the draft minutes of the Annual General Meeting of the Council held on 8 November 2016, the draft minutes of this Special General Meeting of the Council and the draft minutes of the Council meeting later this day; and
d. The next Trustees Meeting of the Charity after the dissolution of the Council shall consider for approval the draft minutes of the Council's Executive Committee meeting held this day.

The above resolution, proposed by Paul Glaister and seconded by Peter Thomas, was agreed with 19 votes in favour, no votes against and no abstentions.

## 8 Conduct of Business

The Secretary introduced the proposals on the conduct of business emphasising the key points in the paper. The Chair then asked for questions.
Ems Lord said that, for the new arrangements regarding reports to work, it was important that deadlines were met. Sally Barton said that it was common for the business at Council meetings to be discussed at Trustees' Meetings. Jennie Golding said that it would be helpful if a reminder of what had been agreed was sent out with the notice of the meeting and the call for reports.

The proposal was agreed unopposed.

## 9 JMC enabled community approval process for TSST mathematics programmes

The Chair said that the proposal was about the existing TSST secondary programme and not its new programme for Core Maths. He said ministers are keen to improve the quality assurance of these
courses and NCTL is keen have an approval process for them. An Expert Panel had been put together from AMET, ATM, JMC, MA, MEI, NANAMIC, NAMA and NCETM, and a mathematics-specific audit tool was being developed, and should be finalised soon. The Chair said that he was asking the General Meeting to approve this going forward as endorsed by the JMC.
Jennie Golding drew attention to the table of programme elements in Annex 2 of the paper that contains as item 8 'A focus on pedagogy and subject knowledge'; she stressed that subject specific pedagogy needed as much attention as subject knowledge. The Chair replied that pedagogy was at the heart of this and he gave details of how the draft arrangements were significantly different from those used by the Institute of Physics for physics which are more focused on subject knowledge.
Alice Rogers asked whether there was opportunity for programmes to be led by higher education institutions. The Chair replied that the money goes to schools but they can involve higher education institutions.

Jeremy Hodgen said that it was essential to distinguish pedagogic content knowledge from subject knowledge.
The proposal was put to the meeting, proposed by the Chair and seconded by Jennie Golding; it was agreed with sixteen votes in favour, none against and one abstention.

## 10 Reports from meetings

10.1 Council for Subject Associations: 24 April 2017 Sally Barton said that Julia Flutter from the Chartered College of Teaching (who would be speaking at the Council meeting of the unincorporated JMC) would be seeking feedback on the CCT's proposals. Sally Barton also said that the issues that the mathematics subject associations had raised at CfSA concerning the CCT's proposals were shared by other subject associations. The Chair of CfSA has stood down and there is no immediate successor, and the CfSA is looking at how to take things forward. Sally Barton also drew attention to the possibility that subject associations may be able to gain access to FutureLearn through subject associations working together.
10.2 National Maths Hubs Forum: 7-8 March 2017 The Chair invited questions on his report. There were none but Steve McCormack concurred with the account of the event.
10.3 National Numeracy Forum: 3 April 2017 Sue Pope said that she had nothing to add to her report. Derek Huby said that following the meeting National Numeracy had undertaken further work on the Essentials of Numeracy and a new version will be launched at a forthcoming event at the Bank of England from 11 a.m. to 1 p.m. on 11 July 2017, and invited anyone who would like to attend to speak to him to receive an invitation.
10.4 OCR Mathematics Consultative Forum: 21 March 2017 Sue Pope said that she had nothing to add to her report.
10.5 Ofqual meeting on communicating changes to GCSE: 7 March 2017 Sue Pope said that she had nothing to add to her report but she emphasised that Ofqual had tried hard to engage and inform the community.
11 Any other business not elsewhere on the agenda
None.

## 12 Conclusion

The Chair thanked everyone present for their contributions and closed the meeting.

## 13 Dates of future meetings

Tuesday 14 November 2017
Tuesday 13 February 2018
Wednesday 6 June 2018
These meetings will be held at the Royal Statistical Society and begin at 1100.

