## Data quality information — School education, chapter 4

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| Data quality information |
| Data quality information (DQI) provides information against the seven Australian Bureau of Statistics (ABS) data quality framework dimensions, for performance indicators in the School education chapter.  Technical DQI has been supplied or agreed by relevant data providers. Additional Steering Committee commentary does not necessarily reflect the views of data providers. |
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### Attendance

Data quality information for this indicator has been drafted by the Secretariat in consultation with ACARA, with additional Steering Committee comments.

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| Indicator definition and description | | |  | |
| Element | Equity ― Access | | | |
| Indicator | Attendance and Participation | | | |
| Measure (computation) | Measure 1 (attendance rate) definition  The number of actual full time equivalent student days attended by full time students in Years 1 to 10 as a percentage of the total number of possible student days attended over the period  Numerator The number of actual full time equivalent student days attended by full time students in Years 1 to 10  Denominator sum of possible school days (the days each student is expected to attend) for all students in the collection period, for children in years 1–10 (children enrolled full time only  Computation/s: The number of actual full time equivalent student days attended by full time students in Years 1 to 10 as a percentage of the total number of possible student days attended over the period. These data are disaggregated by Indigenous status for all year levels and by remoteness for combined year levels 1-6, 7-10 and 1-10.  Measure 2 (attendance level) definition : Government schools  The proportion of full-time students in Years 1-10 whose attendance rate is greater than or equal to 90 per cent over the period  Numerator sum of possible school days, for students attending more than or equal to 90 per cent of possible days in the collection period, for children in years 1–10 (children enrolled full time only)  Denominator sum of possible school days (the days each student is expected to attend) for all students in the collection period, for children in years 1–10 (children enrolled full time only  Computation/s: Numerator divided by denominator, expressed as a percentage. These data are disaggregated by Indigenous status for all year levels and by remoteness for combined year levels 1-6, 7-10 and 1-10.  Measure 2 (attendance level) for Non-government schools  Non-government schools student level data are based on a different measure of headcounts of students attending more than 90 per cent of the time, and are not directly comparable with data for government schools. | | | |
| Data source/s | ACARA Annual StudentAttendance collection 2014 and 2015 | | | |
| Data Quality Framework Dimensions | |  | | |
| Institutional environment | Data Collector(s): State and Territory Education departments and the Australian Government Department of Education and Training collect data from individual schools. Collection authority: ACARA Act 2008 | | | |
| Relevance | Data collection is directly relevant.  Data represent student attendance rates and levels(per cent) for all schools in all sectors in Australia by Year level for Years 1 ‑10 and ungraded students, State and Territory, Sex, and Indigenous status and by geolocation for years 1-6, 7-10 and 1-10.  The collection period for the government sector was Semester 1 in 2014 and 2015 for each state / territory. Attendance level data are available for 2015 only  Note that actual dates of Semester 1 may vary between state / territory. | | | |
| Timeliness | Student Attendance data for national reporting are collected annually for the reporting period of Semester 1 (Terms 1 and 2). 2015 data were provided to ACARA during November 2015 | | | |
| Accuracy | Data reported to ACARA are validated by the data providers and then subjected to consistency checks:   * correct calculation of attendance rates and levels | | | |
| Coherence | Data for the attendance rate (measure 1) are collected according to the “National Standards for Student Attendance Data Reporting” and are consistent for 2014 and 2015, except for NSW data which are collected on a different basis.  Data for the attendance level (measure 2) are collected according to “National Standards for Student Attendance Data Reporting” for government schools (except for NSW), but are collected using a different method for non-government schools. Therefore government and non-government school data for this measure cannot be compared. | | | |
| Interpretability | Please refer to the National Standards for Student Attendance Data Reporting | ACARA | | | |
| Data Gaps/Issues Analysis | | | |  |

The Steering Committee notes the following issues:

Care should be exercised in relation to the data for Aboriginal and Torres Strait Islander students, particularly in some jurisdictions and in the non-government sectors, due to small population sizes.

### Participation (6–15 year old children enrolled in school)

Data quality information for this indicator has been drafted by the Secretariat in consultation with the ABS, with additional Steering Committee comments.

