THE CAREERS & ENTERPRISE COMPANY

Understanding the careers cold spots

The Careers & Enterprise Company prioritisation indicators 2016

The Careers & Enterprise Company
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About The Careers & Enterprise Company

The Careers & Enterprise Company is an employer-led organisation that has been set up to inspire and prepare young people for the fast-changing world of work. Our role is to act as a catalyst in the fragmented landscape of careers and enterprise, supporting programmes that work, filling gaps in provision and ensuring coverage across the country. We follow four principles to do this:

For further information on The Careers & Enterprise Company:

www.careersandenterprise.co.uk

About this paper

This paper sets out our cold spots analysis which provides us with some important insights about how opportunities are organised in England.

In the report we examine which areas have: high levels of engagement between schools and employers; young people who are making opportunity informed decisions and achieving positive outcomes in terms of education and employment. We also examine the areas in which young people are most likely to experience substantial barriers.

This analysis allows The Careers & Enterprise Company to understand where more career support is needed and to direct our resources towards these areas. We hope that it this analysis will also guide the activities of others working in this space.

Executive summary

The Careers & Enterprise Company believes that all young people can benefit from support in their careers. At the moment, we recognise that access to career support is patchy and, even more worryingly, that more disadvantaged young people may be getting less support than their more advantaged peers. We also recognise that some young people have a greater need for career support than others. This paper sets out our cold spots analysis, which helps us to understand which areas need the greatest amount of support.

We published the original cold spots analysis in October 2015. The report helped to drive the Company's strategy and demonstrated our commitment to being evidence-based and data-driven.
This report updates that research, drawing in new, up-to-date data where possible.

In the report we examine which areas have; **high levels of engagement** between schools and employers, young people who are making **opportunity informed decisions** and **positive outcomes** in terms of education and employment.
We also recognise that some young people experience substantial **barriers.** We used the following data to provide insights into each of these areas.

Barriers	% known to be eligible for and claiming free school meals (FSM)
High levels of engagement between business and schools	% employer establishments who had someone doing work experience
	% employer establishments who offered any work inspiration
Opportunity informed decision making	% A levels entered that are STEM (Maths and Science only)
	% A levels entered by girls that are STEM (Maths & Science only)
	% in sustained apprenticeship destination post-KS4
Positive outcomes (education)	5+ A*-C including English and Mathematics GCSEs
Positive outcomes (labour market)	16 and 17-year olds who are not in education, employment or training (NEET)
	Preparedness for work of 16-year-old school leavers (poorly/very poorly prepared)
	Preparedness for work of 17 and 18-year-olds recruited to first job from school (poorly/very poorly prepared)

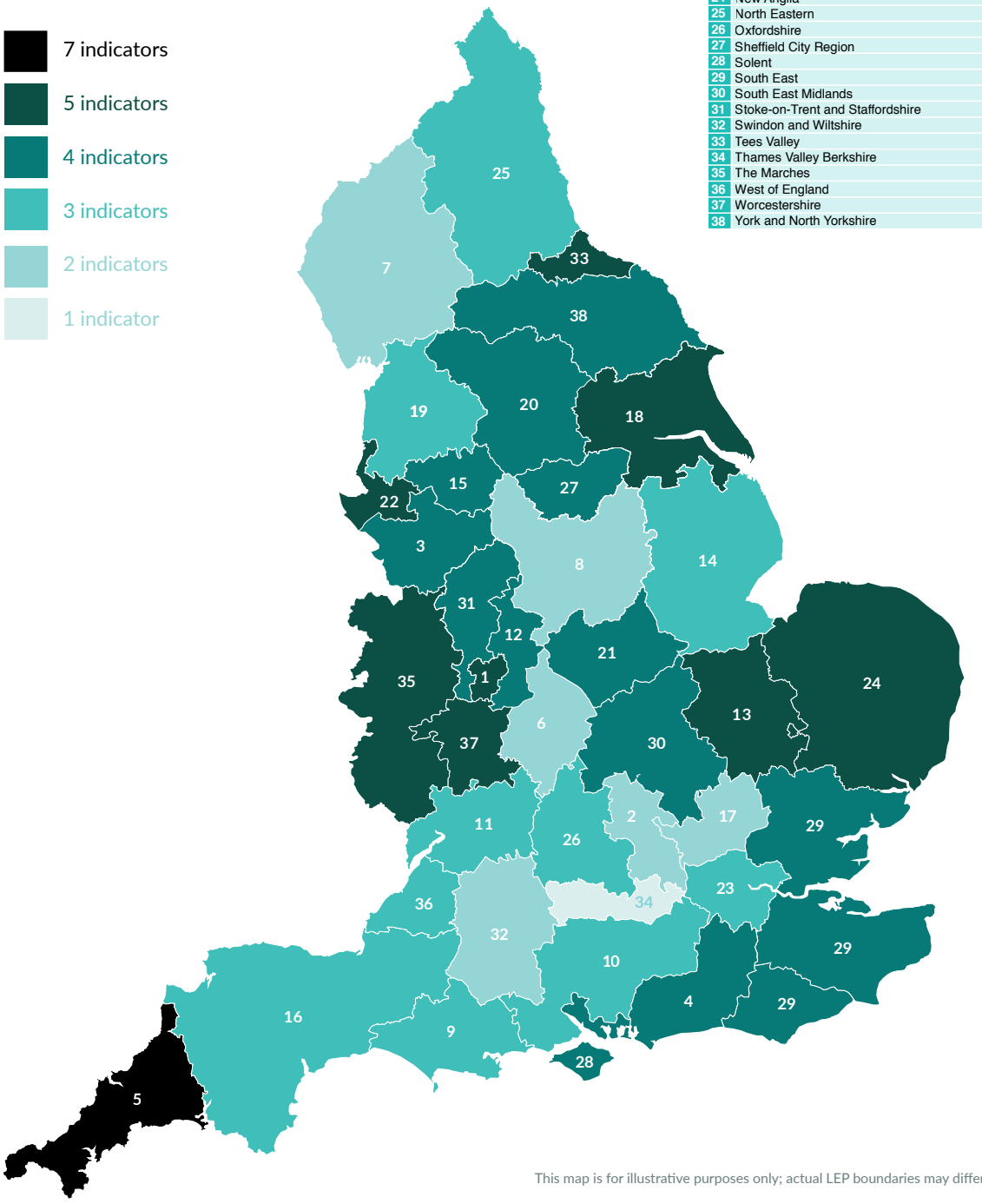
We have decided that if an area falls within the bottom third of an indicator it is deemed 'in need' or 'cold' on that indicator. The more indicators an area has in the bottom third the colder this area is and therefore the more in need of support.

