Equal Opportunities; an analysis of taught postgraduate student performance for cohorts entering the College between 2006 and 2010

Introduction and methodology

1. This paper draws together information on student population and achievement, mainly gathered from data used for the annual review of taught postgraduate programmes. It seeks to examine trends relating to ethnicity, gender, disability and age; factors which are, or will be, implicated in equal opportunities legislation. Data are also examined relating to students’ domicile (or, more accurately, their fee-region - UK, Other EU and Overseas) since Equal Opportunities could equally well be applicable to students coming from overseas and, in any case with the large number of overseas students studying at PG level at Royal Holloway, this makes a substantial ‘minority’ interest group.

2. Data was used covering five entry cohorts, 2006 to 2010, (this was also the case in the equivalent analysis in the last five years, CBECC/07/48, CBECC/08/09, CBECC/09/09, CBECC/10/08 and CBECC/11/11). Comparison with national data is almost impossible since there are no freely available data relating gender, ethnicity and disability to student progression and achievement. Admissions are beyond the scope of this paper since data on applicants’ ethnicity, disability etc are not available - however, the College’s PGT population year on year can be examined for possible trends in admissions, although if there is a consistent bias against one particular sort of applicant, this would not be picked up by such an analysis.

3. Generally speaking, the data are analysed only at the lowest level of a single cohort in the whole College (sometimes all 5 cohorts are combined to give a sufficient sample size to make conclusions meaningful). Some of the analysis is also extended to Faculty level; however note that in general, individual departments/subject areas contain too few minority students in the categories analysed (eg non-white, overseas or disabled students) for analysis at this level of detail to have any great statistical validity. Conclusions in any case have to be tentative since only a full multi-variable analysis on a much larger sample of students could make them statistically sound.

4. For clarity, note that this report analyses postgraduate students studying at Masters level only. Thus, students on Graduate Diploma programmes are omitted since these programmes are at final year undergraduate level, even though the students themselves may be postgraduates. Similarly, students on undergraduate MSci programmes are omitted even though the final year of these degrees are at Masters level. Students on MA/MMus/MBA/MSc programmes are all included, as are those studying for Postgraduate Diploma or Certificate degrees. Students studying on CAPITAL or inSTIL, or at the
University of London Institute in Paris have been omitted for convenience. As with the similar papers on undergraduate student performance, head-counts are used rather than FTEs. Lastly note that, as with the undergraduate student analysis, students are grouped by entry cohort.

5. Since PGT programmes are, virtually without exception, single-stage, analysis of performance focuses on the outcome achieved by students at the end of their study and, to a lesser extent on analysis of the recorded reason for withdrawal for students who fail to complete (ie whether they failed or left for other reasons). No attempt has been made to identify Part-Time students in the data set, although this is a possible area where the study might be expanded in future should resource be made available to improve the data warehouse currently in use. Also note that, in the current data set, there is no record of number of attempts made by students to pass their programme. With the recent pilots of Autumn resits of taught courses in the School of Management, this is an area into which this study could expand in.

Postgraduate student population and benchmark data

6. Overall at PGT level, relatively few students ultimately fail to gain any sort of award- only ca 8-10 % of students in a given cohort Withdraw, and less than 1 in 3 of those students actually fails. Examination of achievement profiles for the most recent cohort (2010) is rather distorted by the large number (nearly 1 in 3) of students who are still Incomplete- this number comprises not only students who failed to gain an award at their first attempt but also those studying part-time, those who interrupted or deferred and those whose programme of study spans more than one academic year (eg MSc Social Work, PGDip Cognitive Behavioural Therapy, MA Screenwriting (Retreat)). Fairer profiles are typically obtained by excluding Incomplete students, implicitly assuming they will perform to a similar level to those who have already completed (this is probably a reasonable approximation, unlike at UG level where most Incomplete students have failed their first attempt and therefore are more likely to withdraw ultimately).

7. Thus, of students who have a final outcome recorded, typically 12-15 % are awarded a Distinction, 19-22 % Merit and 52-59 % a simple Pass (this latter category including lower exit awards such as PGDip or PGCert). As noted above, a little under 1 in 10 students fail to gain any sort of award, and of these, only ca 30 % actually fail. More than half the remaining withdrawn students do not have an informative leave reason recorded on Banner- “Written off after time” being the most common.