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| Indicator definition and description | |
| Element | Equity ― Access |
| Indicator | Attendance and particpation |
| Measure (computation | Definition Proportion of children aged 6–15 years who are enrolled in school (and is expressed as a percentage),  Numerator total number of children aged 6–15 years and enrolled in school (full-time and part-time enrolments)  Denominator total population of children aged 6–15 years  Computation/s: The number of children aged 6–15 years enrolled in school divided by the total population of children of that age group. These data are disaggregated by Aboriginal and Torres Strait Islander and non-Indigenous peoples. |
| Data source/s | Numerator  National Schools Statistics Collection (NSSC) data.  Denominator  ABS Estimated Resident Population (total population), based on the 2011 Census. Data are available annually and adjusted for change over time. |
| Data Quality Framework Dimensions | |
| Institutional environment | Data on government and non-government schools are collected from administrative school enrolment databases and collated by the ABS through the non-finance National Schools Statistics Collection (NSSC). This collection was established through the work of the then Australian Education Council, later the Ministerial Council on Education, Employment, Training and Youth Affairs (MCEETYA).  For information on the institutional environment of the ABS, including the legislative obligations of the ABS, which cover this collection, please see ABS Institutional Environment. |
| Relevance | Students are classified by state/territory, level and Year of education, Aboriginal and Torres Strait Islander status, full-time or part-time status, age at 1 July, category of school and sex. Student data are not currently available by socioeconomic status or geography. Data covers all students enrolled at in scope schools.  All data are collected to standard classifications as stated in the NSSC Notes, Instructions and Tabulations Manual for aggregate submissions and the NSSC Data Collection Manual for unit record level submissions.  Rates are based on school students as a proportion of the estimated resident population. For more information please the Data Quality Declaration for Australian Demographic Statistics (cat. no. 3101.0). |
| Timeliness | The NSSC is based on the national school census that is conducted annually on the first Friday in August by each state and territory department of education and the non-government education systems. Information is disseminated through the ABS website from late January through to March the following year. |
| Accuracy | The NSSC is based on enrolment information from education administrative data systems at the time of the school census, collected in accordance with the standards and definitions applying to the collection.  For government data, each school provides and/or validates the information reflecting their enrolments to the relevant state education department. Each state and territory education department processes the data so that data forwarded to the ABS represents, or can be used to derive, student counts (a count of natural persons within a system of education).  Non-government data are coordinated through the Australian Government Department of Education and Training.  The ABS undertakes further validation of all received data prior to publication.  Due to the different enrolment systems, the ability to manage multiple records of enrolment for a student may vary among jurisdictions, which may result in over-reporting of school students in some jurisdictions.  Some small exceptions exist in the interpretation of the standards applying to the collection, and the ability of systems to collect data to the specifications of the collection. These exceptions may affect comparisons of school counts, student counts and student full time equivalent values. |
| Coherence | Rates are based on school students as a proportion of the estimated resident population. Data items are consistent over time, except where not available.  NSSC school and student information is a subset of the enrolment information provided by the various education authorities. The application of NSSC business rules may result in counts which differ from those in other datasets originating from the same education authorities. For example, NSSC student counts may not reconcile to enrolment counts available in alternate datasets where multiple enrolments were reported for those students enrolled in more than one school.  State and territory governments report on schools, students and staff in their Annual Reports.  State and territory governments provide NSSC data to the Australian Government Department of Education and Training for Commonwealth funding purposes.  State and territory governments provide school, student and staff data to the Australian Curriculum Assessment & Reporting Authority (ACARA) for school level reporting.  NSSC data are reported through the National Report on Schooling in Australia, Aboriginal and Torres Strait Islander Education Action Plan, National Partnership on Youth Attainment and Transitions and the Report on Government Services.  The Australian Government Department of Education and Training reports on non-government school, student and staff data collected for the purposes of administering the Schools Assistance Act 2008 (www.deewr.gov.au/Schooling/Programs/Pages/SchoolsAssistance Act2008.aspx).  The five-yearly Census of Population and Housing (www.abs.gov.au/websitedbs/censushome.nsf/home/data?opendocument#from-banner=LN) includes information on children attending school and the occupation of Australians (including teachers).  The ABS Estimated Resident Population (ERP) series is used in the calculation of some measures of secondary engagement in this publication. It is used as a denominator to calculate students as a proportion of the population. The ERP is an estimate of the population of Australia, based on data from the most recent published ABS Census of Population and Housing, and is updated annually using information on births, deaths and internal migration provided by state and federal government departments. See ABS Population by Age and Sex, Australian states and territories. See Australian Demographic Statistics (cat. no. 3101.0) for further details.  Projected and estimated Aboriginal and Torres Strait Islander population data are sourced from *Estimates and Projections, Aboriginal and Torres Strait Islander Australians, 2001 to 2026*  (Cat. no. 3238.0) (series B)  Non-indigenous population estimates are derived by subtracting the Aboriginal and Torres Strait Islander estimates and projections from the ERP.  Estimates may differ from those released in previous editions of this publication due to scheduled revisions of the estimated resident population.  ABS data from the NSSC for reporting student enrolments are not comparable with Education Council data from the NSAC for reporting student attendance |
| Accessibility | Predominantly national level information is published in *Schools, Australia* (www.abs.gov.au/ausstats/abs@.nsf/mf/4221.0) (cat. no. 4221.0) on the ABS website. A range of time series data cubes, with a focus on state/territory level information, is also available on the ABS website. |
| Interpretability | *Schools, Australia* (www.abs.gov.au/ausstats/abs@.nsf/mf/4221.0) (cat. no. 4221.0) includes explanatory notes and a glossary, both of which are available on the ABS website. |
| Data Gaps/Issues Analysis | |
| Key data gaps/issues | The Steering Committee notes the following issues:   * The differences in populations used for the numerator (service population for each jurisdiction) and denominator (resident population for each jurisdiction) may result in an overestimate of enrolment rates for some jurisdictions (in particular, the ACT) and an underestimate in other jurisdictions. |

### Participation (participation of 15–19 year old students)

Data quality information for this indicator has been drafted by the Secretariat in consultation with the ABS, with additional Steering Committee comments.

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| Indicator definition and description | |
| Element | Equity — Access |
| Indicator | Attendance and Participation |
| Measure (computation) | Definition  The number of full-time and part-time school students of a particular age expressed as a proportion of the estimated resident population of the same age, for each year for 15–19 year olds.  Numerator/s  Number of full and part-time students of specific ages: 15, 16, 17, 18, 19 and  15–19.  Denominator/s  Estimated resident population for these age groups, based on 2011 Census of Population and Housing.  Computation/s:  The number of full and part-time students as a proportion of the estimated resident population. These are provided by jurisdictions and disaggregated by sex. |
| Data source/s | Numerator and Denominator  Numerator: ABS Schools Australia (various years) (cat. no. 4221.0); Education Council National Schools Statistics Collection (NSSC) data; and unpublished data from Schools, Australia.  Denominator – ABS Estimated Resident Population (total population) Data are available annually.  The participation rate is supplied directly to the review, but the numerator and denominator on which it is based are not.  All data are available annually. |
| Data Quality Framework Dimensions | |
| Institutional environment | Data on government and non-government schools are collected from administrative school enrolment databases and collated by the ABS through the non-finance National Schools Statistics Collection (NSSC) and are based on the annual School census. This collection was established through the work of the former MCEETYA.  For information on the institutional environment of the ABS, including the legislative obligations of the ABS, which cover this collection, please see ABS Institutional Environment. |
| Relevance | School student data are available by state/territory and for full-time students and full plus part-time students. Rates are based on school students as a proportion of the estimated resident population.  All data are collected to standard classifications as stated in the NSSC Notes, Instructions and Tabulations Manual. Data covers all students enrolled in school, some of whom may be taking a VET course. |
| Timeliness | The NSSC is based on the school census that is conducted annually on the first Friday in August by each state and territory department of education. The results from the 2014 NSSC were released in March 2015. |
| Accuracy | Each school provides information on their enrolments to the relevant state education department, which then forwards aggregate data to the ABS. The collection of data on students in non-government schools is coordinated through the Australian Government Department of Education and Training.  The NSSC is based on information on each student enrolled at the time of the school census. |
| Coherence | Rates are based on school students as a proportion of the estimated resident population from the five-yearly Census of Population and Housing for the relevant age group. Data items are consistent over time.  Data for jurisdictions are comparable and are collected in accordance with national standards. Before sending data to the ABS, each state and territory education department cleans the data and removes duplicate records so that students are only counted once. Due to the different enrolment systems, the ability to remove duplicates varies among jurisdictions and this may result in over-reporting of school students in some jurisdictions.  Cross border enrolments may affect consistency between the populations at the numerator and denominator.  Each state and territory government reports on school students. The Australian Curriculum Assessment & Reporting Authority (ACARA) also reports on school students and the five-yearly Census of Population and Housing includes information on children attending school. |
| Accessibility | Schools, Australia (cat. no. 4221.0) includes explanatory notes and a glossary available on the ABS website. |
| Interpretability | Predominantly national level information is published in Schools Australia (cat. no. 4221.0) on the ABS website. A range of time series data cubes, with a focus on state/territory level information, is also available on the ABS website. |
| Data Gaps/Issues Analysis | |
| Key data gaps/issues | The Steering Committee notes the following issues:   * This indicator does not provide information on young people who develop their talents and capacities through other options for delivering post-compulsory education and training — for example; work-based training and enrolment in technical and further education (TAFE) delivered programs. A broader participation indicator that accounts for some of these factors is reported in the ‘Child care, education and training sector overview’. |

### Participation (the proportion of 15–19 year olds who have successfully completed at least one unit of competency as part of a VET qualification at AQF Certificate II or above)

Data quality information for this indicator has been drafted by the Secretariat in consultation with NCVER and the ABS, with additional Steering Committee comments.

