

Department for Education

About this document

This document provides a range of information on the quality of the key stage 4 attainment data and the methodology used to produce it. It is based on the Office for National Statistics' guidelines for measuring statistical quality.

It provides an overview of the data used in the production of the key stage 4 statistical first releases (SFRs) and the secondary school performance tables. It describes the methodology used to calculate pupil attainment in these publications. It provides information on the data sources, their coverage, their quality and how the data is validated and processed.

Feedback

We are changing how our releases look and welcome feedback on any aspect of this document at:

Attainment.STATISTICS@education.gsi.gov.uk

Provisional GCSE and equivalent results in England, 2014 to 2015: Quality and methodology information

Contents

1.	Introduction	2
	Changes from the 2013/14 release	2
2.	About the output	4
	Data sources	4
	Relevance	4
	Timeliness and punctuality	6
3.	How the output is created	7
	Derived variables	7
	Data added from other sources	9
4.	Accuracy and reliability	12
	Reliability	12
	Data coverage	13
	Measurement error	13
	Validation and quality assurance of source data	14
	Data Processing	15
	Statistical first release production	15
5.	Accessibility	15
	Disclosure Control	16
6.	Coherence and comparability	16
7.	Got a query? Like to give feedback?	19
	Annex A: Timeline of changes in key stage 4 attainment	20

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1. Introduction

This quality and methodology document provides an overview of the key stage 4 attainment data used in the production of the key stage 4 statistical first releases (SFRs) and the secondary school performance tables. It provides information on the methodology used to calculate pupil attainment, as well as information on the data sources, their coverage, their quality and how the data is validated and processed.

This document is based on the Office for National Statistics' guidelines for measuring statistical quality.

Changes from the 2013/14 release

Extension of the reforms implemented in 2013/14

In 2013/14, two major reforms were implemented which affected the calculation of key stage 4 (KS4) performance measures data:

- Professor Alison Wolf's Review of Vocational Education recommendations which:
 - a. restrict the qualifications counted
 - b. prevent any qualification from counting as larger than one GCSE
 - c. cap the number of non-GCSEs included in performance measures at two per pupil
- 2. An early entry policy to only count a pupil's first attempt at a qualification. In 2013/14, early entry policy only applied to English Baccalaureate subjects.

The 2015 secondary school performance measures will continue to be calculated on the same basis, with the addition that the early entry policy will cover all subject areas instead of only those that count in the English Baccalaureate.

Further information on the reforms can be found in the 2013/14 key stage 4 SFR.

New accountability measures

A new secondary school accountability system will be implemented from 2016. It will include two new headline measures: Attainment 8 and Progress 8. Schools have had the option to adopt the new performance measures a year early in 2015. From 2016, the headline indicator of school performance determining the floor standard will be Progress 8.

Progress 8 aims to capture the progress a pupil makes from the end of primary school to the end of secondary school. It is a type of value added measure, which means that pupils' results are compared to the actual achievements of other pupils with the same prior attainment. As Progress 8 is a relative measure, the average Progress 8 score for all pupils nationally is zero, and it is therefore not published in the key stage 4 SFR.

Attainment 8 will measure the achievement of a pupils across 8 subjects including maths (double weighted) and English (double weighted), 3 further qualifications that count in the English Baccalaureate (EBacc) measure and 3 further qualifications that can be GCSE qualifications (including EBacc subjects) or any other non-GCSE qualifications on the DfE approved list.

Detailed guidance on the new Progress 8 and Attainment 8 measures can be found in the Progress 8 guidance alongside details of how the floor standards will apply to schools that have opted in. A list of schools that have opted in early to the Progress 8 measure can be found here.

The full range of performance measures based on the current accountability system will continue to be published for all schools in the 2015 performance tables, including those that have opted into the Progress 8 system early.

For those schools that did not opt in to Progress 8 in 2015, their Progress 8 results will be published for the first time in 2016.

Use of key stage 2 data

Key stage 2 boycott

In 2010, around 25 per cent of state-funded primary schools boycotted the key stage 2 national curriculum tests. As a result, key stage 2 test results are not available for those pupils who reached the end of key stage 4 in 2014/15 and previously attended a school that took part in the 2010 boycott.

For pupils with missing key stage 2 test data, any secondary performance measures that take prior attainment into account will be based on key stage 2 teacher assessment results instead. This includes measures such as expected progress, best 8 value added and attainment for low, middle and high prior attainers. Using teacher assessment for pupils in place of missing key stage 2 test results is standard practice for secondary performance measures.

