Department for Business Innovation & Skills

Acknowledgments

This report, written by Dr Andrew McCulloch and colleagues at the Higher Education Careers Service Unit (HECSU), builds upon the Futuretrack study undertaken by researchers at the Institute for Employment Research at the University of Warwick, led by Professor Kate Purcell.

Established in 1972, the HECSU is an independent research charity specialising in higher education and graduate employment. We seek to support careers advisory services as they guide students and graduates through university and into postgraduate education and the labour market.

We aim to:

- improve the dissemination of information about higher education and graduate employment

- contribute to knowledge of student and graduate career development and employment by conducting and commissioning research

- work with careers advisers, academic staff, and employers to support graduate employability

We are indebted to the Department for Business, Innovation and Skills for its continuing support of the Futuretrack study; in particular to Charles Ritchie and Jane Carr whose comments during the drafting of the report have been invaluable.

Contents

List of figures and tables

Executive Summary

HECSU was commissioned by the Department for Business, Innovation and Skills (DBIS) to undertake an analysis of factors associated with dropout from higher education (HE) using data from the Futuretrack study. Futuretrack is a longitudinal four-stage study of all people who applied in 2005/06 via UCAS to enter full time higher education in the UK during the autumn of 2006. Data has been collected at four stages, the first as prospective students made applications to higher education in 2006, the second approximately eighteen months later, a third in 2009 / 2010 as most were approaching their final examinations and the fourth in 2012 between eighteen and thirty months post-graduation, when most of the study cohort had either entered the labour market or were undertaking postgraduate study or training.

Factors Associated with Dropout from HE

Previous research studies have shown that a range of demographic and socioeconomic characteristics are associated with drop out from HE. The results of this study also found that multiple factors were associated with the probability of leaving HE during the first year of study:

- Students with parents who worked in either routine or semi-routine occupations were more likely to have dropped out than those with parents who worked in professional and managerial occupations.

- Students with parents who had not been to university were more likely to have dropped out than those with parents who had a university education.

- Students who had lower levels of educational achievement on entry to university were more likely to have dropped out than those with higher levels of achievement. Students with a tariff score of less than 240 points were approximately twice as likely to have dropped out in comparison to students with a tariff score of 360 points or higher.

- Students who were older when they entered HE were more likely to have dropped out. The relationship between dropout and age was, however, attenuated slightly for the oldest age group (26 years and older).

- The dropout rate varied across different subjects. The highest rates of dropout were found for students who had studied either mass communication and documentation, creative arts & design or education while the lowest rates of dropout were found for students who had studied medicine and dentistry.

- Students from the North East, North West, Wales and Northern Ireland had the highest rates of drop out while those from Eastern England, the South East, South West and London had the lowest rates of drop out.

- Students who were at institutions with the highest entry requirements had a lower rate of drop out in comparison to those at institutions with lower entry requirements.

Reasons for Dropping out

- Reasons for drop out were for the most part not a response to the cost of HE, although around a fifth of students who dropped out mentioned this as one of the reasons. The most common reasons given by students for dropout were either 'personal' or that they were unsure what they wanted to do. Around a fifth of students who entered HE said they had dropped out because they decided they didn't want to go to university.

- Reasons for non-entry to HE were, however, somewhat different. More than a third of respondents who had not entered HE mentioned 'costs' or not wanting to 'incur debt' whilst just over a quarter mentioned that they didn't know what they wanted to do or didn't want to go to university.

Dropout and Sources of Advice Used in Applying to HE

- The study was interested in any evidence for the mechanisms through which factors, such as the respondent's family background, might have influenced dropout from HE. In particular, the study examined the relationship between dropout and both the number of sources of advice used by the respondent in applying to HE and the respondent's ratings of the degree to which they had found different sources of career advice helpful. The results showed that both factors were associated with dropout from HE with those respondents who were least satisfied with career guidance and those who had used the lowest number of sources of advice in applying to HE being more likely to have dropped out than remaining respondents.

Labour Market Outcomes of HE Dropouts

Previous Futuretrack reports have not examined separately the longer-term labour market outcomes of respondents who did not enter or who dropped out of HE.

- Respondents who had dropped out of HE had less positive labour market outcomes than respondents who had obtained a degree. In particular, respondents who had completed HE had significantly higher employment rates, were more likely to be working in professional and managerial jobs and had higher levels of pay than respondents who had dropped out of HE.

- Students who had dropped out of HE also had less positive outcomes than those who had applied to but not entered HE. Students who dropped out had an employment rate of around 60 per cent, significantly lower than that of respondents who had either not entered or who had completed HE (around 75 per cent).

- Students who completed a degree had better paid jobs than those who had not entered HE. Students who had dropped out of HE and who were in employment were paid less, however, than those who either had complete HE or who had not entered HE.

- The study findings on labour market outcomes should be treated with caution because of the relatively low response rate among respondents who had dropped out of HE or who had not entered HE. The study provides evidence, however, on what is so far a little researched area.

Most important factors associated with drop out for young entrants

- The report used a series of regression analyses to examine which factors had an independent association with the probability of dropout from HE. The results showed that among young entrants to HE (i.e. those aged under 21 years), the respondents' prior level of academic achievement explained the higher odds of dropout for respondents from disadvantaged family backgrounds. Socio-economic background was no longer significantly associated with the probability of dropout from HE after taking into account the academic achievement of students from different backgrounds.

- The results also showed that students who had used fewer sources of advice in applying to HE and those who gave less positive ratings of career guidance were more likely to have dropped out of HE than remaining respondents after adjusting for other factors.

- Whilst important questions remain about the processes influencing student outcomes, the results support interventions which seek to raise achievement and provide increased career guidance and advice to students prior to applying to university.

1 Introduction

This report was commissioned by the Department for Business Innovation and Skills (BIS) following the publication of the fourth (and final) stage of the Futuretrack study in November 2012. The main aim of the report is to investigate the characteristics of respondents (i.e. age, socioeconomic group, subject discipline, ethnicity, family circumstances, prior attainment and type of institution attended) who did not complete higher education (HE). The research questions that have guided the work are:

- What are the characteristics of respondents who do not complete or do not begin HE?

- Are there discernible patterns of timing for non-completion or non-progression?

- What are the reasons for dropout/non-progression by socioeconomic characteristics?

- What are the career- or learning-related outcomes of those who do not complete or do not progress into HE?

These questions are significant for a range of reasons. The number of students who are not in HE at the end of their first academic year is used as a performance indicator for the efficiency of HE institutions by funding bodies (Draper and Gittoes 2004; HESA 2013). Students are most likely to leave HE during the first year of study and a high rate of dropout suggests that institutions may not be using the available resources of time and money in the most efficient manner. From the perspective of the institution, students who do not complete their course also represent a loss of fee income. Dropout from HE is also important, however, from the viewpoint of equity or fairness. Previous studies have shown that students from disadvantaged family backgrounds are more likely to dropout of HE than those from more affluent family backgrounds (Davies and Elias 2003, Christie *et al*. 2004, Thomas and Quinn 2006, Powdthavee and Vignoles 2009). In many instances dropout may be a consequence of factors that are preventable while not completing HE is likely to have a negative effect on students' future level of labour market attainment given the lack of well-paid jobs for people who do not have degree level qualifications.

The results of previous research studies and administrative data provided by institutions to the Higher Education Statistics Agency (HESA) are useful in illustrating the range of demographic and socioeconomic characteristics associated with dropout from HE. The proportion of students in England who left HE during the first year of study has recently fallen from 9.2 per cent in 2003/04 to 7.4 per cent in 2010/11 (HEFCE 2013). Figure 1 shows how the dropout rate has varied for men and women and for young (less than 21 years) and mature entrants (aged 21 years and over) over the last several years. The figure shows that although the overall proportion of students dropping out of HE during the first year has recently fallen, differences in dropout between men and women and between young and mature entrants have remained relatively stable. The proportion of men leaving HE during the first year has remained around 2 percentage points higher than that for women over the

period, with 9.2 per cent of men and 7.4 per cent of women leaving HE during the first year in 2010/11. The difference between the proportion of young and mature entrants leaving HE has narrowed somewhat over the period. The proportion of mature entrants leaving HE has remained significantly higher than that for young entrants, however, with 6.3 per cent of young and 11.6 per cent of mature entrants leaving HE during the first year in 2010/11.

Figure 1 Proportion of entrants not in HE after one year by gender and age on entry (HEFCE 2013). Figures are for students in England.

In administrative data the variation in dropout between students from different socioeconomic backgrounds is measured using information on whether students attended a state or private school and whether they live in a low participation area. Residence in a low participation area is measured using the POLAR (or Participation of Local Areas) index which uses the proportion of the population aged 18 who entered higher education in each electoral ward as a measure of educational disadvantage. Figure 2 shows how the dropout rate has varied over the period since 2003/04 for students from state and independent schools and across quintiles of the POLAR index for young full-time first degree entrants. The figure shows that the dropout rate during the first year for students from independent schools has remained around three percentage points higher than that for students from state schools over the period considered with 7.1 per cent of students from state schools and 3.7 per cent of students from independent schools dropping out in 2010/11. The figure

also shows that residence in an area with a low level of participation in higher education is a factor influencing dropout from HE. In 2010/11, 9.1 per cent of entrants from areas in the bottom quintile of the index dropped out of HE before the end of the first year compared to 4.9 per cent of entrants from areas in the topmost quintile.
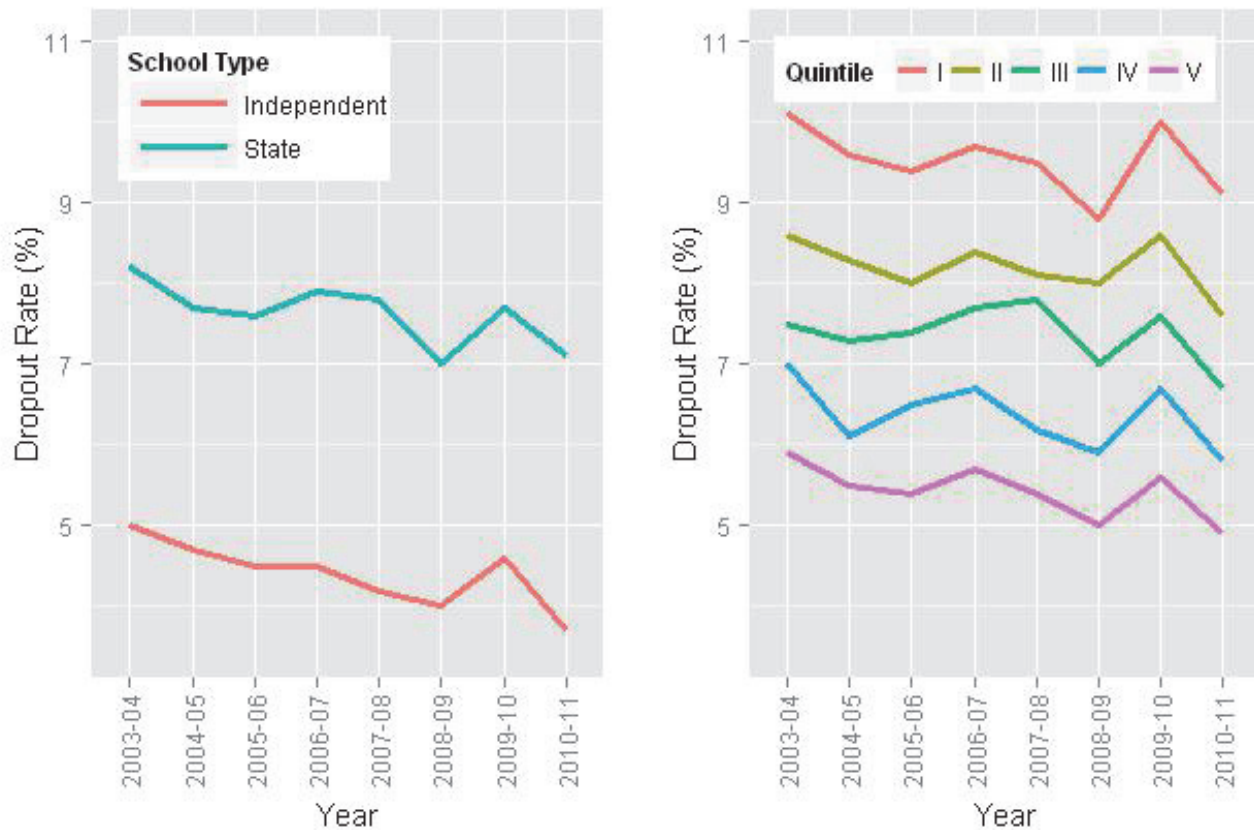
Figure 2 Proportion of entrants not in HE after one year by type of school attended and by quintile of POLAR index for young entrants (HEFCE 2013). Figures are for students in England.

While research has shown that demographic and socioeconomic characteristics are associated with dropout from HE, less is known about the mechanisms through which these factors exert their effects on student's decisions. The introduction of student fees has led to concern about the impact of the costs of attending HE on students from disadvantaged family backgrounds. Previous studies of the reasons for dropout have shown, however, that financial considerations are not the main factor leading students from less well-off families to leave HE. Rather the higher rate of dropout among students from less well-off family backgrounds may be explained by the cumulative effect of a range of factors including poor choice of course, inaccurate expectations of student life and negative perceptions of the university environment (Harvey, Drew and Smith 2006; National Audit Office 2007; Purcell *et*

12

al. 2009a). These factors are not independent of student's family characteristics (Crozier *et al*. 2008). In particular, students from less well-off families often do not have the sources of support and advice (e.g. from family, teachers, career professionals) available to students from better-off families. In consequence, they may be more likely to make an inappropriate choice of course when applying to university and have more difficulties establishing routines conducive to academic success than students from better-off families.

In this study we distinguish between the family background of students and the more immediate or proximal factors through which family background might influence dropout from HE. In particular, the pathways followed by students into HE are highly stratified according to students' prior level of academic achievement and we examine whether the prior achievement of students represents a pathway influencing differences in the rate of dropout between students from different family backgrounds. The data used in the study also contain, however, information on a range of factors such as career attitudes and the sources of advice and guidance used by students in applying to HE. Previous studies suggest that similar factors are associated with dropout from HE and the study considers the extent to which, and whether, these factors also contribute to the association between family background and the probability of dropout from HE.

The remainder of this report is organised as follows. The next section introduces the survey data used in the study and is followed by a brief review of the findings of previous studies using the data. The report then presents a descriptive analysis of the association between the different types of transition made by respondents between stage 1 and stage 2 of the Futuretrack study and the individual characteristics of the respondent (age, gender, ethnicity, prior level of academic achievement), their family background characteristics (parental occupation and parental education) and the HE context (subject of study and type of institution). The analysis distinguished between respondents who completed the year in HE, did not complete the year in HE, didn't enter HE and deferred entry to HE. This section of the report also examines whether factors such as career attitudes and sources of advice and guidance used by the respondents in applying to HE are related to the different types of transition made by respondents. The variation in the labour market outcomes following HE of respondents who made different types of transition is also examined. The report then uses a series of regression analyses to examine whether the family background of the respondent is associated with the probability of dropout from HE and whether any association is independent of the individual characteristics of the respondent, such as prior academic achievement, and more proximal factors such as sources of advice and guidance used in applying to HE. The report then concludes with a brief discussion.

2 Description of Futuretrack Respondents

Futuretrack is a longitudinal four-stage study of all people who applied in 2005/06 to enter full-time university courses in the UK during the autumn of 2006. The initial invitation to participate in Futuretrack was sent to all 2005/2006 UCAS applicants (N = 506304). The cohort has been surveyed on four occasions: summer 2006 (stage 1), summer / autumn 2007 (stage 2), autumn 2009 / 2010 (stage 3) and winter 2011 / 2012 (stage 4). The stage 1 online survey achieved a sample size of 121368 responses, a response rate of 23.9 per cent, comparable to that reported by previous postal surveys of graduates in the UK. Respondents who were domiciled outside the UK have been omitted from the analyses, however, leaving a sample size for analysis of 105816 responses. The attrition rate from the survey has been relatively high, however, with only around 30 per cent of the previous stage's respondents answering the survey at the following stage. Attrition from the study and the calculation of survey weights are further discussed in Appendix A. The study was not designed specifically to examine factors associated with dropout and non-progression into HE. The study has attempted, however, to collect information from students who did not complete HE and students who applied but did not enter HE as well as students who did proceed to HE.

At each stage respondents have been asked to choose the best description of their experience of HE since 2006. For example, at stage 2 the survey asked,

"Please tell us which of the following statements best reflects what happened next, as far as higher education was concerned: I have completed a year in higher education as a full-time student, I started but did not complete the year as a full-time higher education student, I accepted a deferred place to start to start a course in Autumn 2007, I deferred entry to reapply to enter higher education in autumn 2007, and I did not enter higher education and have no immediate plans to do so".

The responses provided at each stage can be used to describe the pathway followed by respondents through HE. Figure 3 shows the most important stage-to-stage transitions made by the cohort members who responded at stage 1 together with the number of respondents and the transition rates between different states. The transition rates are calculated using the number of respondents who remain in the survey from the previous stage as the denominator (e.g. the transition rate from full-time education at stage 2 to full-time education at stage 3 is given by 13604 / (29512 - 15122) = 0.945.

The standard path through HE is for students to enter and complete their course without interruption. This was the path followed by the majority of respondents in Futuretrack. At stage 2 the large majority of respondents had completed the year in HE (81.3 per cent). A significant number of respondents had deferred entry (12.2 per cent) but the number of respondents who had dropped out of or chosen not to enter HE was relatively low (3.6 and

2.6 per cent). The dropout rate in Futuretrack is significantly lower than the dropout rate recorded by HESA for this cohort (9 per cent, HESA 2009) reflecting the particular difficulty of maintaining contact with respondents whose experience of HE may not have been positive, and whose continued participation in the study was voluntary.

The number of respondents recorded as having dropped out of HE at the stage 3 and 4 surveys is significantly lower than at the stage 2 survey. The majority of respondents who had completed the year in HE at stage 2 were still in HE at stage 3 (n = 13604) while only a minority had dropped out of HE since stage 2 (n = 269). At stage 4 only a very small number of respondents who had been in HE at stage 2 and stage 3 had dropped out of HE following the stage 3 survey.

While the majority of students completed their course without interruption, pathways through HE are diverse. A relatively high proportion of respondents (n = 305, 64.8 per cent) who had dropped out of HE between stage 1 and stage 2 had returned to HE between stage 2 and stage 3. The number of respondents in this group is relatively small in the Futuretrack study, however, due to the high level of attrition at stage 3 among respondents who had dropped out of HE at stage 2. In comparison to those respondents who had dropped out of HE at stage 2, respondents who had not entered HE at stage 2 were less likely to subsequently enter HE. At stage 3 only 34.8 per cent of those respondents who had not entered HE at stage 2 had moved into HE between stage 2 and stage 3.

The respondents at stage 1 of the Futuretrack study were linked to their UCAS application and information provided on the university application has been added to the dataset (Purcell *et al*. 2009a). Respondents who entered the Futuretrack study at subsequent stages were not linked to their UCAS application and the study is restricted to respondents who provided data at stage 1. The information from UCAS is itself incomplete, however, and a substantial number of respondents were missing information particularly for the institution and subject of study. Variables from the Futuretrack dataset selected for analysis because of their possible association with dropout from HE were gender, age at entry to HE (18 years or less, 19-20 years, 21-25 years, 26 years and over), ethnicity (Asian, Black, White, Mixed, Other), prior level of educational achievement (UCAS tariff score: non-standard, less than 240, 240 to 359 or greater than 360 points), parental occupation (professional and manual, intermediate, routine and manual, NA/missing), parental educational qualifications (whether the respondent had none, one or two parents who had been to university), subject of study and type of HE institution. In analyses, respondents with missing information on parental educational qualifications were grouped with those who did not have a parent who had been to university. The study uses the highest lowest entry tariff categorisation of institutions (Purcell, Elias and Atfield 2009) rather than mission groups to describe different types of HE institution, partly because membership of mission groups has changed during the Futuretrack studies and partly because entry tariff provides a mechanism more closely aligned with government policies on admissions.
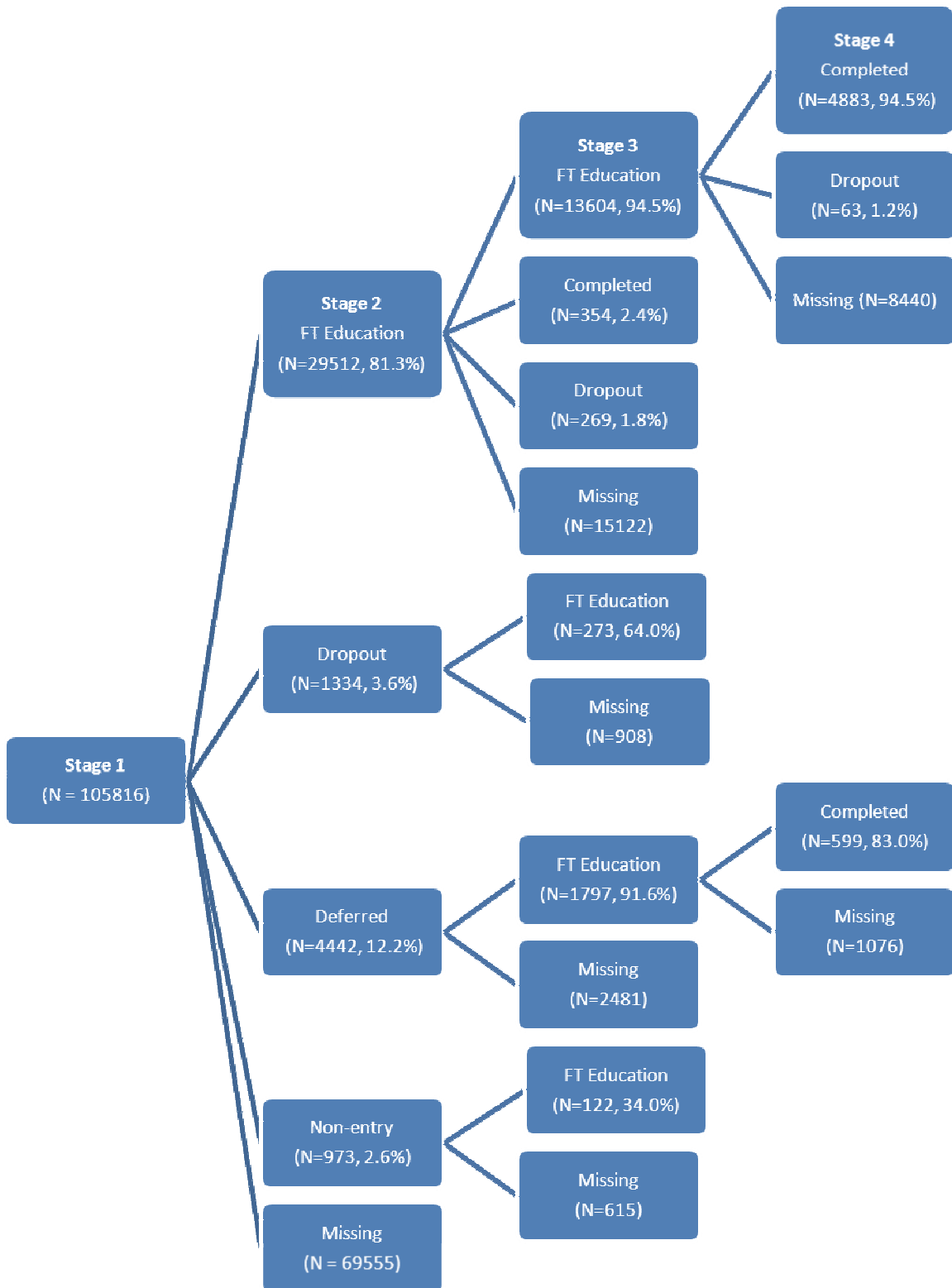
Figure 3 Most important transitions in Futuretrack

3 Previous Findings from Futuretrack Study

The reports detailing previous findings from the Futuretrack study can be found on both the HECSU website and the Institute for Employment Research website at the University of Warwick. The type of transition made by respondents between the stage 1 and stage 2 survey were discussed in the Stage 2 report (Purcell *et al*. 2009). The report found that demographic characteristics such as age, gender and ethnicity did not strongly distinguish respondents who made different types of transition between stage 1 and stage 2. Respondents with high levels of prior academic achievement were more likely, however, than those with low levels of prior academic achievement still to be in HE at stage 2. The report found that the occupation of the respondents' parents was only weakly associated with the probability of dropout from HE with 4 per cent of respondents with parents from routine and manual occupations, 3.5 per cent with parents from intermediate occupational backgrounds and 3 per cent with parents from managerial and professional backgrounds dropping-out during the first year. In comparison, whether the respondent had a parent who had been to university was a more significant factor related to dropout from HE with around 60 per cent of respondents who left HE during the first year having parents who did not have a degree. The subject of study and type of institution were further factors associated with the type of transition made by respondents. The subjects with the highest proportion of students starting but not completing a year in HE were science combined with social science and mass communication and documentation both with dropout rates of around 6 per cent while there was an inverse association between the average tariff score required for admission to an institution and the dropout rate.

The information collected at stage 1 helped to identify some of the main factors underlying the different types of transitions made by respondents. The relationship between the career attitudes of the respondent at stage 1 and the type of subsequent transition showed that cost had been a deterrent to entering HE. The financial aspects of HE were not as important a factor for respondents who had dropped out of HE, however. The report found that:

> "Students who entered HE but then left were most likely to say that they had personal reasons or that they had been disappointed with their experience of HE, but most were planning to reapply in the near future for courses or institutions they thought they would prefer." (Purcell, *et al*, 2009, p 177)

The importance of careers advice and guidance for decisions about HE was also suggested with the report finding that:

> "Students who had changed courses and those who had entered HE but left, as well as those applicants who applied to enter HE but did not end up doing so perceived that they did not have enough information in making their original choices. They were less likely than students who had remained on the same course they started in

Autumn 2006 to say they had all the information they required about HE courses, and more likely to say that they needed more help deciding which course to study." (Purcell, ibid)

The stage 2 report also compared the outcomes of respondents who had not entered HE and those who had dropped out of HE. The report showed that the majority of respondents were in employment at the time of the survey. Respondents who had not entered HE were, however, more likely to be working full-time, and in higher level jobs in comparison to those who had dropped out of HE. In particular, the proportion of respondents who had not entered HE who were working in managerial and professional occupations was around twice that of respondents who had entered but not completed the year in HE.