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| Indicator definition and description | | |
| Element | Equity ― Access | |
| Indicator | Attendance and participation | |
| Measure (computation) | Definition  The proportion of 15–19 year olds who have successfully completed at least one unit of competency as part of a VET qualification at AQF Certificate II or above  Numerator – number of 15–19 year olds who had successfully completed at least one unit of competency as part of a VET qualification at AQF Certificate II, at June 2013.  Denominator – The 15 to 19-year-old population at June 2013.  Computation/s:  Numerator (above) divided by denominator (above) for each jurisdiction. | |
| Data source/s | NCVER, National VET Provider Collection 2013; NCVER, National VET in Schools Collection 2013 (numerator);  ABS (2013) Population by Age and Sex, Australian States and Territories, June 2013 (cat. no. 3201.0) Canberra (denominator). | |
| Data Quality Framework Dimensions | | |
| Institutional environment | Numerator: The NCVER is a not-for-profit company owned by the federal, state and territory ministers responsible for training.  NCVER is a professional and independent body responsible for collecting, managing, analysing, evaluating and communicating research and statistics about VET nationally. It is Australia's principal provider of VET research and statistics.  For further information on NCVER, see http://www.ncver.edu.au/ aboutncver/who.html  Denominator: This publication uses data sourced from a variety of institutional environments. Much of the data are administrative by-product data collected by other organisations for purposes other than estimating the population. Births and deaths statistics are extracted from registers administered by the various State and Territory Registrars of Births, Deaths and Marriages. Medicare Australia client address data are used to estimate interstate migration. Records of overseas movements matched with passenger card, passport and visa data, provided by the Department of Immigration and Border Protection (DIBP) are used to calculate Net Overseas Migration (NOM). ABS Census of Population and Housing and Post Enumeration Survey (PES) data are used to determine a base population from which Estimated Resident Population (ERP) is calculated and to finalise all components of population change. For information on the institutional environment of the Australian Bureau of Statistics (ABS), please see ABS Institutional Environment. | |
| Relevance | The National VET Provider Collection collects information relating to students, courses, qualifications, training providers and funding in Australia’s publicly funded vocational education and training (VET) system.  The system provides training for students of all ages and backgrounds. Students have many options for training and may study individual subjects or full courses that lead to formal qualifications. Training takes place in classrooms, in the workplace, online and through other flexible delivery methods.  Providers of vocational education and training in Australia include not only technical and further education (TAFE) institutes, but also universities, secondary schools, industry organisations, private enterprises, agricultural colleges, community education providers and other government providers.  This collection does not report on the following types of training activity:   * recreation, leisure and personal enrichment * fee-for-service VET by private providers * delivery undertaken at overseas campuses of Australian VET institutions * credit transfer * VET delivered in schools, where the delivery has been undertaken by schools * any activity where revenue was earned from another registered training organisation in terms of subcontracted, auspicing, partnership or similar arrangements   The National VET in Schools Collection contains information on all activity undertaken as part of a student’s senior secondary certificate that provides credit towards a nationally recognised VET qualification.  Estimates of the resident population (ERP) for the states and territories of Australia are published by sex and age groups, and estimates and projections of the Aboriginal and Torres Strait Islander population are also available. The ERP is the official measure of the population of states and territories of Australia according to a usual residence population concept. ERP is used for a range of key decisions such as resource and funding distribution and apportioning seats in the House of Representatives to each state and territory. | |
| Timeliness | The National VET Provider Collection is submitted to NCVER on a quarterly basis and consists of data for January to March, January to June, January to September and January to December.  A summary of 2014 data was released on 30 June 2015 in Government-funded students and courses 2014.  The National VET in Schools Collection is an annual collection, which commenced from the 2005 year. Data are submitted to NCVER via state training authorities and/or the senior secondary assessment authorities by 31 March in the year following activity. A summary of 2014 data was released by NCVER in early December 2015 in the VET in Schools data tables. | |
| Accuracy | The National VET Provider Collection is a collection of all publicly funded training activity in Australia in a particular year. It is an administrative collection.  The National VET Provider Collection is a collection of all publicly funded training activity in Australia in a particular year. It is an administrative collection.  Publicly funded registered training organisations submit unit record data directly to state/territory training authorities, who in turn submit the data to NCVER. Prior to submissions to NCVER, data must first pass a validation process to ensure that data conforms to the AVETMISS (Refer to http://www.ncver.edu.au/avetmiss/21055.html).  Once data submissions are received by NCVER they are subjected to a comprehensive data quality checking program to ensure accurate reporting against agreed Key Performance Measures (KPMs). Some of the KPMs include:   * Percentage of unknown data * The number of training organisation identifiers that do not match the National Training Information Service (NTIS) listing * Inappropriate training organisation delivery locations * The number of qualifications/courses that do not match the NTIS listing * The number of modules/units of competency that do not match the NTIS listing * Duplicate client identification * Duplicate qualifications completed * Reporting scopes * Funding sources * Outcome identifiers   The National VET in Schools Collection is an administrative collection, sourced from the student enrolment records through the senior secondary assessment authority in each state or territory. The data are submitted at unit record level either directly to NCVER or via state/territory training authorities. Prior to submission to NCVER, data must first pass a validation process to ensure that data conforms to the Australian vocational education and training management information statistical standard (AVETMISS) (Refer to http://www.ncver.edu.au/avetmiss/21055.html).  All ERP data sources are subject to non-sampling error. Non-sampling error can arise from inaccuracies in collecting, recording and processing the data. In the case of Census and PES data every effort is made to minimise reporting error by the careful design of questionnaires, intensive training and supervision of interviewers, and efficient data processing procedures. The ABS does not have control over any non-sampling error associated with births, deaths and migration data (see institutional environment).  