To help our users understand where the 2010 boycott has resulted in a high proportion of pupils with missing test results in schools' cohorts, the 2015 performance tables will include an indicator that shows where over 50 per cent of a school's pupils do not have key stage 2 tests results, for either English or maths, due to the boycott.

Single Level Tests (SLTs)

Between 2007 and 2010, 225 primary schools across 10 local authorities (LAs) in England participated in a pilot of Single Level Tests (SLTs) at key stage 2. Test results for SLTs in maths contributed to the performance tables in 2010 and these pupils have now reached the end of key stage 4; therefore, a small proportion of key stage 2 test results used in progress measures in 2014/15 may also include the results of maths SLTs in place of national curriculum tests. An evaluation of the pilot can be found here: Evaluation of the single-level-test (SLT) pilot: final report.

Publication of provisional data at school level in the performance tables

From October 2015, provisional 2014/15 school level results for state-funded schools will be published in the performance tables in advance of the 31 October deadline for secondary school admission applications so that parents can use the latest performance data to inform their choice of secondary school for 2016/17. As in previous years, any amendments made after August 2015 will be reflected in the full performance tables release in January 2016. School level figures will not be published in the key stage 4 SFR.

The decision to publish the provisional results at school level, for state-funded schools only, was based on analysis of previous years' data which showed that: 1) provisional data is an accurate reflection of revised data for the vast majority of secondary schools; and 2) provisional data provides a closer guide to latest school performance than the previous year's final published results. This is explained in more detail in section 4 of this document: reliability. Provisional results have not been released for independent schools because the level of change between provisional and revised data is higher.

2. About the output

National and local authority (LA) information on key stage 4 attainment of secondary school pupils in England is published in the following SFRs

GCSE and equivalent results: SFR series

2015

GCSE and equivalent results: England - 2014 to 2015 (provisional)

2014

Provisional GCSE and equivalent results in England: 2013 to 2014
Revised GCSE and equivalent results in England: 2013 to 2014
Revised GCSE and equivalent attainment by pupil characteristics: 2014

School level information for the end of key stage 4 is published in the secondary school <u>performance</u> <u>tables</u>.

National curriculum standards have been designed so that most pupils will progress by approximately one level every two years. For key stage 4 we assess the expected level of progress a pupil makes in English and in maths. This means that pupils who achieved level 4 at the end of key stage 2 would be expected to achieve grade A*-C by the end of key stage 4.

All children in their final year of a key stage must be assessed. Most of the children will be in the year group with similarly aged pupils. Pupils reaching the end of key stage 4 are typically those pupils starting the academic year aged 15.

Data sources

The key stage 4 datasets are compiled using information matched together from three data sources:

- i. prior attainment records (key stage 2 results)
- ii. school census records
- qualification entries and results collected from awarding bodies

Attainment data for all pupils at the end of key stage 4 is collected from the awarding bodies by the department's contractor.

Relevance

This section describes the degree to which the statistics meet current and potential needs of the users.

The key strength of the data is that it is derived from an administrative data collection. This means that it can supply accurate data down to small geographical areas (school level). In addition, the data is merged with other administrative data held by the department (the school census) to provide detailed information on sub-groups of the school population. Pupil level data from different key stages can also be merged together so that we can produce precise measures of pupil progress between one key stage and another.

Key users

Department for Education	Used to monitor national standards of key stage 4 attainment in secondary schools in England. The national figures are used to determine whether standards are improving or declining.
	Data for sub-groups of the population are also analysed to inform departmental policies aimed at closing gaps in attainment.
	School level figures are used to identify schools where intervention may be needed to bring standards up to an acceptable level.
Ofsted	Used as part of the background information to inform school inspections. For example, it enables inspectors to identify areas of the curriculum or groups of pupils where a school appears to be doing less well. This would then form part of the focus during the inspection.
Ofqual	Used as part of the evidence it reviews on the setting and maintenance of standards in key stage 4 examinations.
Local authorities	National data and that for other LAs is used to set the attainment of their area into context.
	School level information is used to hold maintained schools to account.
Schools	Used to evaluate their own performance against national standards and other local schools.
	Used to identify high performing schools with similar circumstances to their own that they can work with to improve their own standards.
School governors	Used to hold schools to account, to identify strengths and weaknesses and to support school improvement.
Teachers and head teachers	Used for analysis and self-evaluation, and to aid planning of school improvement strategies.
	Used to inform decisions about whether to apply for vacancies in particular schools and also as background information when preparing for interviews.
Parents	Used to compare their own children's performance to others in their school, LA and nationally.
	Used to hold their children's schools to account and identify areas where they feel the school needs to improve.
	Used to inform choice of a secondary school for their child.
	Performance of schools in the local area is also a key consideration for parents and prospective parents when moving house.
Others	Used by researchers from this country and abroad. Used by others to identify schools with particular levels of attainment that they may wish to market their services to.