This then allows us to look at the relative need across the country.

Cold spots map

Cold spots map

No.	Local Enterprise Partnership	
1	Black Country	5
2	Buckinghamshire Thames Valley	2
3	Cheshire and Warrington	4
4	Coast to Capital	4
5	Cornwall and the Isles of Scilly	7
6	Coventry and Warwickshire	2
7	Cumbria	2
8	Derby, Derbyshire, Nottingham and Nottinghamshire	2
9	Dorset	3
10	Enterprise M3	3
11	Gloucestershire	3
12	Greater Birmingham and Solihull	4
13	Greater Cambridge and Greater Peterborough	5
14	Greater Lincolnshire	3
15	Greater Manchester	4
16	Heart of the South West	3
17	Hertfordshire	2
18	Humber	5
19	Lancashire	3
20	Leeds City Region	4
21	Leicester and Leicestershire	4
22	Liverpool City Region	5
23	London	3
24	New Anglia	5
25	North Eastern	3
26	Oxfordshire	3
27	Sheffield City Region	4
28	Solent	4
29	South East	4
30	South East Midlands	4
31	Stoke-on-Trent and Staffordshire	4
32	Swindon and Wiltshire	2
33	Tees Valley	5
34	Thames Valley Berkshire	1
35	The Marches	5
36	West of England	3
37	Worcestershire	5
38	York and North Yorkshire	4



This map is for illustrative purposes only; actual LEP boundaries may differ due to overlaps.

The 2016 analysis is consistent with the 2015 analysis. While there have been some small shifts in the relative need for career support, the overall pattern remains the same across the country. The coldest areas continue to be found in rural parts of the country, particularly in the coastal regions, as well as in post-industrial areas. The warmest areas are in London and the home counties.

The cold spots analysis provides us with some important insights about the way opportunities are organised in England. This analysis allows The Careers & Enterprise Company to understand where more career support is needed and to direct our resources towards these areas. We hope that this analysis will also guide the activities of others working in this space and believe that the provision of the data at the school, local authority and LEP level will help organisations to target their work with even greater precision.

1. Introduction

At The Careers & Enterprise Company we believe that all young people need help and support in their careers. Whether you are rich or poor, an academic high flyer or at the bottom of your class, we think that everyone benefits from learning about the world of work, talking to employers and finding out useful information.

At the moment we recognise that access to career support is patchy and, even more worryingly, that more disadvantaged young people may be getting less support than their more advantaged peers.[1] Much of the activity of The Careers & Enterprise Company is dedicated to improving provision for disadvantaged young people, but we still have a lot of work to do.

This paper sets out our analysis of where career support is most needed. We have used existing data to look at this and to identify the areas that we refer to as cold spots. We will use this analysis to inform the strategy of The Careers & Enterprise Company and to guide the direction of our resources. We hope that other organisations also find this beneficial and make use of the analysis.

We think it is important that career support is channelled to those who need it and to where it can make the most difference.

We also recognise that some young people have a greater need for career support than others. This may be because they lack the family networks that can support their career aspirations, because they are not doing very well at school or because they are struggling to find opportunities in the area in which they live. We think it is important that career support is channelled to those who need it and to where it can make the most difference.

1. Archer, L and Moote, J (2016). *ASPIRES 2 Project Spotlight: Year 11 Students' Views of Careers Education and Work Experience*. London: King's College.

2. History of the cold spots

In October 2015 The Careers & Enterprise Company published a report entitled Prioritisation Indicators, which has become known as **the cold spots report**.[2] This report became a foundational piece of research for the Company. It defined our evidence-based and data-driven approach to policy and practice. The identification of the cold spots was critical as it helped the Company to develop its analysis of what the problem was and where it was impacting on young people.

In the cold spots research we set out to define where young people most needed career support. To do this, we identified ten data sources that could be used to build a basket of indicators. These ranged from the proportion of young people receiving free school meals to the percentage of employers offering work experience. The indicators painted a picture of the differing need for careers and enterprise activities nationally; activities that the newly created Company would be looking to support.

The report collated the most recent publicly available data from the Department of Education and UK Commission for Employment and Skills, and analysed it by Local Enterprise Partnership (LEP) and local authority (LA).

The Company made immediate use of the cold spots report by using it to inform the allocation of our initial £5 million investment fund, and 35 beneficiaries were funded with 75 per cent of the money being allocated to LEPs designated as cold spots.

The cold spots analysis caught the public imagination. The analysis was featured in The Guardian, The Telegraph, the Financial Times and a range of other national publications. It was also mentioned in speeches by Ministers and reports by parliamentary committees. Our stakeholders told us that it made sense and that it helped them to think about where they were allocating their resources.

Because of the positive response to the cold spots research we were keen to update it and deepen it for 2016. So we commissioned the Institute for Employment Studies to update the prioritisation indicators with more recent data where this was available.

2. The Careers & Enterprise Company (2015). *Prioritisation Indicators*. London: The Careers & Enterprise Company.

3. The cold spots model

The purpose of the cold spots analysis is to build a picture of the relative level of career support needed for an area. To build this picture we begin by asking what an area where career and enterprise provision was working really well would look like.

We might hypothesise that such an area would have the following features:

- **High levels of engagement** between schools and employers.
- **Opportunity informed decision making** by young people. This would include young people choosing educational pathways that have a clear connection to their future employment, such as undertaking an apprenticeship or studying STEM subjects at A level.
- **Positive outcomes** in terms of educational attainment and their fitness for work.

We also recognise that some young people experience substantial **barriers** to their career development, which we wanted to take account of in our model.

To capture these points, ten data sources or prioritisation indicators were chosen for the model. These are set out in Table 1.

Table 1: Prioritisation indicators

Barriers	% known to be eligible for and claiming free school meals (FSM)
High levels of engagement between business and schools	% employer establishments who had someone doing work experience
	% employer establishments who offered any work inspiration
Opportunity informed decision making	% A levels entered that are STEM (Maths and Science only)
	% A levels entered by girls that are STEM (Maths & Science only)
	% in sustained apprenticeship destination post-KS4
Positive outcomes (education)	5+ A*-C including English and Mathematics GCSEs
Positive outcomes (labour market)	16 and 17-year olds who are not in education, employment or training (NEET)
	Preparedness for work of 16-year-old school leavers (poorly/very poorly prepared)
	Preparedness for work of 17 and 18-year-olds recruited to first job from school (poorly/very poorly prepared)

Collectively, the prioritisation indicators tell a story about the journey that young people take from learning to work. Every young person is different and there are a multitude of positive outcomes. There are as many journeys as there are young people. However, the prioritisation indicators provide us with clues about where that journey is likely to be smooth and straightforward.

