

Employability Skills in UK Economics Degrees

Report for the Economics Network

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Further information at: www.economicsnetwork.ac.uk

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Related documents

Interested readers can find the following additional materials relating to the project on the Economics Network website: <https://www.economicsnetwork.ac.uk/research/employability>.

1. Notes of focus group discussions
2. Copy of survey sent to Economics Departments
3. Copy of Survey FAQ sent to Economics Departments
4. Case study examples of how economics departments are embedding employability skills development in their degrees
5. Employers Surveys:
https://www.economicsnetwork.ac.uk/projects/surveys#Employer_Surveys

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Executive summary

In light of the increased policy focus on employability in higher education, and parallel criticism of economics degrees, this research report considers whether economics departments are providing sufficient targeted opportunities in their degrees for students to develop skills that are valued by employers. We do not make a judgement about whether degrees are the appropriate vehicle for developing employability skills, leaving that discussion for elsewhere, but instead focus on what the best approach to take is, assuming an economics department has made a choice to do more in this area.

We consider three inter-related research questions:

1. Are there gaps between what departments are doing and what employers are looking for?
2. Are the strategies used to develop employability skills in degrees effective?
3. What challenges need to be overcome to improve skills development in degrees?

To answer these questions, we reviewed the literature on employability in higher education. Our understanding of employer requirements comes from the [Economics Network Employer Surveys](#). Information about what is happening in economics degrees comes from our 2019 survey of economics departments, which was completed by 39 departments (out of a total of 95 eligible departments). We gained further insights from two focus groups involving employers, academics and students.

Our findings, given the nature of our methodology and information base, provide a descriptive indication of the current state of employability skills development in UK economics degrees. We have issues with small sample size and selection bias; however, we believe the research is valuable for our purpose which is to spark a fruitful conversation on how to practically improve the way that skills development is embedded in degrees. This report provides at least some evidence, not previously available, to inform those discussions. Moving conversations away from a critique of economics degrees to focus on what actions to take will benefit economics undergraduates in the UK.

Is there a gap between what employers are looking for and what is happening in degrees?

Economics departments and employers seem to largely prioritise the same skills areas, namely communication, application to the real world and data analysis. Both say that collaboration and wider employability skills, such as resilience, are also important but are less of a priority.

Figure 1: Comparison of employer and economics department priorities

Skill area	Degree priority rank 1 = top priority	Employer priority rank 1= top priority	Employer concern about graduate skills
Communication	3	2	High
Application to the real world	2	3	Medium
Data analysis	1	1	Low
Collaboration	5	-	High
Wider employability skills	4	4	High

However, as shown in Figure 1, employers say that economics graduates do not have high levels of skill in these areas. This may be because economics departments have only recently introduced activities designed to develop these skills and as a result there will be a lag before employers see improvements. The gap may also arise because economics departments interpret these skills in different ways to employers.

On communication, the focus is on traditional academic writing in degrees whereas employers are looking for both written and presentation skills aimed at non-expert audiences. Similarly, for collaboration economics departments focus, albeit in a limited way, on working with other economists whereas employers are looking for graduates who are confident working with colleagues from any discipline.

Considering data analysis, both employers and economics departments value strong technical/econometric skills. However, employers value more basic skills such as being able to find, clean and organise datasets, as well as being able to use Excel and coding software. There is some, but limited focus on these aspects of data analysis in degrees.

It is harder to say for sure how employers and economics departments vary in their interpretation of 'application to the real world'. Employers are interested in graduates being able to analyse policy and commercial problems and being able to simplify complex ideas in an accessible way. Lecturers may explain to students how economics connects to real world issues rather than asking them to develop frameworks to analyse problems.

If an economics department wants to provide opportunities for students to develop skills that matter most to employers, it is not enough to read a list of employer priority skills. An in-depth discussion with employers is needed so there is a common understanding of what those skills mean in a work context.

Are the approaches that economics departments are using effective for skill development?

The skill level of economics graduates may also be limited if the teaching and learning strategies being used are not effective for skills development. Figure 2 sets out the criteria, based on literature and ideas from our focus groups, that we think are needed for a degree to be effective in this area.

Figure 2: Criteria for effectively embedding employability skills development in degree



We find, based on the departments that responded to our survey, that there is a lot happening in economics degrees that is going in the right direction.

Economics departments are taking responsibility for employability skills, working with careers services and societies. Yet, it is unclear how much is coordinated within the degree.

Around 60% of those surveyed had a placement experience as part of the degree. In most cases these were optional or not available to all students. It is unclear to what extent activities in modules are closely related to what happens 'on the job'. Although case studies provided suggest there are good examples out there, the focus groups suggest it is not the norm.

Opportunities for the development of academic writing, applying economics and data analysis are provided, according to our survey respondents, in economics modules rather than bespoke skills or careers modules. The opportunities are generally provided across all years of the degree, with a slight increase in the final year. These skills appear to be developed over time alongside economics content. Opportunities to develop other skills are less frequent but still spread across years and still mainly within economics modules.

Figure 3: Skills development in the classroom

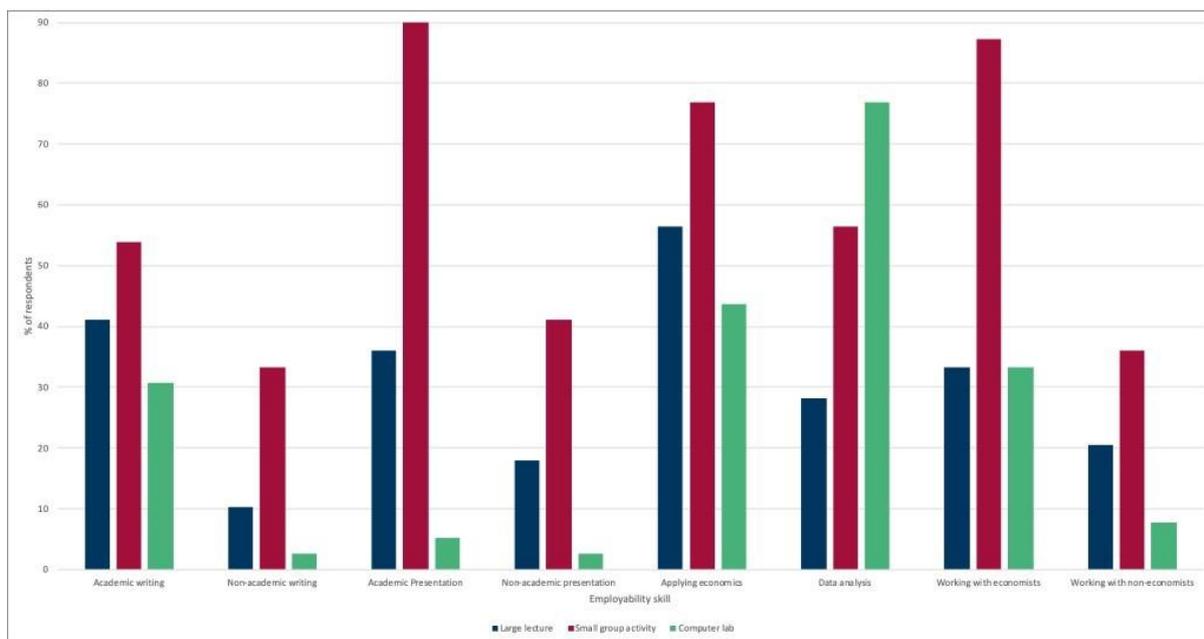
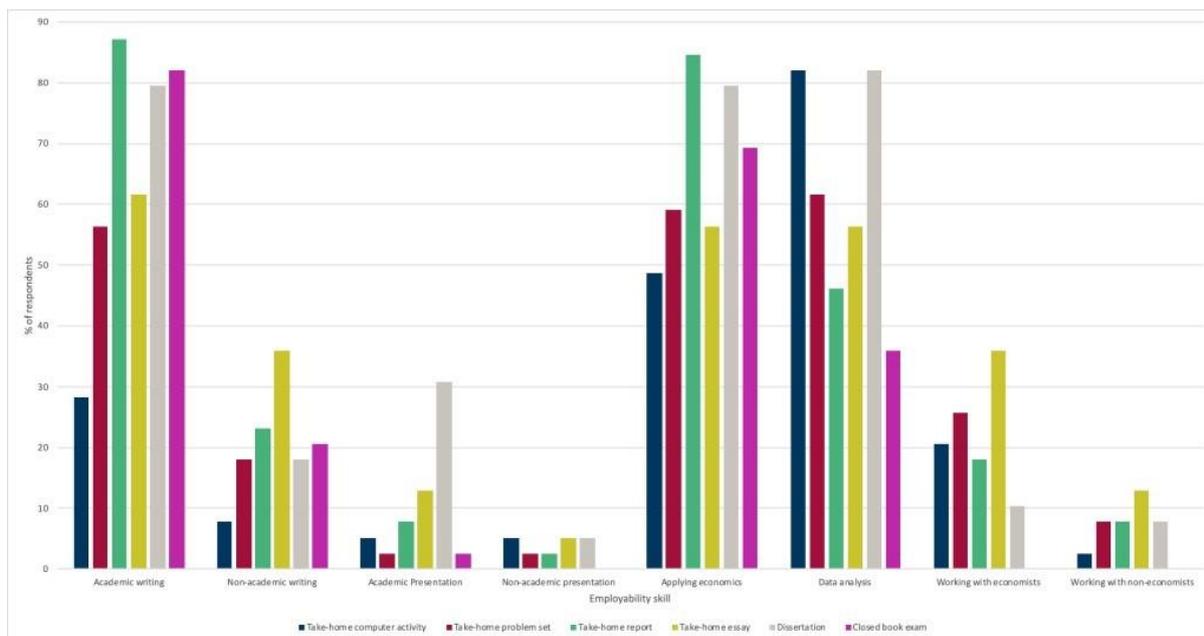
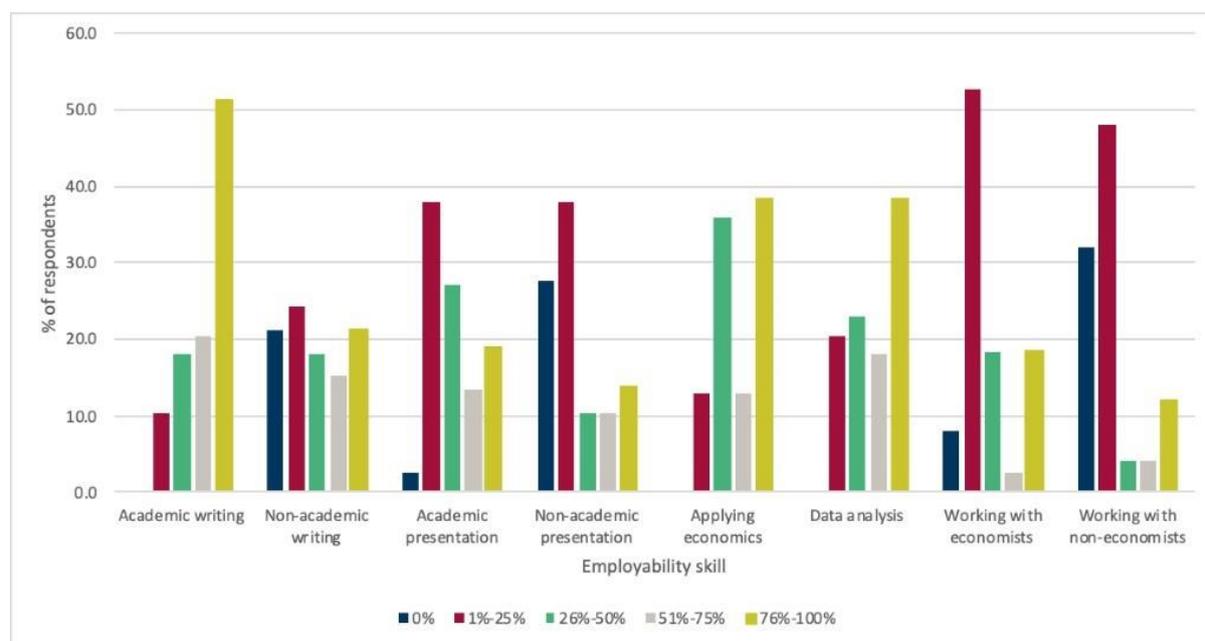


Figure 4: Skills development through take-home activities and closed-book exams



As shown in Figure 3 and Figure 4, small group classes are the main vehicle for developing skills, although many of those surveyed also say that skills are developed in large lectures. Whether or not the skills are genuinely developed depends on how active students are in those classroom settings. A mix of independent learning activities, including closed book exams, are used to develop skills. It is difficult to say how effective these activities are without further information on precisely what students are asked to do. A closer look at the outputs that students produce shows that there is a strong preference for traditional academic-style essays and presentations. Our focus groups were also sceptical that closed book exams were a reasonable way to assess work-relevant skills.

Figure 5: Percentage of work linked to skill that is summatively assessed



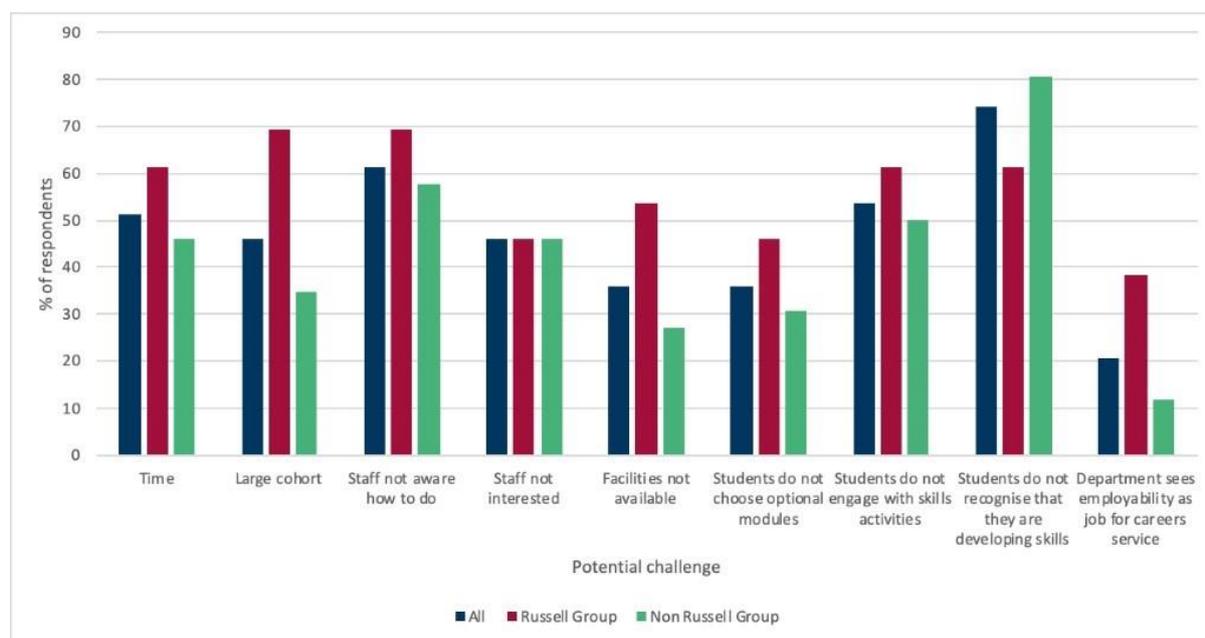
Amongst those that responded to our survey it appears that much of the skills development happens in compulsory modules. It is not clear however whether the activities themselves are considered compulsory. As shown in Figure 5, a high proportion of activities are assessed for academic writing, applying economics and data analysis, which suggests that the incentives to engage should be there. However, it may be the case that only a part of a question links to the skills and may be given less attention by students. Indeed, students may not fully understand how the assessment and skills development connect.

There may be a need to redesign activities, used in the classroom and for independent study, so that they are genuine opportunities for work-related skills development. The nature of assessment, and how clear the importance of skills development in that assessment is, also warrants further consideration.

What are the challenges of doing more and doing it effectively?

Is it by no means an easy task, for an individual lecturer or a whole department, to effectively embed employability skills development into an economics degree. The main challenges, shown in Figure 6, are difficulties with getting students to engage and incentivising and supporting staff.

Figure 6: Percentage of respondents who agreed challenge was a problem or significant problem



Our focus groups suggest that students are more likely to engage if lecturers are transparent about what skills are being developed and explain clearly the connections between skills development and (assessed) activities inside and outside the classroom. Employers can help by explaining to students why it is important to develop skills and assuring them that skills development in the degree is valued.

On supporting and incentivising staff, promotion criteria linked to REF-able research is a difficult hurdle to overcome. More can be done to limit the time and effort required. Encouraging lecturers to use approaches linked to their own research skills may be a good starting point. Establishing processes to make it easier to connect with employers and developing open-source teaching materials that are aligned with what happens ‘on the job’ may also help. These support structures can help lecturers to work out what to teach and how to teach without needing to make significant trade-offs between content and skills.

Next steps

Great efforts are being made by the economics departments in our survey to embed the development of employability skills in their degrees. We hope that this research project provides ideas for further progress. Employability case studies, published on the Economics Network’s website, provide practical insights on what can be done. We will also include a chapter on employability skills in the Economics Network’s Handbook for Economics Lecturers (www.economicnetwork.ac.uk/handbook). Finally, we recommend that the economics education community takes steps to engage with employers more regularly and effectively going forward. The Economics Network welcomes ideas on how this might be facilitated.

1. Introduction

UK and EU higher education policy, epitomised by the Teaching Excellence Framework (TEF), is increasingly focused on the role of universities in preparing graduates for the labour market (e.g. House of Commons Education Committee (2018)). Whilst TEF metrics are narrowly focused on employment and salary levels, there is a wider consideration of what skills graduates need and how universities can help students to develop these skills as part of their degree. These are not new discussions and they are relevant for all disciplines.