Timeliness and punctuality

The timeline of the key stage 4 data cycle is as follows:

May and June

Main GCSE examinations taken

August

The Joint Council for Qualifications (JCQ) collects results data from the awarding bodies

JCQ publish GCSE results in the third week in August

The department's contractor receives results from the awarding bodies (data is collected throughout

the year but the majority is collected in the summer)

September

Department receives provisional data from the contractor

Secondary schools performance tables checking exercise

October to December

Provisional SFR published in October (15 October in 2015 – around six weeks after the department receives the provisional data from the contractor). School level results based on provisional data will be published in the performance tables for the first time in October 2015 for key performance measures.

Scrutiny of amendment requests following checking exercise

Department receives three sets of revised data during November and December

January

Revised SFR published alongside the secondary school performance tables. Figures are also broken down by pupil characteristics. The performance tables include full breakdowns of school level data.

February

Post errata period commences for schools to request additional amendments to data

March

Department receives final data from the contractor and updates the performance tables

The proposed month of publication is announced on <u>gov.uk</u> at least twelve months in advance and precise dates are announced in the same place at least four weeks prior to publication. In the unlikely event of a change to the pre-announced release schedule, the change and the reasons for it would be announced.

3. How the output is created

Data on pupils' attainment is collected from awarding bodies via the department's contractor. This information is linked with information on pupil characteristics taken from the <u>school census</u> and information on pupils' prior attainment. This data is used to produce the provisional SFR.

The data is checked with schools during the performance tables <u>checking exercise</u>. The revised pupil attainment data is then linked again with information on pupil characteristics and prior attainment to produce the revised/final datasets and all derived variables recalculated. This data is published in the revised SFR and the performance tables. Following publication of the performance tables, there is a short errata process where schools can inform us of any additional changes that should be made to the data. Following this process, the performance tables data is finalised and the performance tables website updated. The final data is used to update the time series in the following year's SFR.

Derived variables

A large number of variables are derived for publication in the key stage 4 SFRs and in the secondary school performance tables. The performance measures contained within the SFR are based on the same rules used to produce the measures shown in the secondary school performance tables.

A full list of the derived variables that will be published in the provisional performance tables can be found in the 2015 performance tables statement of intent. The metadata section of the performance tables website will be updated in January 2016 and will be available via the following link: Performance tables metadata

The table below summarises key variables used in the publications:

Total pupils	Number of pupils at the end of key stage 4		
Eligible pupils	Used to identify the pupils to be included in school, LA and national level calculations		
5+ A*-C grades	Number/percentage of pupils achieving 5 or more GCSEs or equivalent at grades A*-C		
5+ A*-C grades (including English and maths)	Number/percentage of pupils achieving 5 or more GCSEs or equivalent at grades A*-C including English and maths GCSEs		
Pupils making expected levels of progress in English or in maths	Pupils included are those at the end of key stage 4 with valid key stage 2 test results or teacher assessments. The measure of expected progress is built on the principle that pupils achieving a level 4 in English or in maths by the end of key stage 2 should be expected to achieve at least a C grade at GCSE in that subject. Further guidance can be found at: Progress measures guidance		

English Baccalaureate (EBacc)

Pupils entering and achieving a core of selected academic subjects which are English, maths, sciences, a humanities subject (history or geography) and a language.

