

EXTERNAL EXAMINER ANNUAL REPORT FORM

Guidance notes are available to support the completion of this Report and are available at <http://learning.cf.ac.uk/quality/review/external-examiners/reports/>.

	For completion by External Examiner:		
Name of External Examiner:	Caroline Clewley		
Home Institution / Employer of External Examiner:	Imperial College London (Physics)		
Programme and / or Subjects Covered by this Report	MSc Physics MSc Compound Semiconductor Physics		
Academic Year / Period Covered by this Report:	2018-2019	Date of Report:	18 th November 2019

For completion by External Examiner in the spaces provided. Please extend spaces where necessary. **Please note this Form will be published online and should not make any reference to any individual students or members of staff.**

1. Programme Structure

The programme consists of two large core modules, one in the autumn term and one in the spring term, complemented by a range of elective modules which are shared with the undergraduate students, building up towards a research project in the summer.

The structure is suitable for the purposes of an MSc course. It is noted that the students enjoy having a wide range of modules to choose from in the MSc Physics course (although the choice is more limited in the MSc Compound Semiconductor Physics). However the fact that these are all designed for the undergraduate cohort remains a challenge, which is likely to be exacerbated by the growing number of international students in the MSc cohort. The undergraduate modules rely on prerequisites from within the Cardiff Physics undergraduate course, which are frequently only partially met by students with different backgrounds (e.g. different university / undergraduate course / country of origin). This has previously been most noticeable in the computing courses as many of the MSc students do not have any Python experiences, but this year it became clear, both from student results and discussion with the students during the external examiner's visit that this can also be problematic in the Physics content. The choices students make for their electives can fundamentally impact their experience on their MSc course (see further discussion in section 7).

2. Academic Standards

The elective exams have previously been seen by other external examiners and judged to be of appropriate academic standard. Having looked through the students' work I am satisfied that this is clearly the case. The number of credits of the electives seems to represent the workload well.

As in previous years, the core modules appear to be of an excellent standard and prepare the MSc students well for independent research.

3. The Assessment Process

The elective exams appear to be marked according to standard procedures. The core courses remain particularly noteworthy in their clear and transparent assessment criteria and well-aligned feedback strategy.

4. Year-on-Year Comments

The overall programme structure has remained similar year on year, though the core modules are continually updated and improved after evaluation and according to the needs of the changing student cohort. This responsiveness of the core modules is commendable: it is clear that issues that are raised in one year are normally addressed by a revision of the courses in the following year. For example, the module leads are adapting to the growing size of the student intake, which means that the courses remain sustainable for a larger cohort whilst the students still feel well supported. Another example is that the newly provided Python tutorials are particularly appreciated by students as being very helpful.

As in other years, the students value the true open door policy by the module leads greatly. However, as the cohort grows, this may not be sustainable. The proposed specific open door hours are therefore a good way of striking a balance.

5. Preparation / Induction Activity (for new External Examiners only)

N/A

6. Noteworthy Practice and Enhancement

The students remain very positive about the MSc course, particularly about the module leads' support and dedication which is unparalleled. This year there was also a specific mention about the fact that projects are co-negotiated by students early on in the course. This was viewed very positively – clearly the module leads have managed over the years to make this work very well. Students did ask if they could be given a list of staff member who they can approach, together with their research areas.

The core courses are seen as very useful and a great preparation for the projects. In contrast most of their concerns are about varying standards in electives, which are run by the undergraduate staff. It is recognised that it is unfeasible to design and

deliver a wide range of electives specifically for the MSc students. However, it is recommended that particular thought is put into how to prepare the MSc students for their elective modules, and appropriate support in decision making is made available. In discussion with the students, the following recommendations are suggested:

- Allow students access to elective modules materials as soon as possible (over the summer preceding the start of the course would be ideal; last year's materials would suffice with a disclaimer that courses can change year on year).
- Create a prerequisite courses spider diagram: show which courses rely on each other within the UG programme.
- Explicitly list prerequisites for each of the electives that MSc students can take, in terms of knowledge and skills (this can be based on intended learning outcomes of preceding courses).
- Schedule face to face sessions to support students in choosing options. For example, at the start of their course they could have a group information session specifically on choosing electives (what modules there are, where they can find prerequisites, what to consider when making a decision). It would be particularly helpful to have MSc alumni act as mentors to help students choose. This session can be followed up later by a 'options surgery' where students come to discuss their personal choice of electives.

7. Comments on the Examination of Master's Dissertations (External Examiners for postgraduate Master's Programmes only, see also 9.23-9.29 below)

Once again there is a good range of topics in the students' dissertation projects. The dissertations were of a high standard and mostly clearly written. In the few exceptions, this was clearly reflected in the feedback. As the intake of international students grows, English writing skills may become more of a problem (when students do not write clearly, the point of their project can get entirely lost in a report, which may unduly depress their overall dissertation mark).