Economics does well, compared to other disciplines, when we look at statistics on graduate employment and salary levels. It is less clear whether graduates have the skills they need to be effective, and progress, in the labour market. There has been much criticism of economics as a discipline since the Global Financial Crisis. The economics curriculum in undergraduate degrees has been scrutinised from different angles and in the last ten years, new textbooks and resources have been published to change what is being taught and how it is being taught¹. The criticisms are not only about the content of the curriculum, but they are also about the ability of graduates to make use of what they have learned when they enter the workplace (e.g. *Rethinking Economics*, 2018). Concerns have been raised about degrees being overly technical, and graduates lacking the ability to apply what they have learnt to real world situations, to communicate their ideas clearly to non-experts and to put questions into appropriate contexts.

When the perceived skills gap is discussed, calls are often made for economics departments to solve the problem, although there has been little discussion of how to do this. The 2015 QAA Subject Benchmark provides a framework for considering skills as part of a degree programme, but it is unclear how economics departments have interpreted and implemented the guidelines. There has also been a shift in education pedagogy in many degrees, epitomised by the work of the Economics Network and presentations at the biennial Developments in Economics Education Conference (DEE) over the last ten years. There has not been, as far as we know, any attempt to collate what is happening on economics education pedagogy and link it to the employability discussion.

This report aims to reflect on the criticism of undergraduate economics degrees in the UK by providing up-to-date and collated information on what economics departments are doing to embed employability skills in their degrees. We consider what skills are relevant, comparing the views of employers and the priorities of economics departments. We discuss how economics departments are attempting to incorporate skills development in their degrees and reflect on how effective these strategies are, and consider how best to manage skills gaps, if at all, going forward. Our focus is on teaching and learning activities in the degree, considering the student learning experience during their time at university. We do not discuss the important question of what content should be taught, although we recognise the need to consider teaching pedagogy and content in parallel.

The report should be read as a contribution to the debate on which skills to prioritise and how to help students develop those skills in their degree. The stocktake of what is being done will, we hope, provide a useful evidence-base to on-going discussions. We do not presume that any perceived problem with employability skills should be the sole responsibility of economics departments. Nor do we assume that all economics departments should prioritise employability skills in their degrees. This is a wider question and a decision for each department to make in the context of their own programmes. We are focused on 'how to do it' and leave discussion of 'whether to do it' for elsewhere.

¹See, for example, CORE - www.core-econ.org/

2. Approach to analysis

Based on discussions at the 2017 Developments in Economics Education Conference, and our review of the literature, we identify three research questions:

1. Are there gaps between the skills employers seek and observe in UK economics graduates and the skills that UK departments prioritise in their degrees?
2. How do UK economics departments embed the development of employability skills in their undergraduate economics degrees and how effective are the approaches used?
3. What challenges need to be overcome to improve the development of employability skills in UK undergraduate economics degrees?

We explain our approach to analysing these research questions here.

2.1. Our definition of employability skills

Employability is a term that is often used in relation to higher education, although interpretations of what this term means vary widely (Tomlinson, 2012). In policy reports and the UK TEF, the emphasis is on measuring how many students get a graduate-level job or conversely on graduate unemployment levels (Smith et al., 2011). Rich (2015) highlights that this typically entails helping students secure employment rather than achieve their ‘best-fit career’ (p. 10). As Cranmer et al. (2006) discuss, focusing on employment level provides little incentive to universities to consider how to improve graduate employability in a wider sense. This concern is shared by Pegg et al. (2012).

For others, employability is a broad concept linked to graduates contributing effectively to society (Cole and Tibby (2013)). This view leads to an expectation that higher education institutions should be preparing citizens of the future. Whilst admirable, this is a hard objective to define and measure in a discipline.

Between these definitions sits a wider view that considers employability in terms of preparing students for their long-term careers (Lowden et al. (2011); McCowan (2015); Pegg (2012); Romgens et al. (2019)). This means preparing them to secure their first job and to be effective throughout their career.

Our focus groups discussed what they thought employability meant for economics degrees. They said that graduates must be able to capture an employer’s attention and add value in the workplace during their employment. Employability should also include ensuring graduates are able to identify roles that ‘fit’ with their interests. It was emphasised that the concept of employability should not be specifically linked to professional or academic economist roles, as the destinations of economics graduates are very broad. There was general agreement that:

‘Higher education should prepare students to get a good graduate-level first job and help them to develop skills to enable them to succeed at work and in their wider life’.

In our research we have taken a relatively narrow view of employability by focusing on the set of specific employability skills listed in Table 1.²

² An FAQ document was provided alongside the survey that gave respondents guidance on how to interpret the question. This included the information provided in the table on how to interpret the skills.

Table 1: Employability skills considered in our research

Skill area	Our Interpretation
Communication	Ability to present ideas clearly to a mix of audiences in writing and/or in oral presentations. A distinction can be made between academic and non-academic audiences.
Application to real world	Ability to take economics concepts, models and theories and use them to answer policy or business questions relevant to the organisation. This includes being able to use economics principles and models to frame a question and understanding the need to abstract core features of complex models when using them for relevant real-world analysis.
Data analysis	Ability to work with data. All steps of data analysis can be considered, including finding or creating data, downloading data, analysing it, potentially with statistical or econometric packages, and making inferences based on the analysis.
Collaboration	Ability to work with others. This could be other economists or colleagues from other disciplines.
Wider employability skills	This category is used to capture a range of often-termed ‘softer’ skills including flexibility, reliability, can-do attitude, independent thinking, creativity and imagination, resilience, commercial awareness, time management and project management. These skills tend to be relevant for all disciplines.

2.2. Data sources

We use a mix of primary and secondary data to tackle our research questions.

Our data on employer preferences and perceptions comes from the Economics Network’s 2019 employer survey. As the survey is conducted every few years with no change to the format, we provide indications of trends over time using the 2012 and 2015 surveys. Insights from the Economics Network’s 2007 employer survey and alumni surveys from 2004 and 2008 are also referenced. These surveys focus almost exclusively on organisations that hire economics graduates to work in specific economist roles, providing a bias in the results towards economics-specific careers. Further information on the employers’ surveys can be found on the Economics Network website: https://www.economicsnetwork.ac.uk/projects/surveys#Employer_Surveys.

To assess whether and how UK economics departments are meeting employers’ expectations we need to have a better understanding of what is actually being done in undergraduate degrees. To this end, we conducted a survey of economics departments across the UK. The final survey and accompany FAQ can be found on the Economics Network’s website: <https://www.economicsnetwork.ac.uk/research/employability>.

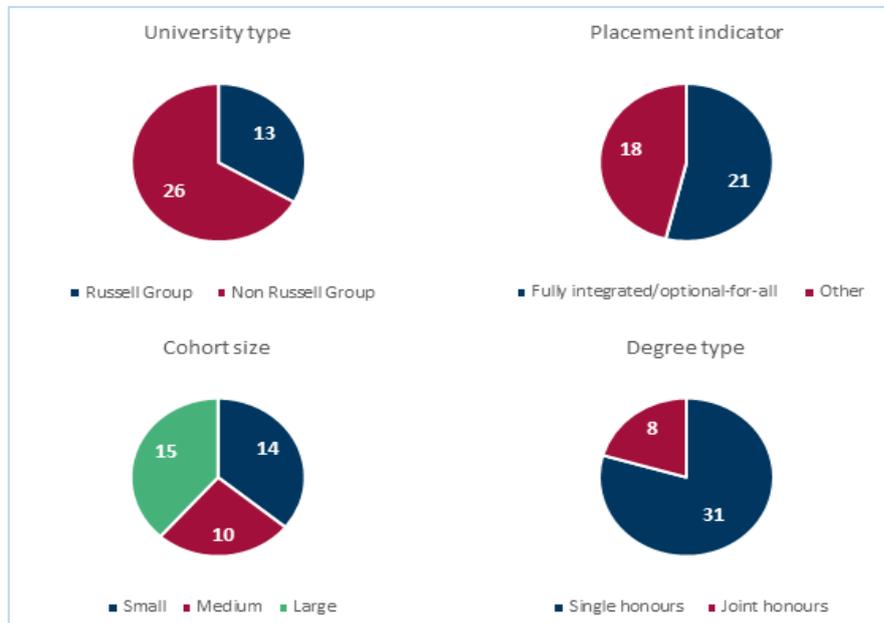
We ran a pilot exercise with Associates of the Economics Network before sending the final survey to 99 economics departments that the Economics Network had contact information for. The survey was open between February and May 2019, and briefly reopened in June 2019 for those who were timed out during teaching term and exam season. Participants were offered the opportunity to complete the survey online, on paper, or by telephone. Four institutions indicated that they do not run an appropriate undergraduate degree for the study. 39 universities responded in total.

To complement the employer surveys and the survey of economics departments, we ran two focus groups at University College London and Aston University in June and July 2019 respectively. They were attended by a mix of employers, academics, recent graduates and current students with 36 participants in total. Although this is a small sample, there was open and fluid conversation under the Chatham House Rule, with many key themes and insights questioned, discussed and debated. The extra depth from these discussions provided useful insights for our research.

2.3. Analysis by type of university

Our sample includes a broad cross-section of the universities running economics degrees in the UK, as shown in Figure 7.

Figure 7: Characteristics of economics departments that responded to survey



The Russell Group is a self-selected collection of 24 research-intensive UK universities, of which 13 are included in our sample. Broadly seen as the most prestigious universities within the UK, graduates from these universities are often targeted by major employers. According to the Institute for Fiscal Studies (2018), going to a Russell Group university can increase earnings by 10% relative to an average degree. We consider whether these economics departments prioritise employability skills in a different way.

Using 2019 National Student Survey (NSS) data for the number of third year undergraduates, we break the sample into three sizes: small courses with less than 100 students, medium courses with between 100 and 250 students, and large courses with more than 250 students. We consider whether size of cohort is an opportunity or constraint on embedding skills development into the degree.

In our survey we asked economics departments to indicate whether they had a placement experience and to explain to what extent the opportunity was open to students. Using their responses, we compare degrees where there is a fully integrated or optional-for-all placement programme to those where placements are not available or are only available to a limited extent. This allows us to explore whether explicit inclusion of a placement experience affects employability skills development within the degree. We consider direct effects from the placement experience and spill-over effects on wider curriculum design.

2.4. Data limitations

Our research fills, to some extent, a gap in information on what is happening with skills development in economics departments as of 2018/19, and how this compares to employer expectations. However, the sample size is small, the set of skills discussed was pre-determined, there are issues with how survey questions were answered by respondents, and there is a selection bias concern. These limitations need to be borne in mind when considering the research presented in this report.

We had a response rate of 41%, based on the 95 eligible economics departments that we sent the survey to. O'Leary (2017) suggests that a 33% response rate is good for online surveys, as rates are usually lower than 25%. However, our sample is too small to allow for a detailed econometric analysis. We rely on a graphical and descriptive approach. We believe that this is sufficient to get a broad overview of what is happening in the economics departments that responded but limits the extent to which we can draw conclusions about all UK economics degrees.

In our surveys we provided a list of skills for respondents to rank or comment on. The focus on a given set of skills allows for deeper discussion of whether and how these skills should be developed in a degree. The disadvantage is that we narrow responder focus and omit other skills, competencies and wider personal attributes that may be relevant (Suleman, 2016). We have tried to capture any additional priority areas through the use of open questions. The definition of the skills is also open to individual interpretation. Our focus groups helped by providing insights on the interpretation of skills and the consensus within these was that there weren't any important skills missing from the list.

As with any survey, it is possible that some questions were interpreted differently by respondents. We included as much detail as possible in the wording of questions and the accompanying FAQ document to negate this risk, but the comprehensive nature of the survey makes it impossible to eliminate this entirely. In particular, the two questions which asked economics departments to rank how they prioritise different skills were answered differently than intended by a large proportion of respondents. We have made adjustments for this in our analysis in Section **Error! Reference source not found.** and believe that our results still provide a useful high-level story on department perceptions.

We asked economics departments to consider, when answering the questions, what was happening within and across modules rather than simply reporting on high-level aims. We cannot be sure if respondents answered in the way intended. It may be the case that some respondents over-stated the extent to which their degree programme helps develop skills, whilst other may have under-played what they are doing. Although there may be biases in individual answers, we find that across the survey respondents, there are relatively consistent messages that are of interest to the sector.

Of the 39 respondents to the survey, many are Associates of the Economics Network and others are members of faculty focused on pedagogic innovation in economics education. These individuals are potentially more engaged with student employability and learning than more research-focused colleagues. Similarly, the students who came to the focus groups were likely more motivated and career-oriented than the average student. Many of the employers present had also actively engaged with universities on employability skills, for example by giving guest lectures or running skills workshops. As a result, we are getting insights from the most engaged academics, employers and students. The spectrum of what is happening in economics degrees will no doubt be more varied than our research suggests. The selection bias should be borne in mind when analysing the findings.

3. What employability skills are prioritised in economics degrees?

In this section we consider the employability skills that employers say are most important and compare these to the skills that economics departments say they prioritise in their undergraduate degrees. Figure 8 summarises our findings.

Figure 8: Comparison of employer and economics department priorities

Skill area	Degree priority rank 1 = top priority	Employer priority rank 1= top priority	Employer concern about graduate skills
Communication ¹	3	2	High
Application to the real world ²	2	3	Medium
Data analysis ³	1	1	Low
Collaboration ⁴	5	-	High
Wider employability skills ⁵	4	4	High

Notes:

¹Degree priority rank based on proportion of respondents to the 2019 survey of economics departments who said skill area was one of top 2 priorities. Employer priority rank based on average % of employers across 2012, 2015 and 2019 Economics Network employers survey who said skill is very important or somewhat important for economics graduates in relation to the following skill used in the employer survey: communication of economic ideas. Employer concern indicator based on average % of employers across 2012, 2015 and 2019 surveys who said skills was 'not very high' amongst economics graduates based on average across answers relating to the following skills covered in the employer survey: ability to communicate in speech and ability to communicate in writing.

²Degree priority rank based on proportion of respondents to the 2019 survey of economics departments who said skill area was one of top 2 priorities. Employer priority rank based on average % of employers across 2012, 2015 and 2019 who said skill is very important or somewhat important for economics graduates averaged across answers relating to the following skills: abstraction, ability to analyse economic, social and business issues, and framing. Employer concern indicator based on average % of employers across 2012, 2015 and 2019 Economics Network employers surveys who said skill was 'not very high' amongst economics graduates averaged across answers relating to the following skills covered in the employer survey: ability to apply what has been learned in wider context and problem-solving strategies and skills.

³Degree priority rank based on proportion of respondents to the 2019 survey of economics departments who said skill area was one of top 2 priorities. Employer priority rank based on average % of employers across 2012, 2015 and 2019 who said skill is very important or somewhat important for economics graduates based on answers relating to the following skills: ability to organise, interpret and present quantitative data. Employer concern indicator based on average % of employers across 2012, 2015 and 2019 Economics Network employers surveys who said skill was 'not very high' amongst economics graduates averaged across answers relating to the following skills covered in the employer survey: ability to analyse and interpret quantitative data, and fluency with IT/Computers.

⁴Degree priority rank based on proportion of respondents to the 2019 survey of economics departments who said skill area was one of top 2 priorities. Skill area not included in top 5 employer priority areas based on average % of employers across 2012, 2015 and 2019 who said related skills are very important or somewhat important for economics graduates. Employer concern indicator based on average % of employers across 2012, 2015 and 2019 Economics Network employers surveys who said skill was 'not very high' amongst economics graduates in relation to the following skills covered in the employer survey: awareness of cross-cultural issues, critical self-awareness and ability to work effectively with others.

⁵Degree priority rank based on proportion of respondents to the 2019 survey of economics departments who said skill area was one of top 2 priorities. Skill area not included in top 5 employer priority areas based on average % of employers across 2012, 2015 and 2019 who said related skills are very important or somewhat important for economics graduates. Employer concern indicator based on average % of employers across 2012, 2015 and 2019 Economics Network employers surveys who said skills was 'not very high' amongst economics graduates in relation to the following skills covered in the employer survey: adaptability, general creative and imaginative powers, and independence of viewpoint and judgement.

In broad terms the set of skills that are prioritised in economics degrees are in line with what employers say are important. However, employers argue that graduates do not always have strong skills in these

areas. We look in more detail at the survey responses, focus group discussions and literature to understand why this might be, and summarise our findings in Section **Error! Reference source not found.**

3.1. Employer priorities

If an economics department wants to embed development of employability skills in their degrees, they will need a good understanding of which skills are most important to employers. We present a summary of the most relevant results from the Economics Network Employer Surveys and our focus groups here. Anyone interested in more detail on the Employer Surveys can find the information on the Economics Network website: https://www.economicnetwork.ac.uk/projects/surveys#Employer_Surveys. Notes of the focus group discussions can also be found on the website: <https://www.economicnetwork.ac.uk/research/employability>.

In the employer surveys, employers are given a list of skill areas and asked to say how important it is that graduates have each skill. Table 2 shows, for the three most recent Economics Network Employer Surveys, the proportion of employers that state each skill area is ‘somewhat’ or ‘very’ important. The skills that were covered in the employers surveys are at a more granular level than those considered in the survey of UK economics degrees. We have grouped them into similar skill areas for comparison.

