Consultative Committee for Mathematics in the Natural Sciences

Minutes of a meeting held on Friday May 17th 2019 at 4.00 p.m., in Meeting Room 1, Centre for Mathematical Sciences, Wilberforce Road

Present: Dr Sue Colwell (Convenor), Dr Austen Lamacraft, Dr Alex Thom, Dr Christopher Thomas, Mr Ross Brown, Mr Fadle Arouna

Apologies: Dr Jorge Santos, Dr Mark Spivack, Ms Anna Bui

1. Minutes of previous meeting and matters arising.

The minutes of the previous meeting were agreed.

2. Part IA, A course: Ms Bui, who had been unable to attend the meeting, sent a report (attached) of a survey she had carried out. This report was discussed at the meeting and is summarised below.

Lecture Course: Dr Santos

The report showed that most people find the course to be medium paced, and most people are somewhat familiar with the material. A few people find Dr Santos' lecturing a little fast but he is clear so the material is usually understandable after review.

Most people agree that he is a good lecturer. He delivers the material in an engaging, enthusiastic and energetic way which helps people keep focused. His explanations are very clear and concise and people also appreciate the fact that he clearly points out and repeats key concepts to reinforce them.

The handouts consist of a printout of the slides for each lecture, and they are distributed a lecture at a time. Most people find that they are very clear and of a high standard. Some people would prefer to have a complete handout for the whole course or for a complete section (such as one for Matrix and one for Fourier series) rather than for individual lectures.

The students find it very helpful to see him going over examples from past tripos questions.

One highlight, commented on by a lot of people, is that he does encourage students to ask loads of questions throughout the class. Therefore, a lot of people are actually utilising his help: a lot of people come early or stay behind to get help with problems and get clarification as well as emailing him directly.

One small adverse comment was that he states a lot of things are simple although they may not be, making some students feel stressed if they don't understand something "trivial". The convenor commented that this was traditional, certainly in the Maths Tripos.

The students would appreciate it if the lecturer were to print out hard copies of the examples sheets.

Lecture attendance has been regular and most of the downstairs of the lecture hall is filled

3. Part IA, B course: Mr Brown reported.

Lecture Course: Professor Allanach

The rep had received no negative comments. The lecturer is not as charismatic as last term's, but is still engaging, and is audible and legible. He occasionally goes off the visualiser, but people point it out to him. The handouts are good, but there is not a lot of text in them.

In general the material is quite familiar as a lot of people have done matrices at A level (although those who have done the IB, like the course rep, haven't met them before). Suffix notation was unfamiliar to everybody. The pace is slower than the first term, but the first term's material was familiar. People have struggled a bit with eigenvectors, and some people are switching from the B course to the A course so they can do Fourier Series again.

The lecturer does do examples, but has only just started to do Tripos questions. At the time of the meeting he had finished the syllabus, and had two lectures left to devote to examples.

Attendance has been maintained, the room is half to two thirds full on weekdays but less than half full on Saturdays.

4. Part IB course: Mr Arouna reported.

Lecture course: Dr Wingate.

Broadly speaking people are happy with the course. The lecturer hands out detailed notes with gaps for them to fill in. He is audible and legible, and the visualiser in the Cockroft now works, which helps.

Most people were familiar with normal modes, but many people didn't enjoy the section on groups as the material was a big departure from usual. The two lectures on Representation Theory didn't seem to be very relevant, and as they are at the end of the course many people did not think it worth making the effort to understand them. The student rep commented that his Supervisor had made them go over this material last summer vacation.

The examples classes were well received, but the students thought the examples sheets were rather dense, and not many people actually attempted them.

The attendance is stable but less than last term.

5. Any other business.

The results of the second week questionnaires were not available in time for this meeting. The student reps confirmed that as the lecture handouts were very good they did not need to use books much, although the book by Riley Hobson and Bence did still come in useful both for IA and IB. They tended to look on line and use e.g. videos on You-Tube instead.

They also said that the students tended to work together, using social media, and that they had set up a Group Chat which had 250 people (the maximum) on it and was in constant use. CUSU sets up a Freshers' Facebook and most people opt in, so incoming students can communicate with each other and with current students.

There was a question as to why Maths counted for only 75 marks in the examinations whilst all the other subjects counted for 100. The Convenor attempted to outline the history of this, and those Committee members who are also on the Syllabus Committee agreed to enquire whether this was still appropriate.

The Committee thanked the student representatives for their efforts throughout the year and wished them well in their examinations.