The previous reports have not examined specifically the longer-term labour market outcomes of respondents who did not progress to HE or who dropped out of HE. The stage 4 report did examine, however, the outcomes of respondents who had not completed a degree. The report showed that overall non-graduates were slightly more likely to be employed than graduates although the gap could mainly be explained by the number of graduates undertaking further study. In addition, non-graduates were being paid less in their current job than graduates with over 50 per cent of non-graduates earning less than £18,000 per year.

In this report our approach has been to amplify what is already reported and to provide further detailed analyses. As many of the socioeconomic characteristics and early employment outcomes of those who failed to complete or did not start HE have been identified, there remains an opportunity to probe into the views held and prior learning and support provided to applicants.

4 Descriptive Analysis

The first question examined in this report concerns the characteristics which distinguish respondents who made different types of transition between stage 1 and stage 2 of the survey. The study does not consider factors associated with dropout following the first year of the study due to the limited number of respondents who dropped out of HE at later stages. The type of transition made by the respondent was defined using the responses to the question about experience of HE since 2006 asked at stage 2. The analysis distinguished between respondents who completed the year in HE, did not complete the year in HE, didn't enter HE and deferred entry to HE. The respondents who deferred entry may either have accepted a deferred place or chosen to reapply to enter HE. The report tabulates the frequencies of different transitions for a range of respondent characteristics and attitudes collected as part of the stage 1 survey. The main interest is in whether there are significant differences in the characteristics of respondents who made different transitions. The analyses use information from all respondents and the number of cases may vary between analyses due to missing data.

4.1 Individual Characteristics

Previous studies have shown that dropout is associated with the demographic characteristics of students. Futuretrack was no exception. Figure 4 shows how the type of transition between stage 1 and stage 2 varies according to the respondent's age, ethnicity, gender and prior level of academic achievement. Detailed tables are given in Appendix C (Tables 1 to 4). The normal pattern is for young people either to enter HE immediately after leaving school when they are usually 18 years of age or to defer entry to HE for a year. Figure 4 shows that in comparison to respondents in older age groups respondents who were aged 18 years and under were more likely to have deferred entry to HE (15.0 per cent). The figure also shows that there is a positive gradient in the probability of not progressing to HE with increasing age with 1.5 per cent of respondents aged 18 years and under but nearly 7 per cent of respondents aged 26 years and over not having entered HE. As expected from previous studies, the survey found that mature students (those who are aged 21 years or over) had a higher rate of dropout in comparison to students who entered university when they were under 21 years of age. Figure 4 shows that there is a positive gradient in the probability of dropout with increasing age although this was attenuated slightly for the oldest age group (26 years and older).
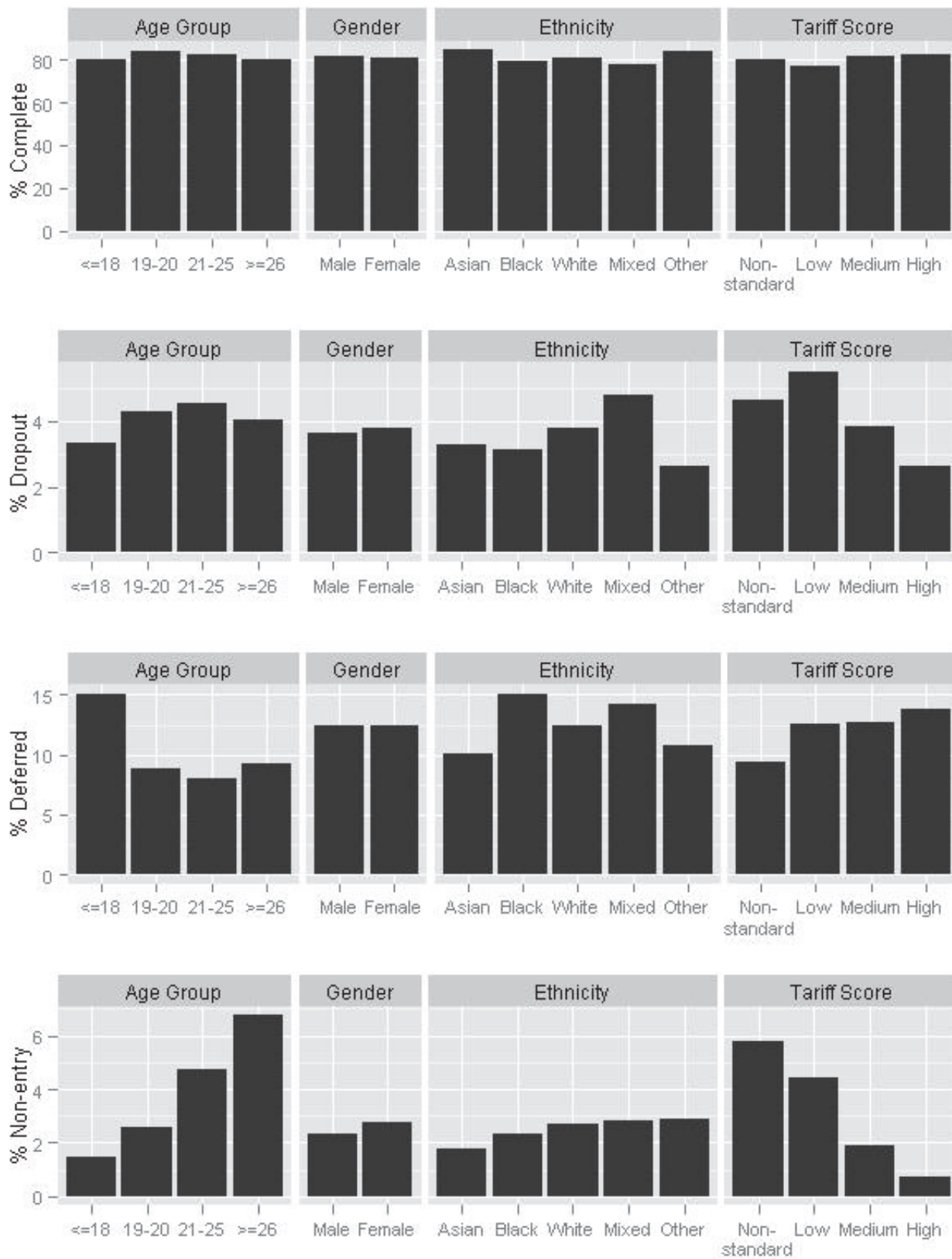
Figure 4 Respondent age, gender, ethnicity and prior qualifications and transitions between stage 1 and stage 2

Previous survey reports have shown that the stage 1 respondents were not representative of the population of UCAS applicants in terms of gender with women making up over 60 per cent of the sample. The proportions of men and women making each transition are, however, broadly similar. The most significant gender difference in the transitions made by respondents is that women were slightly less likely than men to have deferred entry to HE (Figure 4). The figure also shows that the probability of dropout varies between respondents from different ethnic groups with respondents from Black and Other backgrounds having the lowest probability of dropout and respondents from Mixed backgrounds the highest probability of dropout. The number of respondents from non-White ethnic groups who dropped out of higher education was not large, however. The proportion of respondents who deferred entry to HE also varied with the respondent's ethnic background. In particular, the proportion of respondents from Black backgrounds who deferred entry to HE is notably higher than that of the remaining ethnic groups with over 15 per cent of respondents from Black backgrounds having deferred entry to HE.

Previous studies have shown that the individual student's level of prior academic achievement is a significant factor associated with the risk of dropout from HE with students who have lower tariff scores having a higher risk of dropout. Figure 4 shows how the probability of making each type of transition varies according to the level of prior academic achievement achieved by respondents. The figure shows that there is a significant relationship between the prior academic achievement of respondents and subsequent transitions with 5.5 per cent of respondents with low prior levels of achievement dropping out in comparison to 3.8 per cent of respondents with medium and 2.6 per cent of respondents with high levels of achievement. The figure also shows that there is a negative gradient in the proportion of respondents who did not go on to enter university with increasing level of prior achievement with respondents with non-standard tariff scores having the highest probability of not entering HE (5.8 per cent).

Figure 5 (Appendix C Table 5) shows the family characteristics of respondents who made different types of transition between stage 1 and stage 2. The figure shows that respondents who did not progress to HE were more likely than remaining respondents to have dependent children or adult dependents living with them. For example, 8.3 per cent of respondents who did not progress to HE lived with an adult dependent in comparison to 3.1 per cent of respondents who completed the year in HE.
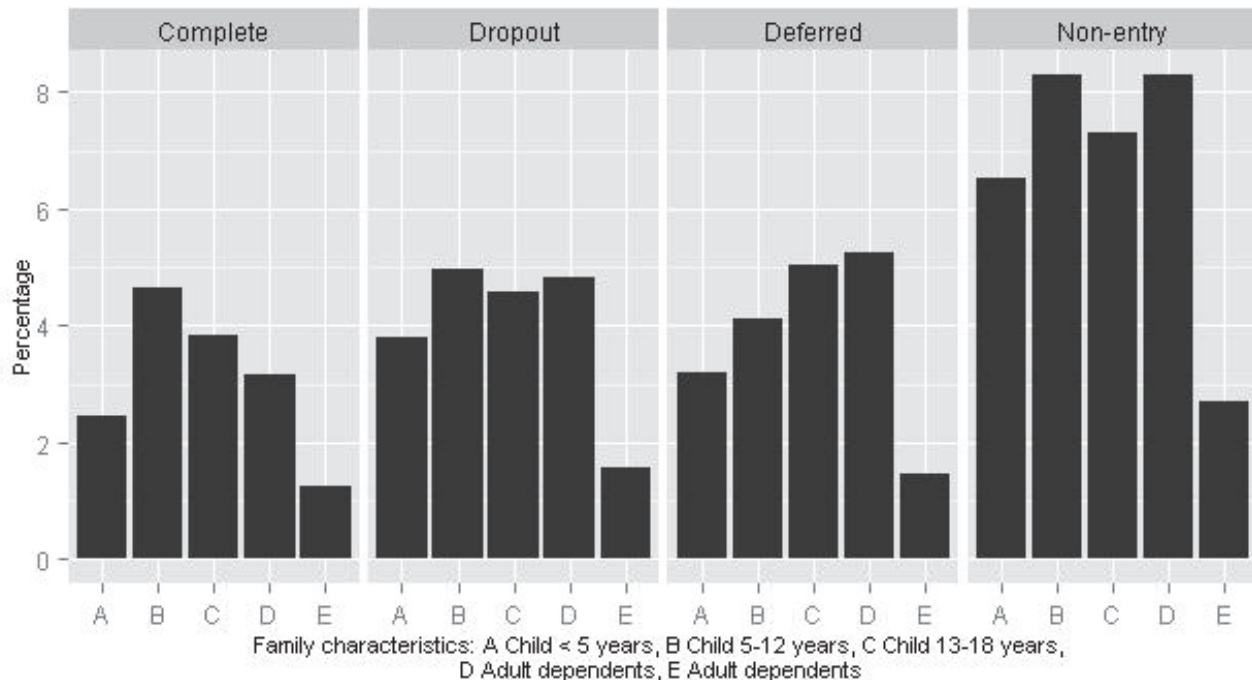
Figure 5 Transitions between stage 1 and stage 2 and respondent family characteristics

Statistics from HEFCE (www.hefce.ac.uk/whatwedo/wp/ourresearch/polar) show that there are broad regional differences in the probability of students going on to HE with the lowest proportion of students going on to HE in the North East and Yorkshire and Humberside. Figure 6 (Appendix C Table 6) shows how the proportion of respondents making each transition between stage 1 and stage 2 varies with region. The figure shows that respondents resident in the North East, North West, Wales and Northern Ireland had the highest probability of dropout and respondents from Eastern England, the South East, South West and London the lowest probability of dropout. The figure also shows that respondents from the South East and South West were more likely than remaining respondents to defer entry to HE while respondents from Merseyside and Northern Ireland were most likely not to have entered HE.
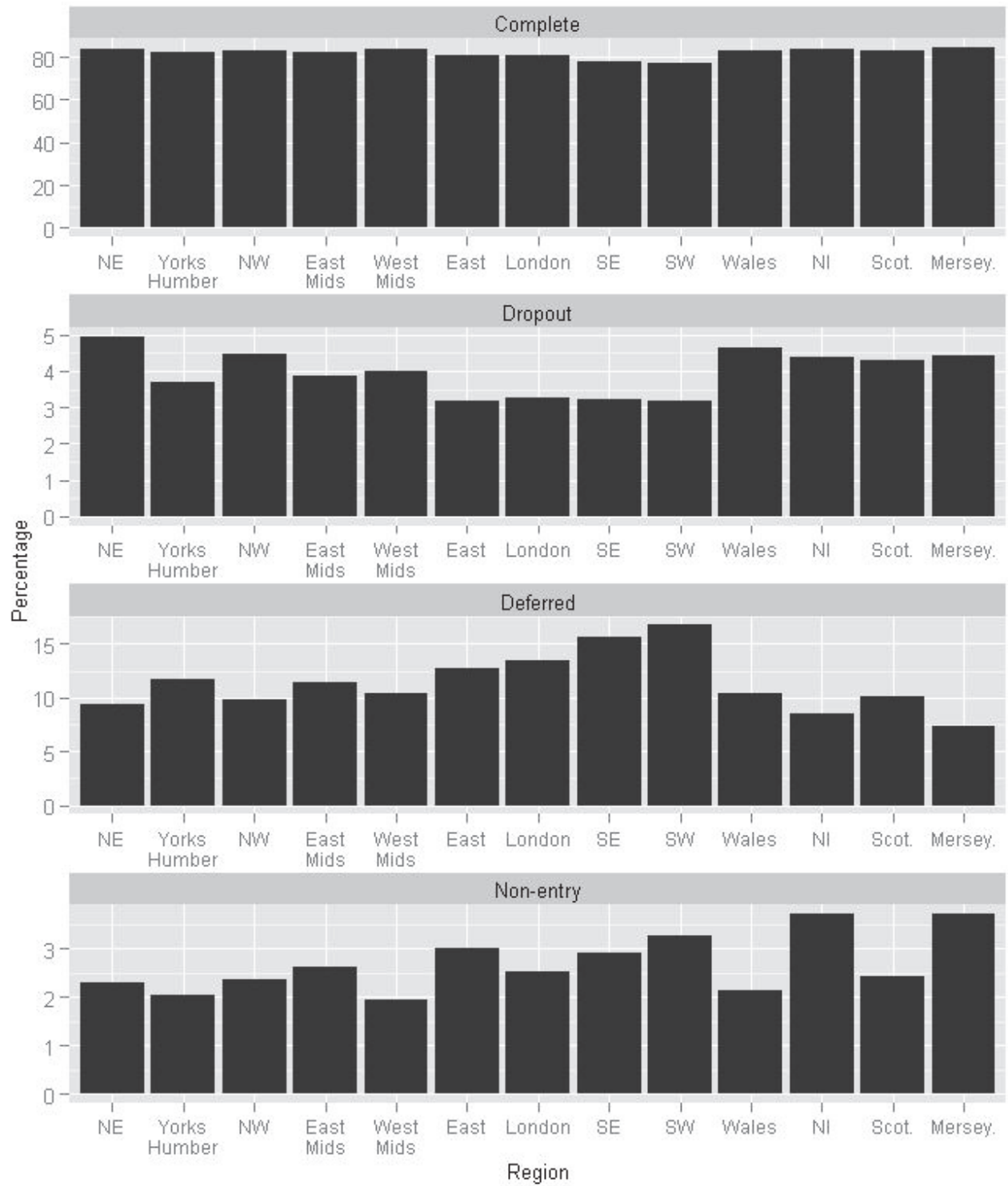
Figure 6 Region of residence and transitions between stage 1 and stage 2

At stage 1 respondents were asked,

"In terms of your own views about your strengths and weaknesses, how do you rate yourself in the following areas: written communication, spoken communication, numeracy skills, computer literacy and self-confidence?" with response categories excellent, very good, good, adequate and not very good.

Figure 7 (Appendix C Table 7) shows the proportion of respondents who made each type of transition and who assessed their skills and abilities as either adequate or not very good on each dimension. The figure shows that the majority of respondents gave positive reports of their skills and abilities. Respondents who dropped out of HE between stage 1 and stage 2 were more likely than respondents in the remaining groups, however, to state that they had low self-confidence, numeracy and spoken abilities with nearly 30 per cent of respondents who dropped out between stage 1 and stage 2 reporting that their level of self-confidence was less than good. There was no reported difference in the levels of computer and written skills between respondents who dropped out and those who made other types of transitions.
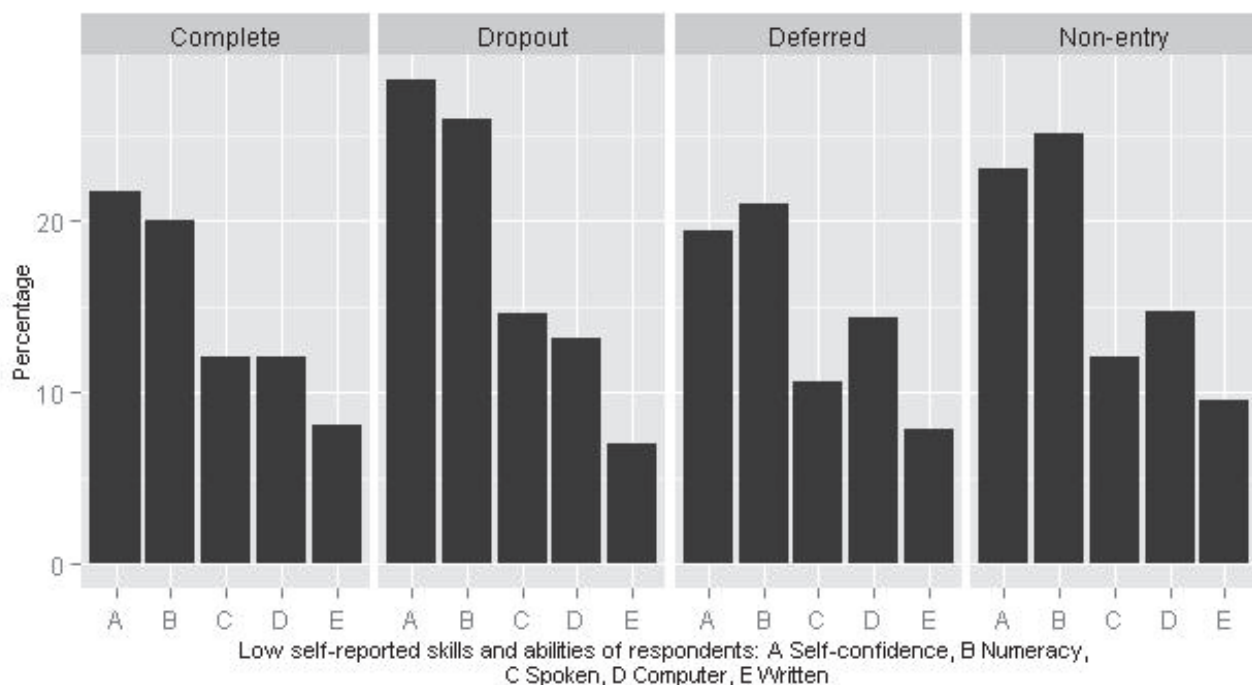
Figure 7 Transitions between stage 1 and stage 2 and respondent self-reported skills and abilities

4.2 Socioeconomic Background

Previous studies have examined how the probability of going to university varies according to socioeconomic characteristics, such as parental occupation and parental educational qualifications, but have tended to pay less attention to what happens to students from different backgrounds once they enter university. Figure 8 shows how the type of transition made by respondents between stage 1 and stage 2 varies with parental occupation and the

level of education of the respondent's parents. Detailed tables are given in Appendix C Tables 8 and 9.

Figure 8 shows that respondents who had parents in managerial and professional occupations were less likely to have either dropped out of HE or not entered HE in comparison to remaining respondents. The figure also shows a marked positive gradient in the probability of deferred entry to HE with the occupational status of the respondent's parents with around 14 per cent of respondents with parents in managerial and professional occupations having deferred entry to HE compared to around 10 per cent of respondents with parents in routine and semi-routine occupations.
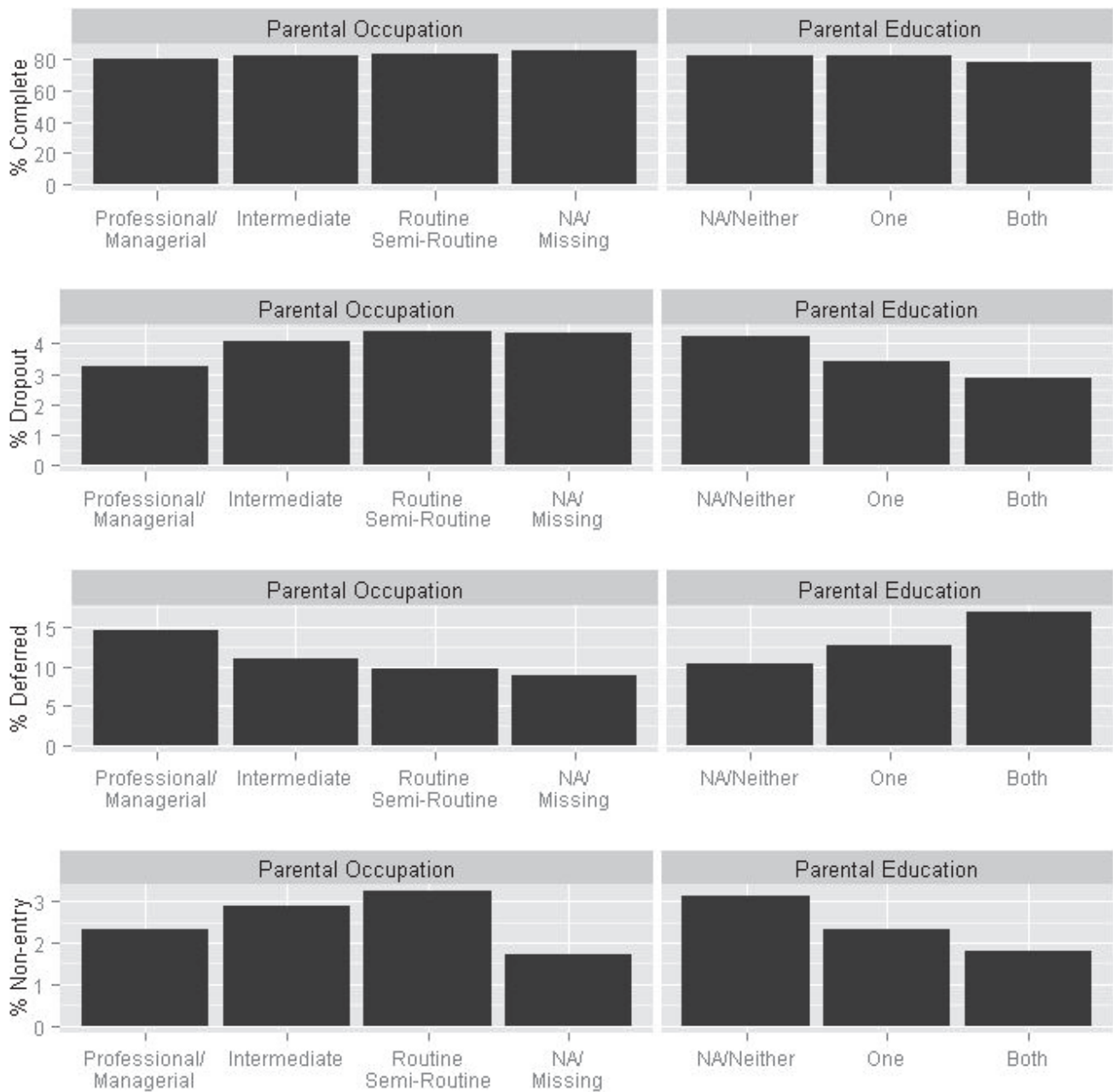
Figure 8 Parental occupation and parental education and transitions between stage 1 and stage 2

The probability of making different types of transition was also influenced by the educational qualifications of the respondent's parents. Figure 8 shows that there is a negative gradient in the probability of dropout with increasing levels of parental education with the probability of dropout varying from 4.2 per cent for respondents who did not have a parent who had been to university to 3.3 per cent for respondents who had one parent and 2.8 per cent for respondents who had both parents who had been to university. Figure 8 shows that the probability of not progressing to HE also has a negative association with parental education while the probability of deferred entry to HE has the opposite association with parental

education with those respondents who had two parents who had been to university having a higher probability of deferred entry to HE in comparison to those who did not have a parent who had been to university.

