

Recommendations to Examiners on Drawing up Class Lists

This document describes the procedures for drawing up class lists for the Chemical Engineering Tripos. These procedures correspond to Faculty Board guidance because they have been approved by the Chemical Engineering and Biotechnology Syndicate. Examiners in the University of Cambridge have the right not to follow these procedures exactly provided they record the justification for all their decisions in the minutes of the meetings of Examiners.

Less formal Department guidance is available in a document entitled Chemical Engineering Tripos Examination Procedures.

1. The qualities and achievement expected for each class are defined to be:
 - 1 The candidate has a mastery of the fundamentals of the subject, and is able to analyse and solve standard and novel problems.
 - 2.1 The candidate has a generally sound grasp of the fundamentals of the subject, and is able to analyse and solve standard and novel problems with some success.
 - 2.2 The candidate is able to reproduce basic material, and is able to analyse and solve straightforward and familiar problems.
 - 3 The candidate is able to reproduce basic material.
2. The guidelines for the class boundaries are:

| Class | Mark |
|-------|-----------|
| 1 | ----- 70% |
| 2.1 | ----- 60% |
| 2.2 | ----- 50% |
| 3 | ----- 40% |
| Fail | |

3. The target for the average mark of the overall examination is 65%. This might be achieved by the following averages:
 - i. CET I: written papers = 63%; labs = 70%; exercises = 70%
 - ii. CET IIA: written papers = 64%; design project = 65%; exercises = 70%
 - iii. CET IIB: written papers = 65%; coursework = 65%; research project = 65%
4. In the event that the average raw mark for any component of the examination deviates significantly from the target mark, the Examiners are recommended to scale the marks of that component so that a suitable average mark is obtained.
5. The Examiners should ensure that candidates taking particular sections of an examination are not disadvantaged compared to those taking other sections.

6. The Examiners shall use their judgement to decide whether to change the class boundaries from those quoted in §2, taking into account the difficulty of the papers and projects. Examiners may find it helpful to consider:
 - i. any large differences between the marks of adjacent candidates in the order of merit,
 - ii. overall, but not individual, results of the candidates in previous examinations,
 - iii. the overall results in the same Tripos in previous years, and
 - iv. the proportion of candidates getting 1st and/or 2.1 classifications in previous years for related science and technology courses at the University of Cambridge.
7. Candidates achieving marks near a borderline should be considered individually. The papers of these individuals should be carefully scrutinised again, and the advice of the External Examiner may be sought. Account may also be taken of:
 - i. differences between candidates with regard to quality of performance in individual components (e.g. whether they obtained 1st class or very poor marks in individual components), and
 - ii. any coursework that does not directly contribute towards the examination mark if it reflects the candidate's application towards his or her studies (e.g. the CET I drawing and physical chemistry laboratory courses).
8. Candidates achieving a final mark lower than another should not be awarded a higher class, *i.e.* the classification list should follow the final order of merit.
9. The agreed class boundaries, the reasons for the decisions, and the proportion of candidates in each class, should be recorded in the minutes of the meetings of Examiners.

Approved by the Chemical Engineering and Biotechnology Syndicate

30 October 2014