Table 2: % of employers who said skill is very important or somewhat important for economics graduates

Skill (%) ¹	2012	2015	2019
Communication			
Communication of economic ideas to both economists and to lay people	100	96	98
Applying economics to the real world			
Abstraction	100	94	98
Ability to analyse economic, social and business issues	100	100	100
Framing	96	86	95
Understanding and interpreting financial matters	65	82	68
Data analysis			
Ability to organise, interpret and present quantitative data	98	100	98
Wider employability skills			
Strategic thinking	88	94	85
Note: ¹ No skill relating to ‘Collaboration’ was included in this question in the Employer Survey			

Based on the answers to this question the three priority skills for employers are:

1. **Application to the real world**, captured by ‘Ability to analyse economic, business and social issues’ and ‘Abstraction’ (the ability to simplify complexity while still retaining relevance).

write and present complex ideas to non-economists. Rethinking Economics (2018) suggest that application is a key skill deficit facing graduates. They also suggest that graduates would benefit from having greater exposure to applied data analysis tasks such as obtaining and cleaning data and providing descriptive statistics. Anand and Leape (2012) similarly emphasise the need in policy-making for basic data gathering and cleaning skills, as well as the ability to generate data through surveys.

These skill areas are not only priorities for economics graduates. Archer and Davison (2008) consider a range of disciplines and identify collaboration and communication as top priority skills. Andrews and Higson (2008) suggest that important skills for business graduates are: working under pressure, strategic thinking, self- and time-management, a willingness to learn and the ability to accept responsibility. Pegg et al. (2012) detail the importance of general skills such as positivity and entrepreneurship. This suggests that the many employers who hire economics graduates alongside graduates from other disciplines may have broadly similar skill requirements to those employers engaged with our research.

3.2. Skills prioritised in economics degrees

In this section we review, based on our survey of UK economics departments, the skills that are prioritised in economics undergraduate degrees. We consider prioritisation by asking economics departments how they rank the skill areas and asking them how much opportunity there is in the degree for students to actively develop the skills. This allows us to capture both intent and action.

Ranking of skills

Economics departments completing the survey were asked to rank the five skill areas from 1 to 5, with 1 being the top priority and 5 being the bottom priority. The aim was to gain an overview of which skill areas academics believe are the most important and how these compare to employer priorities discussed in Section **Error! Reference source not found.**. Caution needs to be exercised as there was some ambiguity and misinterpretation of the question and it is possible that some priorities were not included in the list offered to respondents.³

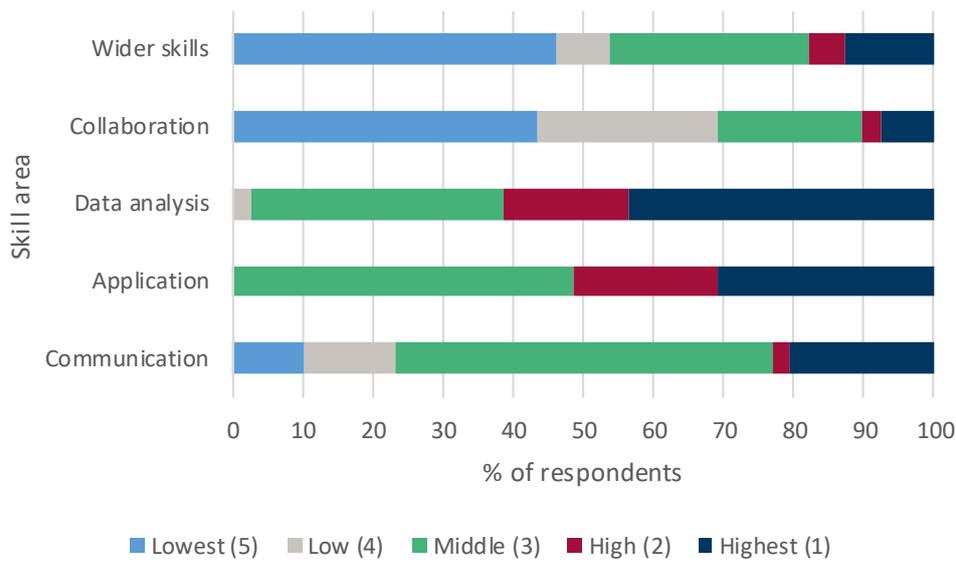
Figure 10 shows the rankings given to each skill area by the respondents after our rank adjustments. The three highest priority skill areas, based on those ranked 1 or 2, in the economics degrees covered by our survey are **data analysis, application to the real world** and **communication**. Although the ordering is slightly different, the top 3 priorities are the same among employers.

³ We adjusted some answers to make our analysis easier. Suppose an example answer was:

- Communication = 1
- Application to the real world = 1
- Data analysis = 2
- Collaboration = 3
- Wider skills = 3

This would be adjusted such that data analysis is given rank 3, and collaboration and wider skills are both given rank 4. The adjustments result in a large over-representation of rank 3. Since the question asks for ordinal rather than cardinal rankings, this superficially changes the response but allows us to more clearly present the data. Our analysis also looks broadly at the top 2 and bottom 2 skills, so to receive a rating of 1 or 2, the skill needs three areas ranked strictly below, and three above for a 'bottom 2' skill, i.e. a ranking vector (1, 1, 5, 5, 5) would be adjusted to (1, 1, 3, 3, 3) and therefore the respondent would have no bottom priority skills in the data. Although this results in the loss of information, we deem it better to accept this rather than over-exaggerate the top and bottom skill areas through unadjusted responses.

Figure 10: % of respondents that gave skill area of rank from 1 (highest) to 5 (lowest)



Data analysis and application to the real world are particularly high priority for Russell Group universities, with 69% ranking the two skills as top priority skills compared to 42% and 58% for non-Russell Group universities. Degrees without a fully integrated or optional-for-all placement year put greater emphasis on ‘data analysis’, ‘applying economics’ and ‘communication’ than those with. This may be to compensate for the fact that students aren’t able to develop these skills in the workplace as part of the degree. Alternatively, it may be because these are the skills most closely associated with academic economics taught in the degree. Degrees with an integrated placement experience place more emphasis on ‘collaboration’ and ‘wider employability skills’ than those without. This may be because students on these degrees have a greater need to develop these skills in the early years of their degree to secure placement opportunities. Alternatively, it could be because the placement experience itself provides more opportunities to develop the skills.

Although the ordering is slightly different, the top 3 priorities are the same for economics departments and employers: communication, application to the real world and data analysis. However, when we look at a more granular list of skills, set out in Figure 11, we find that the emphasis amongst economic degrees is different to what employers state as important.

Figure 11: Granular list of skills included in our survey about economics degrees

<p>Communication</p> <ul style="list-style-type: none"> • Writing for an academic audience • Writing for a non-academic audience • Presentation to an academic audience • Presentation to a non-academic audience
<p>Application to the real world</p> <ul style="list-style-type: none"> • Applying economics to real world contexts • Solving policy or commercial problems • Simplifying complex ideas/information to make them accessible to a wide audience
<p>Data analysis</p> <ul style="list-style-type: none"> • Sourcing and organising quantitative data • Analysing and interpreting quantitative data • Ability to analyse data using Excel • Ability to use statistical/econometric packages
<p>Collaboration</p> <ul style="list-style-type: none"> • Collaboration with economists • Collaboration with non-economists
<p>Wider employability skills</p> <ul style="list-style-type: none"> • Flexibility • Reliability • Can-do attitude • Independent thinking • Creativity and imagination • Resilience • Commercial awareness • Time management • Project management/organisational skills

Economics departments were asked to identify their ‘top 3’ and ‘bottom 3’ skills from this longer list of skills⁴. A skill would be in the top 3 if learning outcomes and learning activities were explicitly and regularly linked to that skill. A skill would be in the bottom 3 if there was little reference to the skill across the programme. We discuss here what the priorities were within each of the main skill areas.

⁴ Many respondents did not answer the question as intended and gave more than six responses, presumably interpreting the question as asking for every skill which fits that definition rather than selecting the three that most describe each definition. Even though the question was not answered as intended, the responses provide insights on what aspects of each skill area departments consider most, and least, important in the economics degrees covered by our survey.

Data analysis is the top priority area for economics degrees and the third priority area for employers. When we look at the longer list of skills, we find, in Figure 12, that all four aspects of this skill area are considered to be ‘top priority’ skills by economics degrees. ‘Analysing data’ and ‘data using econometrics packages’ are the highest priorities, with approximately three quarters and one half of respondents respectively ranking these as ‘top 3’. ‘Sourcing data’ is ranked as ‘top 3’ by 31% of respondents, and ‘data using Excel’ by 26%. Only one Russell Group respondent ranked ‘sourcing data’ as a ‘top 3’ skill compared to 42% for non-Russell Group. None of the Russell Group survey respondents rank ‘data using Excel’ as a ‘top 3’ skill, compared to 39% for the non-Russell Group universities. The focus groups suggested that there was increasing recognition of the importance of Excel training by academics with recently introduced initiatives or plans to provide training in the near future. Figure 13 shows that economics departments in the survey are prioritising Excel, with every non-Russell Group economics departments providing students with opportunities to use the software. The main other programmes that are used are Stata, Eviews and R.

Figure 12: Priority data analysis skills

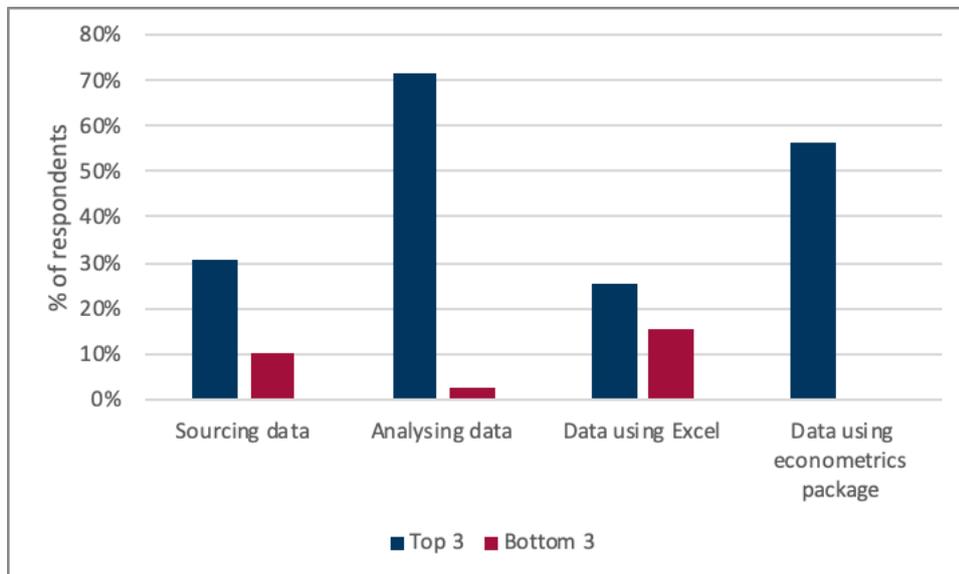
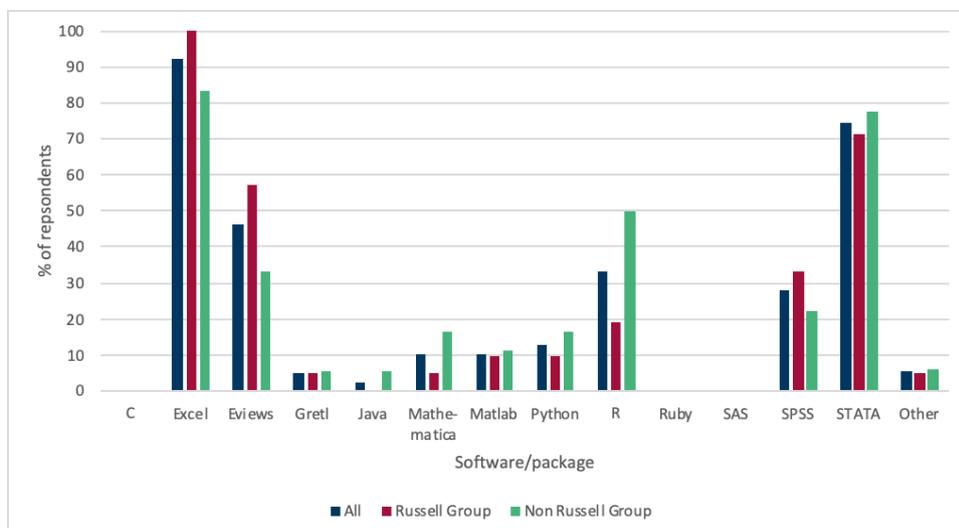
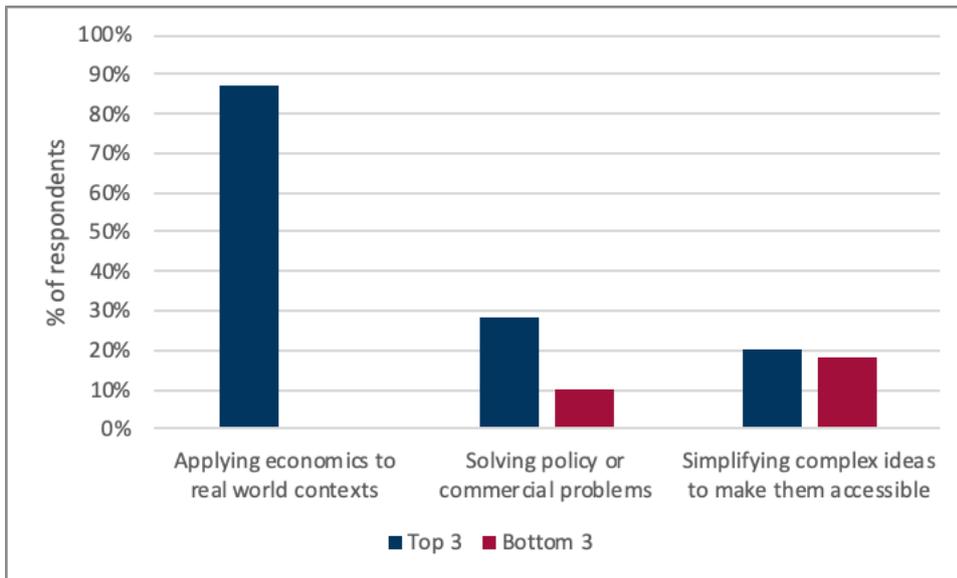


Figure 13: What software do students use for data analysis?



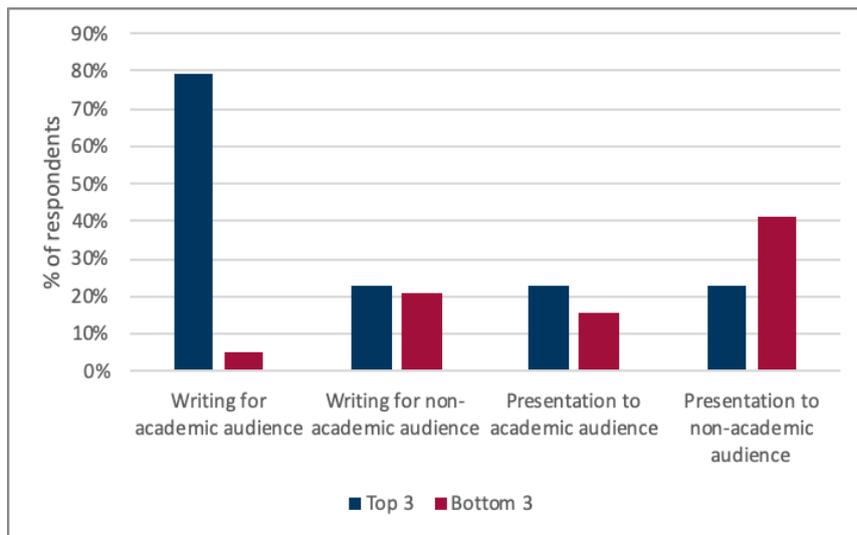
Application to the real world is the second priority area for economics degrees and the top priority area for employers. ‘Applying economics to real world contexts’ is ranked as a ‘top 3’ skill by 87% of respondents, making it the highest ranked skill. ‘Solving policy or commercial problems’ is ranked as a ‘top 3’ skill by 28% and ‘simplifying complex ideas to make them accessible’ by 21%. There is little variation by type of university.

Figure 14: Priority applying economics skills



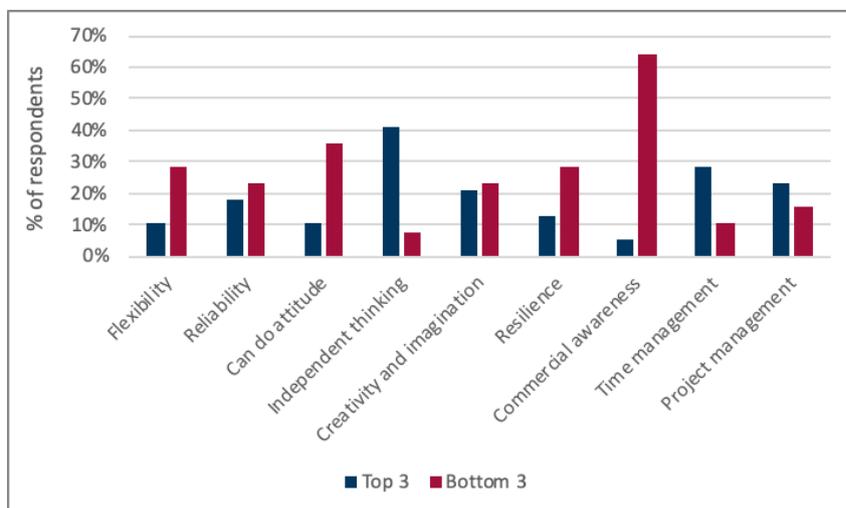
Communication is the third priority area for economics degrees and the second priority area for employers. As shown in Figure 15, writing is a ‘top 3’ skill more often than presentations. Academic writing is placed in the ‘top 3’ by nearly 80%, making it the second priority skill overall. Academic presentations are put in the ‘top 3’ by just over 20%. Presentations to a non-academic audience are most likely to be ranked in the ‘bottom 3’, with 41% of respondents putting them here. 21% of respondents also put non-academic writing in the ‘bottom 3’. Non-academic presentation is much more likely to be ranked ‘bottom 3’ by courses which do not have a fully integrated or optional-for-all placement year relative to those that do.