Another dimension of non-sampling error in ERP is the fact that the measures of components of population growth become more accurate as more time elapses after the reference period. As discussed under Timeliness, the tradeoff between timeliness and accuracy means that a user can access more accurate data by using the revised or final ERP data. While the vast majority of births and deaths are registered promptly, a small proportion of registrations are delayed for months or even years. As a result, preliminary quarterly estimates can be an underestimate of the true number of births and deaths occurring in a reference period. Revised figures for a reference period incorporate births and deaths registrations that were received after the preliminary data collection phase as well as the estimated number of registrations that have still not been received for that reference period. For more information see the Demography Working Paper 1998/2 - Quarterly birth and death estimates, 1998 (cat. no. 3114.0) and Population Estimates: Concepts, Sources and Methods, 2009 (cat. no. 3228.0.55.001).  After each Census the ABS uses the Census population count to update the original series of published quarterly population estimates since the previous Census. For example, 2011 Census results were used to update quarterly population estimates between the 2006 and 2011 Census. The PES is conducted soon after the Census to estimate the number of residents not included in the Census. Factoring the PES results into determining the ERP is a critical step in arriving at the most accurate determination of ERP possible. For more information on rebasing see the feature article in the December quarter 2012 issue of Australian Demographic Statistics (cat. no. 3101.0). | |
| Coherence | AVETMISS provides the foundation for nationally comparable data and includes a range of data items relevant to the VET system.   * From 2007, data comply with release 6.0 of AVETMISS, whereas previous collections complied with earlier releases. * From 2012, data comply with release 6.1 of AVETMISS, whereas previous collections complied with earlier releases. * From 2014, Release 7.0 came into effect.   For further information go to <http://www.ncver.edu.au/avetmiss/21055.html>.  In 2010, the invalid enrolment audit cycle changed, with States and Territories now being audited for invalid enrolments over a three-year cycle rather than annually.  The National VET in Schools collection is governed by the VET in Schools administrative arrangements that are used in conjunction with AVETMISS. From 2012, data comply with release 6.1 of AVETMISS, whereas previous collections complied with earlier releases.  Release 7.0 of the standard applies to training activity from 1 January 2014 and was published in April 2013. For details, see http://www.ncver.edu.au/avetmiss/21055.html.  ERP was introduced in 1981 and backdated to 1971 as Australia's official measure of population based on place of usual residence. ERP is derived from usual residence census counts, to which is added the estimated net census undercount and Australian residents temporarily overseas at the time of the census (overseas visitors in Australia are excluded from this calculation). Before the introduction of ERP, the Australian population was based on unadjusted census counts on actual location basis. It is important to note this break in time series when comparing historical population estimates.  An improved method for calculating NOM was applied from September quarter 2006 onwards. The key change is the introduction of a '12/16 month rule' for measuring a person's residency in Australia replacing the '12/12 month rule'. This change results in a break in time series therefore it is not advised that NOM data calculated using the new method is compared to data previous to this. For further information see Information Paper: Further Improvements to Net Overseas Migration Estimation, Dec 2013 (cat. no. 3412.0.55.002).  The births and deaths data in this publication are not coherent with the data found in ABS births and deaths publications. This is because the revision cycle necessary to produce ERP results in a mix of preliminary births and deaths data, based on date of registration, and revised data which is a modelled estimate of births and deaths by date of occurrence. By contrast, the main tables of data in the births and deaths publications are based wholly on registration in the reference year, with some tables and analysis based wholly on date of occurrence data. | |
| Accessibility | Summary information is available free of charge in Students and Courses on NCVER’s website at: http://www.ncver.edu.au/statistic/21053.html. Requests for more detailed statistical information can be made to NCVER on (08) 8230 8400 or vet\_req@ncver.edu.au  A charge will be generally made by NCVER for more complex requests for information. See NCVER’s fees and charges policy at http://www.ncver.edu.au/statistic/21075.html  ERP data is available in a variety of formats on the ABS website under the 3101.0 product families. The formats available free on the web are:  •The main features which has the key figures commentary,  •A pdf version of the publication,  •Time series spreadsheets on population change, components of change and interstate arrivals and departures,  If the information you require is not available as a standard product, then ABS Consultancy Services can help you with customised services to suit your needs. For inquiries contact the National Information and Referral Service on 1300 135 070. Alternatively, please email client.services@abs.gov.au | |
| Interpretability | To aid interpretation, information on the National VET Provider Collection, the National VET in Schools Collection, AVETMISS, and Students and Courses is available on the NCVER website.  Among other standards detailed in AVETMISS, the collections use the:   * Australian Classification of Education (ASCED) (ABS cat. no. 1272.0) to classify the level and field of education * Australian and New Zealand Standard Classification of Occupations (ANZSCO, previously ASCO) (ABS cat. no. 1220.0) to classify occupation   Access/Remoteness Index of Australia (ARIA+) to classify remoteness. It was developed by the National Centre for Applications of Geographic Information Systems (GISCA) and is the standard ABS endorsed measure of remoteness.  Student remoteness is based on the Access/Remoteness Index of Australia (ARIA+), which was developed by the National Centre for Social Applications of Geographic Information Systems (GISCA). ARIA+ is now the standard ABS-endorsed measure of remoteness. From 2011, Student remoteness (ARIA+) is determined from ARIA+ remoteness regions and ABS SA2 regions. Data prior to 2011 are based on ABS postal areas and ARIA+. Student remoteness (ARIA+) regions use the same ARIA+ ranges as the ABS remoteness areas and are therefore an approximation of the ABS remoteness areas. For more details of ARIA+ refer to <www.adelaide.edu.au/apmrc/research/projects/category/about\_aria.html>  ERP is generally easy to interpret as the official measure of Australia's population (by state and territory) on a place of usual residence basis. However, there are still some common misconceptions. For example, a population estimate uses the term 'estimate' in a different sense than is commonly used. Generally the word estimate is used to describe a guess, or approximation. Demographers mean that they apply the demographic balancing equation by adding births, subtracting deaths and adding the net of overseas and interstate migration. Each of the components of ERP is subject to error, but ERP itself is not in any way a guess. It is what the population would be if the components are measured well.  Population estimation is also very different to sample survey-based estimation. This is because population estimation is largely based on a full enumeration of components. In the case of the population base, only the PES used sampled data to adjust for census net undercount. In the case of the components of population growth used to carry population estimates forward, Australia has a theoretically complete measure of each component.  Another example of a common misconception relates to the fact that the population projections presented in this publication are not predictions or forecasts. They are an assessment of what would happen to Australia's population if the assumed levels of components of population change - births, deaths and migration - were to hold into the future. | |
| Data Gaps/Issues Analysis | |  |
| Key data gaps/issues | The Steering Committee notes the following issues:  This measure does not include private RTOs who are not in receipt of government funding | |