The proportion of applicants from non-state schools who are admitted to an institution has been used widely as an indicator of the social selectivity of different institutions. In particular, a small number of institutions (e.g. Cambridge and Oxford Universities) have much higher proportions of students who attended non-state schools in comparison to remaining institutions. Figure 9 (Appendix C Table 10) shows the relationship between the type of pre-HE establishment an applicant had linked to in their UCAS application and their transitions between stage 1 and stage 2. The table shows that the probability of respondents dropping out between stage 1 and stage 2 varies with the type of school attended, with the probability of dropout varying from 2.5 per cent for respondents who had attended grammar schools to 4.8 per cent for respondents whose previous institution had been a further/higher education institution. The table also shows that respondents who had been to independent schools have a much higher probability of deferring entry to higher education (19.7 per cent) in comparison to remaining respondents.
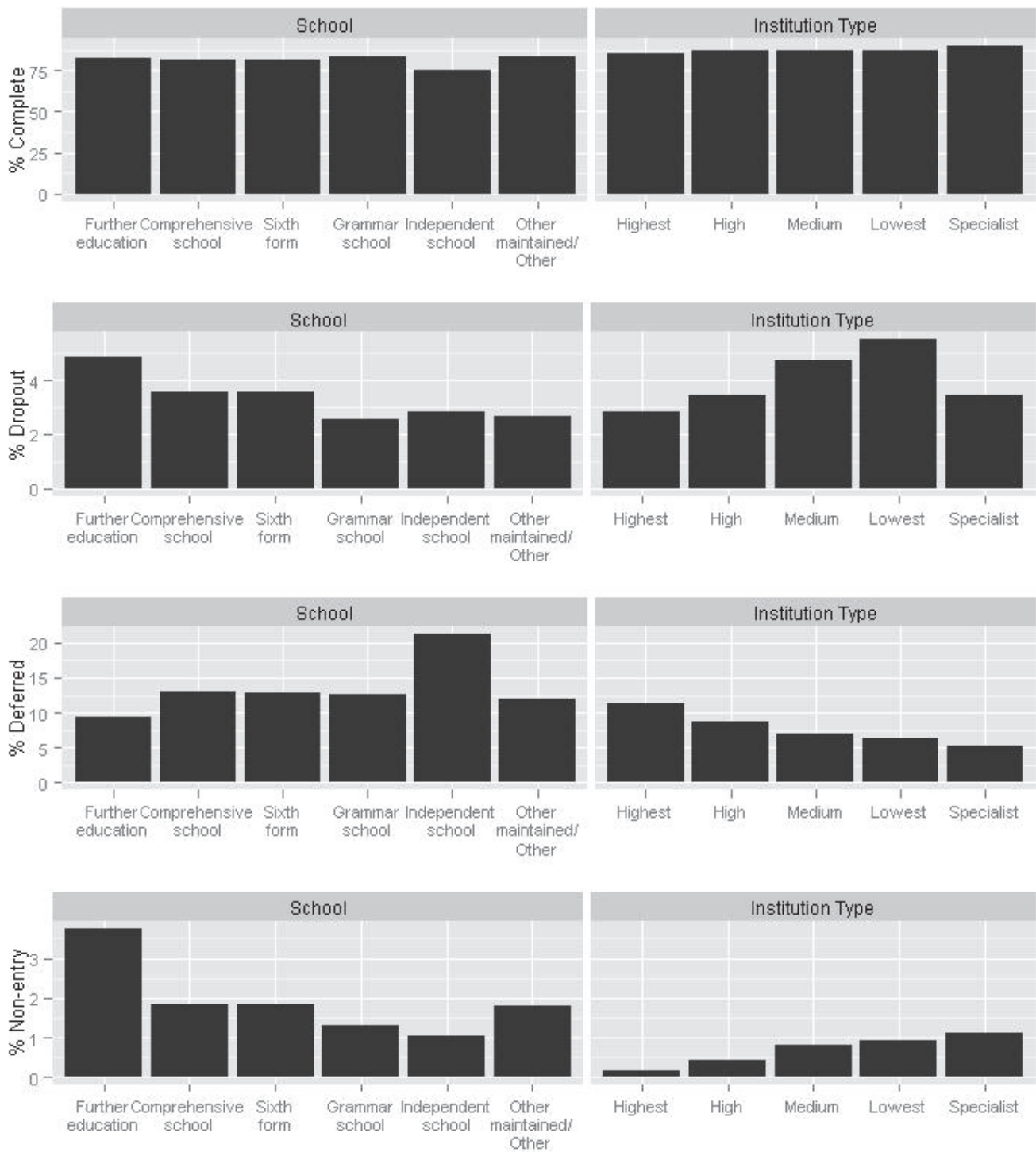
Figure 9 Type of previous educational establishment and type of HE institution and transitions between stage 1 and stage 2

4.3 Institution Factors

Previous studies have shown that the type of HE institution attended by a student is associated with the probability of dropout. Figure 9 (Appendix C Table 11) shows the relationship between the average entry tariff score of students at the HE institution attended by the respondent and transitions between stage 1 and stage 2. The figure shows that respondents at institutions in the highest tariff category had a lower probability of dropout (2.8 per cent) in comparison to respondents at institutions in the high (3.4 per cent), medium (4.7 per cent) and low categories (5.2 per cent). The type of institution was also associated with the probability of the respondent deferring entry to HE with the probability of deferred entry varying from around 11 per cent at institutions in the highest tariff category to around 7 per cent at institutions in the lowest tariff category. Insufficient information was available on the types of institution for respondents who did not go on to enter HE to allow interpretation of variation in non-entry to HE by type of institution.

Studies of dropout from HE have often assumed that the correspondence between student's motivation and ability and institutions' academic and social and characteristics is the most important factor influencing the probability of dropout. In the UK, studies which have examined the experiences of students from different backgrounds at different types of institution have suggested that students from disadvantaged family backgrounds have particular difficulty in adapting to university life at more prestigious institutions (Harvey, Drew and Smith 2006, Crozier *et al*. 2008, Rose-Adams 2013). Figure 10 (Appendix Table 12) shows how the probability of dropout for respondents with parents from different occupational backgrounds varies across different types of institution. The figure shows that respondents with parents who worked in routine and semi-routine occupations had a higher rate of dropout than those with parents who worked in professional and managerial occupations at all types of institution. The variation in the number of respondents from different backgrounds at different types of institution makes it difficult to judge, however, whether the association between parental occupation and the probability of dropout varies across the different types of institution. In a logistic regression model with dropout as the dependent variable, the interaction between parental occupation and institution type was statistically non-significant ($\chi2 = 14.54$, $p = 0.26$). The association between parental occupation and dropout does not therefore appear to vary significantly across the different types of institution.
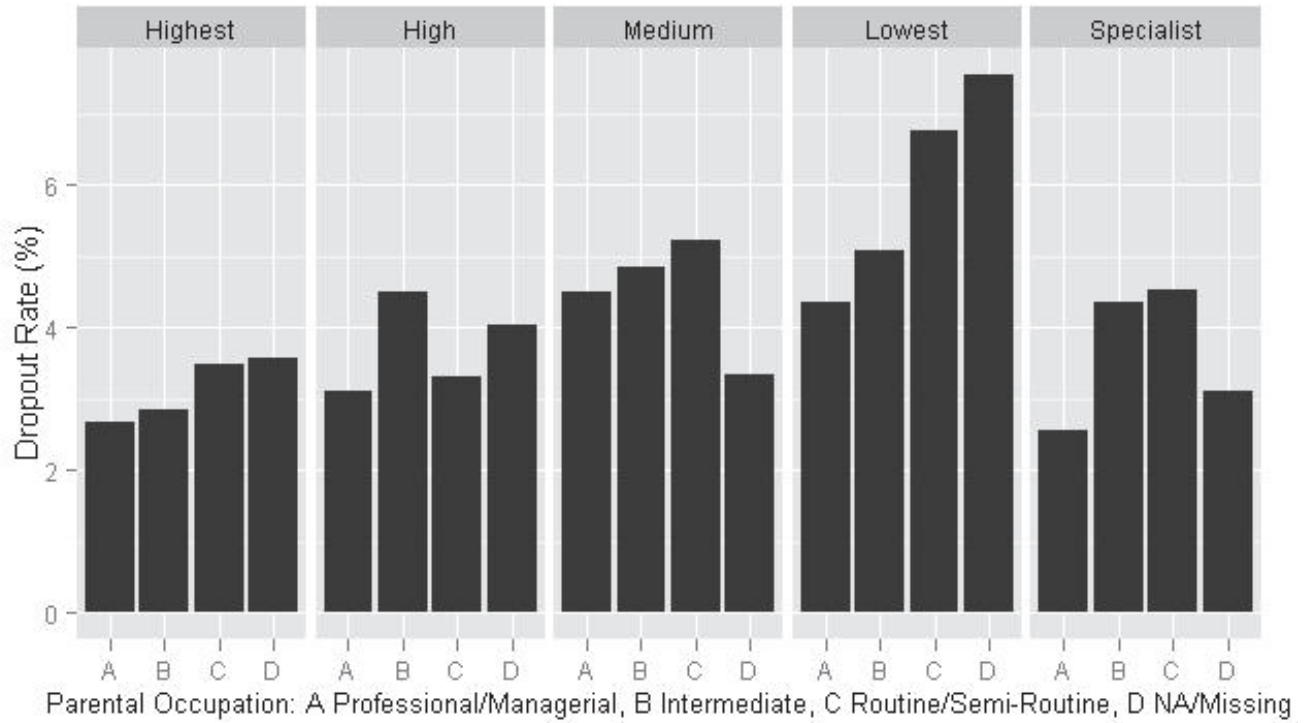
Figure 10 Probability of dropping out between stage 1 and stage 2 by parental occupation and institution type
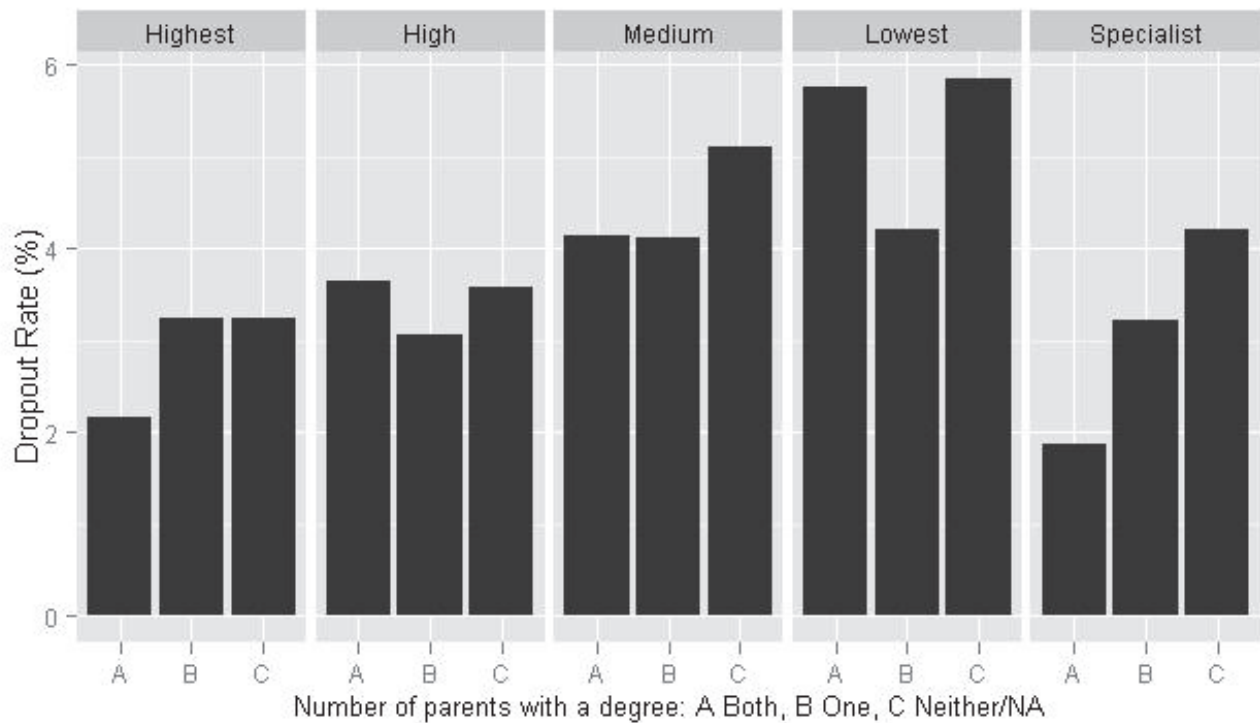
Figure 11 Probability of dropping out between stage 1 and stage 2 by parental education and institution type

Figure 11 (Appendix C Table 13) shows the corresponding results according to whether the respondent's parents had been to university. The figure suggests that respondents with two parents who had been to university were less likely to dropout of HE than those who did not have a parent who had been to university although similar proportions of respondents without a parent and with two parents who had been to university had dropped out at institutions in the high tariff and the lowest tariff categories. The results of a likelihood-ratio test ($\chi2 = 11.6$, $p = 0.16$) again showed, however, that the association between parental education and the probability of dropout did not vary significantly across the different types of institution.

The information provided on subject of study is reasonably complete for respondents who did go on to enter HE in 2006. Figure 12 (Appendix C Table 14) shows how the proportion of respondents who dropped out of HE between stage 1 and stage 2 varies across different subjects. The subjects which had relatively high rates of dropout include: mass communication and documentation, creative arts & design and education. Of those, only dropout from creative arts & design is likely to be of any substantive importance because of the relatively small number of respondents in the other subjects. The subject with the lowest rate of dropout was medicine and dentistry.
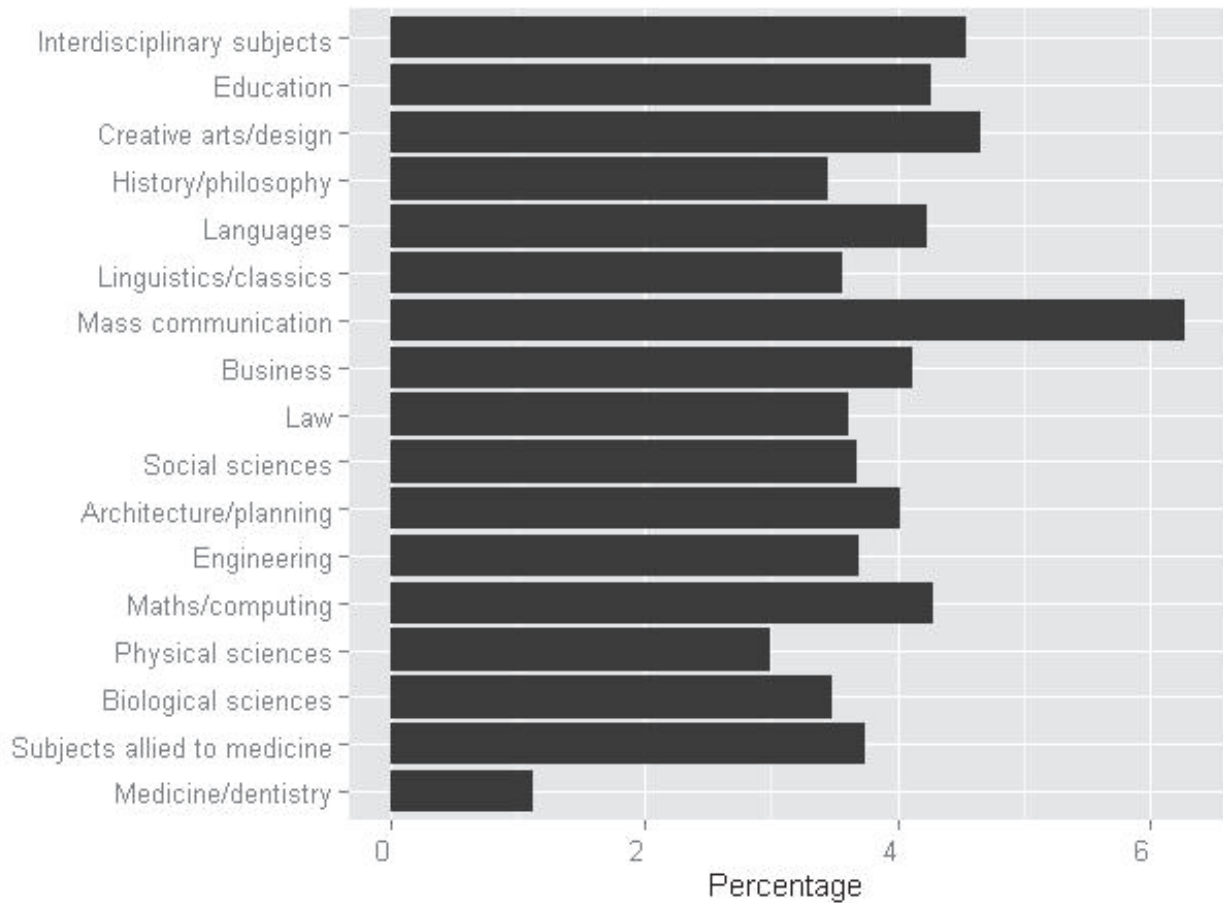
Figure 12 Probability of dropping out of HE between stage 1 and stage 2 by subject

4.4 Proximal Influences on HE Transitions

The differences in transitions between stage 1 and stage 2 made by students with different characteristics have a range of interpretations. In order to help interpret the results we also look, therefore, at the relationship between the type of transition made by the respondent and responses to a range of information collected at stage 1 concerning career attitudes, sources of advice used in applying to HE and career advice and guidance. Previous studies suggest that similar factors are associated with dropout from HE and they may indicate the mechanisms through which differences in family background influence the probability of dropout.

4.4.1 Career Attitudes

At stage 1, respondents were asked a set of 11 questions concerning their attitudes to HE and the labour market. Following exploratory analysis the responses to five questions were chosen to measure the respondents' career attitudes. The questions were: a higher education qualification is a good investment, for most good jobs a degree is essential, education is valuable in its own right and not just as preparation for employment, one of the main benefits of higher education is the opportunity for extra-curricular activities and being a

higher education student provides opportunities for personal growth and independence. The responses ranged from 'strongly agree' scored 1 to 'strongly disagree' scored 5 (Appendix C Table 15).

Only a small minority of respondents disagreed or strongly disagreed with the statement that higher education was a good investment and almost all respondents recognised the advantages of university, not only in terms of getting a job but in terms of opportunities for personal growth and development (Appendix C Table 15). Unsurprisingly, however, those respondents who had not entered HE were most likely to have disagreed with statements concerning the positive benefits of HE.

For respondents who either completed the year or dropped out of HE, Figure 13 shows how the odds of dropout changes across the response categories for each question. The figure shows that respondents who stated that they either disagreed or strongly disagreed with each question have a higher odds of dropout in comparison to respondents who stated that they strongly agreed. The odds of dropout is particularly marked for the question 'A HE qualification is a good investment' with those respondents who stated that they strongly disagreed having an odds of dropout more than 3 times those of respondents who strongly agreed.
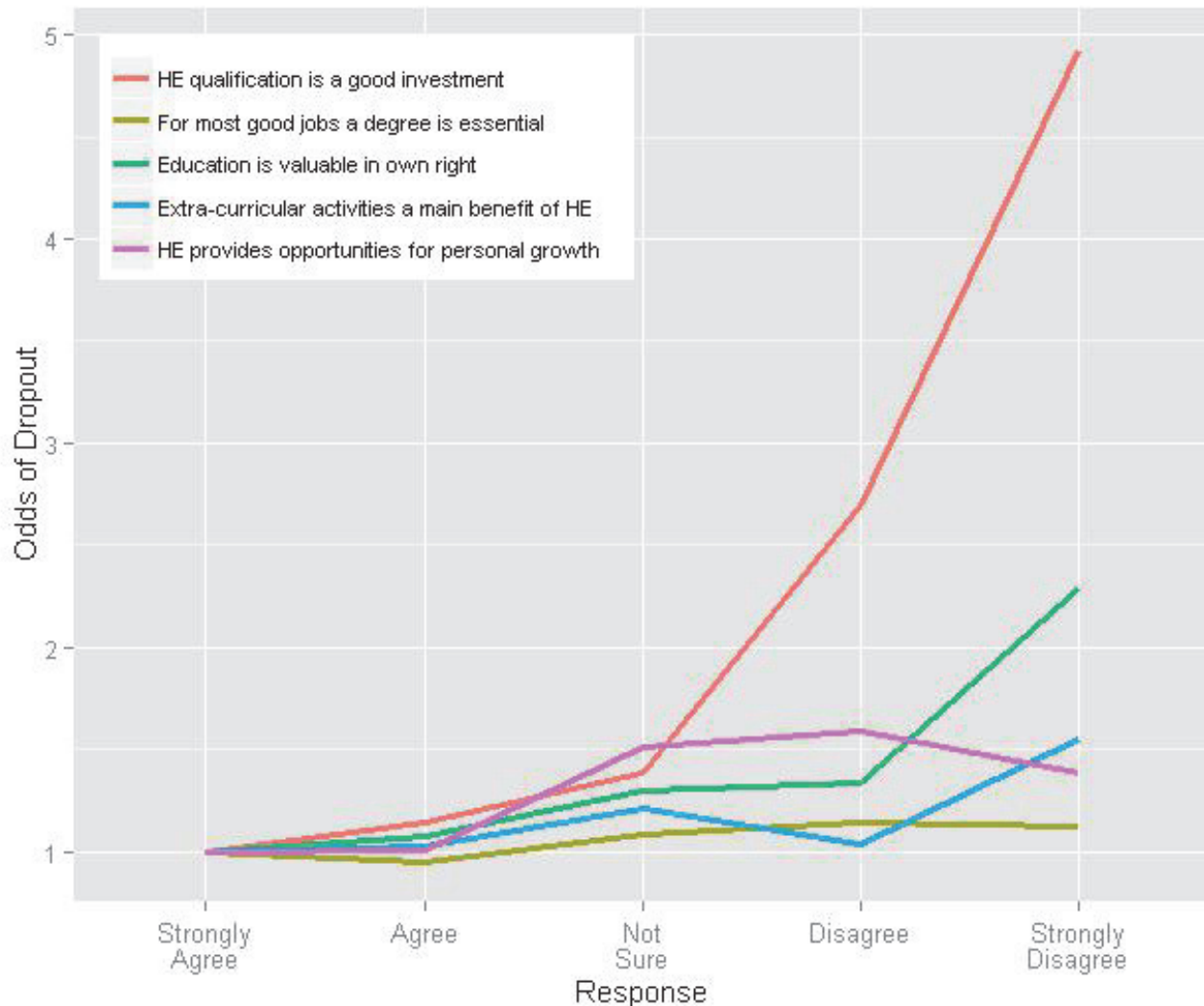
Figure 13 Odds ratio of dropout (vs. continuation in HE) for questions used to measure career attitudes

For use as a predictor of the respondents' subsequent transitions, the responses were summed and the resulting scale split into categories indicating a high, moderate and low level of positive career attitudes using the 50th and 80th percentiles of the scale. Figure 14 (Appendix C Table 16) shows the proportion of respondents with different career attitudes who made each type of transition between stage 1 and stage 2. The figure shows that respondents who either dropped out between stage 1 and stage 2 or who did not enter HE were less likely than those respondents who completed the year or who deferred entry to HE to have positive career attitudes. For example, 14.9 per cent of respondents who completed the year in HE had a low level of positive career attitudes in comparison to 18.1 per cent of respondents who dropped out of HE and 32.2 per cent of respondents who had not entered HE.
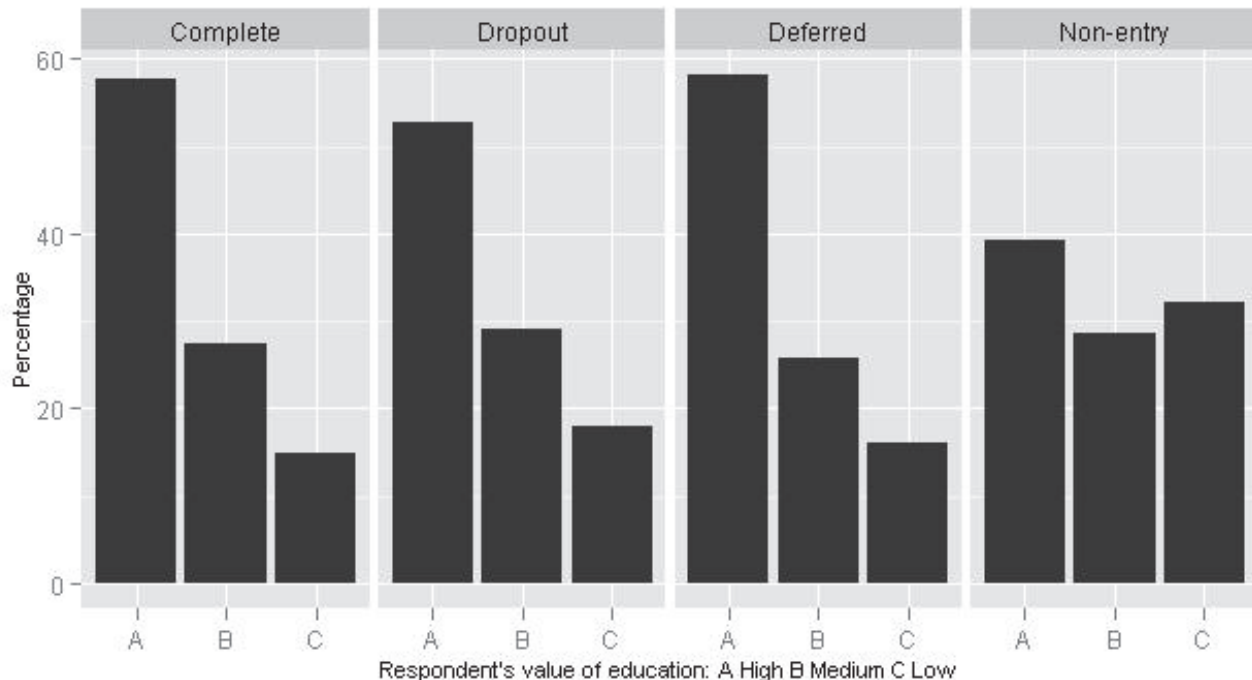
Figure 14 Transitions between stage 1 and stage 2 and respondent career attitudes

4.4.2 Sources of Advice

At stage 1, respondents were asked "which of the following influenced your choice of university or college?" with a set of 19 response items. The questions cover a range of influences (e.g. parents, friends, teachers, general reputation etc.) and the responses are scored as 1 'yes' and 0 'no'. Following exploratory analyses the responses to the first 11 items were chosen to measure the number of sources of advice used by the respondent prior to applying to HE. Figure 15 (Appendix C Table 17) shows how the type of advice used by respondents varies across the different types of transition. Respondents who had either completed the year or who had deferred entry to HE were more likely than those who had dropped out or not entered HE to state that they had been influenced in their choice of institution by the reputation of the institution. In contrast, respondents who dropped out or who had not entered HE were more likely than other respondents to state that being able to live at home had been a factor influencing their choice of institution.