Figure 15: Priority communication skills



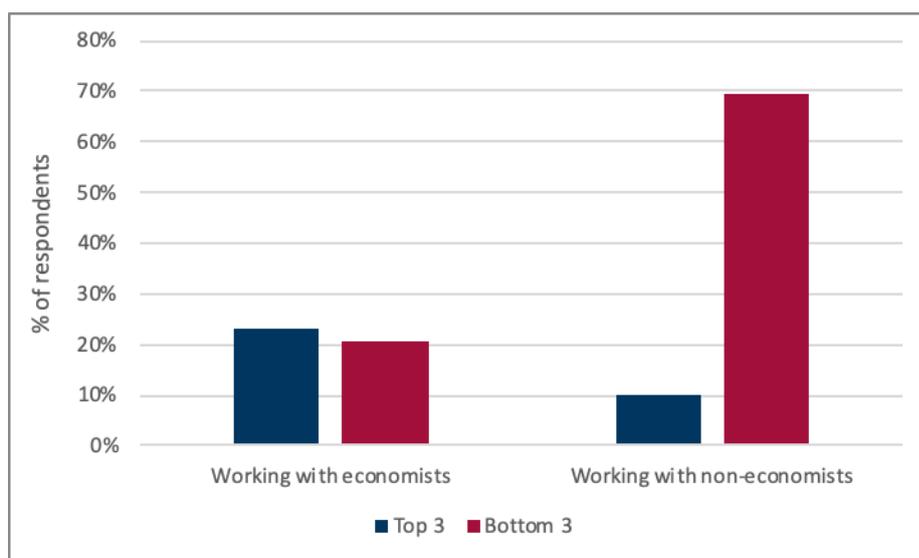
Wider employability skills are the fourth priority area in economics degrees. Figure 16 shows that 'independent thinking' and 'time management' are ranked as 'top 3' by 41% and 28% respectively. The emphasis is stronger at non-Russell Group universities. 'Commercial awareness' is a particularly low priority, with 64% of respondents ranking it 'bottom 3'. 'Can-do attitude', 'flexibility', 'resilience', 'reliability' and 'creativity and imagination' also rank poorly.

Figure 16: Priority wider employability skills



Collaboration came out as the lowest priority skill for economics degrees, although there are numerous comments by respondents emphasising that collaboration is seen as important but is simply a lower priority than other skills listed. As shown in Figure 27, 'working with economists' is rated as a top skill by 23% of respondents. 'Working with non-economists' is only ranked as a 'top 3' skill by 10% of respondents and is the most likely skill to be in the 'bottom 3', with 69% of respondents putting it there.

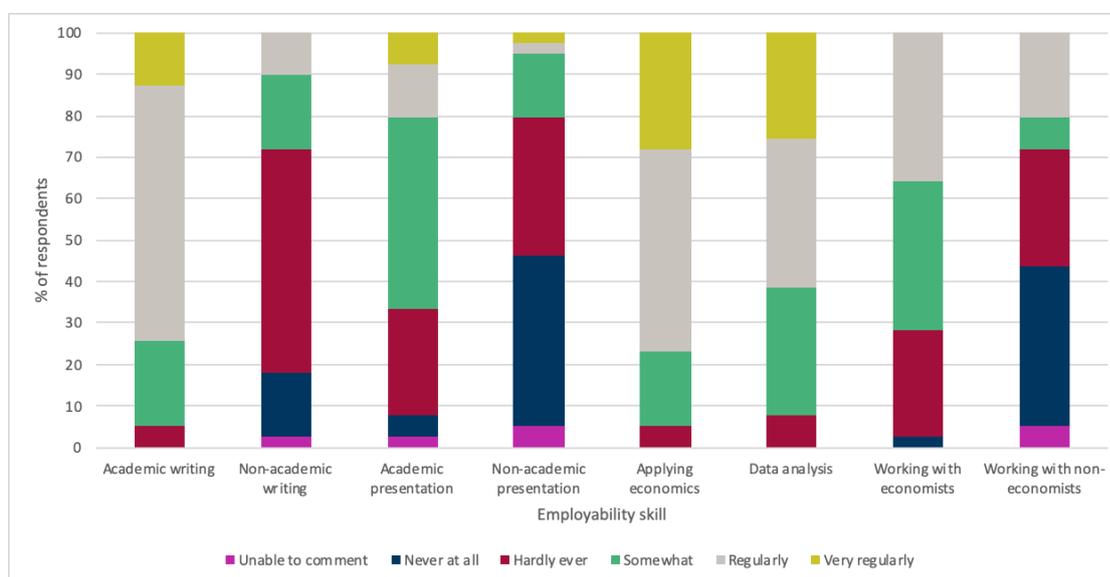
Figure 27: Priority collaboration skills



Extent of opportunities to develop skills

Figure 38 shows how frequently students are given the opportunity to develop skills within their degree. Consistent with how skills are prioritised, there are regular or very regular opportunities to apply economic knowledge and to develop academic writing and data analysis skills. There are more limited opportunities to develop non-academic writing skills, presentation skills and the ability to work with non-economists.

Figure 38: How often do students get opportunities to develop skills?



The pattern of opportunities available does not vary significantly between Russell Group and non-Russell Group departments. Students in degrees with larger cohorts are least likely to get opportunities to develop all skill areas except for academic writing. Economics departments with medium-sized cohorts seem to offer the most opportunities, particularly in relation to applying economics, data analysis and working with economists. This may be because they are large enough to have sufficient staff to run a broad range of modules but are not so large as to come up against organisational, capacity

and facilities constraints. Departments that offer a placement experience are potentially more focused on non-academic than academic skills, relative to those without a placement. They are more likely to have regular or very regular opportunities to develop non-academic writing and presenting skills. These may come from the placement experience. There are more regular or very regular opportunities to develop academic writing and academic presentation skills in degrees without a placement experience.

3.3. Do economics graduates have the priority skills?

It is useful to compare graduate characteristics, as employers perceive them, with what economics departments say they are prioritising. Table 3 shows the percentage of respondents to the Employers' Surveys who said economics graduates had 'not very high' levels of each skill.

Table 3: % of employers who said skill was 'not very high' amongst economics graduates

Skill	2012	2015	2019
Ability to communicate clearly in speech	20.0	16.7	17.9
Ability to communicate clearly in writing	34.0	34.8	35.9
Ability to analyse and interpret quantitative data	8.0	4.5	2.6
Fluency in using IT/computers	0.0	9.2	7.7
Ability to apply what has been learned in a wider context	34.0	37.9	30.8
Adaptability	22.0	23.4	26.3
General creative and imaginative powers	34.0	36.4	46.2
Problem-solving strategies and skills	20.0	19.7	7.7
Independence of viewpoint and judgement	24.0	32.8	23.7
Awareness of cross-cultural issues	30.6	37.9	35.9
Critical self-awareness	40.0	43.9	35.9
Ability to work effectively with others	8.0	7.6	12.8

The top three skills that employers are concerned about are 'creative and imaginative powers', 'awareness of cross-cultural issues' and 'critical self-awareness'. All relate to wider employability skills and to some extent collaboration, neither of which are prioritised in economics degrees. There is not a single skill in this area for which the majority of employers believe economics graduates have 'very high' proficiency. This skills gap is not unique to economics. Webb and Chaffer (2016) find that the emphasis lies too strongly on technical skills rather than wider professional skills in their review of accounting degrees in the UK. Pereira et al. (2019) echo these findings in their study of business, economics and engineering degrees from a number of non-UK universities within Europe. They emphasise that while 'hard skills', which are more of a priority in degrees, may help graduates secure a job, 'soft skills', which are less prioritised, are necessary for succeeding in a job. Economics departments make clear in survey comments and the focus groups that wider employability skills are implicitly developed in the degree

even if not explicitly prioritised. The evidence from the employer surveys and the literature suggests that a more direct and explicit approach may be needed.

Both departments and employers place great weight on the ability to apply economics to real-world problems. However, the proportion of employers rating the 'apply what has been learnt in a wider context' skill level as 'not very high' is approximately one third. The number of employers rating this skill as 'very high' is just 13%. This is a striking gap for what economics departments say is the top priority area in their undergraduate degrees and warrants further discussion. It may be relevant that employers are not particularly concerned about graduate 'problem-solving skills', which may be what some economics departments focus on when considering 'application to the real world'.

Employers are more likely to feel that graduates lack clear written rather than verbal communication skills, with 36% and 18% rating the respective skill levels as 'not very high' in 2019. These figures remain stable across time. This contrasts with the prioritisation in degrees, which is more focused on writing than presentations. The difference may be due to the focus on academic writing in degrees. It may also indicate that students develop presentation skills even if they are not explicitly prioritised in the degree.

Data analysis skills, including fluency using computers, which are prioritised in economics degrees, do not appear to be a concern for employers in the survey. However, the focus groups and comments in the employer surveys identify differences in the type of data analysis skills employers seek relative to what departments prioritise in their courses. It is possible that a question with a more detailed breakdown of data analysis skills in the Employers' Survey would detect gaps that are not shown here.

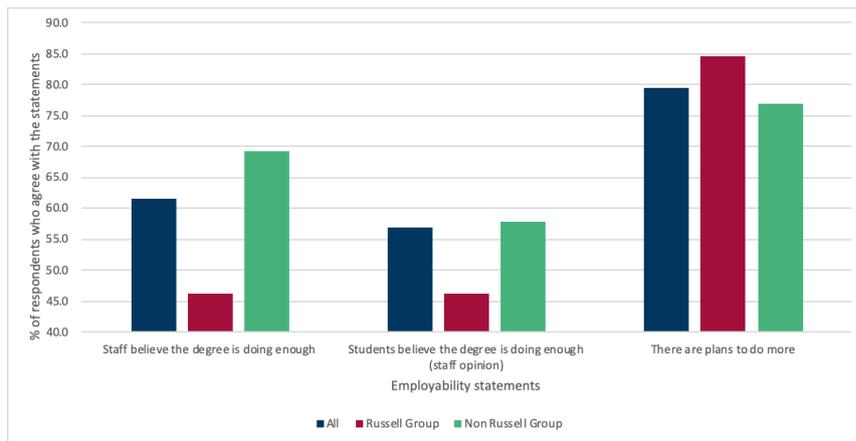
3.4. Are economics departments prioritising the appropriate skills?

We consider three potential reasons why graduates do not appear to have the skills that economics departments say are prioritised in economics degrees.

1. Employers and academics may prioritise the skill areas differently and/or may define the skill in a different way. This means that graduates develop skills in the skill area but not necessarily those aspects that employers most value. We consider this further here.
2. The teaching and learning activities and assessments that academics use to develop these skills are not as effective as needed to ensure students develop the skills. We discuss this further in Section **Error! Reference source not found.** and consider the challenges of managing this limitation in Section **Error! Reference source not found.**
3. The activities and assessments are potentially effective, but students do not engage with the opportunities provided and therefore do not develop the skills to the expected level. We discuss this challenge further in Section **Error! Reference source not found.**

It is also worth emphasising that many economics departments are, according to our survey, in the early days of introducing new teaching and learning activities linked to these skills. There will be an inevitable lag before graduates will display increased levels of the priority skills.

Figure 49: Do economics department think they are doing enough?



As shown in Figure 49, just over 60% of respondents to our economics department survey believe they are doing enough on skills development but 80% of them reported that their department has plans to do more in the future. 55% believed that their students thought they were doing enough in this area. It seems that non-Russell Group departments are substantially more likely than their Russell Group counterparts to think that they are doing enough. Departments with small cohorts are also more likely to believe they are doing enough; 79%, compared to 47% for large-cohort degrees. For degrees including a placement experience, staff are less likely to say they are doing enough and more likely to believe that their students would say they are not doing enough. This may reflect the fact that employability is a higher priority in these departments, resulting in higher expectations among staff and students.

Figure 20: Employer and academic interpretations of skill areas

Skill area	Employer focus	Economic degree focus
Communication	<p>Second priority area of Top Three</p> <p>Confident communication with non-expert audiences</p> <p>Convey complex material in accessible manner</p> <p>Summarise key messages</p> <p>Good listening skills</p>	<p>Third priority area of Top Three</p> <p>Academic writing</p> <p>Academic presentations</p>
Application	<p>Top priority area of Top Three</p> <p>Focus on policy and commercial problems</p> <p>Ability to formulate research questions and develop logical frameworks</p> <p>Ability to identify necessary evidence and draw critical, well-reasoned conclusions from available evidence</p> <p>Ability to simplify complex ideas</p>	<p>Second priority area of Top Three</p> <p>Focus on ‘applying economics to real world contexts’, but unclear how this has been interpreted</p>
Data analysis	<p>Third priority area of Top Three</p> <p>Able to effectively identify, download, clean and organise data on their own</p> <p>Ability to manipulate increasingly large and complex datasets</p> <p>Microsoft Excel proficiency</p> <p>Practical knowledge of econometrics (no specific packages)</p> <p>Programming abilities/coding skills (no specific packages) and ability to self-teach new techniques</p> <p>Understand what data is inferring and be able to explain to broad audience</p>	<p>Top priority area of Top Three</p> <p>Work with (small) datasets provided</p> <p>Excel (but recent)</p> <p>Econometric/technical analysis</p> <p>Some but limited programming (R, Stata)</p> <p>Present results to academic audience</p>
Collaboration	<p>Work in teams with people from variety of specialisms</p> <p>Strong inter-personal skills</p> <p>Adaptability</p>	<p>Little formal focus in degree, particularly with non-economists</p> <p>Students may work together in ‘black economy’ of collaboration behind-the-scenes</p>
Wider Skills	<p>Appreciation of how to learn</p> <p>Flexibility</p> <p>Resilience</p> <p>Independent thinking</p> <p>Proactivity</p> <p>Creativity and imagination</p> <p>Loyalty</p> <p>Time management</p> <p>Tenacity</p>	<p>Independent thinking</p> <p>Time management</p>

Looking at the headline skills priorities, economics departments appear to be largely aligned with employers. However, when we look more closely at each skills area, we find that academics may be focusing on different aspects of the skill to what employers most value and may not be providing sufficient opportunities to student to develop in these areas. We highlight potential differences in [Figure 20](#). Economics departments tend to focus their efforts on the more academic aspects of the skill areas. Data sourcing and cleaning, communicating with non-economists, applying economics to

commercial and policy problems, working regularly in teams and wider employability skills, which are high priority for employers, appear to get less attention in economics degrees than employers would like to see.

If an economics department wants to put more emphasis on development of employability skills in their degree, they may need to step back and give further consideration to how they are interpreting the priority skills and how they design teaching and learning opportunities to help students develop the skills that employers value most. We provide insights on what might be needed in the rest of this report. Finding the best way to approach this needs to be done within a Department, taking account of local context, and may be best achieved in partnership with employers, alumni and students.

4. How are employability skills developed in economics degrees?

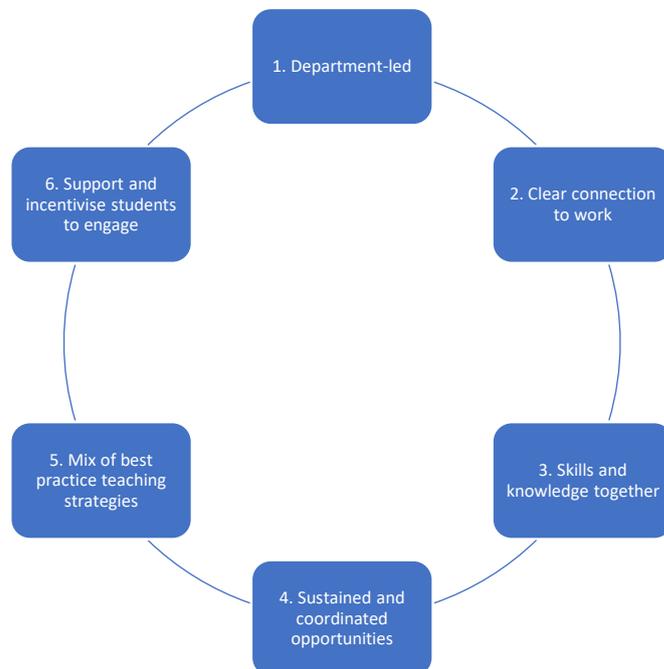
In this section, we set out what might be needed for skills development to be effective in an undergraduate degree, using ideas from focus group discussions and the literature. We examine the extent to which the economics degrees covered by our survey incorporate these desirable characteristics. This enables us to consider whether the gaps between what employers observe and what economics departments are prioritising might be due to the nature of the teaching, learning and assessment strategies being used.

4.1. What is needed for effective employability skills development in a degree?

We present the findings from our survey on what economics departments are doing in this section. We first provide criteria, illustrated in Figure 21, to compare the survey results to⁵. These have been developed based on a review of the literature and our focus group discussions. Similar ideas can be found in employability models proposed by the Higher Education Academy (now Advance HE) and others (see for example Cole and Tibby, 2013). Figure 22 provides an explanation of the criteria and the references underpinning them.

The criteria have primarily been created to help us organise our analysis of survey results. They provide some indication of what ‘good’ looks like, which may be of interest to any economics department that has made a conscious choice to embed employability skills into a degree. An economics degree that meets some but not all of these criteria could be going a long way in facilitating students’ skills development. This is a starting point and there are no doubt other criteria that could be included.