### Retention

Data quality information for this indicator has been drafted by the Secretariat in consultation with the ABS, with additional Steering Committee comments.

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| Indicator definition and description | |
| Element | Equity — Access |
| Indicator | Retention |
| Measure (computation) | Definition  Apparent retention rates (ARRs): The number of school students in a designated level/Year of education as a percentage of their respective cohort group (either at the commencement of their secondary schooling — at Year 7 or 8 — or at Year 10). Data are reported for:  (1) the proportion of students commencing secondary school at Year 7 or 8 and continuing to Year 10  (2) the proportion of students commencing secondary school at Year 7 or 8 and continuing to Year 12  (3) the proportion of Year 10 students continuing to Year 12.  Numerators and denominators  Numerator (1) – number of full-time students in Year 10 in the reporting year  Denominator (1) – number of full-time students in the base year (in year 7 three years previous to reporting year for NSW, Vic, Tas and ACT; in Year 8 two years previous to the reporting year for QLD, WA, SA and NT).  Numerator (2) – number of full-time students in Year 12 in reporting year  Denominator (2)– number of full-time students in the base year (in Year 7 five years previous to the reporting year for NSW, Vic, Tas and ACT; in Year 8 four years previous in Qld, WA, SA and NT).  Numerator (3)– number of full time students in Year 12 in reporting year  Denominator (3) – number of full-time students in the base year (in Year 10 two years previous to the reporting year).  In addition data including part-time students are provided for the Year 10 – 12 measure. This measure only provides information on those who are retained to Year 10 or Year 12. These students may or may not complete Year 10 or Year 12.  Computation/s:  The number of students in the relevant numerator year divided by the number of students in the denominator year. These data are provided by Indigenous status and for government, non-government and all schools. In addition data including part time students are provided for the Year 10 – 12 measure |
| Data source/s | Numerator and Denominator non-finance National Schools Statistics Collection.  Non-finance NSSC. Data are published in *Schools, Australia* (http://www.abs.gov.au/ausstats/abs@.nsf/mf/4221.0) (cat. no. 4221.0). Data are available annually |
| Data Quality Framework Dimensions | |
| Institutional environment | The NSSC is a joint undertaking of the various state and territory departments of education, the Australian Government Department of Education and Training, the Australian Bureau of Statistics (ABS), and the Education Council.  NSSC (non-finance) data are collated by the ABS and are sourced from administrative school enrolment databases from the various state and territory departments of education for government data and the DEEWR for non-government data.  For information on the institutional environment of the ABS, including the legislative obligations of the ABS, which cover this collection, please see ABS Institutional Environment |
| Relevance | School student data are available by state/territory and Indigenous status but are not currently available by socioeconomic status.  Information on Indigenous status is obtained from school enrolment forms which are generally completed by the primary carer of the child. The NSSC includes people who did not state their Indigenous status in the category ‘non-Indigenous’.  This indicator is calculated by dividing the number of students in Year 10 or Year 12 in the reference year by the number enrolled at the commencement of secondary school some years previously (depending on jurisdiction). Hence the measure is an Apparent Retention Rate (ARR). It is not a measure of the proportion of students who actually completed Year 10 or Year 12.  Particularly in small jurisdictions, relatively small changes in student numbers can create apparently large movements in retention rates. In addition, the rates in the smaller jurisdictions may be noticeably affected by changes in such factors as the proportion of ungraded and/or mature aged students from year to year.  All data are collected to standard classifications as stated in the NSSC Notes, Instructions and Tabulations manual. Data covers all students enrolled in school, some of whom may be taking a VET course. |
| Timeliness | The NSSC is based on the school census that is conducted annually on the first Friday in August by each state and territory department of education. The results for each reporting year are released in March of the following year.. |
| Accuracy | Each school provides information on their enrolments to the relevant state education department to then forward aggregate data to the ABS. The collection of data on students in non-government schools is coordinated through the Australian Government Department of Education and Training.  The NSSC is based on information on each student enrolled at the time of the school census  Care should be taken in the interpretation of ARRs as the method of calculation does not take into account a range of factors such as repeating students, inter-sector transfers and enrolment policies. For further details on the accuracy of the NSSC methodology and ARRs, see Explanatory Notes of *Schools, Australia* |
| Coherence | The ARR is based on those who are undertaking study at the Year 10 or Year 12 level as at August in the reference year and they may not go on to complete Year 10 or Year 12  The NSSC data items used to construct the ARRs are consistent and comparable over time, and support assessment of annual change.  The ARR measures change over a period of time. The numerator and denominator are sourced from different annual cycles of the NSSC, to follow the same age-cohort. Given the long analysis period, student transitions, such as migration or re-entry to the school system, have an effect on the accuracy of this calculation. In addition, the denominator is sourced from two different NSSC years due to different starting years for secondary school. For example, for the ARR from Year 7/8 to Year 10 in 2014, the denominator for NSW, Vic, Tas and ACT is sourced from NSSC 2011 (Year 7) and for Qld, WA, SA and NT is sourced from 2012 (Year 8).  There is some variability in the reporting of Indigenous status, particularly in relation to not stated responses. This may result in some under reporting of Indigenous status, see Appendix 2: Collection of Indigenous Status of Students (http://www.abs.gov.au/AUSSTATS/abs@.nsf/DetailsPage/4221.02014?OpenDocument (cat. no. 4221.0) 2009. Increases in the number of Indigenous students due to improvements in the reporting of Indigenous status may lead to increases in ARRs for Indigenous students independently of changes in actual retention.  Care should be taken in the interpretation of ARRs as the method of calculation does not take into account a range of factors such as repeating students, migration, inter-sector transfers and enrolment policies. For further details on the accuracy of the NSSC methodology and ARRs, see Explanatory Notes of *Schools, Australia* http://www8.abs.gov.au/ AUSSTATS/abs@.nsf/Lookup/4221.0Explanatory%20Notes12014?OpenDocument (cat. no. 4221.0). |
| Accessibility | Predominantly national level information is published in *Schools, Australia* (http://www.abs.gov.au/ausstats/abs@.nsf/mf/4221.0) (cat. no. 4221.0) on the ABS website. A range of time series data cubes, with a focus on State/Territory level information, are available on the ABS website. |
| Interpretability | *Schools, Australia* (http://www.abs.gov.au/ausstats/abs@.nsf/mf/4221.0) (cat. no. 4221.0) includes explanatory notes and glossary available on the ABS website.  Socioeconomic status is not yet available in the NSSC |
| Data Gaps/Issues Analysis | |
| Key data gaps/issues | The Steering Committee notes the following issues:   * Data may not be reliable, for example the apparent retention rates are greater than 100 per cent in many cases. Work published by the ABS has noted the limitations of apparent retention rates as measures of engagement in senior secondary school (Rossiter and Duncan, 2006). The ABS has developed alternative measures of secondary school engagement (apparent continuation rates and apparent progression rates), but neither of these measures is currently available disaggregated by Indigenous status. |

### Recurrent expenditure per student

Data quality information for this indicator has been drafted by the Education Council, the Australian Government, State and Territory Governments and the ABS, in consultation with the School Education Working Group, with additional Steering Committee comments.