8. At Faculty level (noting here that, since the students concerned entered in 2010 or earlier, the old faculty structure is still in use), it is noteworthy that in HSS students are far more likely to be awarded a simple Pass than they are in the other two faculties (up to 70 % of completed students against 40 or 50 % in Arts and Science) but no more likely to withdraw. These profiles are almost certainly partly caused by discipline differences on mark profiles (since similar effects are seen in UG classification profiles), but the large number of overseas students in HSS cannot be ignored (and this will be explored below). One should also note that, generally, students need to gain a certain mark in all taught courses to be awarded a Merit or Distinction at PGT level and that many programmes in Management (in particular) have a large number of small sized course units which may hinder some students from achieving the higher awards. Since no data are available on individual marks or number of attempts at course units, this statement cannot be properly quantified.
9. The proportion of UK-domiciled PGT entrants has gradually fallen over the past five cohorts from just under 43% to just under 40%. Generally speaking, just under half the intake originates from outside the EU with around 10% coming from other EU countries (although this last figure increased significantly in 2010). There is an extremely uneven distribution of such students by Faculty - whereas up to 2/3 of students in HSS come from outside the EU, the same proportion in Arts are UK-domiciled. Generally speaking, a significant proportion of students in each cohort are from HSS - in 2009, there were more than in the other 2 faculties put together. However, 2010 saw a drop of almost 200 HSS entrants (with the other two faculties barely affected, although even so there are still 50% more PGT students in HSS than Science and nearly 3 times as many as there are in Arts) and this fact should be born in mind when examining College-level trends - we have already seen the effect on the proportion of Other EU students above.

10. This last point has almost certainly affected the College data on declared ethnicity - the proportion of non-white entrants fell appreciably from 2009 to 2010. Since over 80% of entrants in HSS are non-white, the link is obvious. In both 2009 and 2010, almost 1 in 5 PGT students failed to declare their ethnicity (compared with 5-8% in the preceding 3 cohorts). This has an obvious impact on monitoring equal opportunities with respect to ethnicity, all the more so since these students are, disproportionately, from outside the EU (up to 65% of the non-declarers are from this fee-region) and therefore likely to be mainly non-white. As has been alluded to, entrants from outside the EU are over 80% likely to declare themselves non-white (contrasting with UK students who are over ¾ of white origin and other EU entrants where as few as 1 in 20 declare themselves non-white).

11. The gender balance of PGT entrants has tended to hover around 50:50 for the last few years, with females in a small majority (much smaller than that found at UG level). The gender balance by fee-region and at faculty level tends to vary quite significantly year to year, although there are obvious consistencies being maintained, for instance the large majority of female entrants in Arts and male students in Science.

12. ‘Mature’ entrants (here defined according to the HESA criterion of being 25 or over) make up approximately 40% of a typical intake. This is a much larger proportion than that found at UG level (ca 7% of entrants 22 and over); though one might question whether students in their mid-twenties really are very different from those who progress to PGT study straight after their first degree. Mature entrants have come increasingly to be concentrated in Science - 60% of entrants in this faculty in 2010 were over 25; closer examination of the data shows that these students are highly concentrated on programmes in Information Security and Clinical Psychology (as well as those who took the PGDip Applied Petroleum Geoscience FT during 2010-11), many of which have either recently been validated or who have increased their intake over the past couple of years. By contrast, it is much rarer for non-EU students to be older - typically between ¼ and 1/3 of these entrants will be over 25.

13. Around 5% of PGT entrants declare themselves disabled, little more than half the proportion of undergraduates that do. Whether there are genuinely fewer disabled PG students, or whether those with specific learning difficulties (which represent up to half the declarers) are less likely to declare themselves as there are fewer formal examinations at PGT level, is unclear.
**Analysis of achievement related to ethnic origin**

14. It has been noted in equivalent analyses in previous years that non-white PGT students are significantly more likely to fail to complete their programme than white students; and also more likely to be awarded just a Pass rather than Merit or Distinction. This gap has been shown to exist whether one examines College as a whole or looks at UK-domiciled students in isolation (thus eliminating some potential problems arising from factors relating to difficulties with language or with studying far from home). This may be seen explicitly in Fig. 1 - over time, non-white students tend to be rather more likely to withdraw without completing their programme and are much less likely to be awarded a Distinction (and rather less likely to gain a Merit). Encouragingly, the gap was rather narrower in 2010; although this is made more noticeable by the particularly poor performance of non-white students in 2009. One should also note that significantly more non-white students from the 2010 cohort are still Incomplete.

![Fig. 1](image)

**Fig. 1:** Outcome by declared ethnicity and cohort for *UK-domiciled* PGT students entering between 2006 and 2010. Incomplete students, and those who failed to declare their ethnicity, are excluded.

15. It would be premature to ascribe these differences to some sort of bias or prejudice. For example, UK-domiciled ethnic minority students may well enter with a lower average level of prior achievement or be more likely to come from homes where English is not the first language - both of which are impossible to quantify with the data available. It is also the case that non-white UK students are not evenly distributed across the faculties - in 2010, over 30% of HSS UK entrants were non-white with the corresponding figure in Arts being below 10%. It has already been noted (8 above) that HSS students are far more likely to be awarded a bare Pass than students in other faculties; so these facts are not inconsistent with what is seen in Fig. 1.
If one examines students who withdraw, it can be seen that white students are far less likely to have done so owing to academic failure than are their non-white peers (Fig. 2). Note however that, even over 5 cohorts, this graph represents 36 white and 20 non-white students in total so the evidence is scarcely compelling; although a similar ratio is found when looking at all students, whatever their domicile.