Figure 21: Criteria for effectively embedding employability skills development in degree



⁵ The criteria have been numbered for ease of reference in the report. The numbers do not reflect any prioritisation or ranking of criteria.

Figure 22: Explanation of criteria

	References
<p>1.Department-led</p> <p>The economics department makes a conscious explicit choice to focus on employability skills in the economics degree. There is buy-in from lecturers and strong leadership from the Head of Department, Programme Leads and similar individuals to support a culture that promotes employability. Department staff take the lead in designing and delivering activities, working in collaboration with careers services, student societies, other relevant parts of the institution, employers, alumni and students.</p>	<p>Project focus groups; Archer and Davison, (2008); Cole and Tibby, (2013); Cortronei-Baird, (2009); Lowden et al., (2011); OECD, (2016); Pegg et al., (2012); O’Leary, (2017); Priest, (2016); Rethinking Economics, (2018); Rich (2015)</p>
<p>2. Clear connection to work</p> <p>At least some activities connect, as far as possible, to the world of work. For example, they correspond to activities in interviews/assessment centres. There are opportunities in the degree for work-based learning such as placement years and internships.</p>	<p>Project focus groups; Andrews and Higgins, (2008); House of Commons Education Committee, (2018); Hills et al., (2003); Lowden et al., (2011); Mason et al., (2009); OECD, (2016); Storen and Aamodt, (2010)</p>
<p>3.Skills and knowledge together</p> <p>Employability skills are developed in a meaningful way in the context of the economics degree. The department embeds both discipline-specific and general skill development, alongside subject knowledge, within economics modules. This may be within technical and/or applied economics modules. Bespoke skill modules may be a useful complement but are not the sole opportunity for skills development.</p>	<p>Project focus groups; Cranmer, (2006); Hills et al., (2003); Knight and Yorke, (2006)</p>
<p>4.Sustained and coordinated opportunities</p> <p>There are opportunities for skills development across all years to allow for consistent progression throughout the degree. Skills are embedded in learning outcomes, teaching and learning strategies and assessment across economics modules in a clear and coordinated way.</p>	<p>Project focus groups; Cortronei-Baird, (2009); Hills et al., (2003); O’Leary, (2017); Pegg et al., (2012)</p>
<p>5.Mix of best practice teaching strategies</p> <p>Delivery of the degree involves a mix of teaching strategies, reflecting best practice teaching and learning pedagogy. Students have hands-on opportunities to practice skills in the context of the discipline. These activities are related to what graduates might do in a typical job, such as engaging with the practicalities of empirical analysis and providing opportunities to communicate findings to different audiences. There are explicit opportunities for students to work with others. There are multi-disciplinary opportunities to enable students to consider different perspectives.</p>	<p>Project focus groups; Anand and Leape, (2012); Andrews and Higgins, (2008); Becker and Watts, (2001); Cortronei-Baird, (2009); Coyle, (2012); Heron, (2019); Hills et al., (2003); Mason et al., (2009); Pegg et al., (2012); Rethinking Economics, (2018); Rich, (2015); Storen and Aamodt, (2010)</p>
<p>6. Support and incentivise students to engage</p>	<p>Project focus groups; Cortronei-Baird, (2009); Heron, (2019); Knight and Yorke,</p>

The degree provides incentives and inspiration for students to engage. Skills-related activities are included in (some) compulsory modules, with at least some activities assessed summatively. The connection between economics modules and skills development is transparent. Students understand, and can articulate, which skills they are developing. Support and advice are available, particularly for those who struggle when left to their own devices. Students can ask questions and get feedback on their individual skill development.

(2006); O’Leary, (2017); Pegg et al., (2012); Pereira et al., (2019); Priest, (2016); Rich (2015)

4.2. Is employability support led by the department?

In this section we consider, in line with criterion 1 and criterion 6, whether and how economics departments take ownership of employability support and employability skill development, including how they work with other parts of the university.

Figure 23 shows the percentage of economics departments surveyed who said a particular type of support was available. Consistent with criterion 1, support is provided jointly by the economics department, the careers service and student societies. Economics departments are particularly active in connecting students to employers and alumni. Where departments offer a careers module, they tend to be integrated into the degree and in many cases are linked to an integrated placement year experience. Respondents noted in their comments that they also offered optional skills modules or personal development modules run by the department.

Figure 23: Employability support services available to economics students

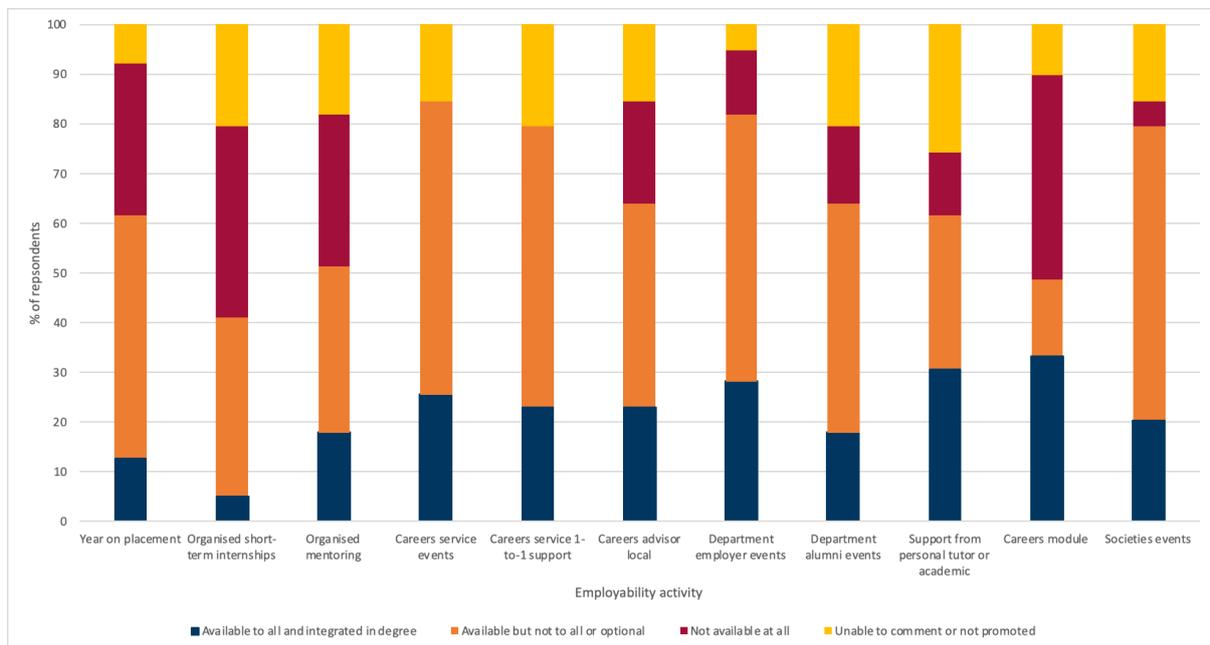
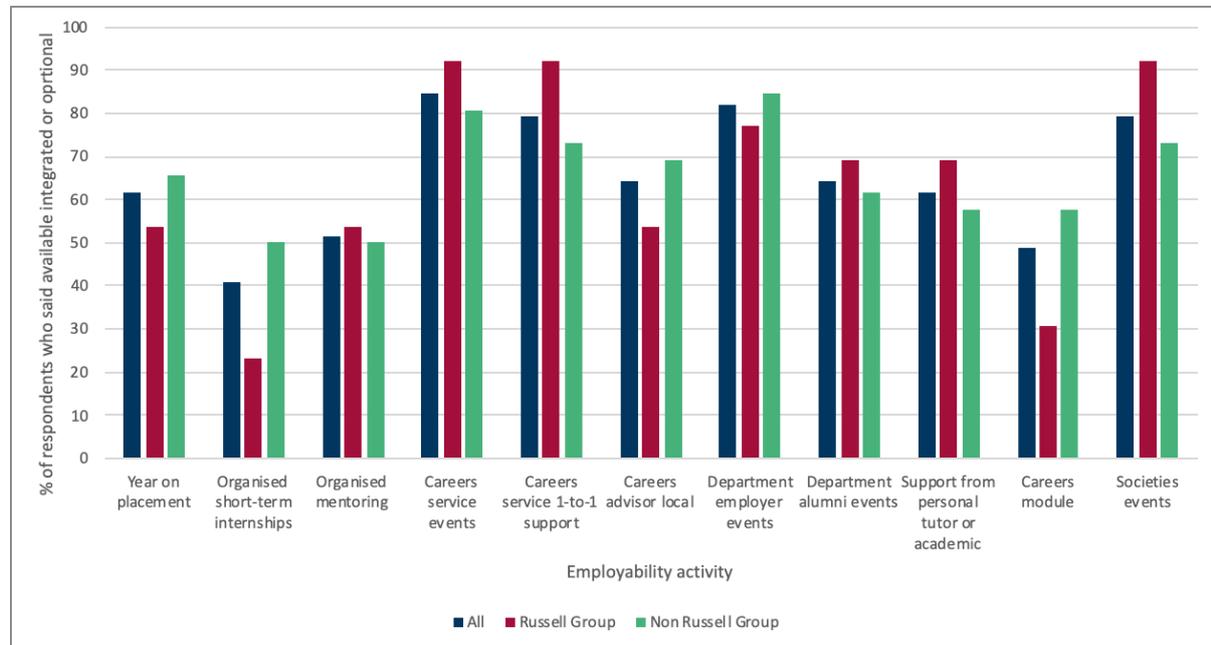


Figure 24 suggests that Russell Group universities rely slightly more on careers service support for their students and are less likely to have a bespoke careers module. Respondents noted in comments that departments worked closely with their careers services, and there were often dedicated staff for economics students. Russell Group universities are more likely to provide department alumni and student society events, possibly reflecting more active student societies and alumni networks at these universities. We also found when splitting the data between universities inside and outside London that

alumni and employer events were more likely to be provided by those in London. This aligns with a point raised in our focus groups where it was suggested that developing relationships with local employers is important for departments. The focus groups also thought students in their final year who have been on a placement could share their experiences with other students, including those who did not have a placement opportunity, as an alternative way of connecting students with the labour market.

Figure 24: Variation in support available in Russell Group and non-Russell Group



Whilst it is clear that economics students are well supported (criterion 6), with a wide range of activities available, only a small proportion of this support is available to all and fully integrated within degrees. This raises questions about the reach and impact of the support provided.

Discussions in our focus groups suggested that the support covered in this survey question is most likely to be centred around helping students gain a better understanding of the labour market and secure their first job, for example with CV writing or interviews. Development of employability skills, which they will use at work, is less likely to be the focus. A closer look at economics modules is needed to understand how these skills are developed within the degree itself.

4.3. Is the degree connected to work?

In this section we review the extent to which placement and internship opportunities are available as part of an economics degree. This is connected to criterion 2. We did not ask about the extent to which activities in the classroom are linked to work-place activities, so this warrants further investigation.

There is good awareness of the value of work-place learning across survey respondents. 13% of survey respondents said that a fully integrated year on placement was available to all students, 41% said it was available but optional, and 31% said it was not available at all. One institution noted that whilst placements were not part of the degree, students could interrupt their studies exceptionally if such an opportunity arose. In addition, 41% of economics departments said that they help organise to short-term internships for students. Again, these are mainly optional or only available to some students. Comments suggest that these include research internship opportunities provided within the department itself.

As shown in [Figure 55](#), placement year opportunities are more likely to be provided by non-Russell Group universities. Where they are provided by Russell Group universities, they are never fully integrated into the degree or available for all students. This may reflect different philosophical views on the value of placement experiences. It may also reflect the fact that Russell Group universities have high graduate employment rates and do not have the same pressures to provide these experiences to ensure student outcomes. The opportunities are most likely to be provided by medium-sized institutions, as illustrated in [Figure 66](#). The staff and other resources needed to organise and support a placement programme may not be available in smaller departments. In large departments, it may be difficult to offer the opportunities when there are a limited number of placements available. It is also hard to provide the necessary support to very large cohorts.

Figure 55: Placement opportunities in Russell Group

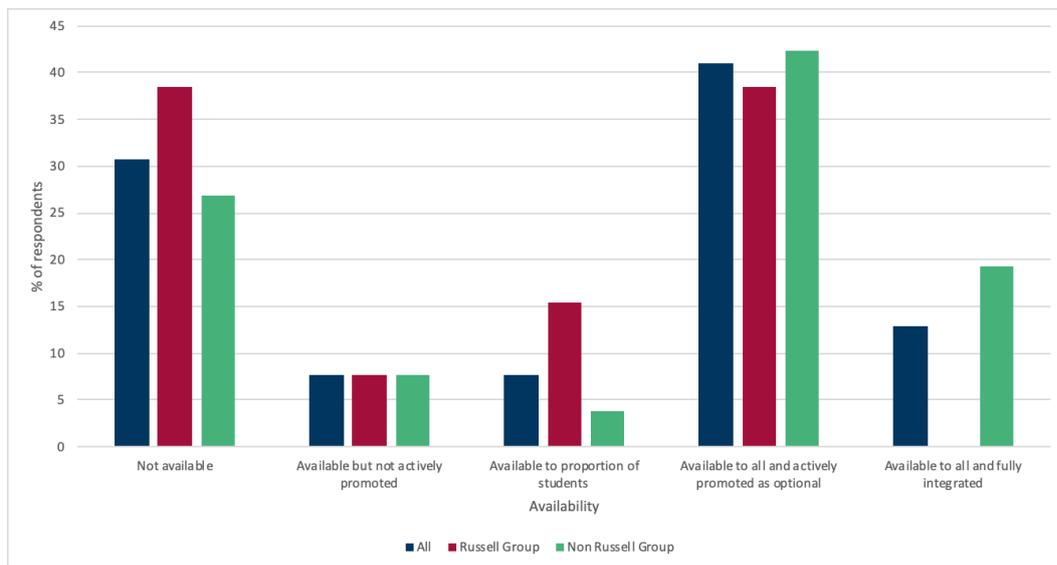
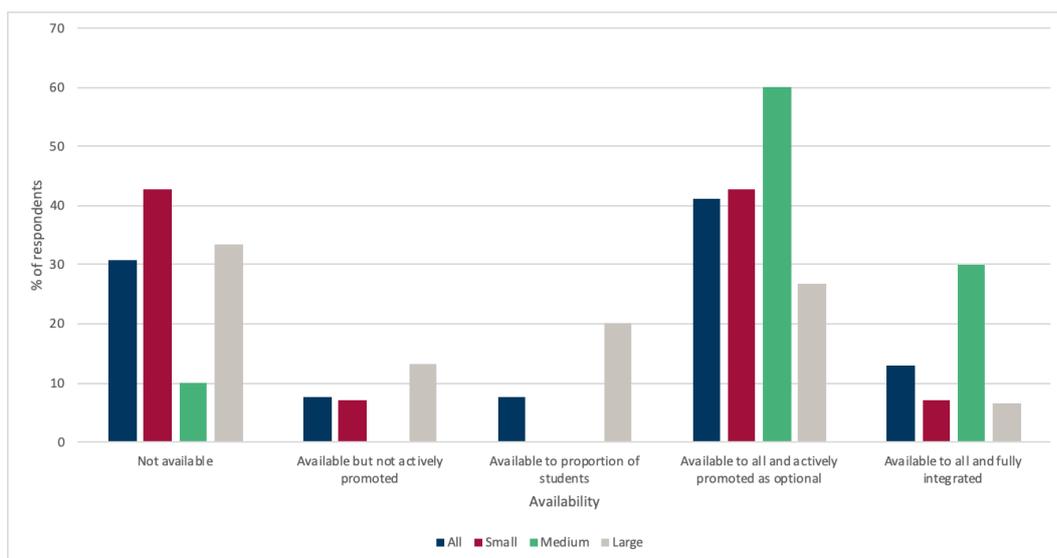


Figure 66: Placement opportunities by cohort size



Where the degree has a placement experience, there is more support available in general. The support is more likely to be integrated into the degree and delivered by the department. For example, 76% of respondents with a placement experience had a local careers officer and 62% had a careers module,

with the corresponding figures for those without a placement at 39% and 16%. Much of the support will be linked to helping students with the placement experience, as well as with graduate work/further study. As mentioned in our focus groups, there are potential spill-over benefits for all students, including those who don't go on placement; for example, administrative and academic staff may have a better understanding of the labour market and more connections with employers.

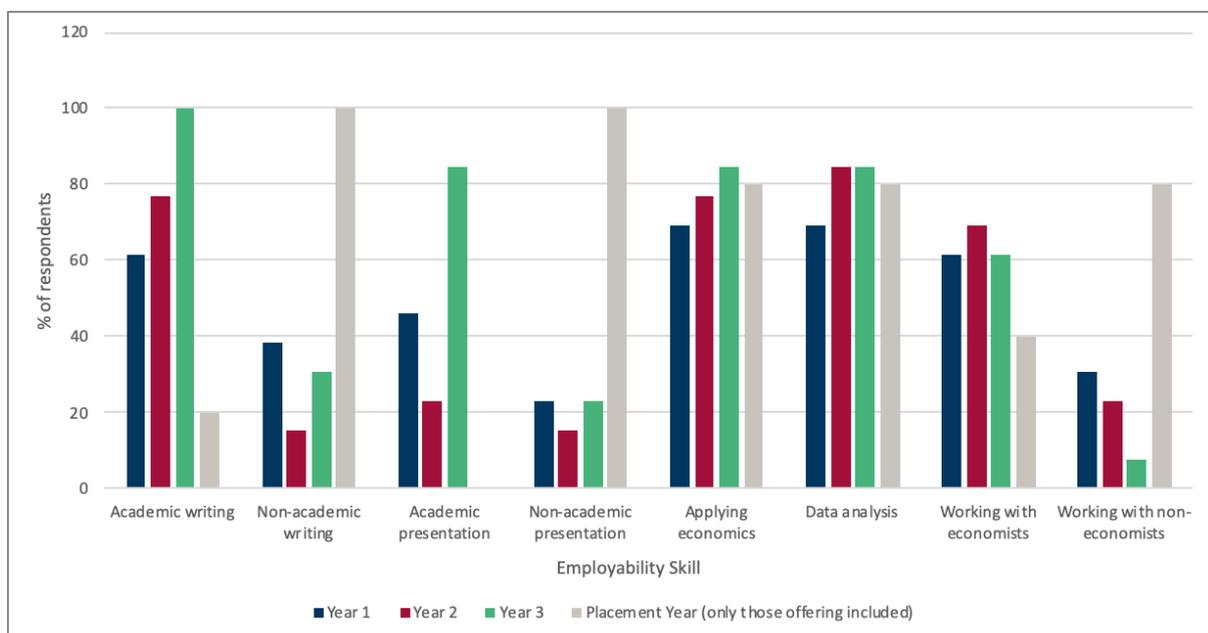
4.4. Are opportunities for skills development evident across the degree?