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| Indicator definition and description | | |
| Element | | Efficiency |
| Indicator | | Recurrent expenditure per student |
| Measure (computation) | | Definition  ‘Recurrent expenditure per student’ is defined as all government recurrent expenditure per FTE student. It is reported for government schools by in-school primary, in-school secondary, out-of-school services and aggregations; and for non-government schools. It is also reported for all Australian government expenditure and state and territory government expenditure, by government and non-government sector.  Numerator – expenditure on government schools by categories identified in ‘definition’ above  Denominator – Full-time equivalent (FTE) students in government schools.  Computation/s:  The expenditure per full-time equivalent student in the categories identified in ‘definition’ above.  State and territory expenditure for government schools are derived by subtracting reported Australian government expenditure on government schools from all government school expenditure (reported by the Education Council).  The nine previous years data are deflated using the GDP Price deflator to provide real expenditure, that can be compared with the current year. |
| Data source/s | | Finance data are collected and quality assured by the Education Council National Schools Statistics Collection (NSSC) School Finance Statistics Group (SFSG); Student and staff data are collected from jurisdictions by the Australian Bureau of Statistics (ABS) on behalf of the Education Council as part of the NSSC; unpublished finance data from Australian and State and territory governments; Finance data are published in the Education Council National Report on Schooling; Data from the non-finance NSSC is disseminated by the ABS through *Schools, Australia, 2014,* cat. no. 4221.0, 'NSSC Table 43a: Full-time equivalent students 1999-2013’ data cube: Excel spreadsheet, cat. no. 4221.0, <http://www.abs.gov.au/AUSSTATS/ abs@.nsf/DetailsPage/4221.02014?OpenDocument>. |
| Data Quality Framework Dimensions | | |
| Institutional environment | | Numerator:  *Australian Government expenditure data (government and non-government schools):*  Australian Government expenditure data are collected by the Department of Finance (DoF). The Australian Government Department of Education and Training and Department of Treasury (Treasury) both contribute financial information to the expenditure data that are collected. DoF plays an important role in assisting government across a wide range of policy areas to ensure its outcomes are met, particularly with regard to expenditure and financial management, deregulation reform and the operations of government.  *State and territory expenditure data (non-government schools):*  These data are collected and compiled by each of the eight state and territory governments, from their own records of budget allocations and expenditure.  *Overall government school expenditure data (provided by Education Council):*  The Education Council collects Government schools recurrent and capital expenditure data on behalf of Government schools for reporting purposes.  Denominator:  For information on the institutional environment of the ABS, including the legislative obligations of the ABS which cover this collection, please see ABS Institutional Environment. |
| Relevance | | Numerator:  *Australian Government expenditure data (government and non-government schools):*  Australian Government payments for specific purposes to support state education services are split across states and territories. This reporting shows how Specific Purpose Payments expenditure is attributed across states and territories.  *State and territory expenditure data for non-government schools:*  These data identify the extent of state and territory funding to non-government schools. These data reflect expenditure by state and territory governments to the non-Government schools sector (both Independent and Catholic, not disaggregated between these sectors). Data are provided on a whole of state allocation and apply to a range of expenditure types agreed by the School Education Working Group, and included in an agreed data manual.  *Overall government school expenditure data (provided by Education Council)*  Data relate to major expenditure categories and are provided both in total expenditure terms and in terms of cost per student.  Denominator:  These data supplied match the scope and definitions specified through the Notes, Instructions and Tabulations (NIT) document available on request from the ABS. Comparable statistics are provided for each of the states and territories and nationally. NSSC student data include students undertaking additional study where this is in conjunction with NSSC in-scope schooling. This additional study is included as part of the student’s workload and includes educational activities such as VET in Schools (including through TAFE), school-based apprenticeships or traineeships, tertiary extension studies, work placements, or a combination of such programs. The workload of such activities is included if the activity is undertaken as part of the student’s school enrolment. |
| Timeliness | | Numerator:  *Australian Government expenditure data (government and non-government schools):*  Australian Government data for the Final Budget Outcome (FBO) are collected on an annual basis. Data are publicly available around October/November annually. The reference period for the FBO is the 2013-14 financial year.  *State and territory expenditure data for non-government schools:*  Data are collected in relation to financial year outcomes, on an annual basis for the RoGS. The data request is made in July for the financial year ending in the year prior. This is the first opportunity for them to be collected for the RoGS. Data providers (states and territories) may update these data for prior years, as part of the data provision process for each RoGS.  *Overall government school expenditure data (provided by Education Council):*  Data are collected annually on a financial year basis which accords with State and Territory financial reporting processes. The most recent available data are used.  Denominator:  The NSSC is an annual collection as at the first Friday in August of each year and provided to the ABS during November of the same year. Student FTE data are made available between January and March the following year. |
| Accuracy | | Numerator:  *Australian Government expenditure data (government and non-government schools):*  The method of Australian Government data collection for FBO is through the Central Budget Management System (CBMS). The Australian Government Department of Education and Training and the Treasury are required to enter data, on a monthly basis to maintain this system. This then forms the basis of the expenditure data that appears in table 38 of the FBO for the 2013-14 financial year. The Australian Government Department of Education and Training minimises processing errors through the use of standard monitoring processes and financial system controls.  *State and territory expenditure data for non-government schools:*  The data are collected by states and territories through their budget and financial recording processes and have a high degree of accuracy. Data categories fit the definitions in the data manual, unless states or territories advise otherwise.  *Overall government school expenditure data (provided by Education Council):*  Data are derived from jurisdictions’ audited annual accounts.  Denominator:  Data on government and non-government schools are collected from administrative school enrolment databases, collated by the ABS through the non-finance NSSC. 2013 and 2014 data forwarded to the ABS represent student counts. The ability to manage multiple records of enrolment may vary among systems administering enrolment data and over-reporting of students by some systems may occur. Where administration duplicates can be identified they should be removed by the administering systems during data validation processes conducted prior to providing the NSSC data to the ABS (or the Australian Government Department of Education and Training for non-government schools who then provides this data to the ABS for the non-government contribution). The extent of over-reporting cannot be quantified, but the understanding of the extent that students might be legitimately enrolled in more than one school would suggest that the figure is small. Some revisions may occur year to year where providers resupply data post publication. The FTE values for students reported for this bench mark have a high degree of accuracy. |
| Coherence | | Numerator:  *Australian Government expenditure data (government and non-government schools):*  The consistency of the Australian Government data for recurrent expenditure has changed from 2008-09 financial year with the introduction of the National Education Agreement (and associated National Schools SPP reported in the FBO), which commenced from 1 January 2009. A further change occurred with the introduction of the Students First funding model on 1 January 2014. The National Partnerships, including the Smarter Schools National Partnership, Closing the Gap – Northern Territory also commenced in the 2008-09 financial year. The Australian Government expenditure data by state and territory are consistent across states and territories and nationally.  *State and territory expenditure data for non-government schools:*  The data are consistent over time, subject to any inclusions or exclusions noted by states and territories. The counting rules and inclusions have remained consistent over recent RoGS editions. As programs vary across states and territories, some aspects of inclusions may differ, but within the agreed categories. A ten year time series is published in each RoGS. Other data in relation to state and territory government funding for non-government schools is included in the annual national Report on Schooling, published by ACARA.  *Overall government school expenditure data (provided by Education Council):*  Data are specialised in terms of established data standards and instructions.  Denominator:  Each state and territory government and the Australian Curriculum Assessment and Reporting Authority (ACARA) reports on school students. ABS NSSC data are sourced for national reporting mechanisms including the Report on Government Services and the National Report on Schooling in Australia. |
| Interpretability | | Numerator:  *Australian Government expenditure data (government and non-government schools):*  There are no context issues that need to be considered in relation to the Australian Government data.  *State and territory expenditure data for non-government schools:*  This information can be considered in the context of all government funding for both government and non-government schools, which is reported in each RoGS.  *Overall government school expenditure data (provided by Education Council):*  Data are nationally consistent and used for the National Report on Schooling.  Denominator:  Explanatory Notes and a Glossary accompanying the data are available on the ABS website, and include caveats and advice as appropriate.  <http://www.abs.gov.au/AUSSTATS/abs@.nsf/Lookup/4221.0Explanatory%20Notes12011?OpenDocument> |
| Accessibility | | Numerator:  *Australian Government expenditure data (government and non-government schools):*  Unpublished Australian Government data cannot be requested as the FBO is only produced upon the completion of the financial year, in this case the 2013-14 financial year. The FBO report is produced in a PDF format. Contact details: Robyn Beutel (02) 6240 0993. DoF/Treasury released the 2013-14 FBO in September 2014.  *State and territory expenditure data for non-government schools:*  Data are unpublished and supplied by state and territory governments as one figure, not subdivided. There data are included in the RoGS in a time series and also in combination with ABS data as a measure of expenditure per Full Time Equivalent student.  *Overall government school expenditure data (collected by Education Council:*  Data are determined based on a derived nationally consistent basis and underpinning data are not directly available.  Denominator:  Results from the NSSC are presented on the ABS website in through data cubes (Excel spreadsheets including pivot tables). These tables offer a versatile source of data, enabling clients to tailor data to suit their information requirements. |
| Data Gaps/Issues Analysis | | |
| Key data gaps /issues | The Steering Committee notes the following issues:  Care should be taken in interpretation of efficiency data:   * Government school data do include the user cost of capital. Non-government school data do not include the user cost of capital. * a number of factors beyond the control of governments, such as economies of scale, a high proportion of geographically remote students and/or a dispersed population, and migration across states and territories, may influence expenditure (see Commonwealth Grants Commission reference in chapter 1, section 1.5 for further details). This Report does not make any cost adjustments based on these or other factors * efficiency data should be interpreted within the context of the effectiveness and equity indicators to derive an holistic view of performance. While high or increasing expenditure per student may reflect deteriorating efficiency, it may also reflect changes in aspects of schooling (increasing school leaving age, improving outcomes for Indigenous students and students from low socioeconomic backgrounds, broader curricula or enhancing teacher quality), or the characteristics of the education environment (such as population dispersion). | |