The prioritisation indicators paint a picture of the system's efficiency in getting young people from school to work. The areas likely to be least efficient at this are those where businesses are less engaged with schools, education outcomes are lower, and young people are rated as less prepared for work and more likely to be NEET. Such 'inefficient' areas are likely to be in more need of support than those where the opposite is true.

So a young man who has been receiving free school meals because his parents have a low income, who does not meet any employers while he is at school, who does badly in his GCSEs and then spends time not in education, employment or training (NEET) can benefit greatly from some additional career support. On the other hand, a young woman who is not eligible for free school meals, who is exposed to multiple work experience and work inspiration activities, who achieves five A*-Cs at GCSE before progressing to A level and studying a mix of Maths and Science may typically have a lower need for additional career support.

By combining the prioritisation indicators in our cold spots analysis we can identify areas in which more individuals are likely to have the former journey.

4. The prioritisation indicators

Deprivation

Free School Meals (FSM) was chosen as an indicator of disadvantage among young people as it is a well-known and accepted measure of disadvantage within the education sector. FSM students are much less likely to achieve five A*-Cs including Maths and English at GCSE (36.7 per cent compared to 64.7 per cent for all other students in state-funded schools[3]) and are less likely to progress to positive education and employment destinations.

Interestingly, in some areas of relatively high disadvantage young people are inoculated, to some extent, from the effect of disadvantage on attainment. The Social Mobility and Child Poverty Commission has said: 'Deprivation need not be destiny… some schools are bucking the trend, enabling their disadvantaged students to far exceed what would have been predicted for them based on experience nationally.'[4] This is particularly the case in London, which is why it has come to be known as the 'London effect'. However, the phenomenon has also been experienced in other large cities such as Birmingham and Manchester.[5]

It is beyond the scope of those working in careers and enterprise to change this indicator (i.e. reduce child poverty), but we can work to break the link between deprivation and outcomes. This is at the core of improving social mobility. In a perfectly socially mobile country FSM would have no predictive power over a young person's destination and would be inappropriate as an indicator. The success of London and other cities provides hope that this may one day be the case. It also provides us with clues as to how this may be done. Research has found that it can be partly explained by demographics, but is largely due to improvements in primary schools.[6]

Attempts to tackle the effects of disadvantage on attainment and labour market outcomes should be taken holistically including investment in primary education, secondary school interventions, and removing barriers to the top professions. The Company recently targeted £12 million of funding at mentoring interventions for pupils in the run-up to their GCSEs, focusing in particular on those disengaged from education. The research supporting this fund found that that socio-economic disadvantage was a big risk factor in a young person's likelihood of disengaging from education.[7]

Nationally, 13.2 per cent of pupils are eligible for FSM but this figure masks a wide range of local circumstances. In the Buckinghamshire local authority fewer than half of the national figure (4.8 per cent of pupils) are FSM whereas in Tower Hamlets this figure rises to 41.6 per cent or nearly nine times as many young people as in Buckinghamshire.[8]

3. Department for Education (2016). Revised GCSE and equivalent results in England: 2014 to 2015. Available from https:/www.gov.uk/government/statistics/revised-gcse-and-equivalent-results-in-england-2014-to-2015 [Accessed 11 October 2016].
4. Social Mobility and Child Poverty Commission (2014). *Cracking the Code: How Schools Can Improve Social Mobility*. London: Social Mobility and Child Poverty Commission.
5. Greaves, E, Macmillian, L, Sibieta, L 2014). Lessons From London Schools for Attainment Gaps and Social Mobility. London: Social Mobility and Child Poverty Commission.
6. Blanden, J, Greaves, E, Gregg, P, Macmillan, L. and Sibieta, L (2015). *Understanding the Improved Performance of Disadvantaged Pupils in London*. London: Centre for Analysis of Social Exclusion – LSE.
7. The Careers & Enterprise Company (2016). *Mapping Disengagement: Exploring Young People's Engagement with School*. London: The Careers & Enterprise Company.
8. Department for Education (2016). School pupils and their characteristics: January 2016. Available from https:/www.gov.uk/government/statistics/schools-pupils-and-their-characteristics-january-2016 [Accessed 29 November 2016.

Employer engagement

The employer engagement indicators consider the proportion of employers offering work experience and work inspiration activities and come from the UKCES Employer Perspectives Survey (EPS) 2014.[9] The survey is conducted once every two years and so these indicators have not been updated in this iteration of the model. At the time of writing the EPS is in the field and it is expected that new data will be available soon. We intend to update the cold spots analysis annually so anticipate that next year's analysis can make use of this new data. These indicators are particularly important to the Company as they are a measure of the activity taking place between the world of work and education. Just 38 per cent of employers offered work experience according to the UKCESS EPS[9], but more recent research by the CBI showed that 56 per cent of employers cite concern with school leavers' lack of work experience.[10]

Research shows that young adults who have greater levels of contact with employers while at school are significantly less likely to become NEET and can expect, when in full-time employment, to earn up to 18 per cent more than peers who had no such workplace exposure.[11] Research by the Company into how young people make decisions about their careers found that they are often presented with too much information, which can lead to 'choice overload'. Young people are asked to think about careers without any real knowledge of what a job involves. Work experience and inspiration activities provide a 'tangible sense of what different jobs and careers entail'.[12]

The proportion of employers offering work experience differs markedly by area. London was the LEP area in which most employer establishments offered work experience at 46 per cent. This is 64 per cent more than that of the Marches, the LEP in which the fewest employer establishments offered work experience at 28 per cent.