## Summary Minutes of the Trustees' Meeting held at the Royal Statistical Society on Friday 9 June 2017

Present Paul Glaister (Chair), Peter Thomas (Secretary), Paul Harris (Treasurer), Sally Barton, Sue Pope and David Pritchard (visitor).

Introduction
1.1 Welcome The Chair welcomed those present.
1.2 Practical Arrangements These were addressed informally.
1.3 Apologies for Absence These were received from Matt Lewis.

2 Minutes of the meeting held on Tuesday 28 February 2017
2.1 Approval The minutes of the previous meeting were approved.
2.2 Actions The action points from the previous meeting were reviewed. Most had been completed and the progress on the others was discussed.

It was agreed that all open actions of the uJMC would be adopted.
2.3 Matters arising not elsewhere on the agenda

JMC enabled community approval process for TSST mathematics programmes it was agreed that the proposal in the late paper for the General Meeting would be put to the General Meeting for approval. In due course, a list of accredited programmes would be put on the JMC website.

3 Transition from the Joint Mathematical Council of the United Kingdom (uJMC) to The Joint Mathematical Council of the United Kingdom (CIO)
It was agreed to bring forward a proposal at the AGM in November 2017 that the JMC should have a Deputy Chair in 2018-19.

## 4 BCME Committee

The report was noted.
MMSA
It was agreed that a Meeting of Mathematics Subject Associations Special Interest Group should be established as a Committee of the JMC and this would be put to the General Meeting. The terms of reference for the group are as follows:

## MMSA Terms of Reference

The MMSA is a meeting between the "classroom facing" mathematical Subject
Associations and is not an institution itself. MMSA is a SIG of JMC.
The MMSA exists to explore and promote issues of common interest. It acts as a single point of contact for external agencies where appropriate. MMSA is the principal vehicle for discussing joint work between some or all of the following associations:

The Association of Mathematics Education Teachers (AMET)
The Association of Teachers of Mathematics (ATM)
The Mathematical Association (MA)
The National Association of Mathematics Advisers (NAMA)
The National Association for Numeracy and Mathematics in Colleges (NANAMIC)
Any of the above named organisations may send up to two delegates. There is an expectation that delegates are office holders of their Association.
Other organisations may be invited to attend the MMSA in whatever capacity the associations of the MMSA choose. JMC sends a trustee if one is not already a representative at MMSA.
Responses to Government initiatives and consultations may be coordinated through the MMSA to ensure, where possible, the associations do not offer contradictory advice. This may not always be possible due to the different stances taken on issues by the represented associations and the short response windows often demanded by Government.
Similarly responses to initiatives and consultations by other bodies may be coordinated through the MMSA. Any response written on behalf of MMSA, will be cleared with the JMC chair.
MMSA usually meets three times each year.
MMSA has an honorary secretary who is elected from the delegates for a term of one year.
Each pair of meetings has a chair and notetaker agreed in advance.

## 6 Future Meetings

6.1 That meetings are to be held on 14 November 2017 and 13 February 2018 was noted. It was agreed that the preferred date for the meetings in June 2018 was 6 June 2018 [this was subsequently booked with the RSS].
6.2 A partial programme for discussion items at future General meetings was agreed:

14 November 2017: Smith Report (speaker to be invited from the DfE)
13 February 2018: Ofqual's research into GCSE Mathematics (speaker: Alison Tonkin, Ofqual [confirmed]) (45-minute session, second discussion to be arranged)
6 June 2018: 'Developing teachers' mathematical knowledge using digital technology' (a Nuffield Foundation-funded research project undertaken by Celia Hoyles and Alison Clark-Wilson) (speakers: Celia Hoyles and Alison Clark-Wilson [confirmed]) (45-minute session, second discussion to be arranged)
$7 \quad$ Any other business not elsewhere on the agenda
The membership of the JMC was discussed.