A list qualifications included in the English Baccalaureate is available at EBacc List

Low/middle/high prior attainment

Pupils are grouped based on their performance at key stage 2. In 2015, performance is averaged across qualifying outcomes in English and maths tests or teacher assessments. Prior to 2015, performance was averaged across qualifying outcomes in English, maths and science. Indicators are shown for:

Low attainers = those below the expected level (level 4) at key stage 2

Middle attainers = those at the expected level (level 4) at key stage 2

High attainers = those above the expected level (level 4) at key stage 2

Further guidance can be found on:

Defining high, middle and low attainers

Average point score (APS)

The key stage 4 average point scores awarded for GCSEs are set out in the table below:

Grade	Points
A*	58
Α	52
В	46
С	40
D	34
Е	28
F	22
G	16
Ungraded	0

Point score allocations for all key stage 4 approved qualifications can be found here: Point score allocation

The capped point score is based on a pupil's best 8 GCSE or equivalent results

Progress 8	A new accountability system, to be implemented from 2016. Schools have had the option to adopt the new performance measures a year early in 2015.
	Progress 8 aims to capture the progress a pupil makes from the end of primary school to the end of secondary school. It is a type of value added measure, which means that pupils' results are compared to the actual achievements of other pupils with the same prior attainment.
	Further guidance can be found in the Progress 8 guidance
Attainment 8	Attainment 8 scores form the basis of Progress 8. It will measure the achievement of a pupil across 8 subjects including maths (double weighted) and English (double weighted), 3 further qualifications that count in the English Baccalaureate (EBacc) measure and 3 further qualifications that can be GCSE qualifications (including EBacc subjects) or any other non-GCSE qualifications on the DfE approved list. To calculate a pupils' Progress 8 score, their Attainment 8 score is compared with the average Attainment 8 score of all pupils nationally who had a similar starting point (or 'prior attainment')

Data added from other sources

Characteristics

Information on pupil characteristics is taken from the school census. Details will be provided in a separate quality and methodology document when 2015 breakdowns by characteristics are published.

School Admission Basis

The school admission basis is taken from <u>Edubase</u> and is given as at 11 September at the start of the academic year. They are defined as follows:

Comprehensive schools	Takes all pupils, usually regardless of their ability, aptitude or whether they have been selected for a place at a selective school
Modern schools	Takes pupils regardless of their ability or aptitude, including those who have not been selected for a place at a local selective school
Selective schools	Admits pupils wholly or mainly with reference to ability. These schools were formally designated as grammar schools

School Type and groupings

The school types are taken from <u>Edubase</u> and are given as at 11 September at the start of the academic year. They are defined as follows:

School types	School types		
Academy sponsor led	Sponsored academies are all-ability, state-funded schools established and managed by sponsors from a wide range of backgrounds, including high performing schools and colleges, universities, individual philanthropists, businesses, the voluntary sector, and faith communities		
Academy converter	Schools that have chosen through Governing Body Resolution and application to the Secretary of State to become an academy under the Academies Act 2010		
Free school	Free schools are all-ability state-funded schools set up in response to what local people say they want and need in order to improve education for children in their community. They have the same legal requirements as academies and enjoy the same freedoms and flexibilities		
University technical college (UTC)	UTCs are all-ability and mixed sex state-funded schools, independent of LAs. They are not extensions of or conversions from existing provision, but new 14-19 academies, typically with 500-800 pupils. UTCs specialise in subjects that need modern, technical, industry-standard equipment, such as engineering and construction, and teach these disciplines alongside business skills and a broad, general education. Pupils integrate academic study with practical learning, studying core GCSEs alongside technical qualifications		
Studio school	Studio schools are all-ability and mixed sex state-funded schools, independent of LAs. They are an innovative new model of educational provision, delivering mainstream qualifications through practical project-based learning. They are not extensions or conversions from existing provision, but are new 14-19 academies, typically with around 300 pupils		
City technology college (CTC)	Independent all-ability, non-fee-paying schools offering pupils the opportunity to study a curriculum geared, with the help of private sector sponsors, towards the world of work. There are currently only three CTCs as most converted to sponsor led academies a few years ago		
Further education college with provision for 14 to 16 year olds	General further education colleges and sixth-form colleges with provision for 14 to 16 year olds who wish to study high-quality vocational qualifications alongside general qualifications including English and maths within the key stage 4 curriculum. 2015 is the first year in which colleges have pupils at the end of key stage 4		
Pupil referral unit (PRU)	A PRU is established and maintained by a LA which is specially organised to provide education for children who are excluded, sick or otherwise unable to attend mainstream school and is not a special or other type of school		