Educational outcomes

Numeracy and literacy skills underpin individuals' participation in learning and work. The Department for Education, in evidence provided to an inquiry on the purpose of education, states that being prepared for adult life starts with basic reading and mathematics, which are fundamental to life chances.[13] Lord Young, in his report Enterprise for All, notes that 'the most employable skills of all are the three Rs'.[14] Despite the importance of these skills, the CBI/Pearson Education and Skills Survey (2016) found that around a third of firms report that they are not satisfied with young people's use of English and maths.[10]

In addition to increasing employability, research shows that careers and enterprise activities may actually support higher attainment as they engage people in learning and provide motivation.[15] So while the primary purpose of including this indicator is to recognise that those who do not achieve in English and mathematics may require additional help in establishing

9. UK Commission for Employment & Skills (2014). *Employer Perspectives Survey 2014: UK Results*. London: UKCES
10. The CBI (2016). The Right Combination: CBI/Pearson Education and Skills Survey 2016. London: CBI.
11. Percy, C and Mann, A (2014). School-mediated employer engagement and labour market outcomes for young adults: wage premia, NEET outcomes and career confidence. In Mann, A, Stanley, J and Archer, L (Eds.). Understanding Employer Engagement in Education: Theories and Evidence. London: Routledge.
12. The Careers & Enterprise Company (2016). *Moments of Choice: How Education Outcomes Data Can Support Better Informed Career Decisions*. London: The Careers & Enterprise Company.
13. Department for Education (2016). Written evidence submitted by the Department of Education. Available from http://data.parliament.uk/writtenevidence/committeeevidence.svc/evidencedocument/education-committee/purpose-and-quality-of-education-in-england/written/27684.pdf
14. Young, D (2014). *Enterprise for All*. London: BIS.
15. Hooley, T, Matheson, J and Watts, AG (2014). *Advancing Ambitions: The Role of Career Guidance in Supporting Social Mobility*. London: Sutton Trust.

their careers, a secondary benefit is that effective careers work may improve students' attainment.

The cold spots analysis sheds light on the different levels of educational attainment by geography. In the Black Country LEP 50.5 per cent of students achieved five A*-Cs including English and Maths compared with 68.9 per cent in Buckinghamshire Thames Valley. In addition to geography, educational attainment is patterned by other attributes, most notably gender, with girls outperforming boys, as well as ethnicity, Special Education Needs (SEN), and deprivation (as measured by FSM).

Opportunity informed decision making

Science, Technology, Engineering and Maths (STEM)

Two of the indicators relate to the uptake of STEM subjects at A level. Importantly, one of these indicators considers the proportion of girls taking STEM A level subjects, an area where they are underrepresented.

A broad consensus exists around the importance of STEM skills, which are recognised by government and employers as vital to the modern knowledge-based economy, particularly in terms of jobs, productivity, innovation and competitiveness.[16] These skills open doors to a wide range of careers and the evidence suggests that they provide an earnings premium.[17] Despite the advantages that accrue to both individuals and the economy, firms report difficulty in recruiting staff with particular technical skills, which are underpinned by STEM A levels.

The LEP with the highest proportion of A levels entered that are STEM stands at 40 per cent while the lowest area is just 25 per cent. This is a difference of 58 per cent. Considering the gender split, nationally 43 per cent of STEM A levels are taken by girls. Although this percentage differs by LEP, in every single LEP more STEM A levels are taken by boys than girls. In a longitudinal study of young people's science and career aspirations, King's College London found that 'from a young age…. girls are less likely than boys to aspire to science careers'.[18] The study also found that boys receive significantly more career education than girls and appear to be doing more work experience.[1]

Apprenticeships

Apprenticeships represent a vocational route into many professions and the government has committed to three million apprenticeship starts by 2020. The prioritisation indicators take a high proportion of apprenticeships to mean that an area provides a substantial amount of appealing vocational opportunities for young people. Vocational education is sometimes juxtaposed to an academic route but this distinction can be unhelpful. High-quality apprenticeships contain qualifications – at the top end, equivalent to a degree – and have been associated with significant earnings premia.[19]

The proportion of young people in a sustained apprenticeship destination after KS4 differs markedly by LEP, with 11 per cent in Cumbria but just 2.6 per cent in London.

16. UK Commission for Employment and Skills (2015). *Reviewing the Requirement for High Level STEM Skills*. London: UKCES.
17. de Vries, R (2014). *Earning by Degrees: Differences in the Career Outcomes of UK Graduates*. London: The Sutton Trust.
18. Department of Education & Professional Studies, King's College London (2013). *Aspires: Young People's Science and Careers Aspirations Age 10–14*. London: King's College London.
19. National Audit Office (2012). *Adult Apprenticeships: Estimating Economic Benefits from Apprenticeships* (Technical Paper). Available at: https://www.nao.org.uk/wp-content/uploads/2012/02/10121787_Technical_paper.pdf [Accessed 18 October 2016].

Progression indicators

Not in Education, Employment or Training (NEET)

The number of 16 and 17-year-olds recorded as NEET is a good indicator of where young people are in need of career support to help them to re-engage with the education system and the labour market.

The Longitudinal Study of Young people sheds light on the characteristics that make a young person more likely to become NEET.[20] These characteristics interact with some of the other priority indicators as young people are more likely to become NEET if they were eligible for FSM, and if they did not achieve five A*-Cs including Maths and English. Other factors that increase the likelihood of being NEET include whether a young person had been permanently excluded or suspended from school in Year 10 or 11. Young people whose parents are in professional occupations are also less likely to become NEET.

This report shows how NEET outcomes are distributed geographically. London has the lowest level of NEET, at 3.6 per cent, which may represent the capital's success at raising the attainment standards of disadvantaged students and its position as the economic centre of the country. The LEP with the highest level of NEET is Tees Valley at 8.6 per cent.

Preparedness for work

The preparedness for work prioritisation indicators come from the UKCES Employer Skills Survey 2013.[21, 22] The majority of employers rate young people as 'well prepared' or 'very well prepared' for work. Attributes including 'working world, life experience or maturity' and 'attitude, personality or motivation' were reported more than technical attributes including 'skills or competencies' as attributes lacking in young people. Perhaps unsurprisingly the higher the qualification of young people the more prepared for work they were judged to be.[22]

In many ways the preparedness for work indicators bring together all the other indicators. The indicators tell the story from the employers' perspective of how well equipped they believe young people are for the world of work. Although it is encouraging to note that the majority of employers rate young people as well prepared, key differences appear between regions. In the Gloucestershire LEP only 20 per cent of 17 and 18-year-olds recruited to a first-time job from school were rated as poorly or very poorly prepared for work, compared with 37 per cent in the Black Country.

20. Department for Education (2011). Youth cohort study and longitudinal study of young people: 2010. Available at: https://www.gov.uk/government/statistics/youth-cohort-study-and-longitudinal-study-of-young-people-in-england-the-activities-and-experiences-of-19-year-olds-2010 [Accessed 18 October 2016].
21. The questions were transferred to the UKCES Employer Perspective Survey but the data was not published at the LEP level. New data is expected to be available by the end of 2016.
22. *UK Commission for Employment and Skills* (2014). UK Commission's Employer Skills Survey 2013: UK Results. London UKCES.