In this section we consider whether skills development opportunities are available consistently over years and across modules in the degree (criteria 3 and 4). The discussion in both the focus groups and wider literature emphasised that skills development is an evolutionary process; students need to build up their skills over time through consistent practice. For example, considering data analysis, it takes time to build up required knowledge about techniques and familiarity with computer packages before being able to undertake an empirical project.

Figure 77 shows whether there are opportunities to develop skills in each year of study.⁶ The survey suggests that economics departments are providing opportunities in all years for academic writing, academic presentations, applying economics, and data analysis skills. More is done in the final year, which may reflect a traditional curriculum where the focus is on understanding concepts and models in the early years, with greater opportunities to explore ideas more deeply in the final year.

When we take a closer look at Russell Group and non-Russell Group data, we see little difference in the years where skills are developed. Non-Russell Group economics departments provide more consistent opportunities each year for non-academic skills (particularly writing), whereas Russell Group departments have a bigger jump in final year for academic writing and presentation skills.

Figure 77: Years in which students get opportunity to develop skills

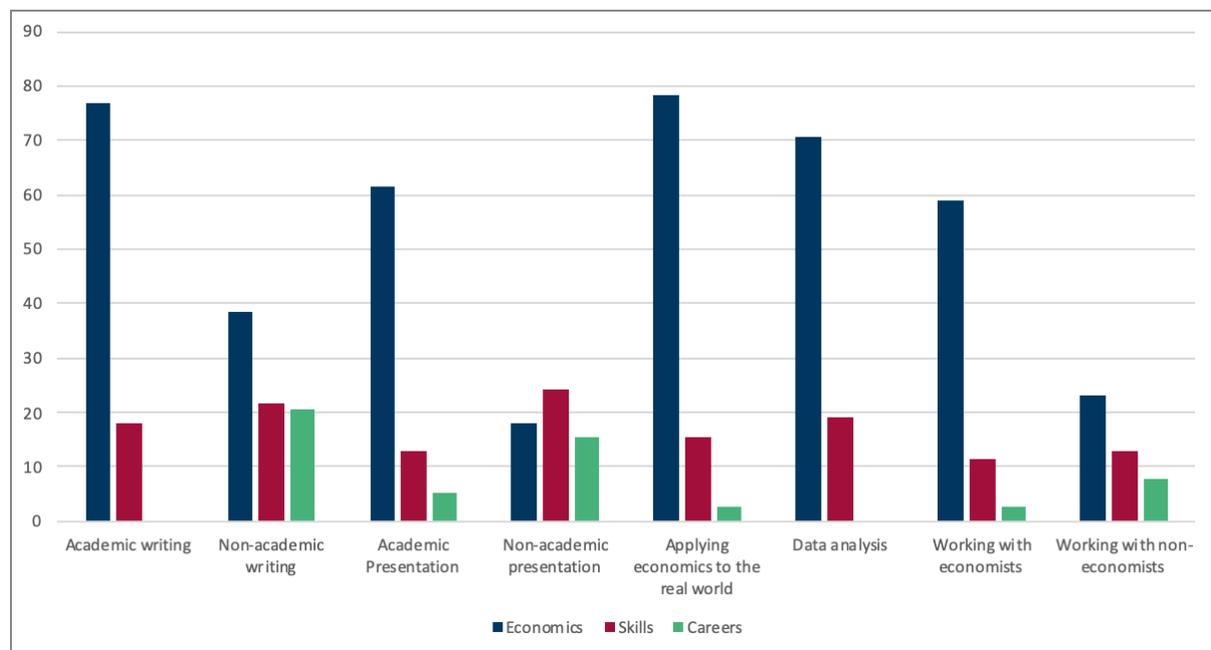


⁶ We have not asked for information on how extensive the opportunity is in each year so this information should be read alongside the information on how regular the opportunities are across the degree. For example, a university could have very few opportunities spread across all years (e.g. one activity per year) or they could have many opportunities but mainly in the final year (e.g. weekly activities in final year).

A point was made in our focus groups that reduced emphasis on skills early in the degree may impact students applying for internships and placements and graduate roles. Students noted that many of their peers are unlikely to engage with skill sessions or activities early in the degree. Providing opportunities may not be enough. If economics departments think they are important, for example for later modules, they may need to be compulsory and assessed. Lecturers may also need to do more to explain the link between skills-related activities, the learning of economics and future careers. Embedding skills development in economics modules, rather than bespoke skills modules, may help.

Figure 88 shows the types of module where there are opportunities to develop each skill. The majority of skills development happens in economics modules, allowing for skills and knowledge to be developed in parallel as per criterion 3. Only non-academic presentation skills are more likely to be developed in bespoke skills modules, but there are limited opportunities for this. It should be noted that 54% of respondents do not reference compulsory skills modules in relation to any of these skills at all. This may be because, as discussed in the focus groups and survey comments, they are used more for CV writing and interview practice rather than the employability skills considered here.

Figure 88: Types of modules providing opportunities for skill development



Although few departments use skills modules, it is interesting to note that where they are used Russell Group departments are more likely to use them for academic writing and data analysis than non-Russell Group. Non-Russell Group economics departments are more likely to use them for non-academic writing and presentation skills. Not surprisingly, degrees with a placement experience make more use of skills and careers modules, particularly for presenting and team-work, compared to degrees without a placement experience. This reinforces the general point that where a placement experience is available, additional support is provided in the degree alongside the placement year.

Our survey data suggests that economics departments appear to be doing the ‘right thing’ by developing skills in a sustained manner across years and in economics modules (criteria 3 and 4). However, employer surveys and our focus group discussions suggest current skills development practices may not be as effective as needed. This might be because activities used are not effective at developing the skills, discussed further in Section **Error! Reference source not found.**, or that students

are not engaging with the opportunities provided, discussed further in Section **Error! Reference source not found.**

4.5. Are teaching and learning activities appropriate for skill development?

Whether an activity is effective depends on the extent to which it is a genuine opportunity for students to develop skills and hence on what teaching and learning strategies are used (criterion 5). Pegg et al. (2012) emphasise the importance of ‘experiential action learning methods’ and ‘integration with more traditional didactic approaches’. Hills et al. (2003) refer to the need for ‘work-related’ learning experiences. If the activities to develop skills are largely confined to traditional teaching methods, such as passive engagement in lectures and closed-book assessments, it is possible that graduates will have under-developed skills relative to the expectations of employers. Our focus groups emphasised that departments should not attempt to replicate on-the-job learning and should not try to ‘teach’ skills. They suggested that activities should simply allow students to experiment with new ideas and methods.

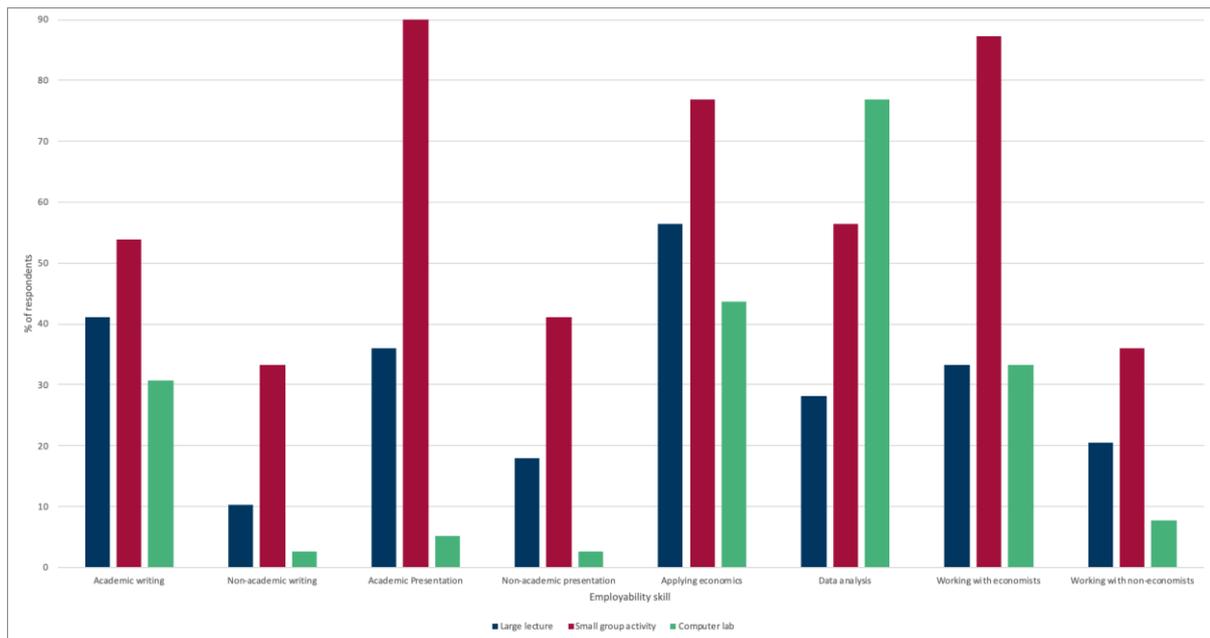
We asked survey respondents to indicate what type of teaching and learning activities were most relevant for how they developed each skill in their degree.⁷ Figure 99 shows the extent to which respondents say skills development happens in large lectures, small group settings and computer-lab sessions. Figure 31 shows the extent to which take-home activities and closed-book exams are used, by the survey respondents, to develop skills. Different types of learning strategies will be used together, with connections between take-home activities, closed book exams and classroom activities.

Large group and small group teaching

Amongst our survey respondents, the large lecture is an important vehicle for skills development for most skills, with the notable exceptions of non-academic writing and presentations. Small group teaching, including in computer-labs, is important for applying economics, data analysis and team working skills. Small group classes are also where students are given the most opportunities for presentations and collaboration.

⁷ It should be noted that we have not asked for information on how extensive the opportunity is, so this information should be read alongside the information on how regular the opportunities are. For example, a university could have very few opportunities in the degree, but they are all in small group tutorials, or they could have many opportunities, but they are mainly in take-home activities (independent learning).

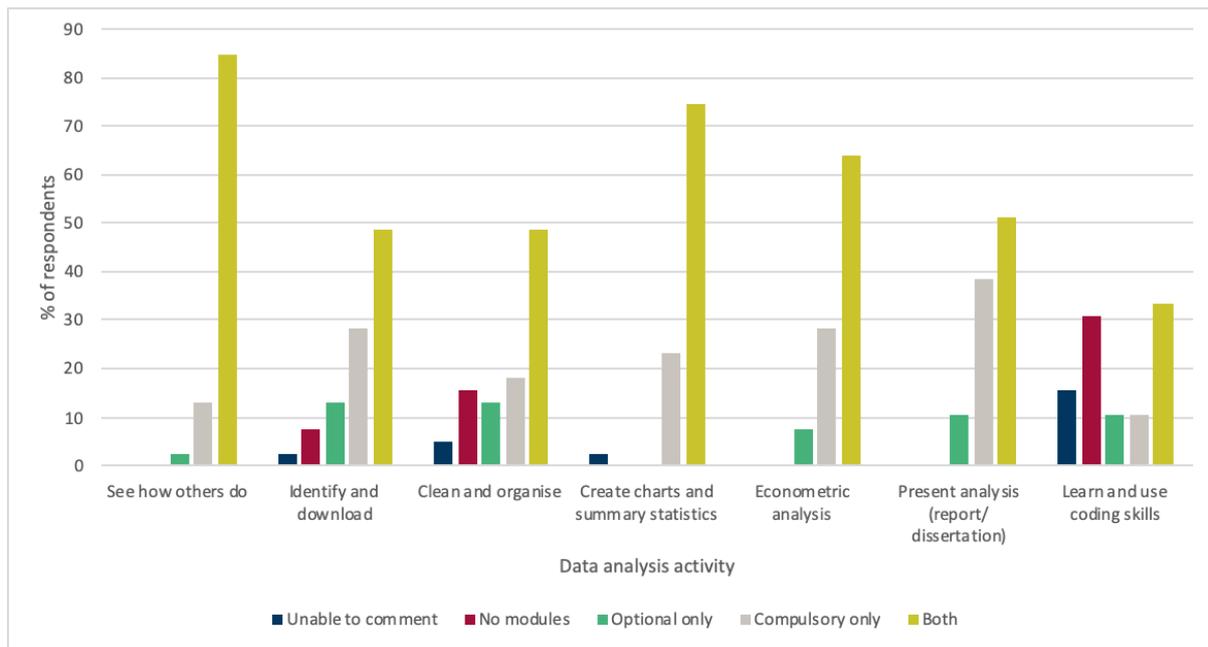
Figure 99: Skills development in the classroom



From the perspective of skills development, what happens in the classroom matters more than whether it is a large lecture or a small teaching setting. According to the literature, if lectures are interactive, they can be effective at developing skills. This may be easier with smaller cohorts, which may be why we see that departments with small cohorts are more likely, relative to medium and large cohorts, to use large lectures for skill development. However, if lectures are traditional in style, with the lecturer delivering knowledge from the front, it is likely that there is only passive engagement with skill development. This point could also hold true for small group teaching. If a lecturer uses the class for student-led activities, skills development is more likely to happen. However, if students merely watch the teacher answering questions on a board, there is limited scope for skill development.

The approaches used to develop data analysis skills provide a useful illustration of how the nature of activity in the classroom, and in take-home activities, matters. Error! Reference source not found.³⁰ shows that there is substantial focus on learning data analysis via passive observation rather than active engagement. This puts a question mark on the extent to which students are developing the skills to work effectively with data. There is limited emphasis on activities that require students to find, clean and organise data. There also tends to be greater focus on doing technical econometric analysis itself, as opposed to presenting analysis after. Non-Russell Group universities are slightly more likely to provide these opportunities than Russell Group universities, as are departments where the degree includes a placement experience. For coding skills, 46% responded either 'unable to comment' or 'no modules'. Russell Group economics departments are more likely than non-Russell Group universities to offer their students the chance to learn coding. As noted earlier, these have been identified as important skills by employers and may need more emphasis placed on them if a lecturer is trying to develop data analysis skills that are most useful for work.

Figure 30: Which activities are used to develop data analysis skills?



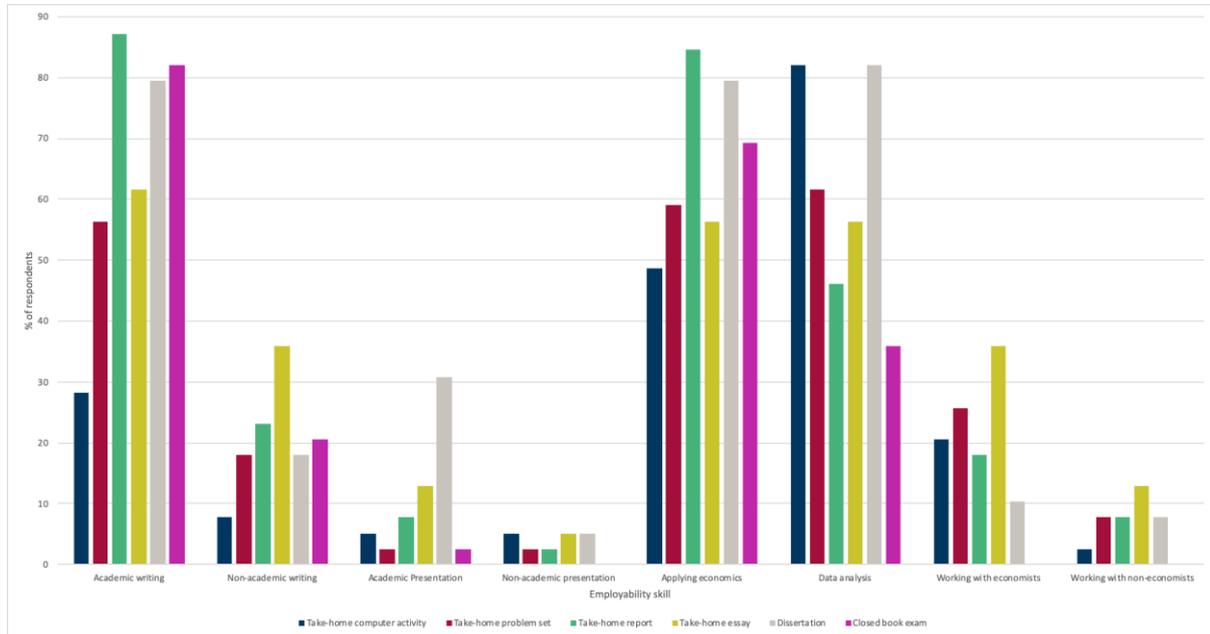
Use of take-home activities

Take-home activities are recognised as important for the development of skills by both survey respondents and focus group discussants. It was emphasised in focus groups that resources also need to be invested in to provide support to students with take-home activities. We did not ask in our survey if additional support such as extra office hours or extra support classes is available. How the take-home activity is designed matters if it is to lead to effective employability skills development. We did not ask about this in our survey, but we provide ideas here, from employers, on what might be needed.