Alternative Provision (AP)	Alternative provision takes place when a LA takes direct responsibility for the education of a young person who is unable to attend a mainstream school. Common reasons for a young person receiving alternative provision include exclusion, medical needs or school refusal
Non-maintained special schools	A school which has been approved as a special school and is not maintained by a LA
Independent school	Any school which provides full time education for 5 or more pupils of compulsory school age, which is not state-funded or a non-state-funded special school
Independent special schools	Approved by the Secretary of State for Education. They are run on a not-for-profit basis by charitable trusts and normally cater for children with severe and/or low incidence special educational needs. This group includes non-maintained special schools
School type groupings	How we group schools in the SFR
State-funded mainstream schools	Includes LA maintained mainstream schools, academies, free schools, city technology colleges (excluding all special schools, pupil referral units, alternative provision and independent schools)
LA maintained school	Schools fully or partially under LA control that are state-funded, mainly by the Dedicated Schools Grant. These include community schools, foundation schools, voluntary aided school and voluntary controlled schools and also LA maintained special schools
State-funded special schools	Includes LA maintained special schools, academy sponsor led special schools, academy special schools and special free schools
State-funded school	Includes LA maintained schools, academies, free schools, city technology colleges and state-funded special schools (excluding hospital schools, pupil referral units, alternative provision and independent schools)
Independent special school	Approved by the Secretary of State for Education. They are run on a not-for-profit basis by charitable trusts and normally cater for children with severe and/or low incidence special educational needs. This group includes non-maintained special schools
All independent	Includes independent schools, independent special schools and non- maintained special schools

4. Accuracy and reliability

Reliability

The extent to which a figure changes over different versions of the same data.

The key stage 4 data can change between provisional and revised data as the revised data contains:

- outcomes of the appeals process where schools ask for reviews for one or more of their pupils in the belief that a clerical error has been made or the mark scheme has not been correctly applied
- late results
- changes resulting from requests from schools to remove pupils who have recently arrived from overseas, have been admitted following a permanent exclusion for another school, if the pupil is not at the end of key stage 4, if the pupil has permanently left England, the pupil has left the school before exams or the pupil is deceased

The national figures usually change by no more than plus or minus one percentage point between provisional, revised and final data. Table 1 shows the change in some key figures at national level over the last three years. Changes in the LA and school level figures can be slightly larger. Figures do not typically change at a national level between revised and final data and changes in LA and school level data are small.

Table 1: Change in national key stage 4 data

All schools		2011/12	2012/13	2013/14
Describer of number objection 5 on	Provisional	58.6	58.6	52.6
Percentage of pupils achieving 5 or more GCSEs or equivalent at grades	Revised	59.4	59.2	53.4
A*-C (including English and maths):	Final	59.4	59.2	53.4

In October 2015 provisional results will be published at school level, for state-funded schools only, so that parents can use the latest performance data to inform their choice of secondary school for 2016/17.

For the vast majority of state-funded schools, provisional data is a reasonably accurate reflection of revised data: in both 2013 and 2014 about 95 per cent of state-funded schools had provisional results within two percentage points of their revised published results.

Provisional results also provide a closer guide to latest school performance, for state-funded schools, than the previous year's final published results. In both 2013 and 2014, about 1 per cent of state-funded schools had provisional results which were 5 or more percentage points from their final results. In contrast, 50 per cent of state-funded schools had changes of 5 or more percentage points in 2014 compared to their previous year's results.

Provisional results have not been released for independent schools because the level of change is higher, in 2014 23 per cent of independent schools had a change of 3 or more percentage points compared to 5 per cent of state schools. This is mainly because independent schools are more reliant on the September checking exercise for making changes to their pupil cohort.

Data coverage

The target population for the key stage 4 data collection is all pupils who are at the end of key stage 4, typically those pupils starting the academic year aged 15.

We produce a provisional SFR in October based on the provisional data covering headline national and local authority information. In October 2015, provisional school level data will be published for the first time for key performance measures. The provisional SFR does not contain any characteristics breakdowns (other than gender) as these are more subject to change, particularly at LA level.

We update this SFR with revised data early the following calendar year when the full breakdown of school level information is published in the performance tables. During the September checking exercise schools are able to apply for pupils to be removed from their figures if they have recently arrived from overseas and their first language is not English. Although these pupils will be removed from the revised school and LA figures, they remain included in the national figures so that these accurately reflect the attainment of all pupils. Other reasons a school may remove pupils are: if a pupil has been admitted following a permanent exclusion from another school; if the pupil is not at the end of key stage 4; if the pupil has permanently left England; if the pupil has left the school before exams; or the pupil is deceased. Schools cannot be accountable for these pupils and therefore we allow the removal of them so they are not included in their performance measures.