5. The cold spot analysis

Our analysis draws on the ten prioritisation indicators described in section 4 to create a geographical mapping of the need for career support. The report updates the 2015 Prioritisation Indicators report.[2] All data are publicly available from the UK Commission for Employment and Skills and the Department of Education. Links to the data sources and a note on which data have been updated can be found in Appendix **Table A1.**

We have analysed the data at three levels of geography: LEP, local authority and school. All of this data is available on the Company's website.

Identifying cold spots

At the core of our analysis is a judgement about the relative need of an area for career support. We have decided that if an area falls within the bottom third of an indicator it is deemed 'In Need' or 'Cold' on that indicator. Figure 1 shows the colouring used to denote whether an indicator is In Need, OK, or Good. The more indicators an area has in the bottom third the colder this area is and therefore the more in need of support.

At each level of geography, the threshold for what is considered In Need has been recalculated based on the distribution of scores within that level. i.e. the LEP-level data highlights those in the bottom third of all LEPs, while the school-level data highlights all those in the bottom third of all schools. **Table A2** in the appendix shows the threshold for bottom, middle and top thirds for the LEP level.

It is important to note that the prioritisation indicators are relative measures. Using the current methodology, that takes the bottom third as in need, there will always be cold spots even if there are improvements across indicators in absolute terms.

Figure 1: Key of indicators

In Need (i.e. cold spot)
OK
Good

6. Where are the cold spots?

Table 2: Prioritisation indicators by LEP

Source	DfE GCSE and equivalent attainment by pupil characteristics January 2016	DfE revised GCSE and equivalent results 2014/15	DfE revised A level and equivalent results 2014/15	DfE revised A level and equivalent results (Maths and science) 2014/15	DfE destinations of key stage 4 pupils: 2013/14
LEP	% pupils claiming free school meals (known to be eligible for and claiming)	% of pupils attaining 5+ A*-C GCSEs (including English and Maths)	% of A levels entered that are STEM (Maths and Science only)	% STEM A levels that are entered by girls (Maths and Science only)	% In sustained apprenticeship destination post-KS4
Black Country	18.9%	50.5%	30.9%	46.2%	6.3%
Buckinghamshire Thames Valley	4.8%	68.9%	39.7%	42.5%	3.0%
Cheshire and Warrington	8.0%	60.3%	26.1%	40.5%	5.5%
Coast to Capital	10.0%	60.9%	27.4%	42.5%	2.9%
Cornwall and the Isles of Scilly	10.8%	56.9%	29.4%	40.0%	5.0%
Coventry and Warwickshire	10.9%	57.2%	30.0%	44.3%	5.0%
Cumbria	8.2%	56.8%	30.8%	45.1%	11.0%
Derby, Derbyshire, Nottingham and Nottinghamshire	13.3%	53.6%	27.2%	43.9%	6.9%
Dorset	10.0%	59.7%	29.8%	44.4%	5.8%
Enterprise M3	7.3%	61.9%	27.2%	41.5%	4.1%
Gloucestershire	7.3%	60.9%	27.8%	41.2%	5.0%
Greater Birmingham and Solihull	18.7%	56.3%	31.3%	45.0%	4.4%
Greater Cambridge & Greater Peterborough	9.4%	57.1%	28.0%	41.0%	4.4%
Greater Lincolnshire	10.7%	55.7%	28.4%	42.4%	5.5%
Greater Manchester	17.4%	54.9%	27.6%	46.2%	5.6%
Heart of the South West	11.5%	57.2%	30.1%	41.6%	6.6%
Hertfordshire	6.9%	65.1%	30.2%	41.3%	3.0%
Humber	14.6%	53.4%	25.1%	41.5%	8.2%
Lancashire	13.4%	57.1%	29.8%	43.9%	6.7%
Leeds City Region	14.9%	55.5%	27.7%	42.9%	5.9%
Leicester and Leicestershire	10.5%	54.8%	31.7%	42.2%	4.7%
Liverpool City Region	19.7%	53.3%	28.0%	43.4%	5.8%
London	18.1%	60.9%	32.9%	44.9%	2.6%
New Anglia	10.7%	54.7%	27.2%	40.3%	6.0%
North Eastern	15.6%	56.0%	27.4%	42.4%	7.7%
Oxfordshire	7.4%	59.7%	32.2%	39.5%	5.0%
Sheffield City Region	14.9%	53.6%	27.7%	43.1%	7.5%
Solent	10.8%	56.4%	26.8%	41.4%	5.1%
South East	9.7%	57.8%	26.0%	42.3%	4.3%
South East Midlands	10.1%	54.8%	28.3%	42.2%	4.3%
Stoke-on-Trent and Staffordshire	10.8%	54.4%	25.6%	42.4%	7.2%
Swindon and Wiltshire	8.4%	58.3%	30.9%	42.9%	4.0%
Tees Valley	19.1%	53.8%	29.1%	44.2%	7.2%
Thames Valley Berkshire	7.5%	63.6%	34.2%	42.7%	4.3%
The Marches	9.8%	56.0%	29.1%	40.2%	5.6%
West of England	11.7%	56.5%	28.2%	40.1%	6.1%
Worcestershire	9.9%	60.7%	26.9%	39.5%	5.0%
York and North Yorkshire	7.4%	60.7%	28.6%	39.7%	6.5%