Responses were missing for around 50 per cent of respondents who had not progressed to university in 2006. The results for respondents who either deferred entry to HE or chose not to enter HE should therefore be interpreted with caution.
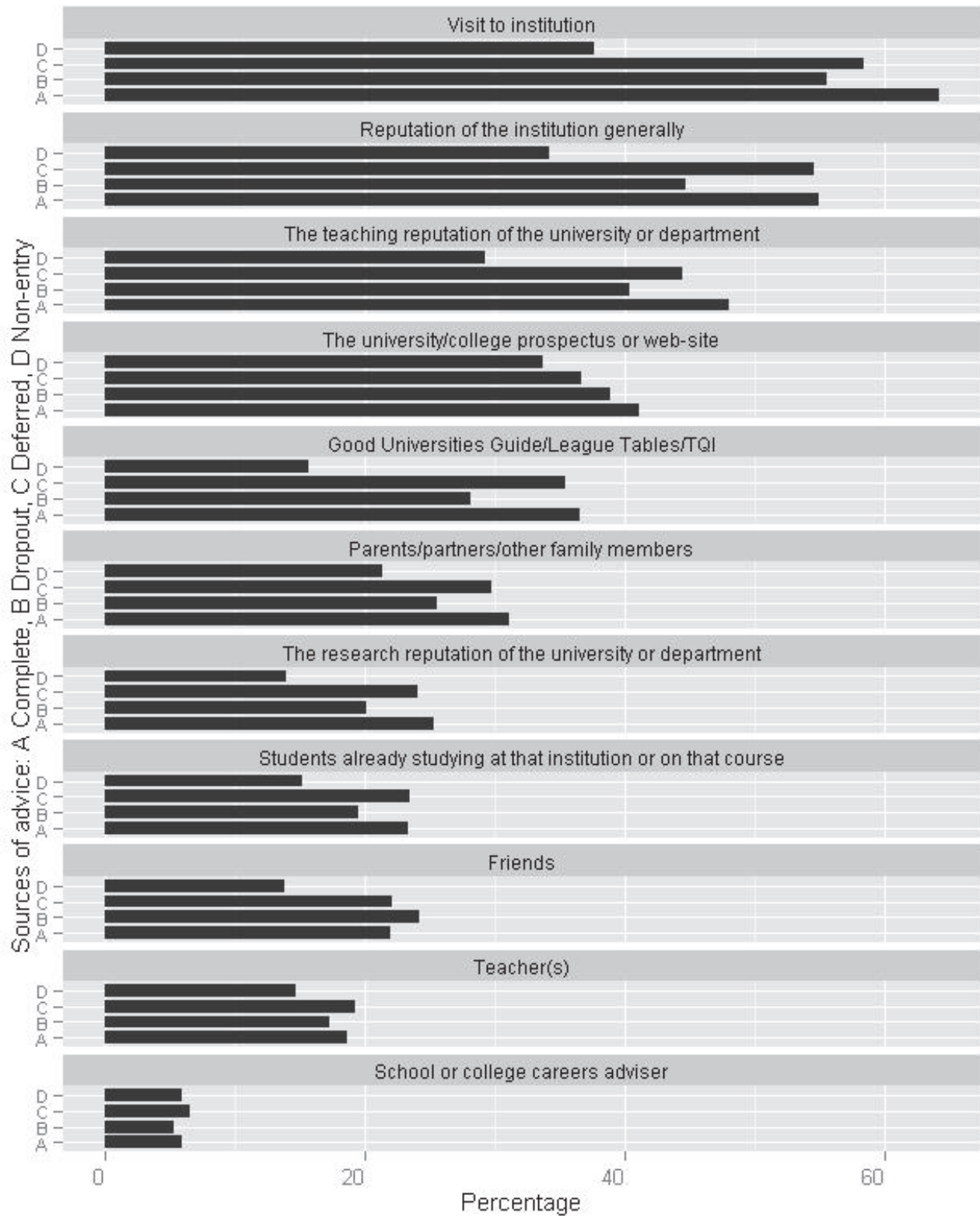
Figure 15 Sources of advice used in applying to enter higher education and transitions between stage 1 and stage 2

For use as a predictor of the type of transition the responses were summed and the resulting scale split into categories indicating a high (6 or more), moderate (4 or 5) and low (0 to 3) number of sources of advice. Respondents who did not answer the questions were not omitted from the analysis but included using a separate response category (as missing). Figure 16 (Appendix C Table 18) shows how the number of sources of advice used in applying to university varies between respondents who made different types of transition between stage 1 and stage 2. The figure shows that respondents who dropped out of HE were more likely to have used a low number of sources of advice (56.2 per cent) in comparison to those who continued in HE (48.6 per cent). In comparison, 22.1 per cent of respondents who continued in HE and 15.7 per cent of those who dropped out had used a high number of sources of advice.
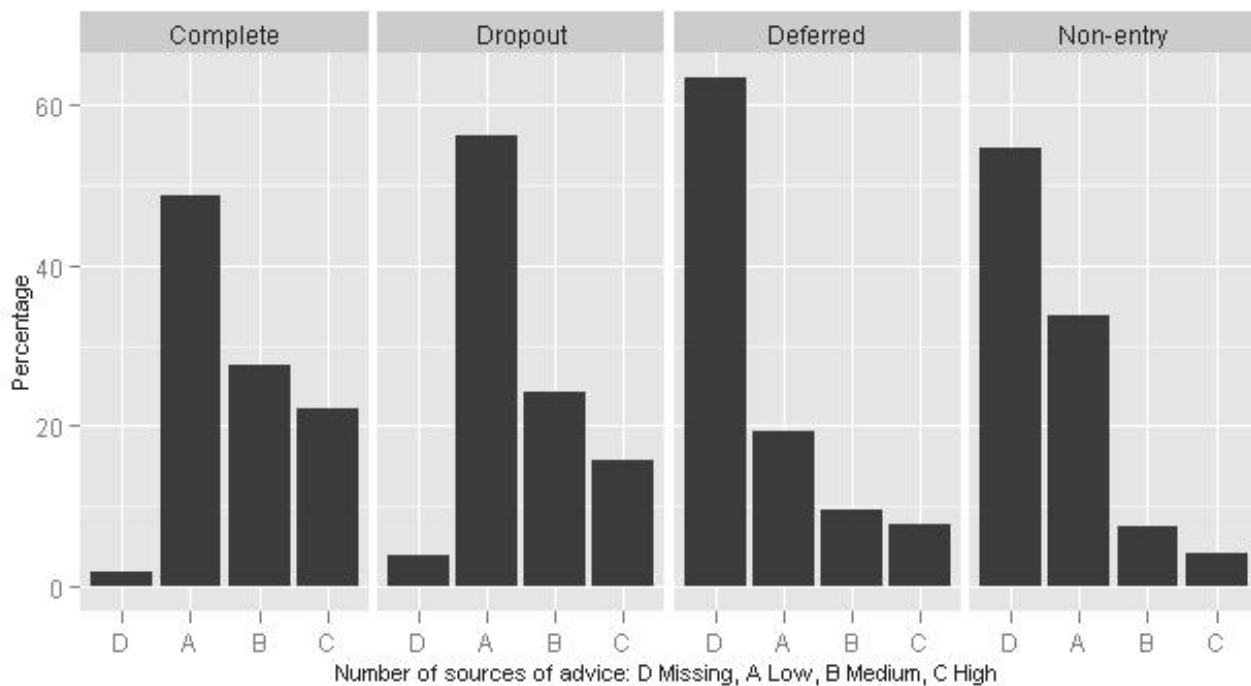
Figure 16 Transitions between stage 1 and stage 2 and the number of sources of advice used by respondents

It has often noted that significant numbers of students do not make what would seem to be rational choices regarding HE participation. Studies have often suggested that one reason why students do not make decisions that appear to be in their own interests is that they lack the necessary information to make the correct choices. In particular, young people from disadvantaged backgrounds have been found to have less information about a range of aspects of HE participation in comparison to their counterparts from better-off families (Mangan, Hughes and Slack 2010) which may have consequences for both the probability of progressing to HE and dropout from HE. It was expected therefore that the number of sources of advice used by the respondent in applying to HE would vary with indicators of

socioeconomic status such as family background and type of prior educational establishment.
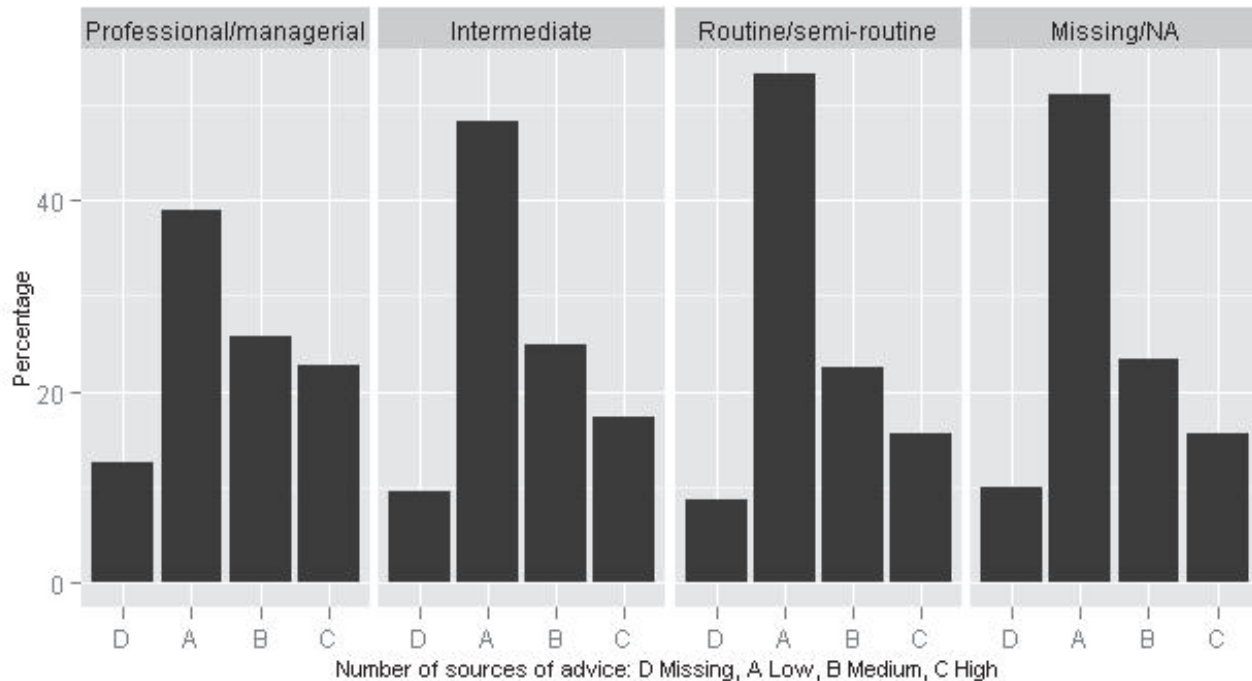
Figure 17 Parental occupation and number of sources of advice used by respondent

Figure 17 (Appendix C Table 19) shows how the number of sources of advice used by respondents varies with parental occupation. The figure shows that respondents from professional and managerial backgrounds were the group most likely to have used a high number of sources of advice (22.7 per cent) but least likely to have used a low number of sources of advice (39.0 per cent). In comparison, 15.5 per cent of respondents from routine and semi-routine backgrounds had used a high number of sources of advice while 53.2 per cent had used a low number of sources of advice.

Figure 18 (Appendix C Table 20) shows how the relationship between the education of the respondent's parents and the number of sources of advice. The figure shows that the variation in the number of sources of advice between respondents who did and did not have parents who had been to university is similar to that for parental occupation. Respondents with two parents who had been to university were least likely to have used a low number (37.1 per cent) and most likely to have used a high number of sources of advice (23.7 per cent) while respondents who did not have a parent with a degree were most likely to have a low number (54.2 per cent) and least likely to have a high number of sources of advice (14.0 per cent).

The results suggest that respondents with two parents who had been to university and those with parents who worked in professional and managerial occupations used a greater number of sources of advice in applying to university in comparison to respondents from disadvantaged family backgrounds. It is unclear, however, to what extent respondents from

disadvantaged family backgrounds had lower levels of access to advice concerning HE or whether the lower number of sources of advice used by respondents from disadvantaged family backgrounds in applying to HE reflect a reluctance to use the sources of advice that might have been available.
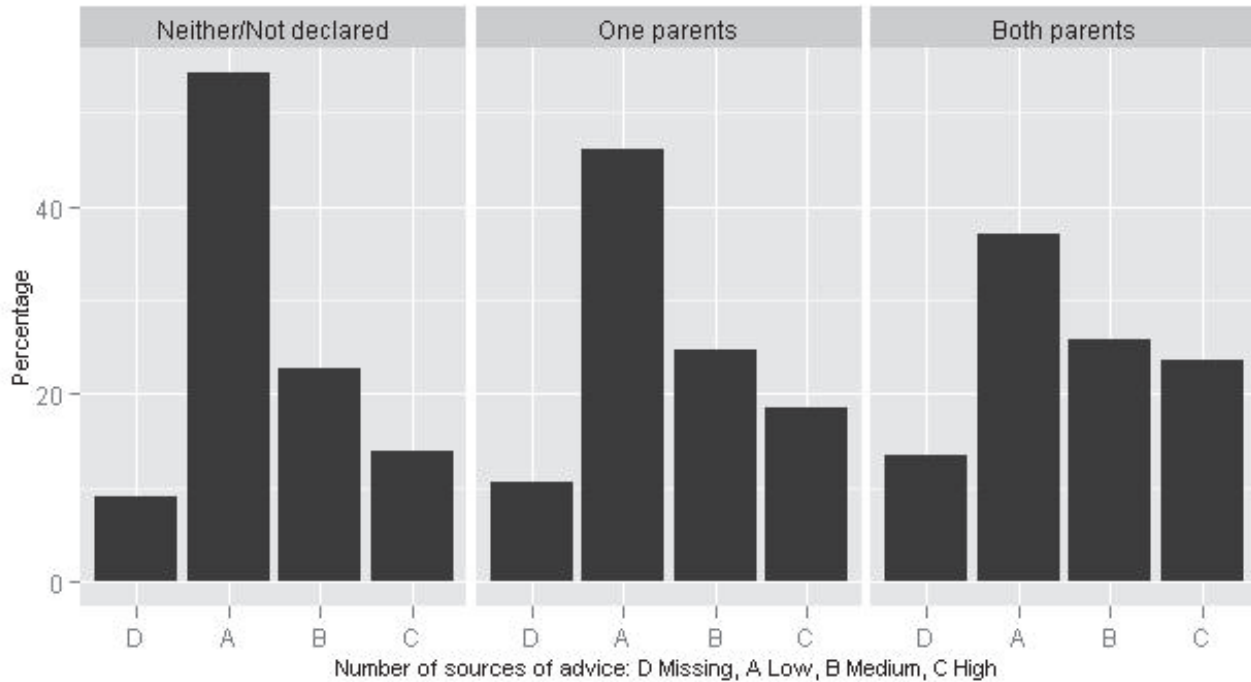
Figure 18 Parental education and number of sources of advice used by respondent

Schools are an important context outside of the family which shape the educational aspirations and achievement of children and the type of information and advice they have about further education. Figure 19 (Appendix C Table 21) shows how the number of sources of advice used in applying to enter HE varies across the type of educational establishment from which the respondent applied to UCAS. The figure shows that respondents who applied to enter HE from establishments in the further/higher education sector or who had not linked to an educational establishment in their UCAS application were most likely to have used a low number of sources of advice in applying to HE. In contrast, respondents at independent schools were the group most likely to have used a high number of sources of advice in applying to HE. The extent to which these differences reflect characteristics of the different types of school or are really a reflection of differences in the characteristics of respondents who attended different types of school is again unclear.
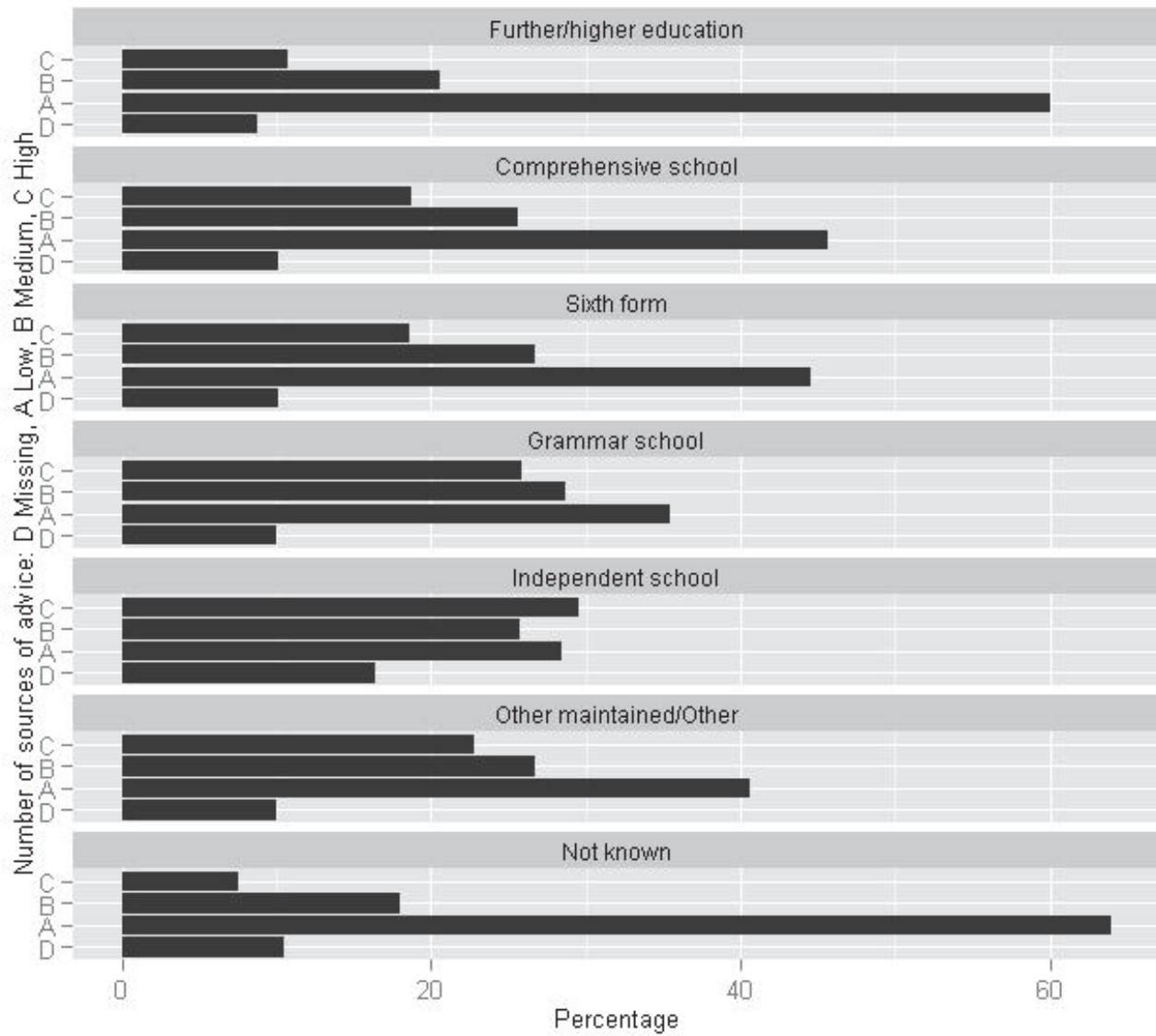
Figure 19 Type of prior educational establishment and number of sources of advice used by respondent

4.4.3 Assessment of Career Guidance

At stage 1 respondents were also asked a set of 10 questions concerning the degree to which different sources of career advice and information had been helpful in deciding to apply for a HE course. Appendix C Table 22 shows detailed responses. Respondents who dropped out of HE or who did not enter HE were more likely than those who completed the year to disagree with positively worded items, such as whether careers guidance and teachers had been helpful, but were less likely to disagree with negatively worded items, such as whether they needed more advice or had had difficulty in choosing a course. For example, 50 per cent of respondents who dropped out either disagreed or strongly disagreed with the statement "I have had excellent careers guidance" while the proportion of respondents who continued in HE who gave a similar response was somewhat lower (39.4 per cent).

Figure 20 shows how the odds of dropout (vs. continuation in HE) changes across the response categories of each question. The figure shows that for the majority of questions, respondents who stated that they either disagreed or strongly disagreed have a higher odds of dropout in comparison to respondents who stated that they strongly agreed.

The odds of dropout is particularly marked for the question 'My family were very supportive in my choice of course' with those respondents who stated that they strongly disagreed having an odds of dropout more than twice those of respondents who strongly agreed. For the purpose of analysis the responses to the question "My friends influenced my choice(s)" were disregarded and the remaining responses summed to create a scale. The coding of the two negative responses to the items 'I needed more help and advice in choosing which course to study' and 'I found it difficult to choose course(s)' were reversed so that a higher response was associated with an increased odds of dropout. The scale was split into three categories with approximately the same number of respondents in each category indicating a high, moderate and low level of satisfaction with career guidance. Figure 21 (Appendix C Table 23) shows the variation in ratings of career guidance for respondents who made different transitions between stage 1 and stage 2. The figure shows that respondents who dropped out of HE were more likely than those who continued in HE to have low levels of satisfaction with career guidance (38.3 per cent vs. 27.8 per cent) while those respondents who continued in HE were more likely than those who dropped out to have high levels of satisfaction with career guidance (36.7 per cent vs. 29.0 per cent).
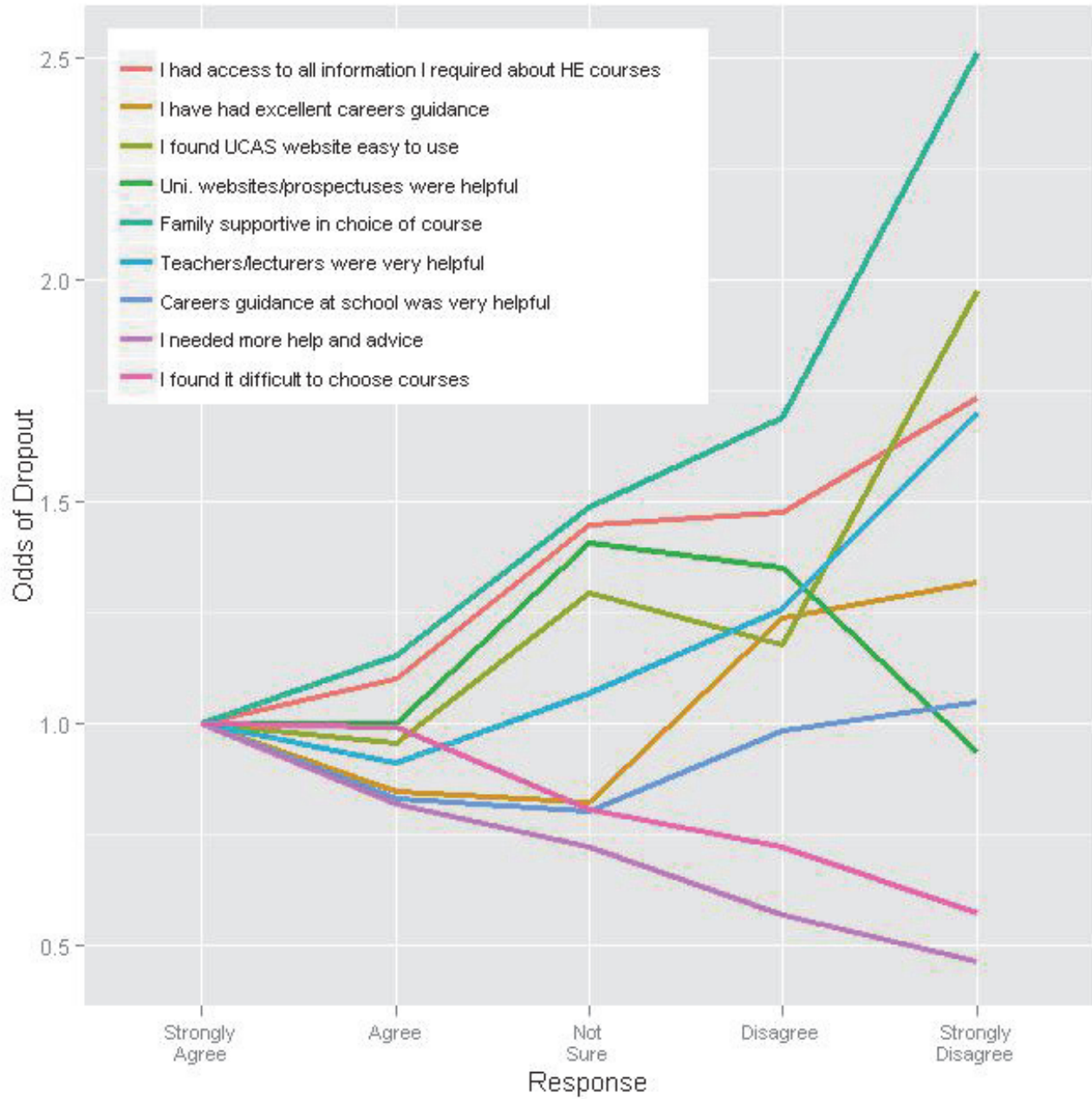
Figure 20 Odds ratio of dropout (vs. completion) for questions used in career guidance scale
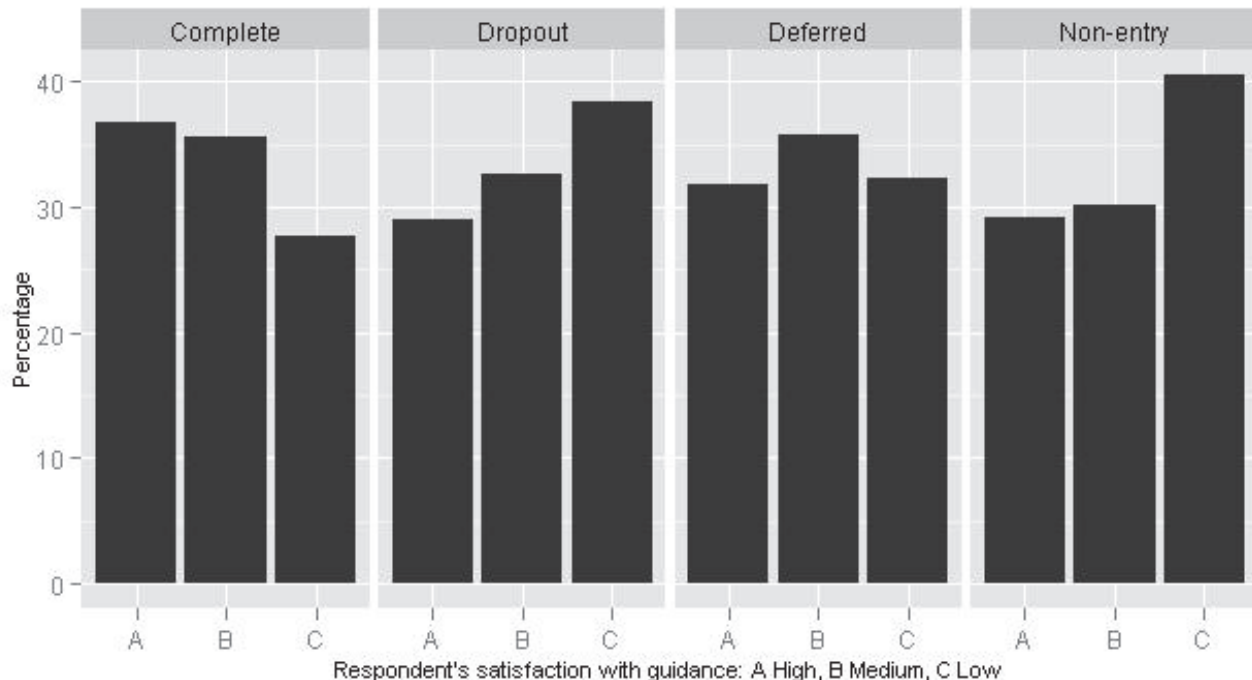
Figure 21 Transitions between stage 1 and stage 2 and respondent ratings of career guidance

4.4.4 Reasons for HE Choices

At stage 1 respondents were asked whether a range of reasons for applying to enter HE applied to them. Respondents were able to give multiple-responses. Figure 22 (Appendix C Table 24) shows the variation in the proportion of respondents who reported each reason for applying to enter HE for respondents who made different types of transition between stage 1 and stage 2. The figure shows that there is little difference in the transitions made by respondents according to the reasons they gave at stage 1 for deciding to enter HE. The most common reasons for applying to enter HE were either career related or related to the subject of study with around 70 per cent of respondents reporting that they had applied to enter higher education 'to enable me to get a good job' or as 'part of my longer-term career plans'. Reasons of personal growth and development were also important, however, with around 60 per cent of respondents reporting that 'I want to realize my potential'.