Schools cannot remove pupils in certain circumstances, for example: pupil has been excluded from school after the January school census; the pupil left to go to another school in England; or the pupil is a persistent non-attender.

In January 2015, characteristic breakdowns such as ethnicity, special educational needs and first language will be published alongside the revised national and LA figures in the same SFR. These breakdowns were previously published in a separate SFR.

There are a small number of further changes to the data following publication of the performance tables. The performance tables (national, LA and school level figures) are updated with these changes but the SFR is not updated because the extent of the changes does not usually affect the national or LA figures. However the final data will be used to update any time series in the following year's statistical first release.

Measurement error

This section describes the administration and marking of key stage 4 examinations, the re-marking process and the regulation of qualifications, all of which can affect the accuracy of key stage 4 attainment measures.

Clear guidance is provided to schools regarding the administration of the GCSE papers, including instructions for keeping the exam materials secure prior to the exams and storage of completed papers until they are collected for marking.

The exam papers are externally marked by the awarding bodies to ensure that marking is consistent between schools. There are no quotas set or underlying assumptions about the proportion of pupils who should be at each grade. Proportions are decided entirely by how pupils' attainment measures up to the standards of the exams.

After marking, results are returned to schools. If schools have concerns over the marking of an exam paper, they may request for it to be re-marked. Outcomes of appeals are not reflected in the provisional data but are included in the revised data.

Further information on the general regulations for schools and how exams are conducted/marked can be found on the JCQ website:

Joint Council for Qualifications (JCQ) website

Ofqual sets the standards and rules that awarding bodies need to meet when they design, deliver and award regulated qualifications. They monitor awarding bodies and qualifications to make sure that standards are maintained. They are a risk-based regulator and concentrate their resources to where they are most needed. For example, they may discover that an awarding body's processes need updating or that there are risks connected to a qualification taken by thousands of students every year. Further guidance on the role of Ofqual can be found at:

How Ofqual regulate

As a further check of the accuracy of the underlying data, the key stage 4 data is also collated into school level information and shown to schools, together with the underlying pupil data, during the performance tables checking exercise. Schools are required to check the data and notify the department of any pupils that are included in their school in error, or of any missing pupils. Schools can also notify us of any other errors in the data such as errors in matching prior attainment results. Any changes requested are validated to ensure that they comply with the rules before being accepted. They are also able to apply for pupils to be removed from their figures, if they have recently arrived from overseas and their first language is not English. We allow the removal of these pupils from the school and LA figures as they can have an impact on some schools figures (since some schools have significant numbers of such pupils). However, we continue to include these pupils in the national figures so that they reflect the attainment of all pupils. Schools can also apply for pupils to be removed if a pupil has been admitted following a permanent exclusion from another school, if the pupil is not at the end of key stage 4, if the pupil has permanently left England, the pupil has left the school before exams or the pupil is deceased.

Following the checking exercise the revised data is produced. This includes changes requested by schools during the checking exercise, changes resulting from any successful marking reviews and any late results. The data is then published in the revised key stage 4 SFR and in the secondary school performance tables.

Following publication of the performance tables, some schools notify us of further changes required in the data. These changes are validated in the same way as those which are received during the checking exercise and final data is produced.

Validation and quality assurance of source data

Once schools have completed their key stage 4 exams they are required to send their exam materials and attendance registers to the awarding bodies for external marking and data capture.

Key stage 4 results are made available to schools on results day: in 2015 this was 20 August. This data is then passed from the awarding bodies to the department's contractor for processing and then onto the department for use in the SFRs and performance tables.

Data Processing

Key stage 4 data received from awarding bodies are combined with pupil characteristics from the school census and prior attainment by the department's contractor. Records are matched, using identifiers such as surname, forename, date of birth, UPN, gender and postcode. This successfully matches around 98 per cent of results.

At every stage in the data cycle, the department checks all calculations used in the production of the figures. The department carries out checks on the data to ensure that the files produced by the contractor comply with the specified format and contain the correct information. All indicators at school level, local authority level and national level are re-derived to ensure the contractor's systems are programmed correctly.

The entire process is subject to a 'dry run' during the summer. This involves producing a dummy dataset, from the previous year's dataset, which conforms to how the current year's data will be supplied (eg if new qualifications have been introduced, then dummy data would be added to last year's data to simulate these). This dummy dataset is used to test the contractor's systems and the department's checking processes. This allows potential problems to be resolved prior to the receipt of the live data.