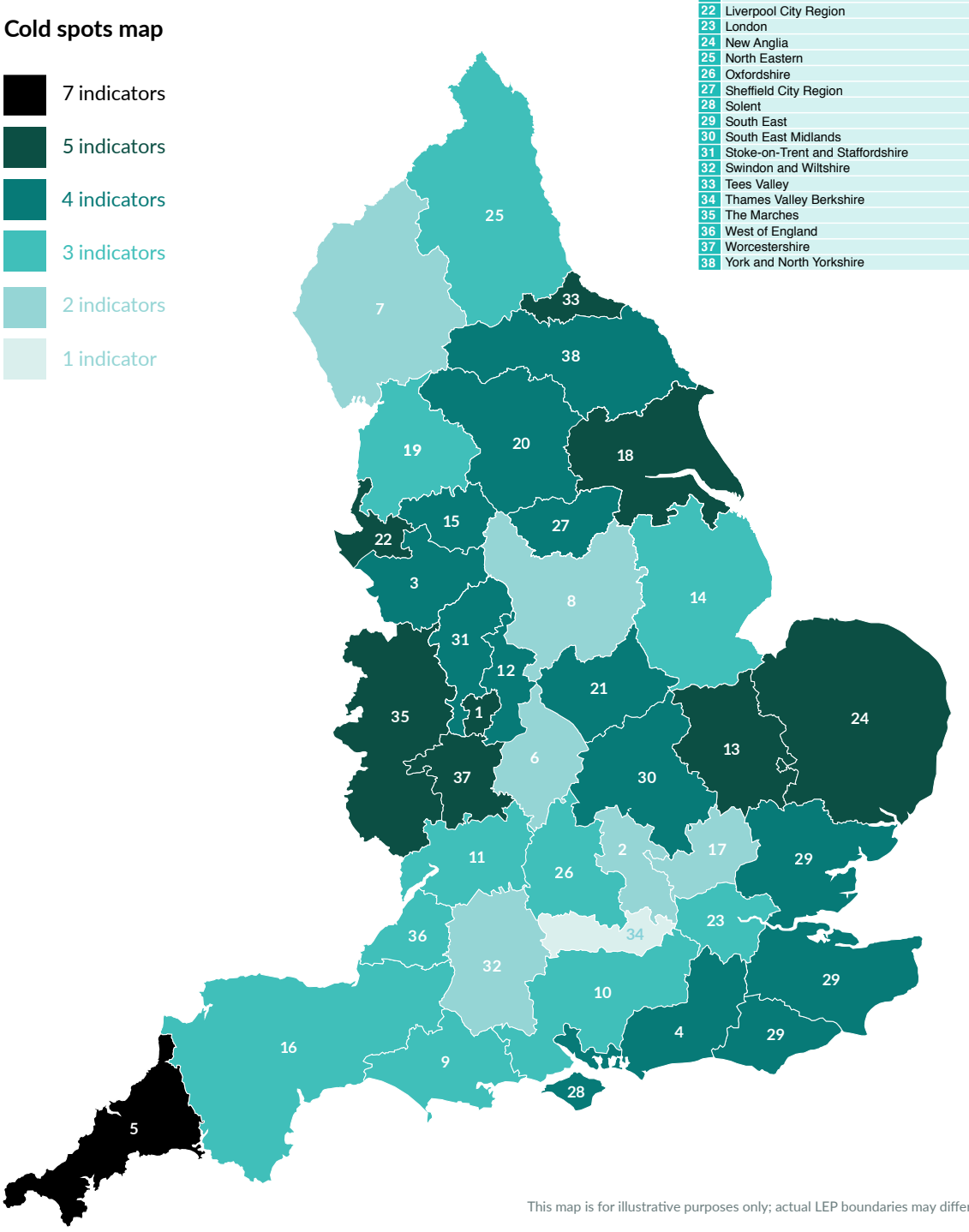
Table 2 sets out the full results for each of the LEP areas in each of the priority indicators. The final column records how many of the priority indictors were in the bottom third. Figure 2 then shows how these cold spots are organised across the country. This is followed by Figure 3, which shows how the LEPs are grouped by relative coldness.

Source	DfE participation in education and training 2012/13	UKCES EPS 2014	UKCES EPS 2014	UKCES ESS 2013	UKCES ESS 2013
LEP	% of 15 and 17-year-olds recorded as NEET (not in education, employment and training)	% of employer establishments who had anyone in on work experience	% of employer establishments who offered any work inspiration	% of employers saying 16-year-old school leavers are 'poorly' or 'very poorly prepared' for work	% Employers answering: 17–18 year olds recruited to first time job from school are "poorly" or "very poorly prepared" for work
Black Country	5.6%	38%	13%	41%	37%
Buckinghamshire Thames Valley	4.4%	38%	22%	33%	34%
Cheshire and Warrington	5.3%	46%	25%	46%	32%
Coast to Capital	4.7%	40%	14%	41%	30%
Cornwall and the Isles of Scilly	5.6%	31%	14%	40%	37%
Coventry and Warwickshire	4.7%	34%	15%	35%	29%
Cumbria	6.8%	31%	15%	37%	30%
Derby, Derbyshire, Nottingham and Nottinghamshire	4.9%	34%	17%	31%	24%
Dorset	8.4%	31%	22%	24%	24%
Enterprise M3	5.2%	39%	17%	34%	28%
Gloucestershire	4.8%	44%	17%	29%	20%
Greater Birmingham and Solihull	6.0%	41%	18%	39%	29%
Greater Cambridge & Greater Peterborough	7.4%	37%	16%	36%	32%
Greater Lincolnshire	6.2%	35%	15%	30%	24%
Greater Manchester	6.8%	37%	20%	38%	32%
Heart of the South West	7.9%	37%	11%	27%	26%
Hertfordshire	6.5%	36%	20%	29%	21%
Humber	6.4%	29%	14%	34%	24%
Lancashire	6.2%	36%	19%	41%	33%
Leeds City Region	6.5%	36%	15%	33%	30%
Leicester and Leicestershire	6.7%	31%	17%	37%	33%
Liverpool City Region	7.0%	42%	22%	42%	28%
London	3.6%	46%	20%	41%	31%
New Anglia	7.6%	42%	21%	39%	30%
North Eastern	6.8%	35%	18%	35%	31%
Oxfordshire	6.8%	35%	23%	36%	32%
Sheffield City Region	6.4%	31%	18%	29%	23%
Solent	6.2%	35%	16%	33%	24%
South East	7.9%	39%	16%	40%	30%
South East Midlands	6.4%	32%	18%	38%	31%
Stoke-on-Trent and Staffordshire	6.2%	31%	18%	36%	32%
Swindon and Wiltshire	5.2%	30%	17%	31%	23%
Tees Valley	8.6%	34%	11%	31%	27%
Thames Valley Berkshire	6.2%	38%	20%	38%	27%
The Marches	8.4%	28%	16%	27%	22%
West of England	6.5%	37%	17%	25%	27%
Worcestershire	6.8%	32%	15%	33%	24%
York and North Yorkshire	4.4%	32%	13%	28%	25%