### Recurrent expenditure per student – staff expenditure per student

Data quality information for this indicator has been drafted by the Education Council and the ABS, in consultation with the School Education Working Group, with additional Steering Committee comments.

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| Indicator definition and description | | |
| Element | | Efficiency |
| Indicator | | Staff expenditure per student |
| Measure (computation) | | Definition  Staff expenditure per student is defined as government recurrent expenditure on staff per FTE student in government schools.  It is reported for government schools by in-school primary, in-school secondary, out-of-school services and aggregations  Numerator – expenditure on staff in government schools by categories identified in ‘definition’ above  Denominator – Full-time equivalent (FTE) students in government schools.  Computation/s:  The expenditure per student (FTE) in the categories identified above.  The four previous year’s data are deflated using the GDP Price deflator to provide real expenditure, that can be compared with the current year. |
| Data source/s | | Finance data are collected and quality assured by the Education Council National Schools Statistics Collection (NSSC) School Finance Statistics Group (SFSG); Student and staff data are collected from jurisdictions by the Australian Bureau of Statistics (ABS) on behalf of the Education Council as part of the NSSC; unpublished finance data from Australian and State and territory governments; Finance data are published in the Education Council’s National Report on Schooling; Data from the non-finance NSSC is disseminated by the ABS through *Schools, Australia, 2014* ,cat. no. 4221.0, 'NSSC Table 43a: Full-time equivalent students 1999-2014’ data cube: Excel spreadsheet, cat. no. 4221.0, <http://www.abs.gov.au/AUSSTATS/abs @.nsf/DetailsPage/4221.02014?OpenDocument |
| Data Quality Framework Dimensions | | |
| Institutional environment | | Numerator:  The Education Council collects Government schools recurrent and capital expenditure data on behalf of Government schools for reporting purposes.  Denominator:  For information on the institutional environment of the ABS, including the  legislative obligations of the ABS which cover this collection, please see ABS Institutional Environment. |
| Relevance | | Numerator:  Data relate to major expenditure categories provided both as total expenditure and as cost per student.  Denominator:  Data supplied match the scope and definitions specified through the Notes, Instructions and Tabulations (NIT) document available on request from the ABS. Comparable statistics are provided for each of the states and territories and nationally. NSSC student data includes students undertaking additional study where this is in conjunction with NSSC in-scope schooling. This additional study is included as part of the student’s workload and includes educational activities such as VET in Schools (including through TAFE), school-based apprenticeships or traineeships, tertiary extension studies, work placements, or a combination of such programs. The workload of such activities is included if the activity is undertaken as part of the student’s school enrolment. |
| Timeliness | | Numerator:  Data are collected annually on a financial year basis which accords with state and territory financial reporting processes.  Denominator:  The NSSC is an annual collection as at the first Friday in August of each year and provided to the ABS during November of the same year. Student FTE data are published between January and March the following year. |
| Accuracy | | Numerator:  Data are derived from jurisdiction’s audited annual accounts.  Denominator:  Data on government and non-government schools are collected from administrative school enrolment databases, collated by the ABS through the non-finance NSSC. Data forwarded to the ABS represent student counts. The ability to manage multiple records of enrolment may vary among systems administering enrolment data and may result in over-reporting of students by some systems. Where administration duplicates can be identified they should be removed by the administering systems during data validation processes conducted prior to providing the NSSC data to the ABS (or the Commonwealth Department of Education and Training for non-government schools who then provides this data to the ABS for the non-government contribution). The extent of over-reporting cannot be quantified, but the understanding of the extent that students might be legitimately enrolled in more than one school would suggest that the figure is small. Some revisions may occur year to year where providers resupply data post publication. The FTE values for students reported for this benchmark have a high degree of accuracy. |
| Coherence | | Numerator:  Data are specialised in terms of established data standards and instructions.  Denominator:  Each state and territory government reports on school students, the Australian Curriculum Assessment & Reporting Authority (ACARA) reports on school students and the five-yearly Census of Population and Housing includes information on children attending school. ABS NSSC data are sourced for national reporting mechanisms including the Report on Government Services and the National Report on Schooling in Australia. |
| Interpretability | | Numerator:  Nationally consistent data that are used for the National Report on Schooling.  Denominator:  Explanatory Notes and a Glossary accompany the data available on the ABS website, and include caveats and advice as appropriate. |
| Accessibility | | Numerator:  Data are determined based on a derived nationally consistent basis and underpinning data are not directly available.  Denominator:  Results from the NSSC are presented on the ABS website in data cubes (Excel spreadsheets including pivot tables). These tables offer a versatile source of data, enabling clients to tailor data to suit their information requirements. |
| **Data Gaps/Issues Analysis** | | |
| **Key data gaps /issues** | The Steering Committee notes the following issues:  Care should be taken in interpretation of efficiency data:   * data include the user cost of capital * a number of factors beyond the control of governments, such as economies of scale, a high proportion of geographically remote students and/or a dispersed population, and migration across states and territories, may influence expenditure (see Commonwealth Grants Commission reference in chapter 1, section 1.5 for further details). This Report does not make any cost adjustments based on these or other factors * efficiency data should be interpreted within the context of the effectiveness and equity indicators to derive an holistic view of performance. While high or increasing expenditure per student may reflect deteriorating efficiency, it may also reflect changes in aspects of schooling (increasing school leaving age, improving outcomes for Indigenous students and students from low socioeconomic backgrounds, broader curricula or enhancing teacher quality), or the characteristics of the education environment (such as population dispersion) * the ‘staff expenditure per student’ measure is partial in nature, as it does not reflect the full cost per student. While high or increasing government expenditure on staff per student may reflect lower efficiency, it may also reflect improvements in teacher quality. | |