**Fig. 2**: Withdrawal reasons by declared ethnicity for UK domiciled PGT students in cohorts 2006-10 combined. Students who failed to declare their ethnicity are excluded. Percentages are of students who withdrew.

**Achievement related to student domicile (fee-region)**

Student achievement profiles by fee-region are shown in Fig. 3. Although there is little, if any, difference between the profiles of UK and other EU students from the past two years (and this is repeated for the preceding three years, as shown in the Appendix), there is a significantly lower level of achievement displayed by students from outside the EU, with almost 30% more Pass awards at the expense of Merits and Distinctions. The percentage of students withdrawing is actually not much higher than that found for UK-domiciled entrants (although those that do withdraw are a lot more likely to have failed). To a large extent, these profiles do fit in with the distribution of students - PGT students in HSS tend to be awarded more Passes and fewer Merits/Distinctions and this faculty is where most non-EU entrants are found. However, even within each faculty (Fig. 4-5 cohorts combined to ensure a sufficient sample size), there is evidence of under-achievement by non-EU students.
**Fig. 3:** Outcome by fee-region for PGT students in cohort 2009-10. Incomplete students excluded.

**Fig. 4:** Outcome by faculty and fee-region for PGT students in cohorts 2006-10 combined. Incomplete students excluded.
18. Although this is not a direct equal opportunities issue (except insofar as the vast majority of these students are non-white), there are clear issues about students who pay the highest level of fees under-achieving which in turn may well lead to additional student appeals and/or complaints. Moreover, non-EU students are concentrated in certain departments/schools and on certain programmes, thus disproportionately placing this burden of under-achievement on those departments.

**Student achievement related to gender**

19. Fig. 5 shows PGT student achievement profiles by gender, demonstrating few, if any, significant differences. As with UG profiles, there is some tendency for males to score more ‘good’ passes but equally to be more likely to withdraw, but the effect is less marked than that found at UG level. Unlike at UG level, male PGT students who withdraw are not more likely to have done so owing to academic failure than are female students, in fact slightly less if anything. There are thus no great matters of concern with respect to gender.

![Outcome for PGT students by gender and cohort, 2006-10. Incomplete students excluded.](Image)

**Fig. 5:** Outcome for PGT students by gender and cohort, 2006-10. Incomplete students excluded.

**Student achievement related to declared disability and age on entry**

20. Mature entrants are rather more likely to withdraw than ‘normal’ aged entrants but otherwise their overall level of achievement is at least as high and arguably higher (Fig. 6). Mature entrants are significantly more likely to be awarded a Distinction or Merit. With regard to withdrawals, although overall levels are higher, the percentage of them that are due to academic failure is much lower (just over half the rate) when compared to younger entrants- mature students are far more likely to be transferred to another HEI which is a ‘good’ method of withdrawal as far as the students are concerned.
Fig. 6: Outcome for PGT students by age on entry and cohort, 2006-10. Incomplete students omitted.

21. There are so few declared disabled PGT students that year-on-year comparison is pointless. A consolidated summary over 5 cohorts (Fig. 7) once again shows a rather higher level of withdrawals among disabled students but also rather greater achievement at the top end of the scale. There is no real matter for concern, although year by year fluctuations cannot be detected because of the tiny sample size.

Summary

22. To a large extent, conclusions follow those in previous year’s reports. Namely that there is no discernable difference in performance between the performance of disabled and non-disabled PGT students (especially given the small number of the former) and that mature students perform at least as well as ‘standard’ entrants, indeed achieving more top grades and being less likely to fail (albeit more likely to withdraw for other reasons).

23. There are minor differences by gender, mirroring trends seen at UG level but to a much lesser degree. Thus male students are more likely to withdraw (but those that do are no more likely to have failed than are female students) but those that complete their programme are more likely to be awarded the highest grades. This may well reflect the bias in these students’ programmes of study since this is a pattern typically seen in Science subjects.

24. A matter of some concern may be that students from outside the EU perform worse than UK- or EU-domiciled students, being rather more likely to withdraw and significantly more likely to be awarded a Pass rather than Merit/Distinction. Although this, to some extent, follows the classification pattern of the Faculty in which most of these students study, it is still a matter for some concern (see 18 above).
The area of most concern, as previously, is the performance of non-white students. Even examining UK students only (to mitigate the concerns noted above over the performance of non-EU students), there is a clear performance gap between them and their white peers. Over time, non-white students have been seen to be rather more likely to withdraw without completing their programme (and to have done so for reasons of failure rather than other reasons) and are much less likely to be awarded a Distinction, and rather less likely to gain a Merit. The gap does appear rather narrower for the 2010 intake when compared to previous years and it is to be hoped that this will carry forward to future cohorts. This analysis also ignores any effects of prior achievement (which in any case are difficult to quantify at PGT level) which may or may not be implicated in these observations.

A full set of figures has been produced as an Appendix to this paper; these are intended for information and as a starting point for potential additional investigations. These include benchmark data showing the performance of the student population as a whole with respect to overall performance and withdrawal.

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