Figure 22 Reasons for applying to HE and transitions between stage1 and stage 2

At stage 1 the respondents were also asked whether a range of reasons for choosing a particular course applied to them. Respondents were able to give multiple-responses. Figure 23 (Appendix C Table 25) shows the variation in responses for respondents who made different types of transition between stage 1 and stage 2. The figure shows that respondents who did not enter HE were less likely than the remaining respondents to state that they enjoyed studying the subject (65.9 per cent) but were more likely to state that they needed the qualification in order to enter a particular profession/occupation (51.7 per cent).
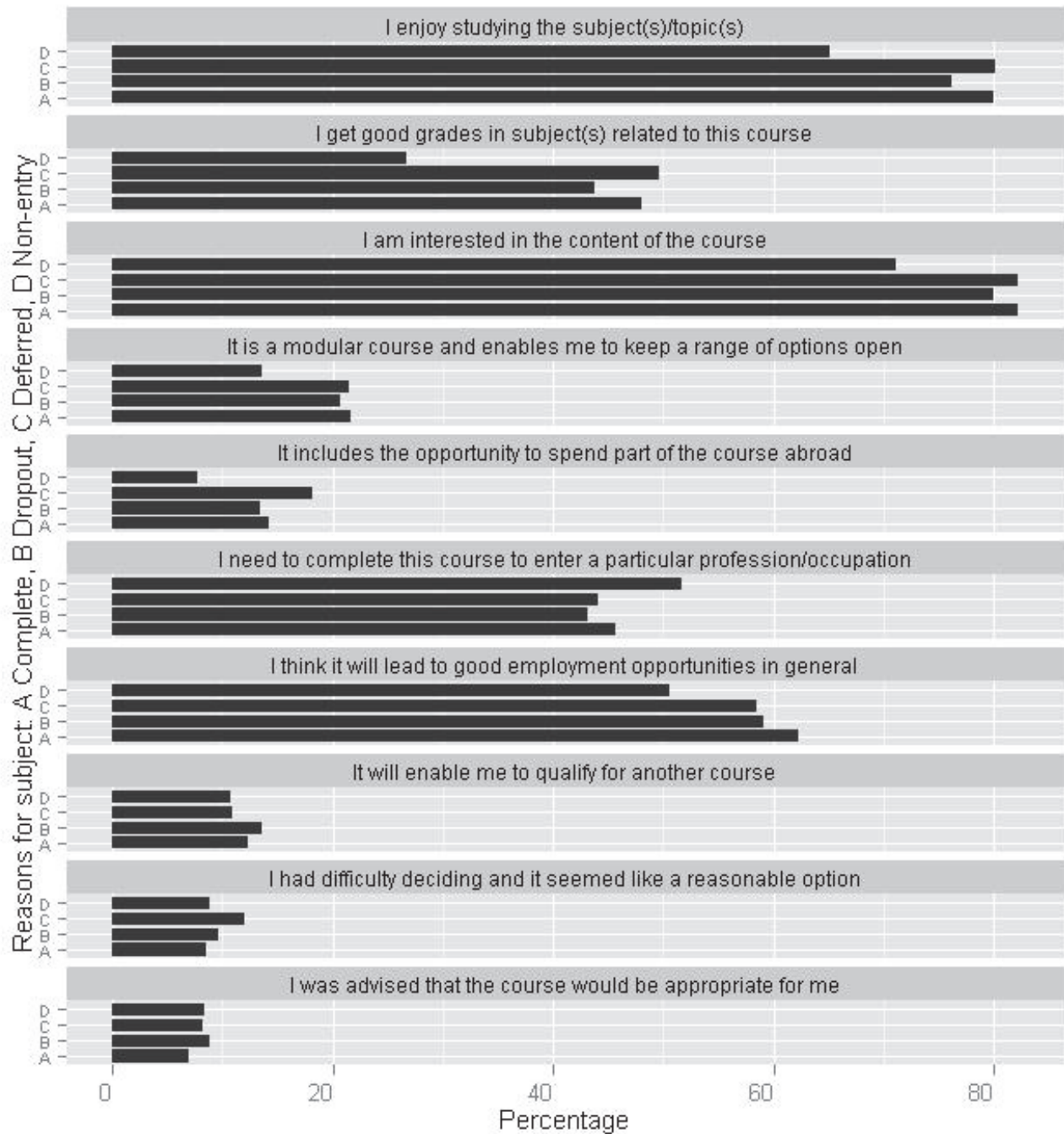
Figure 23 Reasons for choosing course of study and transitions between stage 1 and stage 2

Plans to fund Higher Edcuation: A Complete, B Dropout, C Deferred, D Non-entry

From the Student Loan Company Limited

Working during study

Working during holidays

Non-repayable contributions from parents/other family/partner

Personal savings/inheritance

University/college access funds/bursary

Local Authority/Student Award Agency for Scotland

National Health Service/General Social Care Council

Other forms of borrowing (e.g. credit cards, bank loans, overdrafts etc)

Repayable loan from parents/other family/partner

Sponsorship/bursary from current/prospective employer

University/college hardship or access funds

Percentage

48

Figure 24 Intended sources of finance and transitions between stage 1 and stage 2

4.4.5 Sources of HE Finance

The stage 1 survey also asked respondents "How do you plan to fund your higher education" with 13 response categories. Figure 24 (Appendix C Table 26) shows the responses for respondents who made different types of transition between stage 1 and stage 2. Figure 24 shows that in comparison to respondents who completed the year in HE, those who dropped out between stage 1 and stage 2 were less likely to have planned to fund their studies from savings (45.1 vs. 38.9 per cent) or sources of family income (40.2 vs. 33.0 per cent) and were more likely to have planned to work during their study (52.7 vs. 56.3 per cent). Figure 24 also shows that respondents who deferred entry to HE or who did not go on to HE were much less likely to have provided data on sources of student finance than those respondents who actually entered HE in 2006.

4.5 Reasons for not completing HE

At stage 2 respondents who had dropped out of HE or who had not entered HE were asked "Which of the following reasons for not proceeding to or continuing in full-time higher education applied to you?" with 10 response categories. The reasons given by respondents for dropping-out of HE or not entering HE are useful in giving more insight into the respondent's experiences of HE although it is important to keep the distinction between the reasons given by respondents and the causes of different types of transition. Figure 25 (Appendix C Table 27) shows the responses separately for respondents who dropped out of HE and those who did not enter HE. The figure shows that among respondents who did not go on to HE the costs of university and the prospect of debt were a much more significant factor than among those respondents who dropped out of HE. Financial considerations were not the only reason that respondents did not go on to HE, however, and a significant proportion of respondents who had not entered HE either had not achieved the required grades or preferred to undertake paid work. Figure 25 also shows that while 34.8 per cent of respondents who dropped out of HE gave personal reasons as a factor for not continuing in HE only 18.7 per cent of respondents who did not go on to university stated that personal reasons had been a factor in not proceeding to HE.
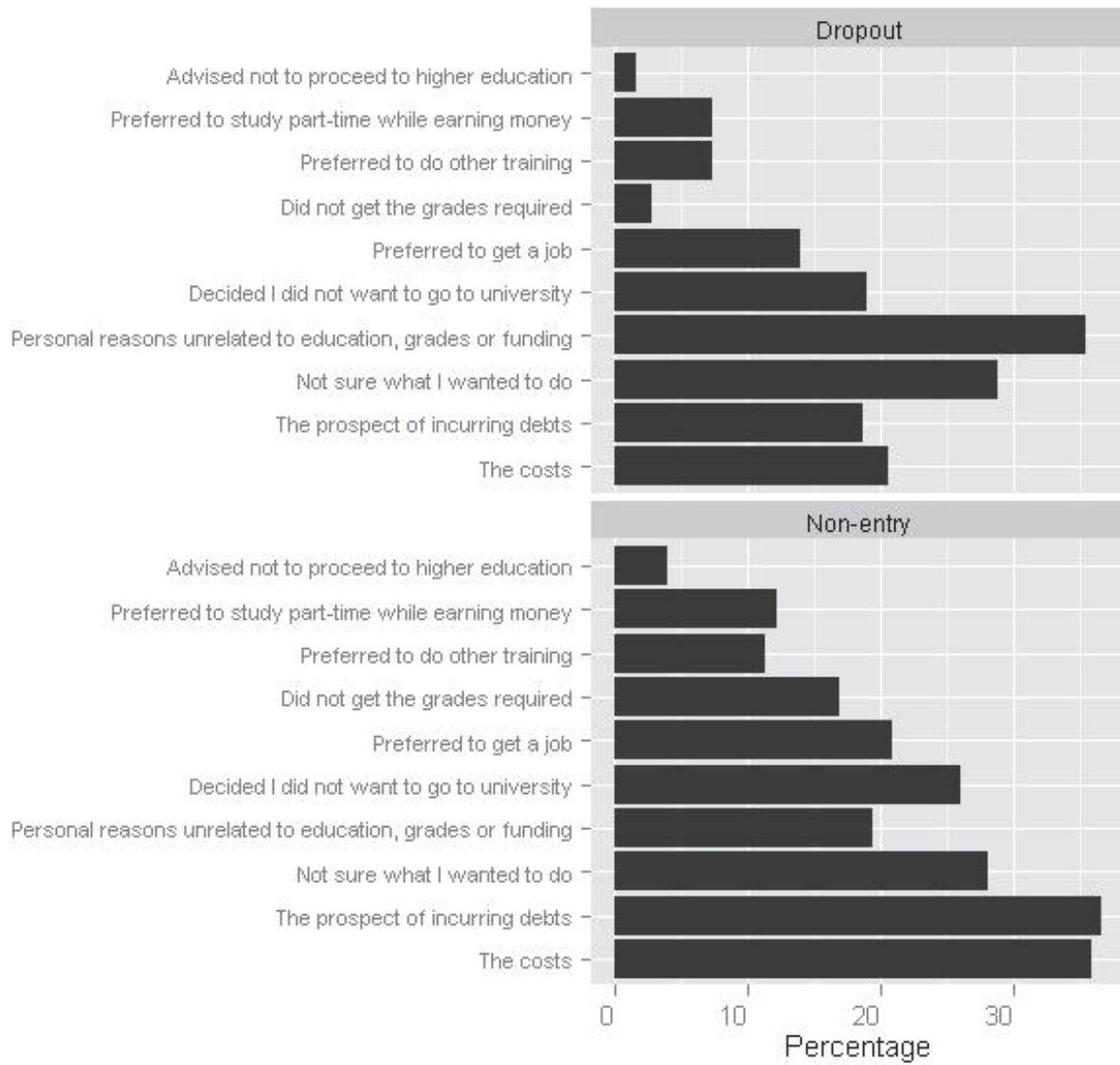
Figure 25 Reasons for dropping out of or not entering higher education at stage 2

4.6 Labour market outcomes at stage 4

The significance of dropout from HE partly depends on whether dropout has a negative effect on subsequent labour market outcomes. At the stage 4 survey the majority of respondents had left HE and had entered the labour market and it was possible to compare the labour market outcomes of respondents who had different experiences of HE. The respondent's experience of HE was measured using the question on the experience of higher education included in the stage 4 survey. At stage 4 respondents were asked "Since applying to UCAS in 2005/06, which of the following has applied to you?": I completed an undergraduate course and I am no longer a full-time student, I completed an undergraduate course and am currently a full-time post-graduate student, I completed an undergraduate

course and a postgraduate course and am no longer a full-time student, I started but did not complete an undergraduate course and I am no longer a full-time student, I did not go on to study full-time and have not been a full-time undergraduate student since then, and I am currently a full-time undergraduate student. The outcomes of three groups of respondents were again examined: those who had completed an undergraduate and/or postgraduate course and were no longer in full-time education (complete), those who had started but not completed an undergraduate course (dropout) and those who had not been a full-time undergraduate student since 2005/06 (non-entry). The number of respondents in the dropout and non-entry groups is relatively low and the results should therefore be interpreted with a degree of caution. The stage 4 outcomes examined were current labour market status (employed, self-employed, studying, unemployed not looking for work and other), whether the respondent had obtained a graduate job (an occupation in SOC major groups one to three) and gross annual pay.

Figure 26 (Appendix C Table 28) shows the current labour market status for the different groups of respondents. The respondents who had either completed a degree or not entered HE had similar rates of employment with around 75 per cent of respondents in employment. In comparison, respondents who had dropped out of HE had a notably lower employment rate of around 60 per cent. The variation in the proportion of each group who were unemployed gave a less positive picture for graduates, however. Respondents who had completed a degree were more likely to be unemployed than respondents who had not entered HE. The higher unemployment rate for graduates may reflect the different lengths of time that different groups of respondents had spent establishing themselves in the labour market and is also likely to reflect the overall difference in labour market conditions at the time the two groups entered the labour market. It is also important to bear in mind that HE applicants who do not progress to HE are unlikely to be representative of all people who do not attend HE and their decision not to progress to HE may reflect that they had other career opportunities that they considered more desirable than HE.
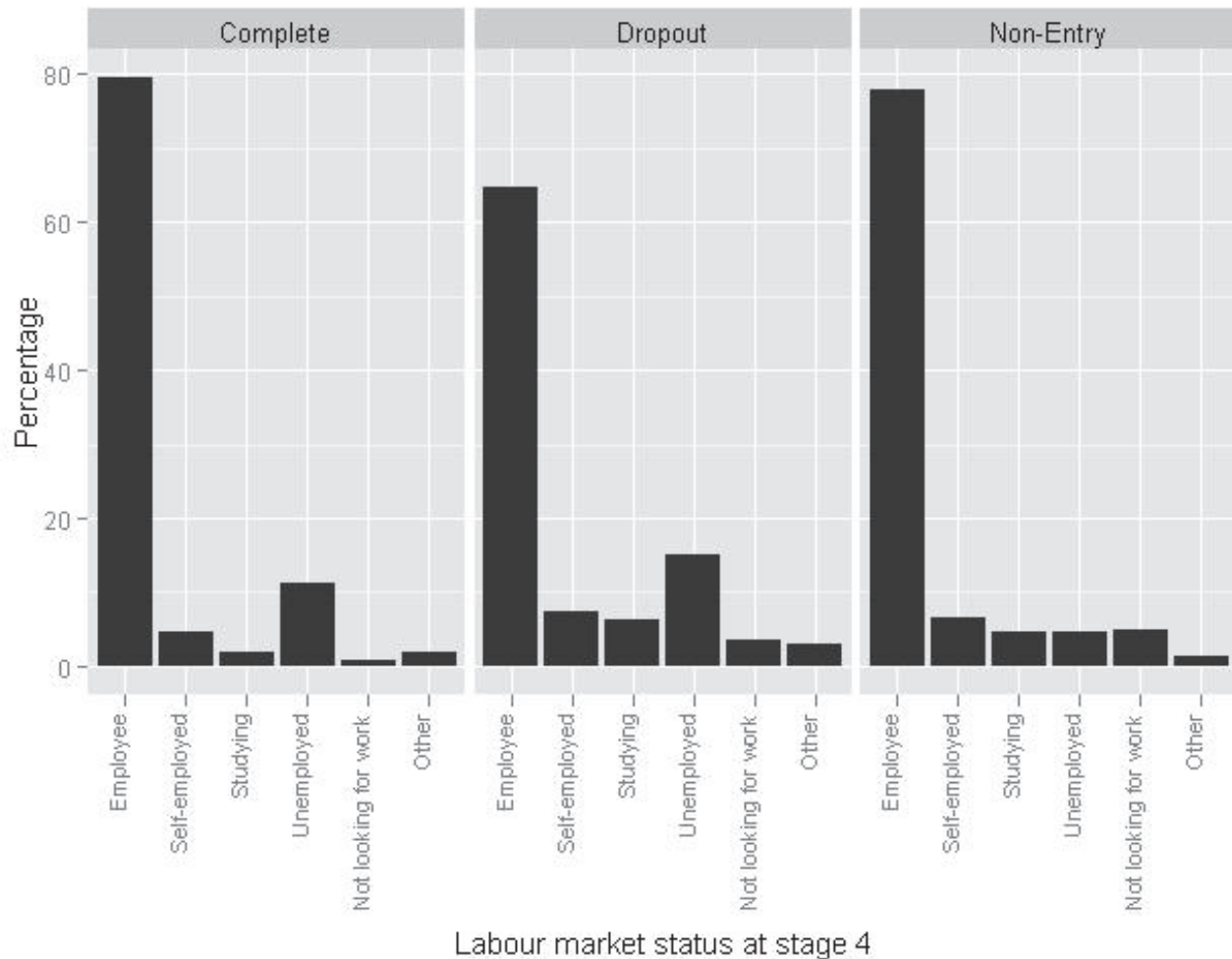
Figure 26 Respondents experience of higher education since 2005/06 and labour market status at stage 4

For those respondents in employment Figure 27 (Appendix C Table 29) shows how the type of job varies with respondent's experience of HE since 2005/06. The respondents who had either dropped out of or not entered HE were significantly less likely to have a professional or managerial job than those who had completed a degree. The figure shows that around 20 per cent of respondents who had chosen not to enter HE but around 16 per cent of those who dropped out of HE were currently working in professional or managerial jobs while over 40 per cent of respondents who had completed a degree were currently working in a professional or managerial job.
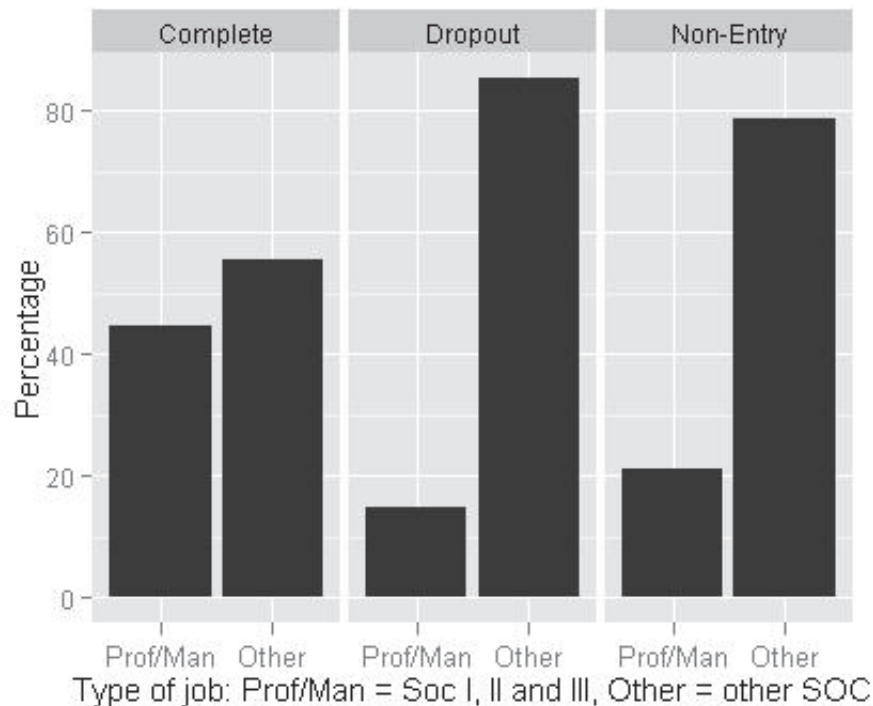
Figure 27 Respondents experience of higher education since 2005/06 and category of job at stage 4

The wage that respondents receive in their job is used to measure the economic returns to education. The results of the stage 4 survey showed that respondents who had not entered HE were being paid an average of £21540 per annum, in comparison to £20765 per annum for respondents who had completed HE and £18410 per annum for respondents who had dropped out of HE. There was no difference in the median wage (£19500 per annum) received by respondents who had not entered HE and those who had completed HE, however, suggesting that the higher wage for respondents who had not entered HE is due to a small number of respondents with significantly higher levels of pay than those who completed HE. Respondents who had dropped out of HE had a significantly lower median wage than other respondents (£16500 per year).

Figure 28 (Appendix C Table 30) shows how the distribution of gross annual pay varies for respondents with different experiences of HE. Respondents who had dropped out or not entered HE were more likely to be in low-paid employment (<£10000 per annum) in comparison to those who had completed a degree. A significant proportion of each group were in low-paid employment, however. In overall terms those who completed HE were in better paid jobs than those who had not: 47 per cent of those who had completed a degree were earning above £21000 per annum (the vertical orange line) as compared to 43 per cent of those who had not entered HE and only 30 per cent of those who had dropped out of HE.
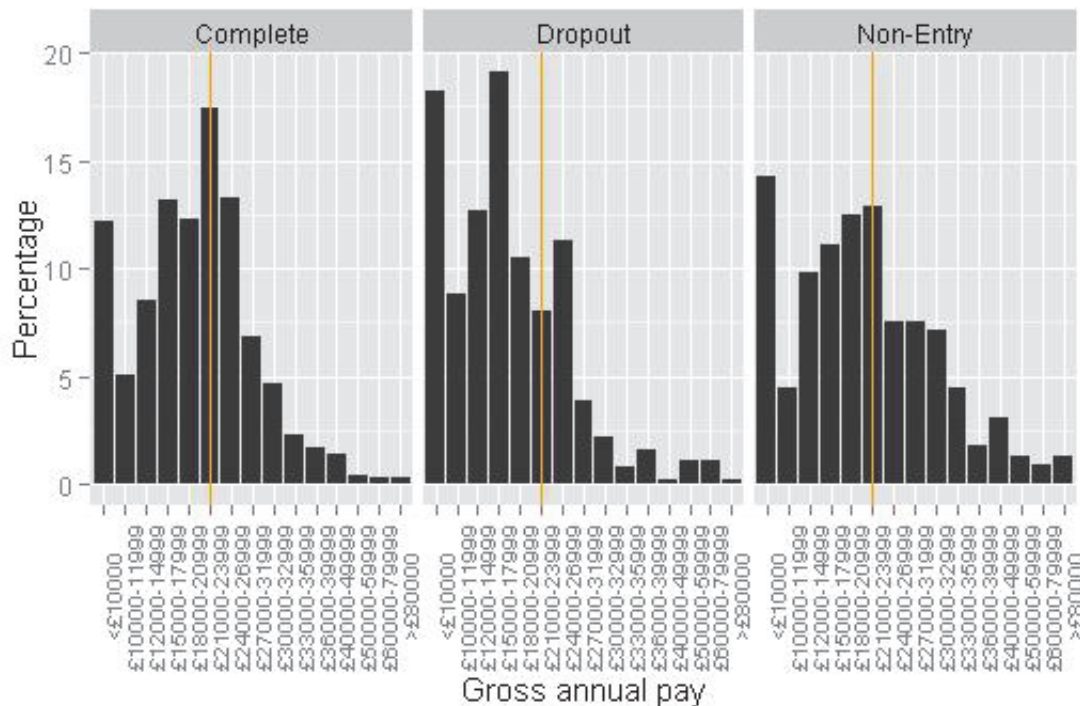
Figure 28 Respondents experience of higher education since 2005/06 and gross annual salary at stage 4

4.7 Summary

In summary, the results suggest that multiple factors were related to the probability of leaving HE during the first year of study. Overall, students who dropped out were more likely to come from disadvantaged family backgrounds or be studying at lower tariff institutions than those who completed the year in HE. The prior levels of educational achievement and subject of study were also significant for the probability of dropout. In particular, respondents with higher levels of educational achievement and those who were studying medicine and dentistry were less likely to dropout than remaining respondents. The reasons given by respondents for dropout from HE suggested that for most dropout was not a response to the costs of HE. Information on the career attitudes and sources of guidance used by respondents prior to starting HE suggested that a lack of advice and guidance and uncertainty about career choices were factors involved in respondents choosing not to continue in HE.