Figure 2: Cold spots by Local Enterprise Partnership

Cold spots map

No.	Local Enterprise Partnership	
1	Black Country	5
2	Buckinghamshire Thames Valley	2
3	Cheshire and Warrington	4
4	Coast to Capital	4
5	Cornwall and the Isles of Scilly	7
6	Coventry and Warwickshire	2
7	Cumbria	2
8	Derby, Derbyshire, Nottingham and Nottinghamshire	2
9	Dorset	3
10	Enterprise M3	3
11	Gloucestershire	3
12	Greater Birmingham and Solihull	4
13	Greater Cambridge and Greater Peterborough	5
14	Greater Lincolnshire	3
15	Greater Manchester	4
16	Heart of the South West	3
17	Hertfordshire	2
18	Humber	5
19	Lancashire	3
20	Leeds City Region	4
21	Leicester and Leicestershire	4
22	Liverpool City Region	5
23	London	3
24	New Anglia	5
25	North Eastern	3
26	Oxfordshire	3
27	Sheffield City Region	4
28	Solent	4
29	South East	4
30	South East Midlands	4
31	Stoke-on-Trent and Staffordshire	4
32	Swindon and Wiltshire	2
33	Tees Valley	5
34	Thames Valley Berkshire	1
35	The Marches	5
36	West of England	3
37	Worcestershire	5
38	York and North Yorkshire	4



This map is for illustrative purposes only; actual LEP boundaries may differ due to overlaps.

Figure 3: LEPs by the number of indictors in the bottom third (relative coldness)

7	5	4	3	2	1
▪ Cornwall and the Isles of Scilly	▪ Black Country ▪ Greater Cambridge & Greater Peterborough ▪ Humber ▪ Liverpool City Region ▪ New Anglia ▪ Tees Valley ▪ The Marches ▪ Worcestershire	▪ Cheshire and Warrington ▪ Coast to Capital ▪ Greater Birmingham and Solihull ▪ Greater Manchester ▪ Leeds City Region ▪ Leicester and Leicestershire ▪ Sheffield City Region ▪ Solent ▪ South East ▪ South East Midlands ▪ Stoke-on-Trent and Staffordshire ▪ York and North Yorkshire	▪ Dorset ▪ Enterprise M3 ▪ Gloucestershire ▪ Greater Lincolnshire ▪ Heart of the South West ▪ Lancashire ▪ London ▪ North Eastern ▪ Oxfordshire ▪ West of England	▪ Buckinghamshire Thames Valley ▪ Coventry and Warwickshire ▪ Cumbria ▪ Derby, Derbyshire, Nottingham and Nottinghamshire ▪ Hertfordshire ▪ Swindon and Wiltshire	▪ Thames Valley Berkshire

We have also analysed the cold spots at the local authority and school levels. The detailed data for each of the three levels is available on our website **www.careersandenterprise.co.uk**.

7. What has changed since 2015?

The map in **Figure 2** presents a picture of the country that will be familiar to many policy makers and practitioners. The coldest areas are found in rural parts of the country, particularly in the coastal regions and post-industrial areas, while the warmest areas are in London and the home counties.

The reasons for the relative warmth of different areas therefore reflect wide-raging and deep-seated historical legacies. The Careers & Enterprise Company is dedicated to addressing these inequalities and to focusing support on the areas that need it most. The success of London schools in breaking the link between disadvantage and destiny offers some hope that concerted policy efforts can solve what are considered stubborn issues.

Table 3 shows the changes to the prioritisation indicators at the national level. A small difference appears for FSM but there is little change in the other indicators at the national level. Encouragingly, the updated indicators reveal that the number of students claiming FSM went down from 15 per cent to 13 per cent between 2015 and 2016.

Table 3: Indicators – national averages

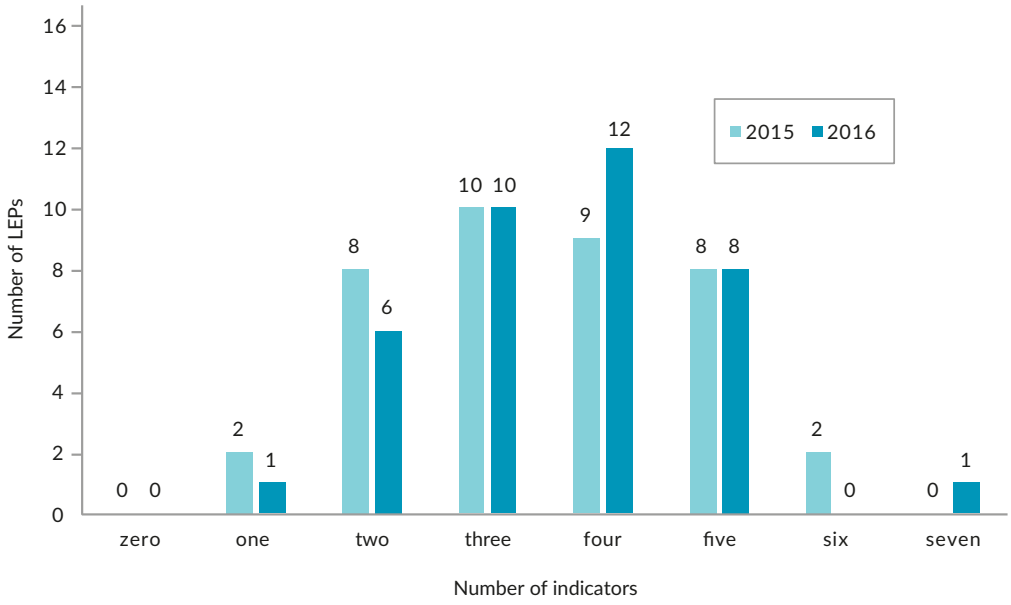
Indicator	Report 2016 %	Report 2015 %
% pupils of claiming free school meals (known to be eligible for and claiming)	13	15
% of employer establishments who had someone doing work experience	38	38
% of employer establishments who offered any work inspiration	18	18
% of pupils attaining 5+ A*-C GCSEs (including English and Maths)	57	57
% of A levels entered that are STEM (Maths and Science only)	29	30
% of STEM A levels entered by girls (Maths and Science only)	43	43
% in sustained apprenticeship destination post-KS4	5	5
% of 16 and 17-year-olds recorded as NEET (not in education, employment and training)	6	6
% of employers saying 16-year-old school leavers are 'poorly' or 'very poorly prepared' for work	36	36
% of employers saying 17 and 18-year-olds recruited to first-time job from school are 'poorly' or 'very poorly prepared' for work	29	29

So the national priority indicators have not changed very much in the last year.

Figure 3 shows the distribution of the number of indicators that LEPs have in the bottom third. LEPs with more than four indicators are designated as cold spots.