All of the activities listed in the survey are, as shown in [Figure 31](#), important for developing students' ability to **apply economics**. Take-home reports, dissertations and small group activities are used most frequently. 40% of survey respondents say they use computer-lab activities to enable their students to practice this skill. The survey responses indicate that closed-book exams and problem sets are also used to develop application skills. Russell Group departments are more likely than non-Russell Group to develop this skill using closed book exams (85% versus 62%). Whether these skills are effectively developed through these activities depends on the nature of the questions asked. In our focus group discussions, a point was made that someone in the survey may say that students are 'applying economics' if they have a sub-part of a mainly mathematical question that asks students to think about how the analysis can be applied to the real world. This was considered inadequate to develop the ability to apply economics to real world questions. It was suggested that students should be asked to explain why a particular technique is the most relevant for analysing a problem rather than simply asking them to use the technique. There could be more focus on longer 'discuss/evaluate' style questions rather than 'solve/prove'. It was also suggested that students should be asked to look at a 'big picture' question and asked to work out the structure of how best to analyse and evidence the question. Importantly, marking criteria should focus more on the approach, evidence used and critical analysis rather than the final answer itself. It was also suggested that economics departments could make more use of case studies and questions asked by employers in interviews/assessment centres. Similar comments were made by Rethinking Economics (2018), where employers suggested the use of games, experiments and

role-playing. It is not clear whether take-home activities are designed in this way in our survey; an in-depth review would be needed to say whether or not they are meeting employers' expectations.

Figure 31: Skills development through take-home activities and closed-book exams



Employers in the survey and focus groups emphasised that students should be encouraged to target their work at different audiences, including non-experts. They should be asked to explain the context of the question, how they approached it, why they approached it that way, and what they found. The type of outputs used, for writing and presentation tasks, can affect the extent to which this happens.

Figure 32 shows that the range of writing outputs is narrow, with limited use of non-traditional writing outputs that might be targeted at non-expert audiences. Where non-traditional outputs are used, they tend to be in optional modules.

Presentations are also largely academic, as shown in Figure 33, with few opportunities for other formats. For example, only one university gives students the opportunity to give conference-style presentations. Many of the opportunities to develop oral communication skills are through class discussions which are typically ad hoc, informal and not assessed. Whilst this may happen in compulsory modules, it is unlikely that participation is monitored or compulsory. Degrees with a placement experience are more likely to have opportunities for non-academic presentations, but still offer limited opportunity for poster, video or podcast outputs. This focus on traditional academic outputs may partially explain why graduates' communication skills are underdeveloped relative to employers' expectations.

Figure 32: What types of written outputs do students produce?

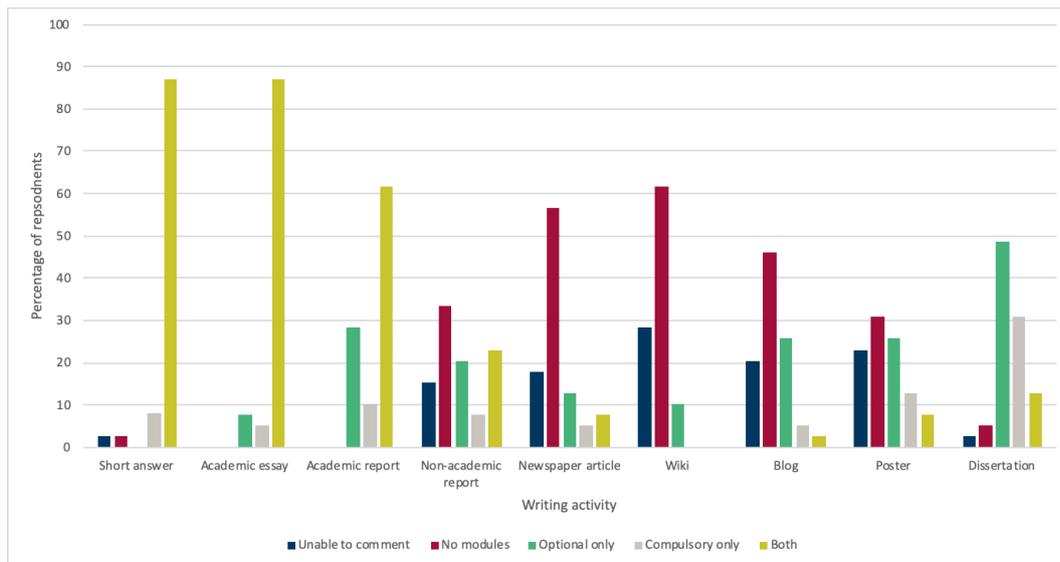
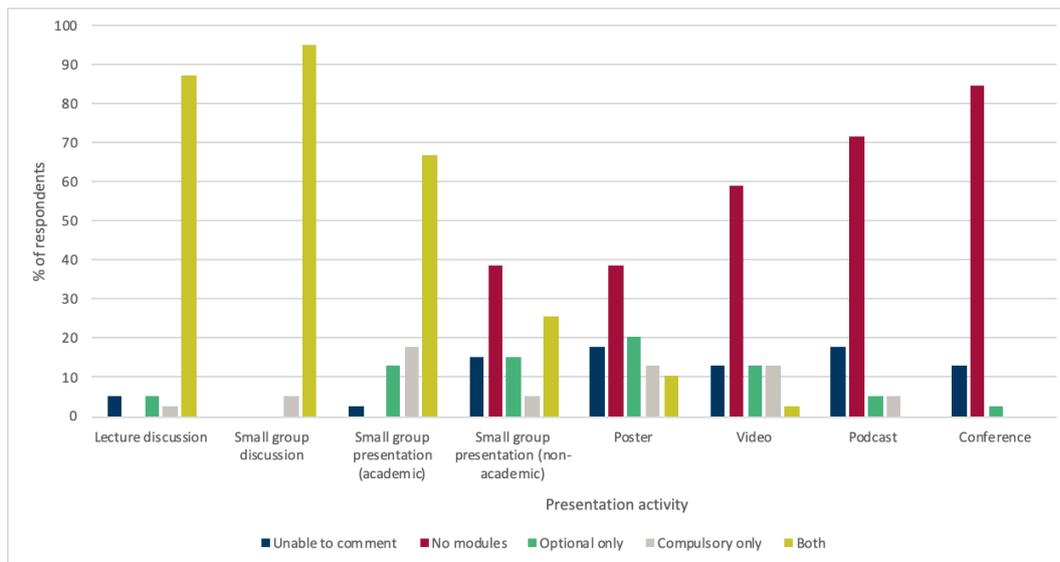


Figure 33: What types of presentations do students deliver?



The survey responses show that economics departments place significant emphasis on the use of dissertations to develop academic writing, applying economics and data analysis skills. Our focus group participants recognised the value of dissertations but thought that there may be an over-reliance on them. It was noted that they were still academic in nature and there may be merit in requiring students to orally defend their ideas. Furthermore, as shown in

Figure 32, the dissertation is largely optional with 8% saying they are not available or did not comment, and 49% saying they are optional. This raises two questions: where the dissertation is not compulsory, are some students missing opportunities to develop these skills in their degree? And, is there a risk, given the need for sustained opportunities to develop skills, that too much emphasis is placed on this final year activity? The answers to these questions will of course vary by degree, depending on what happens in other modules across the years.

4.6. Are there sufficient requirements or incentives for students to engage?

Opportunities offered for skills development will only be effective if students have incentives to engage with them (criterion 6). This could be achieved by including skills development in compulsory economics modules. Summative assessment of skills development may also be important.

Opportunities in compulsory modules

Table 4 shows whether the modules in which each skill is developed are compulsory or optional.⁸ The survey responses suggest that most skills are primarily developed in compulsory economics modules. 'Working with non-economists' seems to be an exception, developed more in optional economics modules. Some survey respondents indicated in comments that they included open elective modules run by other programmes when considering optional modules, which may explain why the opportunities to work with non-economists are more frequent here. As expected, the primary focus is on academic writing, applying economics and data analysis in economics modules. Non-academic writing and presentations are more balanced between compulsory and optional modules. Few respondents have skills or careers modules. Where these modules do exist, they seem to develop a broader range of skills if compulsory rather than optional.

⁸ We have not asked for information on how extensive the opportunity is, so this information should be read alongside the information on how regular the opportunities are. It may be that there are opportunities to develop skills in the compulsory modules, but they are limited in number or the activities are not effective at developing the skill.

Table 4: Percentage of respondents who said skills development happened in module type

Skill	% - Compulsory Economics	% - Compulsory skills	% - Optional economics	% - Optional skills	% - Careers module
Academic writing	90	23	64	13	0
Non-academic writing	38	21	38	23	21
Academic presentation	64	18	59	8	5
Non-academic presentation	18	26	18	23	15
Applying economics	85	18	72	13	3
Data analysis	90	23	51	15	0
Working with economists	59	13	59	10	3
Working with non-economists	18	10	28	15	8

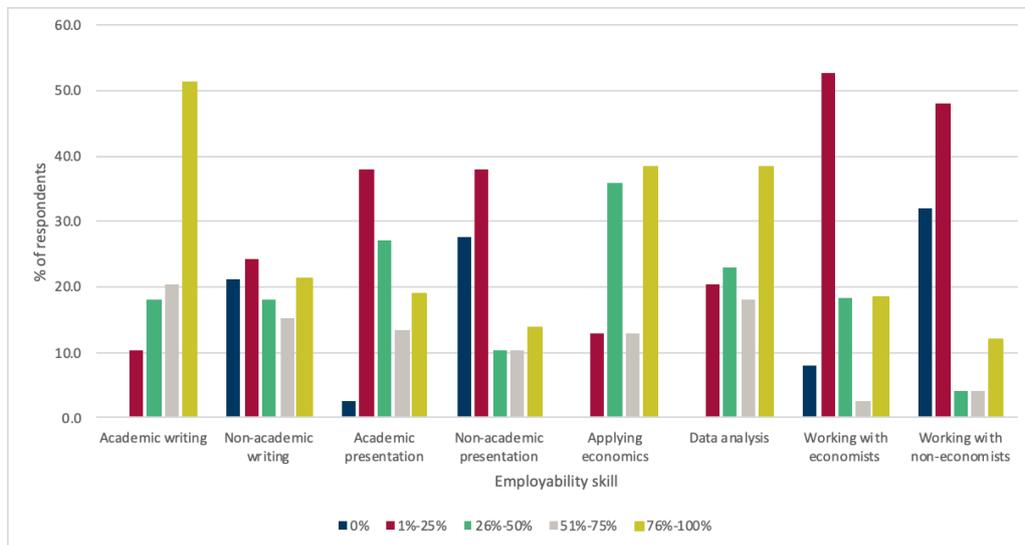
The main difference between Russell Group and non-Russell Group departments relates to the type of modules used to develop non-academic skills. 30% of non-academic writing opportunities are in compulsory modules in Russell Group departments compared to 60% in non-Russell Group. However, there are no opportunities for non-academic presentations in compulsory modules in Russell Group departments but in non-Russell Group 70% of the opportunities are in compulsory modules. Non-Russell Group are also more likely than Russell Group to develop collaboration skills in compulsory modules. This might reflect wider differences in the skills that are prioritised in the different departments. Departments with large cohorts are also more likely to use optional rather than compulsory economics modules for developing non-academic writing, presentation and team-working skills. This is possibly due to resource constraints for implementing activities in modules with a large number of students. Degrees without a placement experience are slightly more likely to use compulsory rather than optional economics modules, where they use them at all, to develop non-academic skills. They may do this to compensate, in part, for the absence of work-based learning.

Extent to which opportunities are summatively assessed

Figure 34 shows the proportion of activities that are assessed for each skill area. Academic writing is the most heavily assessed skill. Both 'applying economics' and 'data analysis' skills are summatively assessed to a large extent as well, with a majority of respondents assessing at least 50% of the work. Collaboration is rarely assessed. Non-academic presentations and working with non-economists are the

skills that are least likely to be assessed, with the latter never being assessed by almost one third of respondents.

Figure 34: Percentage of work linked to skill that is summatively assessed



For academic writing, applying economics and data analysis skills, Russell Group economics departments are more likely than non-Russell Group to have more than 50% of activities summatively assessed. Non-academic writing, non-academic presentations and working with non-economists are all less likely to be assessed in any way by Russell Group departments compared to non-Russell Group. This aligns with the higher priority given to academic skills by Russell Group departments.

Unsurprisingly, the extent to which activities are summatively assessed varies by size of cohort, as shown in

Table 5. Practicalities of designing and implementing effective assessments for some skill areas may be easier with smaller cohorts. The one exception is academic writing which is assessed more in large cohorts. This would be surprising if the marking load of take-home writing assignments is considered but it may be because the assessment happens only in closed book exams that are set once in the year. Degrees with placement experiences are more likely to assess a high proportion of their activities, potentially because of a greater need for students to engage with activities early in the degree. The difference with degrees without a placement may also reflect a wider philosophy or culture about the value of employability skills.

Table 5: Percentage of respondents who say that more than 50% of activities related to skill are assessed by cohort size

%	Academic writing	Non-academic writing	Academic presentation	Non-academic presentation	Applying economics	Data analysis	Working with economists	Working with non-economists
Small	64	45	38	40	71	71	31	30
Medium	30	33	40	22	20	20	30	0
Large	67	31	21	10	27	47	0	10

The survey data on the proportion of activities that are assessed suggests that students have a reasonable incentive to actively engage with academic writing, applying economics and data analysis but potentially less incentive to do so with non-academic writing and presentations or with team work. Of course, the strength of the incentive may depend on how much weight is placed on individual activities.

It also remains open for discussion whether the nature of the assessment links effectively to the skill that students are supposed to be developing. Our focus groups suggested that whilst closed book exams have significant practical and convenient benefits for academics, they are of limited use for developing and assessing most skills, perhaps with the exception of academic writing. Employers emphasised that memory and knowledge retention are of limited use in the modern workplace, where the internet allows individuals to instantly gather information on almost any topic, and experienced colleagues can be asked for information. There seems to be increasing interest in 24-hour exams and open book exams. For example, in one department students were given a report to read ahead of the exam and instructed to create a one-page set of notes, which they could then use in the exam to answer questions on the report. Employers in the focus group indicated that this was both a more accurate representation of the workplace and encourages students to engage with actual research and independently identify the most salient points. Pegg et al. (2012) similarly suggest that any assessment must be 'fit for purpose' without compromising academic rigour, which may entail a move away from traditional 'pen and paper' written assessments. The focus groups further argued that leaving all assessment to the end of the year was unhelpful for effective skill development, which requires activities throughout the year to embed the skill and engage students.

4.7. Are strategies to embed employability skills effective?

Considering our criteria in Section **Error! Reference source not found.**, it appears that the economics departments in our survey sample are making reasonable attempts to embed employability skills

developments in their degrees. We summarise our findings in **Error! Reference source not found.**³⁵. Support is provided for students, although it is often optional. There is more of a focus on skills closely associated with academic work. There is, as discussed further in Section **Error! Reference source not found.**, a need to review how students are incentivised to engage effectively with the opportunities offered. There is also, as discussed in Section **Error! Reference source not found.**, a question about whether and how to incentivise academics to widen the nature of what they do in this area.

Figure 35: Comparing research findings to criteria on effective skill development

	Comment
1. Department-led	Amongst the survey respondents, it appears that the economics department generally takes a leading role in ensuring that employability support and skills development opportunities are provided to students. This includes promoting opportunities provided by the university careers service and student societies. However, much of the support is optional. Discussions in the focus group suggest that initiatives often happen in a piecemeal rather than coordinated way. They are often designed and delivered by one or two members of staff with a particular interest in the area. Those who engaged with our survey and focus groups are more likely to be active in this area. We cannot conclude that positive steps on this criterion are widespread across all departments.
2. Clear connection to work	Comments to our survey and discussions in the focus groups suggest that there are modules within degrees that have activities, including assessments, that mirror closely what happens in the workplace. Examples can be found in the Employability Skills Case Studies published on the Economics Network website. These are often modules taught by people who have worked previously outside academia. However, activities generally tend to be closer to academic work and there is little evidence of academics working with employers to get ideas in this area. Amongst our survey respondents, over 60% of degrees had a placement or internship option. However, most are optional or not available to all students. Russell Group departments are less likely to have the option.
3. Skills and knowledge together	Our survey respondents suggest that skills development mainly happens within economics modules. If the activities and assessments used in the modules are appropriately targeted this should mean that skills and knowledge are developed in tandem. There are some but limited skills modules. These are rarely compulsory.
4. Sustained and coordinated opportunities	There appear to be opportunities offered to students in each year to develop all of the skill areas, although it is unclear whether the frequency of opportunity is the same in each year. The focus on the dissertation for academic writing, data analysis and applying economics suggests that opportunities with more depth may be reserved to the final year. It is unclear, from what we asked in the survey, to what extent the skills development opportunities across the degree are coordinated. Our focus groups suggested that they tend to be developed on a module basis with limited 'central planning' of how skills are developed across modules.
5. Mix of best practice teaching strategies	Many of our survey respondents are using a mix of teaching and learning strategies to develop employability skills. Opportunities are more limited for team-working and communicating with non-academic audiences than other skill areas. The outputs that students are asked to produce, and the type of activities that are used, are typically traditional and academic in nature. It is hard to determine from our survey, but discussions in the focus groups and comments to the survey suggest that the activities are not designed in the way that employers think would be most useful for skill development. Although many lecturers are making effort in this area, there is work to be done on the design of activities, including assessments. Suggestions of what may be needed are discussed in Section Error! Reference source not found.
6. Support and incentivise students to engage	Our survey results suggest that a reasonable proportion of skills development happens in compulsory modules. For academic writing, applying economics and data analysis, a high proportion of the related activities are assessed. This suggests that students are required to engage (compulsory) or have an incentive to engage (assessed). The incentives are not as strong for non-academic skills.