8. Appointment Overview (for retiring External Examiners only)

N/A

9. Annual Report Checklist

Please include appropriate comments within Sections 1-8 above for any answer of 'No'.

		Yes (Y)	No (N)	N/A (N/A)
Programme/Course Information				
9.1	Did you receive sufficient information about the Programme and its contents, learning outcomes and assessments?	Y		
9.2	Were you asked to comment on any changes to the assessment of the Programme?	Y		
Draft Examination Question Papers				
9.3	Were you asked to approve all examination papers contributing to the final award?		N	
9.4	Were the nature, spread and level of the questions appropriate?	Y		
9.5	Were suitable arrangements made to consider your comments?	Y		
Marking Examination Scripts				
9.6	Did you receive a sufficient number of scripts to be able to assess whether the internal marking and classifications were appropriate and consistent?	Y		
9.7	Was the general standard and consistency of marking appropriate?	Y		
9.8	Were the scripts marked in such a way as to enable you to see the reasons for the award of given marks?	Y		
9.9	Were you satisfied with the standard and consistency of marking applied by the internal examiners?	Y		
9.10	In your judgement, did you have the opportunity to examine a sufficient cross-section of candidates' work contributing to the final assessment?	Y		
Coursework and Practical Assessments				
9.11	Was the choice of subjects for coursework and / or practical assessments appropriate?	Y		
9.12	Were you afforded access to an appropriate sample of coursework and / or practical assessments?	Y		
9.13	Was the method and general standard of assessment appropriate?	Y		
9.14	Is sufficient feedback provided to students on their assessed work?	Y		
Clinical Examinations (if applicable)				
9.15	Were satisfactory arrangements made for the conduct of clinical assessments?			N/A
Sampling of Work				
9.16	Were you afforded sufficient time to consider samples of assessed work?	Y		

		Yes (Y)	No (N)	N/A (N/A)
Examining Board Meeting				
9.17	Were you able to attend the Examining Board meeting?		N	
9.18	Was the Examining Board conducted properly, in accordance with established procedures and to your satisfaction?			N/A
9.19	Cardiff University recognises the productive contribution of External Examiners to the assessment process and, in particular, to the work of the Examining Board. Have you had adequate opportunities to discuss the Programme and any outstanding concerns with the Examining Board or its officers?	Y		
Joint Examining Board Meeting (if applicable)				
9.20	Did you attend a Composite Examining Board, i.e. one convened to consider the award of Joint Honours degrees?		N	
9.21	If so, were you made aware of the procedures and conventions for the award of Joint Honours degrees?			N/A
9.22	Was the Composite Examining Board conducted according to its rules?			N/A
Examination of Master's Dissertations (if applicable)				
9.23	Did you receive a sufficient number of Dissertations to be able to assess whether the internal marking and classifications were appropriate and consistent?	Y		
9.24	Was the sample in accordance with the University's sampling guidelines (guidelines provided below)?	Y		
9.25	Were you satisfied with the standard and consistency of marking applied by the Internal Examiners?	Y		
9.26	Were you able to attend the Master's Degree (Dissertation) Stage Examining Board?	Y		
9.27	If so, was the Examining Board conducted properly and in accordance with established procedures?	Y		
9.28	Were the schemes for marking and classification correctly applied?	Y		
9.29	Were the standards of the awards recommended appropriate?	Y		

Please return this Report, preferably in a Microsoft Word format, by email to:

ExternalExaminers@cf.ac.uk

Your fee and expenses claim form and receipts, should be sent electronically to the above email address or in hard copy to:

External Examiners, Registry, Cardiff University, McKenzie House, 30-36 Newport Road, Cardiff, CF24 0DE

SAMPLING OF TAUGHT MASTER'S DISSERTATIONS BY EXTERNAL EXAMINERS

External Examiners shall be expected to see prescribed numbers and ranges of Dissertations, but not to mark them, on the following basis:

At least 10% of Dissertations for a postgraduate taught Master's Programme, or a minimum of 10 (whichever is the higher figure) must be seen by the External Examiner(s). Where the total number is less than 10, all Dissertations must be seen by the External Examiner(s) #.

Dissertations seen by External Examiners should include examples from across the whole range of achievement (i.e. Pass with Distinction, Pass, Fail).

External Examiners will retain the right to see other Dissertations at random.

Where more than one External Examiner is appointed on a Programme, at least 10% of Dissertations, or a minimum of 10 (whichever is the higher figure), should be seen collectively by the External Examiners.