Statistical first release production

All data in the SFR tables is produced and quality assured by two people. Any discrepancies in the data produced are discussed and resolved prior to publication. Examples of quality assurance are provided in the box below.

Examples of further quality assurance

Comparisons with previous year's figures to identify any large unexpected changes

Comparisons with provisional data to identify any large changes (revised/final data only)

Check totals are consistent across tables

Check patterns in the data (eg expected differences between subjects, high/low performing local authorities)

Check figures against those produced for the performance tables

5. Accessibility

Accessibility is the ease with which users are able to access the data. It also relates to the format(s) in which the data are available and the availability of supporting information.

The SFR text is published in pdf format so that it is accessible to all users irrespective of their choice of software. Care is also taken to ensure that the document meets accessibility guidelines. Key figures are highlighted in the SFR text which draws out the key messages such as changes over time and differences between groups of pupils. Small tables or charts illustrating key figures are also included in the text.

Each SFR is accompanied by formatted Excel tables with clear titles which allow general users to find more detail than can be provided in the SFR text. Any important limitations or inconsistencies in the data are mentioned in footnotes so that users do not have to refer to the text or this document. Where there are large numbers of tables, these are split into manageable sections (eg national tables in one file, LA tables in a separate file) so that users do not need to download larger files than necessary for their needs.

The performance tables website provides a number of ways of searching for schools of interest (eg by name of school, by town, within x miles of a postcode or all schools within a LA) and presents the data in a series of web pages showing different aspects of the data. The selected schools are shown in alphabetical order by default but can be sorted by any measure if the user requires ranked data.

Key stage 4 information also forms part of the national pupil database (NPD) which is an education dataset holding a wide range of information about pupils and students and has provided invaluable evidence on educational performance to inform independent research, as well as studies commissioned by the department. Any user wishing to conduct more detailed research or analysis may request an anonymised pupil level extract of the national pupil database (NPD).

Disclosure Control

The Code of Practice for Official Statistics requires us to take reasonable steps to ensure that our published or disseminated statistics protect confidentiality.

In the statistical first releases, an 'x' indicates that a figure has been suppressed due to small numbers. Values of 1 or 2 or a percentage based on 1 or 2 pupils who achieved a particular level are suppressed. Percentages based on 1 or 2 pupils who did not achieve a particular level are suppressed in circumstances where non-suppression would lead to disclosure of pupils. Some additional figures have been suppressed to prevent the possibility of a suppressed figure being revealed. This suppression is consistent with the departmental statistical policy on confidentiality.

In the school level data, any figures relating to a cohort of 5 pupils or fewer will be suppressed. This applies to sub-groups of pupils as well as the whole cohort; for example, if there were 5 boys and 3 girls in a school, we would not publish attainment for boys or girls separately but would publish attainment for all pupils (as this is based on 8 pupils).

6. Coherence and comparability

Coherence is the degree to which the statistical processes, by which two or more outputs are generated, use the same concepts and harmonised methods.

Comparability is the degree to which data can be compared over time, region or other domain.

We use the same methodology to produce the data within our SFRs and the performance tables. We also use a dataset produced at the same time for the performance tables and the provisional and revised SFRs. As a result, the national and LA figures included in both the provisional and revised SFRs and the performance tables will match.

There have been some changes to key stage 4 data which can make comparisons over time difficult. These changes are listed in annex B. Where time series are shown in the tables, any discontinuities will be indicated in the tables by the use of a dotted line and footnotes will be included to explain the reason for the discontinuity. Where possible (for example, when methodology rather than test structures change), figures for previous years will be recalculated using the current methodology following major changes in methodology. For the changes in 2014 the figures haven't been recalculated but information has been provided based on different methodologies to give users some statistics for comparison. The expansion of early entry policy to all subjects in 2015 was not a major change and an additional methodology has not been produced.

There were major changes to key stage 4 data in 2014:

Wolf Review

In 2014, secondary school performance measures were calculated significantly differently following the implementation of the Wolf review recommendations¹.