The relationship between the respondent's experience of HE and transitions into the labour market following HE showed that respondents who had completed HE and those who had not entered HE were more likely to have made a successful transition into the labour market than respondents who had dropped out of HE. Respondents who had completed HE and those who had not entered HE had much higher employment rates and significantly higher levels of pay than respondents who had dropped out of HE. The results also provided

evidence for considerable differences in the labour market outcomes of graduates. Respondents who had completed HE were more likely to be working in professional and managerial jobs than respondents who had not progressed to HE but they also had higher levels of unemployment than those who had not progressed to HE.

5 Logistic Regression Models of Dropout

5.1 Methodology

The final question examined in this report concerned the individual, family and institutional factors which had an independent association with the probability of dropout. In particular, our main interest was whether indicators of family disadvantage have a direct link with the probability of dropout from HE after adjusting for the individual characteristics of the respondent, or whether respondent characteristics are able to explain the association between family characteristics and the probability of dropout. The analyses used a series of logistic regression models where the dependent variable is a binary variable where 0 indicates that the respondent completed the first year of HE and 1 indicates that the respondent dropped out of HE during the first year. Respondents who deferred entry to HE or who did not enter HE were omitted from the analysis. Previous research suggests that mature students (i.e. those aged 21 years and over) are more likely than younger students to dropout of HE for family reasons (Purcell *et al*. 2009). We examined whether separate analyses could be undertaken for respondents who were aged under 21 years and those who were 21 years and over when they applied to enter university. In the sample of respondents who were 21 years and over when they applied to enter university, the number of dropouts from HE was inadequate to allow separate analyses of this group. The analyses are restricted therefore to respondents who were under 21 years of age when they applied to HE. Appendix C Table 31 does, however, give descriptive statistics for the sample of respondents aged 21 years and over.

The analyses used four steps. The first analysis step examined a model which included only gender, ethnicity, parental occupation and parental education as explanatory variables and the results from this model provide estimates of the unadjusted association between family background characteristics and the probability of dropout (Model 1). The respondent's level of prior academic achievement was then added to the model (Model 2). Previous research has shown that the prior level of academic achievement is the main route through which family background characteristics influence the routes followed by students into HE and prior academic achievement was considered likely to be the most important factor through which family background influences the probability of dropout (Powdthavee and Vignoles 2009). The following model (Model 3) added the scales measuring the number of sources of advice used in applying to HE (section 4.4.2) and satisfaction with careers guidance (section 4.4.3) while the final model (Model 4) additionally contained the type of institution and subject of study. The comparison of results from different models allows us to see how far any association between family background and the probability of dropout can be explained by the prior level of academic achievement of respondents and differences in the sources of guidance and advice used in applying to HE. It also allows us to examine whether there are

differences in the probability of dropout between different types of institution after adjusting for respondent characteristics.

5.2 Results

Descriptive statistics for the variables from the Futuretrack dataset which were included in the analysis are given in Table 1. The analysis sample is restricted to respondents who were present at both the first and second stage of the survey and who had no missing data on the variables included in the analysis (N = 21928). In order to reduce the sensitivity of the model results to explanatory variables with categories containing a low number of dropouts, ethnicity was collapsed into a simple White/non-White binary variable and subject of study was grouped into three broad categories: specialist vocational subjects, occupationally-oriented subjects and discipline-based subjects. Specialist vocational subjects include medicine, engineering, law and education; occupationally-oriented subjects include biology, mathematics, social studies, business, creative arts and inter-disciplinary studies; discipline based subjects include physical sciences, linguistics, classics, history and philosophy.

The results in Table 1 show that women were slightly more likely to dropout of HE than men while respondents from non-White backgrounds had a lower dropout rate than those from White backgrounds. The association between family background and dropout was also relatively weak, however, respondents who did not have a parent who had been to university and those with parents in routine and semi-routine occupations had the highest rates of dropout. The relationship between the respondent's prior level of academic achievement and dropout was larger in magnitude than for demographic and family background characteristics. Respondents who had non-standard levels of prior academic achievement or who were missing information on prior qualifications had a dropout rate of 6.7 per cent while that for respondents who had high levels of prior academic achievement was only 3.0 per cent. The indicators of the more proximal factors associated with respondents application to HE showed the expected association with dropout. Respondents who had used either a higher number of sources of advice in applying to HE or those who were more positive about career guidance were less likely to have dropped out than remaining respondents. Institution characteristics showed only a weak association with the probability of dropout with those respondents at institutions in the lowest tariff category and those studying occupationally-oriented subjects having the highest probability of dropout.

Table 2 shows the regression coefficients with corresponding standard errors in parentheses from the estimated models. For any coefficient β, the exponentiated value of the coefficient can be interpreted as giving the ratio of the odds that a respondent with those characteristics dropped out of higher education to the odds that a respondent in the omitted category of the variable dropped out. See Appendix B for more details. The Futuretrack study contains weights which account for the effect of dropout on longitudinal analyses. The construction of the weights is discussed in Appendix A. The analyses were conducted with and without the weights. There was no significant difference in results and for reasons of simplicity we present the unweighted results.

The results of the initial model (Model 1) show that the odds of dropout from HE are higher for those respondents from disadvantaged family backgrounds. In comparison to respondents with two parents who had been to university, the odds of dropout were

approximately 30 per cent higher (or exp (0.282)) for respondents who did not have a parent with a university education while respondents with parents who worked in routine and manual occupations had an odds of dropout which were around 30 per cent higher than those for respondents with parents who worked in professional and managerial occupations. The results also show that non-White respondents had a significantly lower odds of dropout than White respondents while gender showed no significant association with dropout.

The results of the model additionally controlling for the respondents prior level of academic achievement (Model 2) show that there is a strong negative gradient in the odds of dropout with increasing levels of prior academic achievement. In comparison to the previous model, controlling for the respondents prior level of academic achievement explained the variation in the odds of dropout between respondents with different family background characteristics. The higher odds of dropout for respondents from disadvantaged family backgrounds can therefore be interpreted as reflecting the lower overall levels of prior academic achievement among respondents from disadvantaged family backgrounds. The lower odds of dropout for respondents from non-White backgrounds remained, however.

The addition of information on the number of sources of advice and the respondent's assessment of careers guidance to the model (Model 3) had little effect on the magnitude or statistical significance of the coefficients from the previous model. Respondents who had used a high number of sources of advice prior to applying to university had a significantly lower odds of dropout from HE in comparison to those who had used a low number of sources of advice while respondents who gave the least positive reports of careers guidance had an odds of dropout that were nearly 70 per cent higher (or exp (0.522)) than those for respondents who gave the most positive reports. The results of the final model (Model 4) show that the type of institution and broad subject area had little association with the odds of dropout after adjusting for other model characteristics. Controlling for factors associated with the respondent's institution also had little effect on either the magnitude or statistical significance of the coefficients from the previous model.

Table 1 Means of explanatory variables separately for respondents who continued in and dropped out of HE during the first year. Figures are for respondents under 21 years of age when they applied to HE.

| Variable | Response at Stage 2 | | | | | |
| | Completed | | | Dropout | | |
	N	Row%	Col%	N	Row%	Col%
Gender						
Male	7714	96.2	36.7	302	3.8	34.0
Female	13325	95.8	63.3	587	4.2	66.0
Ethnicity						
White	17798	95.8	84.6	783	4.2	88.1
Non-white	3241	96.8	15.4	106	3.2	11.9
Parental Education						
Neither/not declared	10519	95.4	50.0	511	4.6	57.5
One of parents	5393	96.3	25.6	207	3.7	23.3
Both parents	5127	96.8	24.4	171	3.2	19.2
Parental Occupation						
Managerial and professional	11569	96.4	55.0	427	3.6	48.0
Intermediate	4129	95.5	19.6	193	4.5	21.7
Routine and manual	4612	95.1	21.9	240	4.9	27.0
Not known / missing	729	96.2	3.5	29	3.8	3.3
UCAS Tariff Points						
Non-standard / Missing	1382	93.3	6.6	100	6.7	11.2
Low	2606	93.3	12.4	188	6.7	21.1
Medium	5808	95.7	27.6	258	4.3	29.0
High	11243	97.0	53.4	343	3.0	38.6
Number of Sources of Advice						
0 to 3 sources	9016	95.1	42.9	465	4.9	52.3
4 to 5 sources	6390	96.3	30.4	248	3.7	27.9
6 to 11 sources	5633	97.0	26.8	176	3.0	19.8
Careers Guidance Satisfaction						
High	7129	96.8	33.9	233	3.2	26.2
Moderate	7759	96.3	36.9	301	3.7	33.9
Low	6151	94.5	29.2	355	5.5	39.9
Institution Type						
Highest	7774	97.0	37.0	242	3.0	27.2
High	5628	96.4	26.8	210	3.6	23.6
Medium	5179	94.6	24.6	297	5.4	33.4
Low	1922	94.2	9.1	118	5.8	13.3
Specialist	536	96.1	2.5	22	3.9	2.5
Subject Group						
Specialist vocational	5267	96.6	25.0	183	3.4	20.6
Occupationally-oriented	11241	95.6	53.4	523	4.4	58.8
Discipline-based academic	4531	96.1	21.5	183	3.9	20.6
Number	21039			889		

Table 2 Regression Model Results

Variable	Model 1 β (se)	Model 2 β (se)	Model 3 β (se)	Model 4 β (se)
Gender				
Male	–	–	–	–
Female	0.095 (0.072)	0.109 (0.073)	0.096 (0.073)	0.088 (0.073)
Ethnicity				
White	–	–	–	–
Non-white	-0.333 (0.107) **	-0.409 (0.107) ***	-0.426 (0.108) ***	-0.401 (0.109) ***
Parental Education				
Neither/not declared	0.282 (0.097) **	0.156 (0.099)	0.140 (0.099)	0.126 (0.100)
One of parents	0.098 (0.106)	0.022 (0.107)	0.012 (0.107)	0.007 (0.108)
Both parents	–	–	–	–
Parental Occupation				
Managerial and professional	–	–	–	–
Intermediate	0.168 (0.092)	0.134 (0.092)	0.126 (0.092)	0.125 (0.093)
Routine and manual	0.252 (0.089) **	0.161 (0.090)	0.157 (0.090)	0.148 (0.090)
Not known / missing	0.075 (0.201)	-0.071 (0.202)	-0.074 (0.202)	-0.082 (0.202)
UCAS Tariff Points				
Non standard		-0.018 (0.129)	-0.012 (0.129)	0.021 (0.130)
Low		–	–	–
Medium		-0.505 (0.099) ***	-0.490 (0.100) ***	-0.456 (0.103) ***
High		-0.849 (0.096) ***	-0.775 (0.099) ***	-0.696 (0.115) ***
Number of Sources of Advice				
0 to 3 sources			–	–
4 to 5 sources			-0.111 (0.082)	-0.094 (0.083)
6 to 11 sources			-0.227 (0.094) *	-0.205 (0.097) *
Careers Guidance Satisfaction				
High			–	–
Moderate			0.157 (0.089)	0.149 (0.089)
Low			0.522 (0.087) ***	0.512 (0.087) ***
Institution Type				
Highest				–
High				-0.010 (0.102)
Medium				0.145 (0.111)
Low				0.112 (0.140)
Specialist				-0.184 (0.237)
Subject Group				
Specialist vocational				–
Occupationally-oriented				0.144 (0.089)
Discipline-based academic				0.187 (0.109)
Constant	-3.455 (0.092) ***	-2.795 (0.121) ***	-2.961 (0.138) ***	-3.168 (0.178) ***

* for p<.05, ** for p<.01, and *** for p<.001

5.3 Summary

In summary, the results show that among respondents who applied to HE when they were under 21 years of age, those who had two parents who had been to university or parents who worked in professional and managerial jobs were less likely to have dropped out of HE than remaining respondents. The association between family background and the probability of dropout could be explained, however, by respondents' prior level of academic achievement with respondents who had high levels of prior academic achievement having a significantly lower odds of dropout than respondents with low levels of prior ability. The number of sources of advice used by the respondent in applying to HE and respondents' assessment of their experiences of career guidance were further factors that had an independent association with dropout from HE. Institution factors were not associated with the probability of dropout, however.

6 Conclusions

The results of the descriptive analysis presented in this report suggest that multiple factors influenced the probability of dropping-out of HE during the first year of study. Respondents who dropped out of HE were more likely to have lower levels of prior academic achievement, to come from disadvantaged family backgrounds and to be studying at lower tariff institutions than those who completed the year in HE. The reasons given by respondents for not continuing in HE suggested that dropout was not a response to the cost of HE. The information on career attitudes and sources of guidance used by respondents prior to starting HE suggested, however, that a lack of sources of information about HE and a lack of career guidance were factors involved in respondents dropping out of HE. The descriptive analysis also illustrates the consequences for dropout from HE for respondent's subsequent labour market outcomes. Respondents who had completed HE had significantly higher employment rates, were more likely to be working in professional and managerial jobs and had higher levels of pay than respondents who had dropped out of HE.

In order to examine the effect of a range of family, individual and institutional characteristics on the probability of dropout, a series of regression analyses were undertaken. The analysis were organized to examine whether there was a direct link between family disadvantage and the probability of dropout or whether respondent characteristics are able to explain the association between family characteristics and the probability of dropout. The results showed that for young entrants to HE (i.e. aged under 21 years of age), the respondents prior level of academic achievement explained the higher odds of dropout for respondents from disadvantaged family backgrounds. The results also showed that the transitions made by respondents between stage 1 and stage 2 were associated with the experiences of career guidance and the number of sources of advice used by respondents prior to applying to university. In particular, respondents who gave less positive assessments of career guidance or who had used a low number of sources of advice in applying to HE had a higher odds of dropout in comparison to remaining respondents. The probability of dropout was not influenced by the type of institution after taking into account the characteristics of the respondent, however, suggesting that dropout may not be a useful indicator of university performance.

The results show that dropout from HE is not easily attributable to a single cause and it is likely that there are few interventions that will single-handedly yield significant improvements in dropout rates. Interventions therefore need to focus on factors from the multiple contexts which are important for students (e.g. family, schools, and neighbourhoods) instead of considering single factors as independent problems. Although our evidence of a link from sources of career advice and guidance to dropout from HE is systematic and statistically significant, it is not spectacular; small changes in students' circumstances could not be expected to yield more than small changes in outcomes. Recent work to provide prospective students with more information about HE is welcomed but a one-size-fits-all approach is unlikely to be able to address the diversity of factors and different pathways followed by students into HE (HEFCE 2010, Davies 2012).

In terms of policy, our results support the conclusion that efforts to increase student retention need to intervene early in respondents' transition to HE probably before students even apply to university. Interventions such as outreach activities including master classes to help pupils improve their GCSE and A level grades and summer schools which offer a taste of university life to pupils who may not have a family background in HE are the main route through which institutions are currently attempting to widen participation in HE (OFFA 2010). Universities increasingly focus their outreach activities on local schools and the association between the respondent's prior level of academic achievement and the probability of dropout found in our analyses suggests that outreach activities could reduce levels of dropout from HE by trying to raise the achievement of students from disadvantaged family backgrounds. It would also be helpful for outreach activities, however, to be allied to further more intensive sources of advice and guidance for students with greater needs.

The study has some weaknesses. In particular, the statistical models used in this paper ignore the possibility that sources of careers advice and guidance may be related to unobserved disadvantages that also cause dropout. The coefficient on the careers guidance and advice variable captures both the causal effects of careers guidance and the non-causal effects of the omitted factors that are associated with sources of careers guidance and advice. In the case at hand, because we would expect the correlation between unobserved characteristics which lead to dropout and respondents' ratings of career guidance to be positive, we suspect that the estimates of the effect of career guidance on dropout are likely to be biased upwards (i.e. too high).

A major disadvantage of the study lies in not providing much insight into the causal mechanisms leading to dropout and non-entry. In a quantitative study it is very difficult, however, to do more than obtain a few (largely indirect) quantifiable observations on the social influences affecting respondent's transitions. Qualitative interviews might provide details of the mechanisms underlying the associations described in this study. The social and administrative characteristics of institutions have also been viewed as being important for student retention. Our analysis was only able to capture broad differences between institutions and it is likely that there is considerable heterogeneity in student dropout between similar institutions in our data.

In conclusion, this study provides useful information on the range of factors that are related to dropout from HE. Although important questions remain about the processes influencing student outcomes, the results support interventions which seek to raise achievement and provide increased career guidance and advice to students prior to applying to university.

References

Christie H, Munro M and Fisher T, 2004, Leaving university early: exploring the differences between continuing and non-continuing students. Studies in Higher Education 29, 617–636.

Crozier G, Reay D, Clayton J, Colliander L, Grinstead J, 2008, Different strokes for different folks: diverse students in diverse institutions – experiences of higher education. Research Papers in Education, 23, 167–177.

Davies P, 2012, Can governments improve higher education through 'informing choice'? British Journal of Educational Studies, 60, 261–276.

Davies R and Elias P, 2003, Dropping out: a study of early leavers from higher education. Research Report 386. Department for Education and Skills.

Draper D and Gittoes M, 2004, Statistical analysis of performance indicators in UK higher education. Journal of the Royal Statistical Society: Series A (Statistics in Society), 167, 449–474.

Harvey L, Drew S and Smith M, 2006, The first-year experience: a review of literature for the Higher Education Academy. York: The Higher Education Academy.

Higher Education Funding Council for England (HEFCE), 2010, Meeting the Information Needs of Users of Public Information about Higher Education. Bristol, HEFCE.

Higher Education Funding Council for England (HEFCE), 2013, Non-continuation rates at English HEIs: Trends for entrants 2005-06 to 2010-11. Bristol, HEFCE.

Higher Education Statistics Agency (HESA), 2009, Performance indicators in higher education in the UK 2007/08. (www.hesa.ac.uk/dox/performanceIndicators/0708/t3a_0708.xls)

Higher Education Statistics Agency (HESA), 2013, Performance Indicators in Higher Education in the UK (http://www.hesa.ac.uk/content/view/2072/141/). Cheltenham, HESA.

Mangan J, Hughes A and Slack K, 2010, Student finance, information and decision making. Higher Education, 60, 459–472.

National Audit Office, 2007, Staying the Course: The Retention of Students in Higher Education. London, The Stationery Office. (Available from http://www.nao.org.uk/report/staying-the-course-the-retention-of-students-in-higher-education/)

Office for Fair Access (OFFA), 2010, What more can be done to widen access to highly selective universities. Bristol, OFFA.

Powdthavee N and Vignoles A, 2009, The socioeconomic gap in university dropouts. BE journal of economic analysis & policy, 9, article 19. (Available from http://www.bepress.com/bejeap/vol9/iss1/art19)

Purcell K, Elias P and Atfield G, 2009, Analysing the relationship between higher education participation and educational and career development patterns. A New classification of higher education institutions, Futuretrack Working Paper No.1. HECSU, Manchester.

Purcell K, Elias P, Atfield G, Behle H, Ellison R, Hughs C, Livanos I and Tzanakou C, 2009a, Plans, Aspirations and Realities: Taking Stock of Higher Education and Career Choices One Year On. HECSU, Manchester.

Purcell K, Elias P, Atfield G, Behle H, Ellison R, Luchinskaya D, Snape J, Conaghan L and Tzanakou C, 2012, Futuretrack Stage 4: Transitions into Employment, Further Study and Other Outcomes. HECSU, Manchester.

Rose-Adams J, 2013, Leaving university early. Widening Participation and Lifelong Learning, 15, 96–112.

Thomas L and Quinn J, 2006, First Generation Entry into Higher Education. Maidenhead, Open University Press.

Appendix A Survey Attrition and Weighting

The Futuretrack survey had a longitudinal design. The use of a longitudinal survey provides several advantages for analysis in comparison to a cross-sectional survey. A longitudinal survey can provide a measure of individual change for each survey member. In addition, longitudinal data are collected in a time sequence that clarifies the direction and magnitude of change among variables. For example, in comparison to a cross-sectional study we can be more confident that in this study the respondent's ratings of career guidance was a cause rather than a reflection of dropout because career guidance was measured at stage 1 and dropout was measured at stage 2. There are, however, some disadvantages to using a longitudinal design. In particular, longitudinal surveys are subject to attrition when respondents who respond in the first stage or set of stages do not respond in subsequent stages. In a longitudinal survey the rate of nonresponse at the initial stage is usually comparable to that of similar cross-sectional surveys but the attrition suffered over time may create serious biases in an analysis.

Whether attrition affects the statistical analysis of the survey data depends on the variables one is interested in. If one aims to use the survey to estimate the fraction in the population with a certain characteristic, then a systematically high or low dropout among those who have this characteristic biases the estimate. However, if one aims to estimate a model, and the only difference between the sample of respondents who remain in the survey and the initially selected sample is in the distribution of explanatory variables which are included in the analysis, then attrition does not affect the estimation results (Fitzgerald, Gottschalk and Moffitt 1998).

Surveys of young people in higher education do not typically yield high response rates. The first stage of Futuretrack had an overall response rate of around 24 percent, in line with that found in previous postal surveys of graduates approximately 2 years after their graduation (Elias *et al*. 1999). The characteristics of respondents at stage 1 were not representative of all UCAS applicants, however. In particular, a comparison of information provided by UCAS for both responding and non-responding individuals showed that respondents were more likely than nonrespondents to be female and to have higher UCAS tariff points scores. A weight was calculated to adjust for nonresponse at stage 1. The weight was calculated by defining all respondents as members of weighting classes using the cross-classification of UCAS tariff points score and gender. The respondents in each class are then weighted in proportion to the inverse of the probability of response in that class. The weights ranged in magnitude from 2.1 to 6.4. The method used to calculate the weight assumes that the characteristics of respondents and non-respondents are the same within a given weighting class. This assumption may not be correct and its appropriateness needs to be considered for each analysis.

Attrition from the survey has also been substantial. Table 1 shows the number of respondents at each stage of the survey. The first column in the table shows the number of respondents remaining in the sample by stage. As the table indicates in the second column, about 34 per cent of stage 1 respondents remained after the second stage, implying an attrition rate of 66 per cent. The actual number attriting is shown in the third column, with conditional attrition rates shown in parentheses. It is noticeable that the attrition rate has been approximately constant over time with a similar proportion of respondents leaving the survey at each stage after the first. By stage 4, only 10 per cent of the original respondents were still in the study, corresponding to a cumulative attrition rate of 90 per cent. The final column in the table shows the number of individuals who came back into the survey from nonresponse ("In from nonresponse") each year. These figures are substantial reflecting the effort given to advertising the survey through social media and higher education institutions.

Table 1 Stage 1 responses for respondents with complete and incomplete responses

Stage	Total remaining in sample	% of stage 1 sample	Attrition	In from nonresponse
1	105816	1	-	-
2	36409	0.344	69407 (0.655)	-
3	18649	0.176	19123 (0.525)	1363
4	11719	0.110	11816 (0.633)	4886

Note: these attrition rates condition on being a respondent at stage 1.

In order to examine whether the data remain cross-sectionally representative in spite of substantial attrition the second and third columns of Table 2 show the proportion of respondents with each characteristic measured at the first stage who did not respond at stage 2 versus those who did while column 4 shows the odds ratio of attrition at stage 2 for each characteristic. As the first two columns indicate, respondents who did and did not provide information at stage 2 have many significant differences in characteristics. Attritors are more likely to be aged 19-20 and 21-25 years, Black, male, have studied business & administrative studies, mass communication and documentation or creative arts & design, have parents from routine and manual occupations or parents who did not attend higher education, have non-standard or low UCAS tariff points scores, have applied to higher education from further education, be resident in Greater London or have attended a medium or low tariff university. The clear implication of this pattern is that attritors are concentrated in the lower portion of the socioeconomic distribution.

In order to adjust for the effects of attrition in longitudinal analysis a longitudinal weight was calculated at each stage. The calculation of the longitudinal weight first calculates an attrition weight using the inverse of the probability of response within cells defined by the cross-classification of UCAS tariff points score and gender. The longitudinal weight is then given by the product of the previous stage weight and the attrition weight. The longitudinal weight is intended to allow inference to the entire population from that portion of the sample that responded to each stage. These weights are zero for individuals who were non-respondents at any time during the respective reference period.

The extent to which the weights are successful in adjusting for the effects of attrition was tested by examining the effect of controlling for UCAS tariff points score and gender on the magnitude and statistical significance of the association between the explanatory variables

and dropout. If the weights are effective in adjusting for attrition, adjusting for the UCAS tariff points score and gender should reduce the size and statistical significance of the association between dropout and the explanatory variables.

The results in column 4 show that adjustment for UCAS tariff points score and gender results in significant attenuation of the relationship between dropout and respondent characteristics for most of the explanatory variables. The use of the longitudinal weight in our analyses should therefore remove the most significant effects of attrition from the survey and the results in our study are likely to be broadly representative of those that would have been obtained in the population. It should be noted however that the relationship between several of the explanatory variables and dropout remains statistically significant. While the calculated weights may remove the most significant effects of attrition a degree of caution is needed in interpreting the results.

References:

Fitzgerald J, Gottschalk P and Moffitt R, 1998, An Analysis of Sample Attrition in Panel Data: The Michigan Panel Study of Income Dynamics. Journal of Human Resources, 33, 251-299.