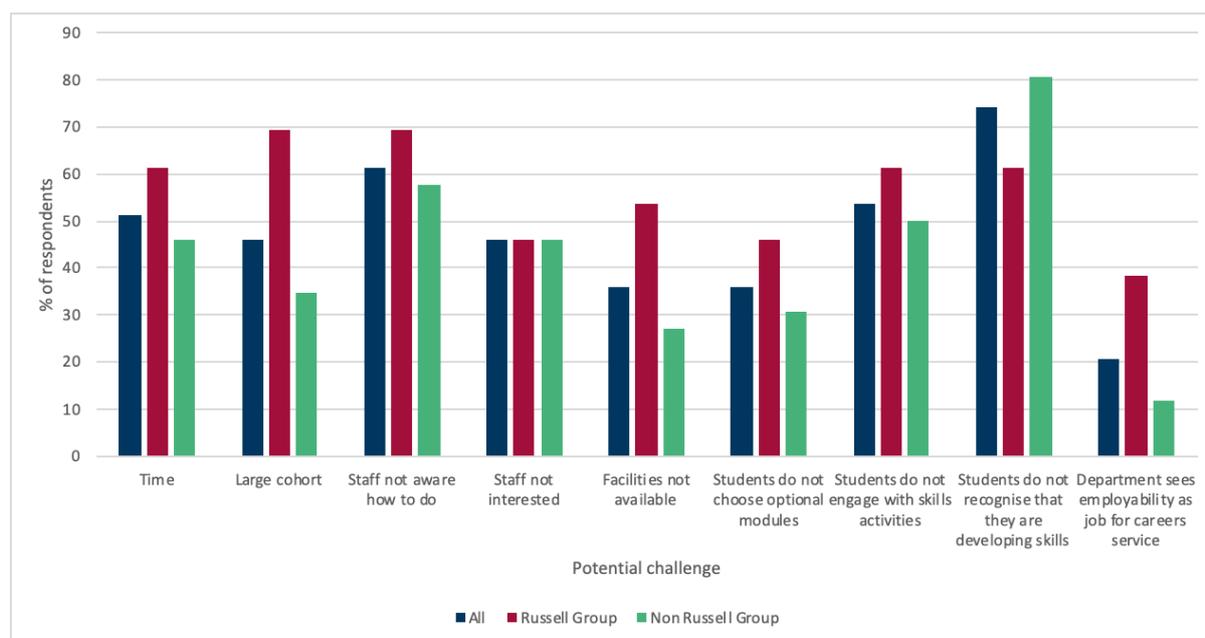
It is not feasible, or desirable, to use our survey evidence and focus group discussions to make strong judgements about the extent to which UK economics departments are using teaching and learning

strategies effectively to develop employability skills. There is unlikely to be a 'one size fits all' checklist of teaching and learning strategies to use but we hope that this research provides departments interested in developing employability skills in their degrees with ideas on what to consider.

5. Managing the challenges of embedding skills in economics degrees

It is not straightforward to reform a degree to ensure the development of employability skills is effectively embedded alongside core economics knowledge. Economics departments responding to our survey were given a list of challenges and asked to report to what extent they were a problem. Figure 106 shows the percentage of respondents who said each challenge was either a problem or a significant problem. We explore the four main challenges here.

Figure 106: Percentage of respondents who agreed challenge was a problem or significant problem



5.1. Incentivising and supporting students to engage

The most significant issue reported by survey respondents is that students do not recognise that they are developing skills through their degrees. This is particularly a problem for non-Russell Group economics departments.

It is also the case that students may not engage with skills activities. This is more of a problem for Russell Group departments. It is less of an issue for departments with small cohorts, who report that their students do engage but that there is still little recognition that skills are being developed. Student engagement is a greater challenge for degrees with a placement experience than those without. This is somewhat surprising as one might expect students looking for a placement to engage but it may be that the departments have higher expectations for these students, or that the students believe the placement is where skills development occurs rather than in their university courses.

Our focus groups, comments in the employers and economics department surveys, and the literature provide some ideas on how this challenge might be managed. We present the suggestions in Figure 117 and Figure 128. Further ideas can also be found in the employability skills case studies published on the Economics Network website: <https://www.economicsnetwork.ac.uk/research/employability>.

Figure 117: Suggestions on how to get students to engage

	Comments
Assess skill-related activities	<p>Unassessed skills activities and skills or careers modules that have no credit attached to them are more likely to be ignored by students. A small allocation of marks can act as a sufficient nudge.</p> <p>Don't go overboard. A balance needs to be struck between formative practice and summative assessment.</p>
Make sure that the skills part of the assessment is worth a sufficient amount of the credit	<p>If only a part of a part of a question relates to the skill, students may not concentrate on that part. Allocate marks according to how important skills development is in learning outcomes.</p>
Make sure students understand that the skill is needed to do well in the assessment	<p>To illustrate, consider a situation where a lecturer designs a discussion activity in a tutorial to help students develop communication and economics application skills. The discussion activity is not assessed but the lecturer assumes that students know that the related skills, for example in critical analysis and clarity of explanation, are needed to do well in the exam months later. The students may not make the connection and focus only on course content when preparing for the exam.</p>

Figure 128: Suggestions on how to help students recognise that they are developing skills

	Comments
Tell them what skills are being developed	<p>Be explicit about what skills are being developed and explain how the activities (in class and take-home) connect to skill development. Pegg et al. (2012) emphasise the need for students to 'recognise what they are learning' (p. 30).</p>
Use (assessed) reflective opportunities	<p>Students could be given explicit (assessed) opportunities to reflect on what skills they are acquiring, perhaps through reflective diaries or skills portfolios.</p>
Help students understand that skills development in the degree is helpful for their careers	<p>Employers could emphasise more to students that examples of skills development from the degree are considered valuable, even if all students in a cohort have had the same opportunities.</p> <p>Personal tutors and careers advisors could work more closely with academics to understand what skills are developed in the degree. This would enable them to better support students 'selling' those skills in job applications and interviews.</p>
Explain the importance of skills development to students from the start of their degree	<p>Many students, particularly early in their degree, are not thinking about future employment. Departments need to explain that active and early engagement with skills development helps with employment prospects. This message may have more credibility if delivered by students from later year groups, employers and alumni.</p>

5.2. Incentivising and supporting lecturers to do more on employability skills

Just over 60% of survey respondents said that it is a challenge that staff are not sufficiently aware of how to embed skills in their modules, although only 8% reported that it is a significant problem. This was more of an issue for Russell Group departments, perhaps reflecting the more research-oriented focus of these institutions relative to non-Russell Group counterparts.

46% of respondents also said that it is a problem that staff were not interested in embedding skills in their modules. Issues with lecturer engagement may not be helped by the fact that 39% of respondents from Russell Group departments also stated that it was a problem that the department saw employability as a job for the careers service, rather than a priority for the degree itself.

The combination of a lack of interest and uncertainty about how to embed skills may hold lecturers back from making changes in their modules, or from designing effective activities. In our focus groups it was emphasised that not all lecturers need to engage, but it is likely that there needs to be a sufficient number working in this area for skills to be consistently embedded across the degree.

Helping unsure lecturers embed skills development in modules

Focus group discussants highlighted that many academics do not believe they are well placed to teach and assess employability skills as they have always worked in academia and were themselves taught in a traditional manner. Indeed, academic economists are often criticised themselves for how they present their research to non-expert audiences. Becker and Watts (2001, 1996), Rich (2015) and Cotronei-Baird (2019) all suggest this is a general problem in academia.

We summarise, in

Figure 139, suggestions made within the focus groups and literature about how to support lecturers who are interested in embedding skills development in their module but are unsure what to do (Anand and Leape (2012), Archer and Davison (2008), Cranmer (2006), Mason et al. (2009), Priest (2016) and Rethinking Economics (2018)).

Figure 139: Ideas on how to help students embed employability skills in their modules

	Comments
Employers or alumni should work more closely with lecturers	There are a range of ways that employers could help, including talking to students about the importance of developing certain skills during their degree for the workplace and motivating them to identify links between their degree content and future careers. Employers could also work with lecturers to design activities and/or assessments that more closely match typical workplace activities.
Help lecturers connect with employers willing and able to support them	Many lecturers will not have connections to employers or alumni. A coordinated approach within a department may be needed to facilitate more co-working between employers and academics. This may be easier for departments with a placement experience in the degree as they will be able to engage with employers and alumni from the placement scheme.
Encourage employers to use their limited resources to help with degree design	Employers have limited resources, particularly small-to-medium enterprises and micro-businesses (NFER et al. (2015)). It may be helpful if they target their limited resources towards the degree itself rather than careers activities linked to CV writing and similar.
Encourage lecturers to focus on skills areas and activities that they are most confident in	Make clear to lecturers that academic research and professional work share significant similarities. Incorporating skills linked to research may be a useful starting point within the comfort zone of lecturers. The focus groups emphasised that lecturers should not assume that they are providing 'skills training'. They should allow students to experiment with new ideas, concepts and methods within the context of the module content.
Work more on teaching-related activities with other disciplines, mirroring interdisciplinary research	This allows for pooling of knowledge and collaboration on activities that are not discipline-specific. More interdisciplinary teaching will also expose students to ideas from different perspectives. It was noted that some applied degrees, for example energy economics or economic policy, may already have a stronger focus on skills development and collaboration with employers. The staff on these degrees could share experiences.

Incentivising lecturers to embed skills development in modules

The focus group participants felt that the most significant barrier to lecturers doing more, is that they have little professional incentive to do so. It was emphasised that much of the progress made in this area is done by a few individuals with a personal interest or passion about student employability. They get no particular credit other than personal satisfaction from improving the skills of their students. Most lecturers are incentivised to dedicate the majority of their time to research, as this determines promotion and career progression because of the design of the Research Excellence Framework (REF). Some may also hold traditional views of what a degree should teach and have concerns about economics degrees becoming 'too vocational'. As the survey data suggests, this may be more of an issue for large research-focused Russell Group departments than others.

The focus groups discussed potential ways to tackle the issue of staff incentives. We summarise the suggestions in

Figure 140. They are all difficult to implement, particularly as any changes require buy-in from those teaching and need to be 'done in a light-touch way' (Rich (2015), p. 12).

Figure 140: Ideas on how to help students embed employability skills in their modules

	Comments
Include incentives linked to teaching/education into the promotion criteria for all staff	Lowden et al. (2011) suggest that ‘Government should consider ways of reflecting and promoting the employability skills and attributes in funding mechanisms such as the Research Excellence Framework’ (p. vii). Pegg et al. (2012) also emphasise the need for a cultural change to balance the rewards for research activity relative to teaching. This requires discipline and institutional changes that are difficult to imagine happening soon and would likely be met by some resistance.
Require all lecturers to include some activities related to skills development in their module as part of a wider policy to reform the curriculum	There should be a conscious choice about how much the degree will focus on employability skills. Concerted, systematic steps should be taken to implement the decision. Similar recommendations have been made for universities in general by Lowden et al. (2011). This requires a strong steer from senior management in the department and internal incentives to ensure lecturers do this effectively. Traditionally, lecturers have had freedom over module design and are likely to resist changes that reduce their autonomy about what and how they teach.
Find ways to manage the time and effort required and reward those who make the effort	Design and delivery of skills-focused activities can involve upfront fixed cost for the lecturer. Marking of assessed work, such as essays and reports, can also be a burden particularly if it is in addition to marking an existing exam. Departments should encourage lecturers to make use of technology, group working and resources like feedback forms to limit the burden. The time and commitment involved should also be recognised and rewarded by the department.
Invest in staff hired specifically to focus on education and employability skills	Accept that staff that teach and research will balance their time towards the latter. Create a pool of teaching-focused staff who are expected to embed employability skills in the modules they teach. This requires sufficient resource in a department to have a mix of staff. Many researchers also enjoy teaching and students benefit from being taught by expert researchers in the field. It would be important that their role in the degree is not overly reduced.

5.3. Ensuring enough time and space in module alongside content

51% of survey respondents thought that a lack of time to embed skills alongside content was a problem or significant problem. This rises to 62% for Russell Group respondents, compared to 46% for non-Russell group. Departments with large cohorts also considered this to be more of a problem, with only 27% saying it was not a problem at all compared to 50% for those with small and medium cohorts.

Our focus groups discussed whether it was necessary to trade-off economics content with skill development. A number of academics thought it was inevitable that content had to be sacrificed to allow for wider activities linked to skills. Others thought that content and skills development could be complementary. Pegg et al. (2012) similarly suggest that skills development should be about teaching the same content in a different way. Some thought that the trade-offs were different depending on the nature of the module, with synergies between content and skills more obvious in applied modules. A number of suggestions, summarised in Figure 41, were made on how economics departments might manage any potential trade-offs between content and skill development.

Figure 41: Ideas on how to manage trade-offs between content and skill development

	Comments
Any rebalancing between content and skills development should reflect a wider policy on the importance of employability skills in the degree	Economics departments needed to be clear on the purpose of their degrees and how important employability skills are. Once this is agreed it becomes easier to have discussions about how and where to prioritise skills and knowledge. In this context, it was suggested that there may be lessons to learn on prioritisation from degrees such as engineering, where accreditation provides direction on what is most important. QAA Subject Benchmarks, which include employability skills as well as content, may provide a platform for discussion on the 'professional standards' that economics graduates should be expected to meet. There is no one-size-fits-all model, and local circumstances and philosophies should be considered (Knight and Yorke, (2006)).
Step back and consider what knowledge/content has to be included and what could be optional	Employers in the focus groups emphasised that it was important that core economics knowledge and concepts should not be sacrificed. However, there was discussion about how advanced or deep the theoretical knowledge needed to be. It was suggested that only a small subset of students planning a career in technical, professional economics roles (including academia) require an understanding of advanced specialist material. This material may be better suited to final year optional modules or a graduate degree. This could suggest a switch away from teaching advanced material in compulsory modules.
Have technical and non-technical pathways, with employability skills emphasised more in modules on the non-technical pathway	A mix of technical (more academic) and non-technical (more applied) pathways may allow for the wide range of career interests of economics students to be met. Focus group participants stressed that there should still be some aspect of skills development in more technical modules, particularly as the skills are as valuable for a student wanting to study for a PhD as they are for a student seeking a career in an unrelated field. For example, students should learn how to apply material to different contexts, as well as be able to derive the results. This is consistent with the analogy mentioned in Anand and Leape (2012), that degrees should teach students 'how to drive a car and not how to build one' (p. 16).

5.4. Managing large cohorts and facility constraints

Russell Group economics departments were most concerned about the impact of large cohorts and limited facilities on the extent to which skills could be effectively embedded in degrees. It may be that the few non-Russell Group departments with large cohorts have found ways to manage any associated challenges. Those with a placement experience were slightly more likely, relative to those without a placement experience, to highlight large cohorts as a problem. This may be because it is more challenging to manage practicalities such as providing CV advice and undertaking placement visits with larger cohorts.

The focus group participants recognised that it may be difficult to design some activities for large cohorts, but they suggested that technology enabled more options. For example, discussion forums could be used to practice writing for non-economists, and online simulation games could be used to explore how to apply concepts and models. They also noted that more group work can reduce the

marking load although it was recognised that this needed to be done carefully given concerns about free-riding. Similarly, more use could be made of peer feedback and peer assessment to alleviate the marking load of lecturers. It was recognised that lecturers may need advice and support on the range of teaching strategies that could be used and how to use them.

6. Conclusions and next steps

Returning to our research questions, set out in Section **Error! Reference source not found.**, we find that there are attempts being made by the economics departments that responded to our survey to embed skills development in their degrees. For some, changes in this area have only been recently introduced and employers may not have observed the impact on graduates in the workplace yet.

The survey respondents have similar priorities to employers, with the focus on communication, applying economics to real world contexts and data analysis. There is less emphasis on collaboration and wider employability skills. Within the priority areas, teaching and learning activities and assessments do not appear to be focused on the skills that matter most to employers. Essentially, economics departments focus more on academic and technical angles of the skills areas. This may be why we have a situation where employers think graduates do not have the skills needed to a high level even though economics departments think they are making reasonable attempts to develop them.

Economics departments may need to redirect their efforts and consider again how to design content, skills-development activities and assessments in parallel. Suggestions of what to consider, largely from our focus groups and literature, are provided throughout this report. They need to be considered locally by a department, taking the wider context of their degrees into account. We would also encourage the profession to share ideas on how to design activities and assessments. We welcome more contributions to our Employability Case Studies which are published on the Economics Network website.

There is a need to provide more support to students so that they have a better understanding of what skills they are developing in their degree. This may help increase engagement, alongside making more of the activities compulsory and assessed. Co-ordinated action from lecturers, personal tutors and careers advisors may be helpful here.

Lecturers interested in doing more in this area also need to be supported and they need incentives to put the effort in. There may be limits on how much can be expected, particularly from those whose career progression is dependent on meeting research targets. A clear and co-ordinated department policy on the prioritisation of employability skills is likely to help. Finding ways to connect employers and alumni with lecturers so that they can help with the design of module activities and assessments will also be important. This could happen at the department-level or may be something that the profession wants to consider collectively.

Any additional feedback on this report can be sent to the lead author, Cloda Jenkins (cloda.jenkins@ucl.ac.uk).

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