The review set out a number of recommendations for the reform of the secondary school performance tables from 2014, including:

- only include qualifications in performance measures which meet the new quality criteria.
 This has led to the removal of around 3,000 unique qualifications from the performance
 measures between 2012/13 and 2013/14. A full list of the qualifications that can count in
 2014/15 performance measures can be found here: inclusion of 14-16 qualifications in
 2014
- adjust the associated point scores for non-GCSEs so that no qualification will count as larger than one GCSE in size. For example, where a BTEC may have previously counted as four GCSEs it will now be reduced to the equivalence of a single GCSE in its contribution to performance measures
- restrict the number of non-GCSE qualifications that count in performance measures at two per pupil

To ensure that all pupils are provided with access to a broad and balanced curriculum, the number of approved non-GCSE qualifications counting towards secondary school performance measures will be capped at two qualifications per pupil, affecting both threshold and point score measures.

In line with Professor Alison Wolf's recommendations² the department has published a list of qualifications that will count in the secondary school performance tables for 14 to16 year olds in 2014, 2015 and 2016. The list of qualifications that will count in the 2014 performance tables can be found at key stage 4 performance tables 2014: eligible qualifications and List of all qualifications included in the 2014, 2015 and 2016 performance tables

¹ Professor Alison Wolf published her review of vocational education in March 2011: <u>Professor Alison Wolf's review</u>

Discounting

Discounting will be employed against the list of qualifications that will count in the performance tables from 2014. In general, qualification discounting ensures that, where a pupil has taken two or more qualifications with an overlap in curriculum, the secondary school performance tables only give credit once for teaching a single course of study.

Discounting may be required in a number of situations, for example:

- a pupil resits a qualification before the end of key stage 4, possibly with a different awarding body. Discounting then ensures that only one result is counted in the secondary school performance tables calculations and measures
- the school provides a single course of study but then enters the pupil for two or more very similar qualifications. Discounting ensures that the achievement from this single set of teaching hours is counted only once

For further information on the new discounting rules, along with specific scenarios of how the policy will be applied and the specific handling of English, maths and science qualifications, please see the Discounting guidance in the RAISEonline document library.

New early entry rules

New 'early entry' rules for key stage 4 qualifications have been introduced, which affected the key stage 4 SFRs and the secondary school performance tables from 2014. On 29 September 2013 the Secretary of State announced that, from this date, only a pupil's first entry to a key stage 4 qualification counts towards their school's performance measures.

The early entry rule will apply even where qualifications are taken with one exam board and then re-taken with another. This new rule does not prevent schools from entering pupils for examinations before the end of key stage 4. Pupils can sit an examination more than once but it will be their first certificated grade in that subject that will be used for performance measures.

The early entry rules will be applied to all performance measures. This includes the percentage of pupils achieving at least 5 or more A*-C GCSEs including English and maths, and the English Baccalaureate.

The early entry rules only applied to English Baccalaureate subjects in 2014. These subjects are:

- English (English, English language, English literature)
- maths
- science
- history
- geography
- modern and ancient foreign languages

In 2015, the early entry policy will cover all subject areas instead of only those that count in the English Baccalaureate.

For further information on the early entry rules, along with specific scenarios of how the policy will be applied, please see the Early Entry guidance in the <u>RAISEonline document library</u>.

7. Got a query? Like to give feedback?

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Annex A: Timeline of changes in key stage 4 attainment

2009/10	Publish per cent attaining the new English Baccalaureate.
	Publish per cent attaining the "Basics" (A*-C English and maths).
	Count accredited IGCSEs (and their precursors) for first time
2010/11	GCSE only measures introduced to performance tables.
	AS levels counted in English Baccalaureate
2011/12	First cohort to know of English Baccalaureate measure when making course choices
2012/13	New biology, chemistry, physics and additional science GCSEs.
	Marks awarded for spelling, punctuation and grammar in English literature, history, geography and religious studies exams
2013/14	Wolf Review recommendations come into force in performance tables:
	only Wolf-approved qualifications counted
	each equivalent of one GCSE only
	no more than two non-GCSE qualifications
	new discounting rules
	Only first attempt at GCSEs etc counts in performance tables and in English Baccalaureate subjects.
	GCSEs no longer unitised (modular) but linear.
	New GCSE geography exam.
2014/15	Early entry policy expanded to include all subjects.
	Schools have had the option to adopt a new accountability system a year early in 2015. It will include two new headline measures: Attainment 8 and Progress 8. 327 schools chose to adopt the new accountability system early and for these schools we will publish Attainment 8 scores in the 2015 performance tables. The new secondary school accountability system will be implemented for all schools from 2016.
	AS level computer science now contributes towards the EBacc science pillar.





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This document is also available from our website:

https://www.gov.uk/government/collections/statistics-gcses-key-stage-4.