Elias P, McKnight A, Pitcher J, Purcell K, Simm C, 1999, Moving on: graduate careers three years after graduation. Manchester, Careers Services Unit

Table 2 Characteristics of stage 1 respondents who did and did not respond at stage 2

Stage 1 Characteristics	Number of	Stage 2 No	Stage 2 Yes	Odds Ratio	Adjusted
Age					
18 and under	57310	64.9	35.1	1	1
19-20	27632	68.6	31.4	0.85***	0.95**
21-25	10289	67.3	32.7	0.90***	1.32***
26 and over	10565	59.5	40.5	1.26***	1.91***
Ethnicity					
Asian	9393	69.4	30.6	1	1
Black	4902	73.7	26.3	0.81***	0.81***
White	82912	62.9	37.1	1.34***	1.25***
Mixed	2990	65.0	35.0	1.22***	1.13**
Other	1134	64.3	35.7	1.26***	1.26***
Gender					
Male	38637	66.5	33.5	1	1
Female	67121	65.1	34.9	1.06***	0.71
Subject					
Medicine & dentistry	3181	58.2	41.8	1	1
Subjects allied to medicine	7027	63.7	36.3	0.79***	1.05
Biology, vet science, agriculture & related	9711	63.5	36.5	0.80***	1.06
Physical sciences	4476	57.6	42.4	1.03	1.29***
Mathematical & comp science	5110	62.0	38.0	0.85***	1.14**
Engineering technologies	4448	63.4	36.6	0.80***	1.06
Architecture build & plan	1520	70.5	29.5	0.58***	0.78***
Social studies	7701	64.6	35.4	0.76***	0.99
Law	4130	67.1	32.9	0.68***	0.84***
Business & admin studies	7748	72.9	27.1	0.52***	0.74***
Mass communication and documentation	2032	72.5	27.5	0.53***	0.77***
Linguistics and classics	3182	62.1	37.9	0.85**	1
Languages	4185	61.6	38.4	0.87**	1.03
History & philosophical studies	3442	60.4	39.6	0.91	1.12*
Creative arts & design	9100	70.2	29.8	0.59***	0.84***
Education	3416	66.3	33.7	0.71***	1
Interdisciplinary subjects	8282	65.6	34.4	0.73***	0.97
Parental Occupation					
Managerial and professional occupations	42954	64.2	35.8	1	1
Intermediate occupations	16982	65.4	34.6	0.95**	1.01
Routine and manual occupations	18501	67.9	32.1	0.85***	0.95*
Not known & UCS missing	27379	66.4	33.6	0.91***	0.99
Parental Education					
Neither/not declared	56980	67.5	32.5	1	1
One of parents	25140	64.8	35.2	1.13***	1.06***
Both parents	23696	61.8	38.2	1.28***	1.09***
Self-confidence					
Excellent	16569	71.0	29.0	1	1
Very good	33056	67.0	33.0	1.21***	1.18***
Good	35948	64.4	35.6	1.36***	1.33***
Adequate	14749	61.4	38.6	1.54***	1.49***
Not very good	5213	58.8	41.2	1.72***	1.67***

UCAS Tariff Points

Stage 1 Characteristics	Number of	Stage 2		Odds Ratio	Adjusted
		No	Yes		
Non-standard	24260	67.0	33.0	1	1
Low	16551	73.5	26.5	0.73***	0.73***
Medium	24826	69.0	31.0	0.91***	0.99
High	34193	58.6	41.4	1.43***	2.08***
School Type					
Further/higher education	26733	68.7	31.3	1	1
Comprehensive school	29468	64.8	35.2	1.19***	1.04*
Sixth form college	11906	65.5	34.5	1.16***	0.98
Sixth form centre	702	65.2	34.8	1.17	1.08
Grammar school	5572	60.2	39.8	1.45***	1.11**
Independent school	8803	64.4	35.6	1.21***	0.91**
Other maintained	5863	62.7	37.3	1.30***	1.10**
Other	1312	70.0	30.0	0.94	0.87*
Not known	9440	65.9	34.1	1.14***	1.09***
Region of Residence					
North East	3676	68.1	31.9	1	1
Yorkshire & the Humber	7472	67.4	32.6	1.04	0.99
North West	8547	67.4	32.6	1.03	0.97
East Midlands	6583	65.5	34.5	1.13**	1.11*
West Midlands	8387	63.9	36.1	1.21***	1.18***
Eastern	9064	63.6	36.4	1.22***	1.18***
Greater London	15053	69.7	30.3	0.93	0.94
South East	14343	62.5	37.5	1.28***	1.23***
South West	8667	61.6	38.4	1.33***	1.31***
Wales	4375	65.4	34.6	1.13**	1.17**
Northern Ireland	3010	70.3	29.7	0.9	0.92
Scotland	8478	66.1	33.9	1.10*	0.93
Merseyside	2116	68.1	31.9	1	0.99
Other UK	28	78.6	21.4	0.58	0.63
Institution Type					
Highest tariff university	24791	58.7	41.3	1	1
High tariff university	21994	63.6	36.4	0.81***	0.98
Medium tariff university	27243	69.6	30.4	0.62***	0.84***
Lower tariff university	10208	70.1	29.9	0.61***	0.83***
General HE college	1610	70.1	29.9	0.61***	0.80***
Specialist HE college	2845	68.2	31.8	0.66***	0.85***
Clearing					
No	94441	65.4	34.6	1	1
Yes	5358	70.6	29.4	0.79***	0.89***
Number of Sources of Advice					
0 to 3 sources	51790	68.2	31.8	1	1
4 to 5 sources	33381	63.8	36.2	1.22***	1.10***
6 to 11 sources	9944	60.3	39.7	1.41***	1.16***
Missing	10701	63.7	36.3	1.22***	1.15***
Careers Guidance Satisfaction					
High	35172	64.6	35.4	1	1
Moderate	36451	66.2	33.8	0.93***	0.94***

Stage 1 Characteristics	Number of	Stage 2		Odds Ratio	Adjusted
		No	Yes		
Low	29877	66.0	34.0	0.94***	0.96*
Positive Career Attitudes					
High	61017	65.7	34.3	1	1
Medium	28661	65.8	34.2	1	1.04*
Low	15814	64.5	35.5	1.05**	1.12***

[1] Odds ratio adjusted for gender and UCAS tariff points score

Appendix B Logistic Regression Model

Regression models are used to describe how one variable varies as a function of another variable or set of variables. The logistic regression model is used to analyse outcomes where the response is either `No' or `Yes' (coded as 0 and 1, respectively). In the logistic model the probability of a `Yes' response for individual i on the dependent variable Y, pi, can written as:

$$P(Y_i = 1) = p_i = \frac{\exp(X_i\beta)}{1 + \exp(X_i\beta)} \qquad (2)$$

or equivalently the logit of pi can be expressed as:

$$\log it(p_i) = \log(\frac{p_i}{1 - p_i}) = X_i\beta \qquad (3)$$

where Xi are variously called the predictor, covariate, independent or explanatory variables and β are as above. The logit transformation is used to ensure that pi lies between 0 and 1. To illustrate the interpretation of the regression coefficients we consider a model with dropout as the dependent variable and a single explanatory variable (e.g. age group with 4 categories: 18 years and under, 19-20 years, 21-25 years and 26 years and over). The logistic model can then be expressed as:

$$\log it(p_i) = \log(\frac{p_i}{1 - p_i}) = \log(\frac{Y_i = 1}{Y_i = 0}) = \beta_0 + Age_{19-20\,years}\beta_2 + Age_{21-25\,years}\beta_3 + Age_{26\,years and over}\beta_4$$

where the effect of age is measured relative to that of the omitted age group (18 years and under). The interpretation of the model usually uses the exponential transformation of the model coefficients which can be interpreted as the ratio of the odds of a positive response for the relevant category of the explanatory variable to the odds of a positive response for the omitted category of the explanatory variable. For example, in the above model the odds of a positive response for a respondent in the youngest age group (18 years and under) is given by:

$$\frac{p_1}{1 - p_{1i}} = \exp(\beta_0)$$

while that for a respondent in the jth age group is given by:

$$\frac{p_i}{1-p_i} = \exp(\beta_0 + \beta_j) \qquad j = 2,3,4$$

The ratio of the odds of a positive outcome for a respondent in the jth age group relative to a respondent in the youngest age group is therefore given by:

$$\psi_{j1} = \frac{p_j/(1-p_j)}{p_1/(1-p_1)} = \exp(\beta_j)$$

If the probability of the outcome is rare (i.e. < 0.1), the exponentiated coefficients can approximately be interpreted as a ratio of probabilities since p/(1-p) is approximately equal to p when p < 0.1

One of the advantages of using a statistical model is that it provides measures of the uncertainty associated with the model coefficients. For example, a t-test can be used to test the null hypothesis that the true regression coefficients are zero where the test statistic is:

$$t = \frac{\beta}{SE(\beta)}$$

and SE(β) is the standard error of the estimated regression coefficient which quantifies the sampling variability of the estimate. The p-value associated with the test statistic gives the probability of observing a statistic as extreme as the value found assuming that the null hypothesis is true. In this report we follow the convention of using either one, two or three asterisks * to highlight the level of statistical significance of the coefficient estimates (one asterisk represents p < 0.05, two is p < 0.01 and three is p < 0.001). In this report we also follow the usual convention of using p < 0.05 as a threshold at which the null hypothesis that the coefficient is equal to zero is rejected.

Appendix C Data Tables

Appendix Table 1 Respondent age and transitions between stage 1 and stage 2.

Age Group	Response at Stage 2											Total
	Complete			Dropout			Deferred			Non-entry			
	N	Col%	Row%	N	Col%	Row%	N	Col%	Row%	N	Col%	Row%	
18 years and under	15891	57.4	80.1	660	51.8	3.3	2980	70.4	15.0	296	33.1	1.5	19827
19-20 years	6078	22.0	84.3	311	24.4	4.3	635	15.0	8.8	184	20.6	2.6	7208
21-25 years	2564	9.3	82.6	142	11.2	4.6	250	5.9	8.1	148	16.5	4.8	3104
26 years and over	3157	11.4	79.9	160	12.6	4.0	368	8.7	9.3	267	29.8	6.8	3952
Total	27690			1273			4233			895			

Appendix Table 2 Respondent gender and transitions between stage 1 and stage 2.

Gender	Response at Stage 2											Total
	Complete			Dropout			Deferred			Non-entry			
	N	Col%	Row%	N	Col%	Row%	N	Col%	Row%	N	Col%	Row%	
Women	17877	64.6	81.1	837	65.8	3.8	2729	64.5	12.4	612	68.4	2.8	22055
Men	9813	35.4	81.5	436	34.2	3.6	1504	35.5	12.5	283	31.6	2.4	12036
Total	27690			1273			4233			895			

Appendix Table 3 Respondent ethnicity and transitions between stage 1 and stage 2.

Ethnicity	Response at Stage 2											Total
	Complete			Dropout			Deferred			Non-entry			
	N	Col%	Row%	N	Col%	Row%	N	Col%	Row%	N	Col%	Row%	
Asian	2287	8.3	84.8	89	7.0	3.3	273	6.4	10.1	48	5.4	1.8	2697
Black	908	3.3	79.4	36	2.8	3.1	173	4.1	15.1	27	3.0	2.4	1144
Mixed	749	2.7	78.2	46	3.6	4.8	136	3.2	14.2	27	3.0	2.8	958
Other	320	1.2	83.8	10	0.8	2.6	41	1.0	10.7	11	1.2	2.9	382
White	23407	84.6	81.0	1092	85.8	3.8	3610	85.3	12.5	782	87.4	2.7	28891
Total	27671			1273			4233			895			

Appendix Table 4 Respondent level of prior academic achievement and transitions between stage 1 and stage 2.

Tariff Score	Response at Stage 2												Total
	Complete			Dropout			Deferred			Non-entry			
	N	Col%	Row%	N	Col%	Row%	N	Col%	Row%	N	Col%	Row%	N
Non-standard/Missing	6379	23.0	80.2	370	29.1	4.7	745	17.6	9.4	458	51.2	5.8	7952
Low	3370	12.2	77.5	240	18.9	5.5	547	12.9	12.6	192	21.5	4.4	4349
Medium	6254	22.6	81.5	294	23.1	3.8	981	23.2	12.8	145	16.2	1.9	7674
High	11687	42.2	82.8	369	29.0	2.6	1960	46.3	13.9	100	11.2	0.7	14116
Total	27690			1273			4233			895			

Tariff score categories: low = 1 to 239 points, medium = 240 to 359 points, high = 360 to 540+ points

Appendix Table 5 Transitions between stage 1 and stage 2 and respondent family characteristics.

	Response at Stage 2												Total
	Complete			Dropout			Deferred			Non-entry			
	N	Col%	Row%	N	Col%	Row%	N	Col%	Row%	N	Col%	Row%	N
Child < 5 years	667	2.5	73.5	134	3.2	14.8	48	3.8	5.3	58	6.5	6.4	907
Child 5-12 years	1264	4.6	80.3	173	4.1	11.0	63	5.0	4.0	74	8.3	4.7	1574
Child 13-18 years	1044	3.8	75.8	211	5.0	15.3	58	4.6	4.2	65	7.3	4.7	1378
Adult dependents living with me	856	3.1	70.6	221	5.3	18.2	61	4.8	5.0	74	8.3	6.1	1212
Adult dependents not living with me	337	1.2	76.2	61	1.5	13.8	20	1.6	4.5	24	2.7	5.4	442
None	24185	89.0	81.9	3603	85.9	12.2	1074	85.0	3.6	666	74.8	2.3	29528
Number	27183			4196			1264			890			

Note: percentages may not add to 100 per cent due to multiple response options

Appendix Table 6 Region of residence and transitions between stage 1 and stage 2.

Region	Response at Stage 2											Total
	Complete			Dropout			Deferred			Non-entry		
	N	Col%	Row%	N	Col%	Row%	N	Col%	Row%	N	Col%	Row%	
North East	976	3.5	83.4	58	4.6	5.0	109	2.6	9.3	27	3.0	2.3	1170
Yorks & Humber	2001	7.2	82.5	90	7.1	3.7	285	6.7	11.8	49	5.5	2.0	2425
North West	2313	8.4	83.4	124	9.7	4.5	273	6.4	9.8	65	7.3	2.3	2775
East Midlands	1857	6.7	82.1	88	6.9	3.9	259	6.1	11.4	59	6.6	2.6	2263
West Midlands	2529	9.1	83.6	121	9.5	4.0	316	7.5	10.4	59	6.6	2.0	3025
Eastern	2663	9.6	81.2	104	8.2	3.2	416	9.8	12.7	98	10.9	3.0	3281
Greater London	3665	13.2	80.7	148	11.6	3.3	613	14.5	13.5	115	12.8	2.5	4541
South East	4188	15.1	78.2	173	13.6	3.2	837	19.8	15.6	156	17.4	2.9	5354
South West	2545	9.2	76.8	105	8.2	3.2	555	13.1	16.8	108	12.1	3.3	3313
Wales	1251	4.5	82.9	70	5.5	4.6	156	3.7	10.3	32	3.6	2.1	1509
Northern Ireland	741	2.7	83.4	39	3.1	4.4	75	1.8	8.4	33	3.7	3.7	888
Scotland	2385	8.6	83.2	123	9.7	4.3	289	6.8	10.1	69	7.7	2.4	2866
Merseyside	570	2.1	84.4	30	2.4	4.4	50	1.2	7.4	25	2.8	3.7	675
Total	27684			1273			4233			895			

Appendix Table 7 Transitions between stage 1 and stage 2 and respondent self-reported skills and abilities.

	Response at Stage 2											Total
	Complete			Dropout			Deferred			Non-entry		
	N	Col%	Row%	N	Col%	Row%	N	Col%	Row%	N	Col%	Row%	
Written	2243	8.2	81.6	89	7.1	3.2	333	7.9	12.1	85	9.6	3.1	2750
Spoken	3318	12.1	81.8	184	4.5	14.6	445	11.0	10.6	107	2.6	12.0	4054
Numeracy	5491	20.0	79.3	325	25.9	4.7	881	21.0	12.7	223	25.1	3.2	6920
Computer	3325	12.1	78.7	165	13.1	3.9	602	14.3	14.3	131	14.7	3.1	4223
Confidence	5968	21.7	81.3	355	28.2	4.8	815	19.4	11.1	205	23.1	2.8	7343
Total	27516			1257			4205			889			

Appendix Table 8 Parental occupation and transitions between stage 1 and stage 2.

| | Response at Stage 2 | | | | | | | | | | | | | |
| | Complete | | | Dropout | | | Deferred | | | Non-entry | | | Total |
Parental Occupation	N	Col%	Row%	N	Col%	Row%	N	Col%	Row%	N	Col%	Row%	Row%
Professional/managerial	14350	51.8	80.0	582	45.7	3.2	2595	61.3	14.5	417	46.6	2.3	17944
Intermediate	5597	20.2	82.0	280	22.0	4.1	750	17.7	11.0	196	21.9	2.9	6823
Routine/semi-routine	6642	24.0	82.7	355	27.9	4.4	775	18.3	9.6	260	29.1	3.2	8032
NA/Missing	1101	4.0	85.2	56	4.4	4.3	113	2.7	8.7	22	2.5	1.7	1292
Total	27690			1273			4233			895			

Appendix Table 9 Parental education and transitions between stage 1 and stage 2.

| | Response at Stage 2 | | | | | | | | | | | | | |
| | Complete | | | Dropout | | | Deferred | | | Non-entry | | | Total |
Parental Education	N	Col%	Row%	N	Col%	Row%	N	Col%	Row%	N	Col%	Row%	Row%
Neither parent/NA	14754	53.3	82.3	761	59.8	4.2	1845	43.6	10.3	562	62.8	3.1	17922
One parent	6791	24.5	81.6	286	22.5	3.4	1056	24.9	12.7	193	21.6	2.3	8326
Both parents	6145	22.2	78.4	226	17.8	2.9	1332	31.5	17.0	140	15.6	1.8	7843
Total	27690			1273			4233			895			

Appendix Table 10 Type of prior educational establishment attended by the respondent and transitions between stage 1 and stage 2.

| | Response at Stage 2 | | | | | | | | | | | | | |
| | Complete | | | Dropout | | | Deferred | | | Non-entry | | | Total |
Type of school	N	Col%	Row%	N	Col%	Row%	N	Col%	Row%	N	Col%	Row%	Total
Further/higher education	6844	24.7	82.1	403	31.7	4.8	773	18.3	9.3	313	35.0	3.8	8333
Comprehensive school	8433	30.5	81.6	367	28.8	3.6	1344	31.8	13.0	190	21.2	1.8	10334
Sixth form	3551	12.8	81.9	155	12.2	3.6	552	13.0	12.7	79	8.8	1.8	4337
Grammar school	1842	6.7	83.5	56	4.4	2.5	279	6.6	12.6	29	3.2	1.3	2206
Independent school	2339	8.4	74.9	88	6.9	2.8	663	15.7	21.2	32	3.6	1.0	3122
Other maintained/Other	2152	7.8	83.7	68	5.3	2.6	305	7.2	11.9	46	5.1	1.8	2571
Not known	2529	9.1	79.3	136	10.7	4.3	317	7.5	9.9	206	23.0	6.5	3188
Total	27690			1273			4233			895			

Appendix Table 11 Type of higher education institution and transitions between stage 1 and stage 2.

Institution Type	Complete			Dropout			Deferred			Non-entry			Total
	N	Col%	Row%	N	Col%	Row%	N	Col%	Row%	N	Col%	Row%	
Highest	8748	32.6	85.6	290	24.5	2.8	1163	42.8	11.4	16	10.0	0.2	10217
High	6962	26.0	87.3	276	23.3	3.5	700	25.8	8.8	35	21.9	0.4	7973
Medium	7223	26.9	87.4	393	33.2	4.8	585	21.5	7.1	67	41.9	0.8	8268
Lowest	3066	11.4	87.3	193	16.3	5.5	222	8.2	6.3	32	20.0	0.9	3513
Specialist	818	3.1	90.3	31	2.6	3.4	47	1.7	5.2	10	6.3	1.1	906
Total	26817			1183			2717			160			

Appendix Table 12 Probability of dropout by parental occupation and institution type

Parental Occupation	Institution Type									
	Highest		High		Medium		Lowest		Specialist	
	Total	Dropout % (N)	Total	Dropout % (N)	Total	Dropout % (N)	Total	Dropout % (N)	Total	Dropout % (N)
Professional/managerial	6712	2.7 (179)	4290	3.1 (133)	3524	4.5 (159)	1380	4.3 (60)	470	2.6 (12)
Intermediate	1759	2.8 (50)	1601	4.5 (72)	1810	4.9 (88)	768	5.1 (39)	206	4.4 (9)
Routine/semi-routine	1523	3.5 (53)	1785	3.3 (59)	2546	5.2 (133)	1140	6.8 (77)	198	4.5 (9)
NA/Missing	223	3.6 (8)	297	4.0 (12)	388	3.4 (13)	225	7.6 (17)	32	3.1 (1)

Appendix Table 13 Probability of dropout by parental education and institution type

Parental Education	Institution Type									
	Highest		High		Medium		Lowest		Specialist	
	Total	Dropout % (N)	Total	Dropout % (N)	Total	Dropout % (N)	Total	Dropout % (N)	Total	Dropout % (N)
None/NA	3714	3.2 (120)	4153	3.6 (149)	5358	5.1 (273)	2394	5.8 (140)	475	4.2 (20)
One	2746	3.2 (89)	2033	3.0 (62)	1869	4.1 (77)	736	4.2 (31)	218	3.2 (7)
Both	3757	2.2 (81)	1787	3.6 (65)	1041	4.1 (43)	383	5.7 (22)	213	1.9 (4)

Appendix Table 14 Subject studied and number of dropouts between stage 1 and stage 2

Subject	Number of students	Dropout % (N)
Medicine/dentistry	1325	1.1 (15)
Subjects allied to medicine	2539	3.7 (95)
Biological sciences	3533	3.5 (123)
Physical sciences	1897	3.0 (57)
Maths/computing	1937	4.3 (83)
Engineering	1621	3.7 (60)
Architecture/planning	447	4.0 (18)
Social sciences	2720	3.7 (100)
Law	1352	3.6 (49)
Business	2088	4.1 (86)
Mass communication	558	6.3 (35)
Linguistics/classics	1204	3.6 (43)
Languages	1604	4.2 (68)
History/philosophy	1361	3.5 (47)
Creative arts/design	2703	4.7 (126)
Education	1148	4.3 (49)
Interdisciplinary subjects	2840	4.5 (129)
Total	30877	3.8 (1183)

Appendix Table 15 Responses to survey questions concerning career attitudes and transitions between stage 1 and stage 2.

Table 15a A HE qualification is a good investment

	Response at Stage 2												
	Complete			Dropout			Deferred			Non-entry			Total
	N	Row%	Col%	N	Row%	Col%	N	Row%	Col%	N	Row%	Col%	
Strongly agree	15671	82.3	57.5	663	3.5	53.0	2375	12.5	57.0	337	1.8	38.8	19046
Agree	10013	81.0	36.7	484	3.9	38.7	1484	12.0	35.6	388	3.1	44.6	12369
Not sure	1417	75.5	5.2	83	4.4	6.6	269	14.3	6.5	109	5.8	12.5	1878
Disagree	140	64.5	0.5	16	7.4	1.3	31	14.3	0.7	30	13.8	3.5	217
Strongly disagree	24	61.5	0.1	5	12.8	0.4	5	12.8	0.1	5	12.8	0.6	39

Table 15b For most good jobs a degree is essential

	Response at Stage 2												
	Complete			Dropout			Deferred			Non-entry			Total
	N	Row%	Col%	N	Row%	Col%	N	Row%	Col%	N	Row%	Col%	
Strongly agree	7346	82.6	26.9	333	3.7	26.6	1058	11.9	25.4	153	1.7	17.6	8890
Agree	11799	82.2	43.3	509	3.5	40.7	1702	11.9	40.9	338	2.4	38.9	14348
Not sure	4227	79.7	15.5	208	3.9	16.6	708	13.4	17.0	159	3.0	18.3	5302
Disagree	3619	78.0	13.3	187	4.0	14.9	644	13.9	15.5	187	4.0	21.5	4637
Strongly disagree	274	73.7	1.0	14	3.8	1.1	52	14.0	1.2	32	8.6	3.7	372

Table 15c Education is valuable in its own right

	Response at Stage 2												
	Complete			Dropout			Deferred			Non-entry			Total
	N	Row%	Col%	N	Row%	Col%	N	Row%	Col%	N	Row%	Col%	
Strongly agree	13962	81.4	51.2	609	3.6	48.7	2200	12.8	52.8	377	2.2	43.4	17148
Agree	11897	81.6	43.6	560	3.8	44.8	1707	11.7	41.0	413	2.8	47.5	14577
Not sure	1057	77.5	3.9	60	4.4	4.8	195	14.3	4.7	52	3.8	6.0	1364
Disagree	309	76.9	1.1	18	4.5	1.4	56	13.9	1.3	19	4.7	2.2	402
Strongly disagree	40	69.0	0.1	4	6.9	0.3	6	10.3	0.1	8	13.8	0.9	58

Table 15d One of the main benefits of HE is the opportunity for extra-curricular activities

	Response at Stage 2													Total
	Complete			Dropout			Deferred			Non-entry				
	N	Row%	Col%	N	Row%	Col%	N	Row%	Col%	N	Row%	Col%		
Strongly agree	4325	80.6	15.9	185	3.4	14.8	733	13.7	17.6	120	2.2	13.8		5363
Agree	12655	81.3	46.4	554	3.6	44.3	1986	12.8	47.7	363	2.3	41.8		15558
Not sure	6545	81.8	24.0	339	4.2	27.1	909	11.4	21.8	212	2.6	24.4		8005
Disagree	3439	81.1	12.6	153	3.6	12.2	500	11.8	12.0	149	3.5	17.1		4241
Strongly disagree	301	78.8	1.1	20	5.2	1.6	36	9.4	0.9	25	6.5	2.9		382

Table 15e Being a HE student provides opportunities for personal growth and independence

	Response at Stage 2													Total
	Complete			Dropout			Deferred			Non-entry				
	N	Row%	Col%	N	Row%	Col%	N	Row%	Col%	N	Row%	Col%		
Strongly agree	14963	81.7	54.9	673	3.7	53.8	2320	12.7	55.7	361	2.0	41.5		18317
Agree	11409	81.0	41.8	517	3.7	41.3	1723	12.2	41.4	429	3.0	49.4		14078
Not sure	707	77.4	2.6	48	5.3	3.8	97	10.6	2.3	62	6.8	7.1		914
Disagree	154	77.8	0.6	11	5.6	0.9	22	11.1	0.5	11	5.6	1.3		198
Strongly disagree	32	76.2	0.1	2	4.8	0.2	2	4.8	0.0	6	14.3	0.7		42

Appendix Table 16 Transitions between stage 1 and stage 2 and respondent career attitudes.