Four indicators in the bottom third was the most common category with 12 or 31.6 per cent of LEPs in 2016. One LEP – Cornwall and Isles of Scilly – had seven indicators in the bottom third. In 2016, 21 areas were considered cold spots compared to 19 the previous year. A breakdown of the number of bottom third indicators in each LEP is given in the Appendix **Table A3.**

Figure 3: Number of bottom third indicators in 2015 and 2016



8. Conclusions

The cold spots analysis provides us with some important insights about how opportunities are organised in England. It identifies that there are clear patterns in disadvantage, attainment, opportunities for career development and labour market outcomes.

Unfortunately, many of the prioritisation indicators co-occur, creating these career cold spots. This analysis allows us to understand where more career support is needed and to direct our resources towards these areas. We have been doing this since the inception of The Careers & Enterprise Company and this new analysis provides us with further confirmation of our approach.

We hope that this analysis will guide the activities of others working in this space and believe that the provision of the data at the school, local authority and LEP level will help organisations to target their work with even greater precision. The Company will continue to update the prioritisation indicators and to refine and deepen the analysis as new data becomes available.

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Appendices

Appendix 1

Sources of data

Table A1: Data source for each indicator, with corresponding link to data file

Category	Indicator	Updated	Data source	Link to data file
Barriers	% of pupils claiming free school meals (known to be eligible for and claiming)	Yes	DfE SFR20/2016 School pupils and their characteristic	https://www.gov.uk/government/statistics/schools-pupils-and-their-characteristics-january-2016
High levels of engagement between business and schools	% of employer establishments who had anyone in on work experience	No	UKCES Employer Perspectives Survey 2014	https://www.gov.uk/government/uploads/system/uploads/attachment_data/file/415506/EPS_2014_England_LEP_Summary_data_tables.ods
	% of employer establishments who offered any work inspiration	No		
Positive outcomes (Education)	% of pupils attaining 5+ A*-C GCSEs (including English and Maths	Yes	SFR01 2016: Statistics: GCSEs (Key Stage 4)	https://www.gov.uk/government/collections/statistics-gcses-key-stage-4
Opportunity informed decision making	% of A levels entered that are STEM subjects	Yes	SFR 03/2016 A level and other level 3 results: 2014 to 2015	https://www.gov.uk/government/statistics/a-level-and-other-level-3-results-2014-to-2015-revised
	% of STEM A levels entered that are entered by girls	Yes	SFR03/2016 A level and other level 3 results: 2014 to 2015	https://www.gov.uk/government/statistics/a-level-and-other-level-3-results-2014-to-2015-revised
	% in sustained apprenticeship destination post-KS4	Yes	SFR 05/2016 Destinations of key stage 4 pupils: 2013 to 2014	https://www.gov.uk/government/statistics/destinations-of-ks4-and-ks5-pupils-2013-to-2014
Positive outcomes (labour market)	% of 16 and 17-year-olds recorded as NEET (not in education, employment and training)	No for LA and LEP level, yes at school level	NEET data by local authority	https://www.gov.uk/government/publications/participation-in-education-and-training-by-local-authority
	% of employers saying 16-year-old school leavers are 'poorly' or 'very poorly prepared' for work	No	UKCES Employer Skills Survey 2013	https://www.gov.uk/government/uploads/system/uploads/attachment_data/file/354714/ESS2013_England_LEP_Tables.ods
	% of employers saying 17 and 18-year-olds recruited to first-time job from school are 'poorly' or 'very poorly prepared' for work	No		

Appendix 2

Boundaries for indicator

Table A2: Boundary of top third and bottom third of the range of results for each indicator (LEP level)

Indicator	Range	Lower third	Upper third	Good perfor-mance	Cold/in need	What is good?
% known to be eligible for and claiming free school meals, 2016	0.1490	0.0976	0.1472	9.75%	14.72%	Low
% of employer establishments who had someone doing work experience, 2014	0.18	0.34	0.40	40.00%	34.00%	High
% of employer establishments who offered any work inspiration, 2014	0.14	0.16	0.20	20.33%	15.67%	High
% of pupils attaining 5+ A*-C GCSEs (including English and Maths), 2014/15	0.18	0.57	0.63	62.77%	56.65%	High
% of A levels entered that are STEM (Maths and Science only), 2014/15	0.15	0.30	0.35	34.84%	29.98%	High
% of STEM A levels that are entered by girls (Maths and Science only), 2014/15	0.07	0.41	0.44	43.97%	41.72%	High
% in sustained apprenticeship destination post-KS4, 2013/14	0.08	0.05	0.08	8.20%	5.40%	High
% of 16 and 17-year-olds recorded as NEET (not in education, employment and training), 2013/14	0.05	0.05	0.07	5.26%	6.92%	Low
% of employers saying 16-year-old school leavers are poorly or very poorly prepared for work, 2013	0.22	0.31	0.39	31.33%	38.67%	Low
% of employers saying 17 and 18-year-olds recruited to first-time job from school are poorly or very poorly prepared for work, 2013	0.17	0.26	0.31	25.67%	31.33%	Low

Appendix 3

Number of bottom third indicators for each LEP

Table A3: Number of bottom third indicators for each LEP

bold = a change since 2015

% bottom third indicators

LEP	2015	2016
Black Country	**6**	**5**
Buckinghamshire Thames Valley	**3**	**2**
Cheshire and Warrington	4	4
Coast to Capital	**5**	**4**
Cornwall and the Isles of Scilly	**6**	**7**
Coventry and Warwickshire	**1**	**2**
Cumbria	2	2
Derby, Derbyshire, Nottingham and Nottinghamshire	2	2
Dorset	3	3
Enterprise M3	3	3
Gloucestershire	**2**	**3**
Greater Birmingham and Solihull	4	4
Greater Cambridge & Greater Peterborough	5	5
Greater Lincolnshire	3	3
Greater Manchester	4	4
Heart of the South West	3	3
Hertfordshire	2	2
Humber	**4**	**5**
Lancashire	**4**	**3**
Leeds City Region	**3**	**4**
Leicester and Leicestershire	4	4
Liverpool City Region	5	5
London	3	3
New Anglia	5	5
North Eastern	**2**	**3**
Oxfordshire	**2**	**3**
Sheffield City Region	**3**	**4**
Solent	**2**	**4**
South East	4	4
South East Midlands	4	4
Stoke-on-Trent and Staffordshire	4	4
Swindon and Wiltshire	**3**	**2**
Tees Valley	5	5
Thames Valley Berkshire	1	1
The Marches	**4**	**5**
West of England	**2**	**3**
Worcestershire	5	5
York and North Yorkshire	4	4

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