Career Attitudes	Response at Stage 2													Total
	Complete			Dropout			Deferred			Non-entry				
	N	Row%	Col%	N	Row%	Col%	N	Row%	Col%	N	Row%	Col%		
High	15742	82.1	57.7	661	3.4	52.8	2422	12.6	58.2	341	1.8	39.2		19166
Medium	7468	81.6	27.4	364	4.0	29.1	1071	11.7	25.7	248	2.7	28.5		9151
Low	4055	77.5	14.9	226	4.3	18.1	671	12.8	16.1	280	5.4	32.2		5232
Total	27265			1251			4164			869				

Appendix Table 17 Responses to survey questions concerning sources of career advice

Source of Advice	Complete		Response at Stage 2					
			Dropout		Deferred		Non-entry	
	Col%	N	Col%	N	Col%	N	Col%	N
Family	31.1	8455	25.6	313	29.8	463	21.4	87
Friends	22.1	6000	24.2	296	22.2	344	13.8	56
Teachers	18.7	5079	17.3	212	19.3	299	14.8	60
Students already studying there	23.4	6371	19.5	239	23.4	364	15.3	62
School career adviser	6.0	1630	5.4	66	6.6	102	5.9	24
Good universities' guide	36.5	9936	28.2	345	35.5	551	15.8	64
Teaching reputation	48.1	13083	40.4	495	44.4	690	29.3	119
Research reputation	25.4	6904	20.2	247	24.1	375	14.0	57
Reputation generally	55.0	14951	44.8	548	54.5	847	34.2	139
University prospectus	41.2	11204	39.0	477	36.7	570	33.7	137
Visit to institution	64.2	17456	55.6	681	58.4	907	37.7	153
Could continue to live at home	24.5	6666	27.2	333	23.0	357	37.7	153
Wanted to study away from home	28.7	7797	28.2	345	27.8	431	15.8	64
Attractive place	46.9	12769	44.8	548	45.3	704	27.3	111
Offered particular course	63.2	17189	64.6	791	59.1	918	58.6	238
Course fees/bursaries available	12.3	3357	12.8	157	11.5	179	14.8	60
Cost of living considerations	13.3	3618	14.1	172	12.4	192	15.8	64
Availability of suitable accommodation	13.4	3633	13.4	164	10.4	161	7.9	32
Personal reasons	12.9	3517	16.9	207	13.2	205	13.3	54
Number	27204		1224		1553		406	

Note: percentages may not add to 100 per cent due to multiple response options

Appendix Table 18 Transitions between stage 1 and stage 2 and the number of sources of advice used by respondents.

Career Advice	Response at Stage 2															Total
	Complete			Dropout			Deferred			Non-entry						
	N	Col%	Row%	N	Col%	Row%	N	Col%	Row%	N	Col%	Row%				
Low	13461	48.6	88.0	716	56.2	4.7	817	19.3	5.3	302	33.7	2.0				15296
Medium	7611	27.5	90.7	308	24.2	3.7	409	9.7	4.9	66	7.4	0.8				8394
High	6132	22.1	91.6	200	15.7	3.0	327	7.7	4.9	38	4.2	0.6				6697
Missing	486	1.8	13.1	49	3.8	1.3	2680	63.3	72.4	489	54.6	13.2				3704
Total	27690			1273			4233			895						

Appendix Table 19 Respondents career advice scale and parental occupation

Parental Occupation	Number of Sources															Total
	Low			Medium			High			Missing						
	N	Row%	Col%	N	Row%	Col%	N	Row%	Col%	N	Row%	Col%				
Professional/managerial	7617	39.0	15.7	5015	25.7	21.0	4440	22.7	26.0	2458	12.6	23.9				19530
Intermediate	3541	48.3	7.3	1822	24.9	7.6	1263	17.2	7.4	705	9.6	6.9				7331
Routine/semi-routine	4581	53.2	9.4	1944	22.6	8.1	1339	15.5	7.8	754	8.7	7.3				8618
Missing/NA	32827	51.0	67.6	15081	23.4	63.2	10046	15.6	58.8	6366	9.9	61.9				64320
Total	48566			23862			17088			10283						

Appendix Table 20 Respondents career advice scale and parental education

Parental Education	Number of Sources															Total
	Low			Medium			High			Missing						
	N	Row%	Col%	N	Row%	Col%	N	Row%	Col%	N	Row%	Col%				
Both parents	7869	37.1	16.2	5460	25.8	22.9	5019	23.7	29.4	2849	13.4	27.7				21197
One parents	10936	46.1	22.5	5890	24.8	24.7	4387	18.5	25.7	2522	10.6	24.5				23735
Neither/Not declared	29761	54.2	61.3	12512	22.8	52.4	7682	14.0	45.0	4912	9.0	47.8				54867
Total	48566			23862			17088			10283						

Appendix Table 21 Respondents career advice scale and type of institution prior to HE

| | Response at Stage 2 | | | | | | | | | | | | | Total |
| | High | | | Medium | | | Low | | | Missing | | | |
Institution Type	N	Row%	Col%	N	Row%	Col%	N	Row%	Col%	N	Row%	Col%	N
Comprehensive school	13440	45.6	27.7	7533	25.6	31.6	5508	18.7	32.2	2987	10.1	29.0	29468
Further/higher education	16066	60.1	33.1	5483	20.5	23.0	2856	10.7	16.7	2328	8.7	22.6	26733
Grammar school	1973	35.4	4.1	1597	28.7	6.7	1443	25.9	8.4	559	10.0	5.4	5572
Independent school	2506	28.5	5.2	2262	25.7	9.5	2597	29.5	15.2	1438	16.3	14.0	8803
Not known	6045	64.0	12.4	1702	18.0	7.1	709	7.5	4.1	984	10.4	9.6	9440
Other maintained/Other	2917	40.7	6.0	1915	26.7	8.0	1630	22.7	9.5	713	9.9	6.9	7175
Sixth form	5619	44.6	11.6	3370	26.7	14.1	2345	18.6	13.7	1274	10.1	12.4	12608
Total	48566			23862			17088			10283			

Appendix Table 22 Responses to survey questions concerning satisfaction with career guidance

Table 22a I had access to all the information I required about higher education course

| | Response at Stage 2 | | | | | | | | | | | | | Total |
| | Complete | | | Dropout | | | Deferred | | | Non-entry | | | |
	N	Row%	Col%	N	Row%	Col%	N	Row%	Col%	N	Row%	Col%	N
Strongly agree	5092	83.2	18.7	199	3.3	16.0	714	11.7	17.1	112	1.8	12.9	6117
Agree	15805	81.8	58.0	681	3.5	54.6	2379	12.3	56.8	448	2.3	51.6	19313
Not sure	3500	79.9	12.8	198	4.5	15.9	537	12.3	12.8	148	3.4	17.1	4383
Disagree	2446	76.8	9.0	141	4.4	11.3	470	14.8	11.2	128	4.0	14.7	3185
Strongly disagree	413	73.9	1.5	28	5.0	2.2	86	15.4	2.1	32	5.7	3.7	559

Table 22b I have had excellent careers guidance

| | Response at Stage 2 | | | | | | | | | | | | | Total |
| | Complete | | | Dropout | | | Deferred | | | Non-entry | | | |
	N	Row%	Col%	N	Row%	Col%	N	Row%	Col%	N	Row%	Col%	N
Strongly agree	1872	82.0	7.3	84	3.7	7.2	283	12.4	7.1	44	1.9	5.8	2283
Agree	6598	81.8	25.8	251	3.1	21.5	1062	13.2	26.5	158	2.0	20.7	8069
Not sure	6852	82.2	26.8	253	3.0	21.7	1048	12.6	26.1	182	2.2	23.8	8335
Disagree	7366	79.9	28.8	409	4.4	35.0	1183	12.8	29.5	256	2.8	33.5	9214
Strongly disagree	2869	79.7	11.2	170	4.7	14.6	437	12.1	10.9	125	3.5	16.3	3601

Table 22c I found the UCAS website easy to use

| | | | | | | Response at Stage 2 | | | | | | |
| | Complete | | | Dropout | | | Deferred | | | Non-entry | | | Total |
	N	Row%	Col%	N	Row%	Col%	N	Row%	Col%	N	Row%	Col%	N
Strongly agree	7530	82.5	27.6	341	3.7	27.1	1056	11.6	25.3	197	2.2	22.5	9124
Agree	15907	81.2	58.4	689	3.5	54.8	2500	12.8	59.8	486	2.5	55.5	19582
Not sure	1893	79.0	6.9	111	4.6	8.8	308	12.9	7.4	83	3.5	9.5	2395
Disagree	1558	78.9	5.7	83	4.2	6.6	258	13.1	6.2	76	3.8	8.7	1975
Strongly disagree	369	75.2	1.4	33	6.7	2.6	56	11.4	1.3	33	6.7	3.8	491

Table 22d University/college websites and prospectuses were helpful

| | | | | | | Response at Stage 2 | | | | | | |
| | Complete | | | Dropout | | | Deferred | | | Non-entry | | | Total |
	N	Row%	Col%	N	Row%	Col%	N	Row%	Col%	N	Row%	Col%	N
Strongly agree	8336	83.0	30.6	371	3.7	29.7	1176	11.7	28.1	163	1.6	18.8	10046
Agree	16613	81.1	61.0	739	3.6	59.1	2574	12.6	61.5	561	2.7	64.7	20487
Not sure	1501	76.4	5.5	94	4.8	7.5	283	14.4	6.8	86	4.4	9.9	1964
Disagree	698	76.5	2.6	42	4.6	3.4	129	14.1	3.1	44	4.8	5.1	913
Strongly disagree	96	71.1	0.4	4	3.0	0.3	22	16.3	0.5	13	9.6	1.5	135

Table 22e My family were very supportive in my choice of course

| | | | | | | Response at Stage 2 | | | | | | |
| | Complete | | | Dropout | | | Deferred | | | Non-entry | | | Total |
	N	Row%	Col%	N	Row%	Col%	N	Row%	Col%	N	Row%	Col%	N
Strongly agree	12567	82.9	47.0	495	3.3	41.0	1809	11.9	43.9	287	1.9	35.1	15158
Agree	10692	80.7	40.0	486	3.7	40.3	1700	12.8	41.3	373	2.8	45.7	13251
Not sure	2101	79.4	7.9	123	4.6	10.2	344	13.0	8.4	79	3.0	9.7	2647
Disagree	1007	76.3	3.8	67	5.1	5.6	190	14.4	4.6	55	4.2	6.7	1319
Strongly disagree	364	73.2	1.4	36	7.2	3.0	74	14.9	1.8	23	4.6	2.8	497

Table 22f My friends influenced my choice(s)

| | Response at Stage 2 | | | | | | | | | | | | |
| | Complete | | | Dropout | | | Deferred | | | Non-entry | | | Total |
	N	Row%	Col%	N	Row%	Col%	N	Row%	Col%	N	Row%	Col%	
Strongly agree	568	81.3	2.2	31	4.4	2.6	80	11.4	2.0	20	2.9	2.6	699
Agree	3247	82.3	12.6	186	4.7	15.8	407	10.3	10.1	106	2.7	13.7	3946
Not sure	3419	83.4	13.2	134	3.3	11.4	466	11.4	11.6	82	2.0	10.6	4101
Disagree	11422	81.5	44.2	496	3.5	42.2	1747	12.5	43.6	354	2.5	45.6	14019
Strongly disagree	7160	79.4	27.7	328	3.6	27.9	1311	14.5	32.7	214	2.4	27.6	9013

Table 22g Teachers/lecturers were very helpful to me

| | Response at Stage 2 | | | | | | | | | | | | |
| | Complete | | | Dropout | | | Deferred | | | Non-entry | | | Total |
	N	Row%	Col%	N	Row%	Col%	N	Row%	Col%	N	Row%	Col%	
Strongly agree	3743	82.5	14.6	169	3.7	14.3	544	12.0	13.7	83	1.8	11.3	4539
Agree	13100	82.3	51.2	539	3.4	45.7	1953	12.3	49.0	323	2.0	44.1	15915
Not sure	4911	80.2	19.2	237	3.9	20.1	824	13.5	20.7	151	2.5	20.6	6123
Disagree	2991	78.1	11.7	170	4.4	14.4	535	14.0	13.4	132	3.4	18.0	3828
Strongly disagree	847	78.4	3.3	65	6.0	5.5	126	11.7	3.2	43	4.0	5.9	1081

Table 22h Careers guidance provided at my school/college was very helpful to me

| | Response at Stage 2 | | | | | | | | | | | | |
| | Complete | | | Dropout | | | Deferred | | | Non-entry | | | Total |
	N	Row%	Col%	N	Row%	Col%	N	Row%	Col%	N	Row%	Col%	
Strongly agree	1671	81.2	6.9	84	4.1	7.7	270	13.1	7.1	34	1.7	5.2	2059
Agree	7178	81.7	29.8	300	3.4	27.3	1133	12.9	29.7	178	2.0	27.3	8789
Not sure	5678	81.3	23.6	229	3.3	20.9	937	13.4	24.5	140	2.0	21.5	6984
Disagree	6193	80.8	25.7	306	4.0	27.9	981	12.8	25.7	187	2.4	28.7	7667
Strongly disagree	3369	81.0	14.0	178	4.3	16.2	500	12.0	13.1	113	2.7	17.3	4160

Table 22i I needed more help and advice in choosing which course to study

| | Response at Stage 2 | | | | | | | | | | | | Total |
| | Complete | | | Dropout | | | Deferred | | | Non-entry | | | |
	N	Row%	Col%	N	Row%	Col%	N	Row%	Col%	N	Row%	Col%	
Strongly agree	1305	75.9	5.1	94	5.5	7.9	245	14.2	6.1	76	4.4	9.9	1720
Agree	4872	78.1	19.0	287	4.6	24.1	860	13.8	21.5	222	3.6	28.8	6241
Not sure	4062	80.6	15.8	211	4.2	17.7	661	13.1	16.5	104	2.1	13.5	5038
Disagree	10626	82.3	41.4	437	3.4	36.7	1570	12.2	39.2	271	2.1	35.1	12904
Strongly disagree	4805	83.9	18.7	161	2.8	13.5	666	11.6	16.6	98	1.7	12.7	5730

Table 22j I found it difficult to choose course(s)

| | Response at Stage 2 | | | | | | | | | | | | Total |
| | Complete | | | Dropout | | | Deferred | | | Non-entry | | | |
	N	Row%	Col%	N	Row%	Col%	N	Row%	Col%	N	Row%	Col%	
Strongly agree	1934	75.5	7.4	116	4.5	9.6	426	16.6	10.5	86	3.4	10.7	2562
Agree	5271	78.5	20.1	314	4.7	26.0	950	14.2	23.4	176	2.6	21.9	6711
Not sure	2846	81.0	10.9	138	3.9	11.4	445	12.7	11.0	83	2.4	10.3	3512
Disagree	9640	82.3	36.8	418	3.6	34.5	1369	11.7	33.7	288	2.5	35.9	11715
Strongly disagree	6489	83.7	24.8	224	2.9	18.5	871	11.2	21.4	170	2.2	21.2	7754

Appendix Table 23 Transitions between stage 1 and stage 2 and respondent ratings of career guidance

| | Response at Stage 2 | | | | | | | | | | | | Total |
| Career Guidance | Complete | | | Dropout | | | Deferred | | | Non-entry | | | |
	N	Col%	Row%	N	Col%	Row%	N	Col%	Row%	N	Col%	Row%	
High	9766	36.7	83.7	355	29.0	3.0	1311	31.9	11.2	236	29.2	2.0	11668
Moderate	9445	35.5	81.7	400	32.7	3.5	1472	35.8	12.7	244	30.2	2.1	11561
Low	7380	27.8	77.6	469	38.3	4.9	1330	32.3	14.0	327	40.5	3.4	9506
Total	26591			1224			4113			807			

Appendix Table 24 Reasons for applying to enter HE and transitions between stage 1 and stage 2

Reason for applying to enter HE	Response at Stage 2							
	Complete		Dropout		Deferred		Non-entry	
	Col%	N	Col%	N	Col%	N	Col%	N
It is the normal thing to do for somebody like me	38.6	10687	34.1	433	46.9	1983	22.3	199
I want to realise my potential	62.7	17334	58.5	743	60.5	2558	50.6	452
I want to be a student	47.4	13122	45.6	580	50.5	2136	23.7	212
It is part of my longer-term career plans	78.3	21661	72.3	919	76.2	3220	67.9	606
To enable me to get a good job	80.4	22226	75.8	963	79.3	3350	63.8	570
I want to study the particular subject/course	76.3	21104	70.5	896	75.5	3191	65.5	585
Some/all of my friends are doing so.	16.6	4591	17.3	220	20.5	868	12.5	112
My parents encouraged me to apply.	33.4	9240	30.1	382	38.8	1640	21.3	190
My teachers encouraged me to apply	30.7	8503	29.3	373	36.0	1521	23.2	207
I was encouraged to apply by my employer/colleagues	3.3	899	3.1	40	3.5	150	5.3	47
I was influenced by careers advice/info provided at my school/college	14.1	3893	14.5	184	16.2	686	10.8	96
I was influenced by careers advice/info provided elsewhere	7.5	2078	7.2	91	8.3	352	6.2	55
I wasn't sure what to do next and it gave me more options	18.3	5060	24.4	310	21.1	893	23.2	207
I thought it would be better than being unemployed	11.3	3139	16.7	212	13.4	567	11.0	98
Other	2.5	689	4.0	51	2.3	98	5.2	46
Number	27658		1271		4227		893	

Note: percentages may not add to 100 per cent due to multiple response options

Appendix Table 25 Reasons for course of study and transitions between stage 1 and stage 2

Reasons for course of study	Response at Stage 2							
	Complete		Dropout		Deferred		Non-entry	
	Col%	N	Col%	N	Col%	N	Col%	N
I enjoy studying the subject(s)/topic(s).	79.9	22016	76.2	964	80.0	3370	65.2	578
I get good grades in subject(s) related to this course	48.1	13249	43.8	554	49.7	2091	26.7	237
I am interested in the content of the course	82.2	22650	80.0	1012	82.1	3456	71.0	630
It is a modular course and enables me to keep a range of options open	21.7	5971	20.7	262	21.4	902	13.6	121
It includes the opportunity to spend part of the course abroad	14.2	3916	13.5	171	18.2	767	7.8	69
I need to complete this course to enter a particular profession/occupation	45.6	12564	43.1	545	44.0	1853	51.6	458
I think it will lead to good employment opportunities in general	62.3	17169	59.1	747	58.5	2464	50.6	449
It will enable me to qualify for another course	12.4	3404	13.6	172	10.9	459	10.7	95
I had difficulty deciding and it seemed like a reasonable option	8.6	2362	9.6	122	12.0	504	8.8	78
I was advised that the course would be appropriate for me	7.0	1919	8.9	113	8.2	346	8.5	75
Other	1.2	331	2.0	25	1.1	45	2.6	23
Number		27545		1265		4210		887

Note: percentages may not add to 100 per cent due to multiple response options

Appendix Table 26 Intended source of finance and transitions between stage 1 and stage 2

Source of finance	Response at Stage 2							
	Complete		Dropout		Deferred		Non-entry	
	Col%	N	Col%	N	Col%	N	Col%	N
From the Student Loan Company Limited	80.1	21771	80.1	978	73.2	1133	65.9	265
Personal savings/inheritance	44.7	12147	37.2	454	43.2	668	35.3	142
Non-repayable contributions from parents/other family/partner	37.7	10241	31.3	382	32.3	499	23.1	93
Repayable loan from parents/other family/partner	9.8	2673	7.5	92	12.5	193	9.0	36
Local Authority/Student Award Agency for Scotland	15.0	4078	14.3	174	13.5	209	13.2	53
National Health Service/General Social Care Council	6.3	1723	6.6	80	8.9	138	11.2	45
Working during study	53.9	14638	57.6	703	54.1	837	58.2	234
Working during holidays	68.0	18469	65.6	801	64.6	1000	58.2	234
University/college hardship or access funds	8.8	2388	12.0	147	10.7	165	10.9	44
Other forms of borrowing (e.g. credit cards, bank loans, overdrafts etc)	16.9	4580	20.6	252	18.2	282	17.4	70
University/college access funds/bursary	30.6	8314	33.2	405	30.2	467	28.4	114
Sponsorship/bursary from current/prospective employer	3.3	909	2.6	32	5.6	87	8.0	32
Other	1.7	470	0.7	8	1.8	28	3.2	13
Number		27168		1221		1547		402

Note: percentages may not add to 100 per cent due to multiple response options

Appendix Table 27 Reasons for dropping out of or not entering HE

Reason for dropout or not entering HE	Response at Stage 2			
	Dropout		Non-entry	
	N	Col%	N	Col%
The costs	178	20.5	319	35.8
The prospect of incurring debts	162	18.7	326	36.6
Not sure what I wanted to do	250	28.8	250	28.1
Personal reasons unrelated to education, grades or funding	308	35.5	173	19.4
Decided I did not want to go to university	165	19.0	231	26.0
Preferred to get a job	121	13.9	186	20.9
Did not get the grades required to do the course	24	2.8	150	16.9
Preferred to do other training	64	7.4	101	11.3
Preferred to study part-time while earning money	63	7.3	108	12.1
Advised not to proceed to higher education	13	1.5	35	3.9
Number	868		890	

Note: percentages may not add to 100 per cent due to multiple response options

Appendix Table 28 Main activity at stage 4 and transitions between stage 1 and stage 2

Main Activity Stage 4	Response at Stage 2					
	Complete		Dropout		Non-entry	
	N	Col%	N	Col%	N	Col%
Employee	6659	79.1	338	64.1	218	77.3
Self-employed	398	4.7	39	7.4	18	6.4
Studying	161	1.9	33	6.3	13	4.6
Unemployed	944	11.2	78	14.8	13	4.6
Other	148	1.8	16	3.0	4	1.4
Not looking for work	70	0.8	18	3.4	14	5.0
Total	8380		522		280	

Appendix Table 29 Occupation at stage 4 and transitions between stage 1 and stage 2

Occupation at stage 4	Response at Stage 2						Total
	Complete		Dropout		Non-entry		
	N	Col%	N	Col%	N	Col%	
Professional/Managerial	3086	44.5	52	14.7	47	21.3	3185
Other	3850	55.5	302	85.3	174	78.7	4326
Total	6936		354		221		

Appendix Table 30 Annual wage at stage 4 and transitions between stage 1 and stage 2

Annual Wage (£)	Complete		Dropout		Non-entry	
	N	Col%	N	Col%	N	Col%
<10000	840	12.2	66	18.2	32	14.2
10000-11999	349	5.1	32	8.8	10	4.4
12000-14999	584	8.5	46	12.7	22	9.8
15000-17999	906	13.2	69	19.1	25	11.1
18000-20999	843	12.3	38	10.5	28	12.4
21000-23999	1197	17.4	29	8.0	29	12.9
24000-26999	916	13.3	41	11.3	17	7.6
27000-31999	469	6.8	14	3.9	17	7.6
30000-32999	322	4.7	8	2.2	16	7.1
33000-35999	160	2.3	3	0.8	10	4.4
36000-39999	116	1.7	6	1.7	4	1.8
40000-49999	97	1.4	1	0.3	7	3.1
50000-59999	30	0.4	4	1.1	3	1.3
60000-79999	26	0.4	4	1.1	2	0.9
>80000	20	0.3	1	0.3	3	1.3
Total	6875		362		225	

Appendix Table 31 Means of variables for mature respondents separately for respondents who completed and dropped out of HE during the first year

Variable	Completed			Dropout		
	N	Row%	Col%	N	Row%	Col%
<u>Gender</u>						
Male	1393	94.1	32.0	87	5.9	39.7
Female	2954	95.7	68.0	132	4.3	60.3
<u>Ethnicity</u>						
White	3721	95.5	85.6	176	4.5	80.4
Non-white	626	93.6	14.4	43	6.4	19.6
<u>Children in Household</u>						
None	2657	95.4	61.1	129	4.6	58.9
Child < 5 years	402	93.7	9.2	27	6.3	12.3
Child 5-12 years	804	95.6	18.5	37	4.4	16.9
Child 13-18 years	484	94.9	11.1	26	5.1	11.9
<u>Parental Education</u>						
Neither/not declared	2817	95.1	64.8	144	4.9	65.8
One of parents	904	95.4	20.8	44	4.6	20.1
Both parents	626	95.3	14.4	31	4.7	14.2
<u>Parental Occupation</u>						
Managerial and professional	1765	95.1	40.6	91	4.9	41.6
Intermediate	993	96.0	22.8	42	4.0	19.2
Routine and manual	1352	95.2	31.1	69	4.8	31.5
Not known / missing	237	93.5	5.5	17	6.5	7.8
<u>UCAS Tariff Points</u>						
Non-standard / Missing	3637	95.1	83.7	186	4.9	84.9
Low	451	95.4	10.4	22	4.6	10.0
Medium	154	95.7	3.5	7	4.3	3.2
High	105	96.3	2.4	4	3.7	1.8
<u>Number of Sources of Advice</u>						
0 to 3 sources	3124	95.2	71.9	159	4.8	72.6

| Variable | Response at Stage 2 | | | | | |
| | Completed | | | Dropout | | |
	N	Row%	Col%	N	Row%	Col%
4 to 5 sources	880	95.1	20.2	45	4.9	20.5
6 to 11 sources	343	95.8	7.9	15	4.2	6.8
Careers Guidance Satisfaction						
High	2243	95.8	51.6	98	4.2	44.7
Moderate	1281	95.7	29.5	57	4.3	26.0
Low	823	92.8	18.9	64	7.2	29.2
Institution Type						
Highest	703	94.9	16.2	38	5.1	17.4
High	989	95.6	22.8	46	4.4	21.0
Medium	1582	95.5	36.4	74	4.5	33.8
Low	858	93.9	19.7	56	6.1	25.6
Specialist	215	97.7	4.9	5	2.3	2.3
Subject Group						
Specialist vocational	1584	95.5	36.4	75	4.5	34.2
Occupationally-oriented	2310	94.9	53.1	125	5.1	57.1
Discipline-based academic	453	96.0	10.4	19	4.0	8.7
Number	4347			219		