### User cost of capital per student

Data quality information for this indicator has been drafted by the Education Council and the ABS, in consultation with the School Education Working Group, with additional Steering Committee comments.

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| .Indicator definition and description | |
| Element | Efficiency |
| Indicator | User cost of capital per student |
| Measure (computation) | Definition  The notional costs to governments of the funds tied up in capital used to produce services (for example, land and buildings owned by government schools) per FTE student  Numerator – 8 per cent of the value of non-current physical assets of government schools (for example, land, buildings, plant and equipment) which are re-valued over time.  Denominator – number of full time equivalent students in government schools.  Computation/s:  The numerator divided by the denominator (above). |
| Data source/s | Finance data are collected and quality assured by the Standing Council on School Education and Early Childhood (SCSEEC) National Schools Statistics Collection (NSSC) School Finance Statistics Group (SFSG); Student and staff data are collected from jurisdictions by the Australian Bureau of Statistics (ABS) on behalf of SCSEEC as part of the NSSC; unpublished finance data from Australian and State and territory governments; Finance data are published in the SCSEEC National Report on Schooling; Data from the non-finance NSSC are disseminated by the ABS through *Schools, Australia, 2014*, cat. no. 4221.0, 'NSSC Table 43a: Full-time equivalent students 1996-2014’ data cube: Excel spreadsheet, cat. no. 4221.0, <http://www.abs.gov.au/AUSSTATS/abs@.nsf/DetailsPage/4221.02014?OpenDocument>. |
| Data Quality Framework Dimensions | |
| Institutional environment | Numerator:  SCSEEC collects Government schools recurrent and capital expenditure data on behalf of Government schools for reporting purposes.  Denominator:  For information on the institutional environment of the ABS, including the legislative obligations of the ABS which cover this collection, please see ABS Institutional Environment. |
| Relevance | Numerator:  Data relate to major expenditure categories provided both as total expenditure and in terms of cost per student (FTE).  Denominator:  The data supplied matches the scope and definitions specified through the Notes, Instructions and Tabulations (NIT) document available on request from the ABS. Comparable statistics are provided for each of the states and territories and nationally. NSSC student data includes students undertaking additional educational activities such as VET in Schools (including through TAFE), school-based apprenticeships or traineeships, tertiary extension studies, work placements, or a combination of such programs. The workload of such activities is included if the activity is undertaken as part of the student’s school enrolment. |
| Timeliness | Numerator:  Data are collected annually on a financial year basis which accords with State and Territory financial reporting processes. The most recent available data are used.  Denominator:  The NSSC is an annual collection as at the first Friday in August of each year and provided to the ABS during November of the same year. Student FTE data are made available between January and March the following year. |
| Accuracy | Numerator:  Data are derived from jurisdictions’ audited annual accounts.  Denominator:  The NSSC is an administrative by-product collection from data collected from enrolment forms. 2013 and 2014 data forwarded to the ABS represent student counts. The ability to manage multiple records of enrolment may vary among systems administering enrolment data and may result in over-reporting of students by some systems. Where administration duplicates can be identified they should be removed by the administering systems during data validation processes conducted prior to providing the NSSC data to the ABS (or the Australian Government Department of Education and Training, for non-government schools who then provides this data to the ABS for the non-government contribution). The extent of over-reporting cannot be quantified, but the understanding of the extent that students might be legitimately enrolled in more than one school would suggest that the figure is small. Some revisions may occur year to year where providers resupply data post publication. The FTE values for students reported for this indicator have a high degree of accuracy. |
| Coherence | Numerator:  Data are specialised in terms of established data standards and instructions.  Denominator:  Each state and territory government and the Australian Curriculum Assessment & Reporting Authority (ACARA) reports on school students. ABS NSSC data are sourced for national reporting mechanisms including the National Education Agreement, Report on Government Services and the National Report on Schooling in Australia. |
| Interpretability | Numerator:  Data are nationally consistent and used for the National Report on Schooling.  Denominator:  Explanatory Notes and a Glossary accompany the data available on the ABS website, and include caveats and advice as appropriate. |
| Accessibility | Numerator:  Data are determined based on a derived nationally consistent basis and underpinning data are not directly available.  Denominator:  Results from the NSSC are presented on the ABS website in data cubes (Excel spreadsheets including pivot tables). These tables offer a versatile source of data, enabling clients to tailor data to suit their information requirements. |
| Data Gaps/Issues Analysis | |
| Key data gaps /issues | The Steering Committee notes the following issues:  The notional UCC makes explicit the opportunity cost of using the funds to provide services rather than investing elsewhere or retiring debt. When comparing the costs of government services, it is important to account for the notional UCC because it is:   * often a significant component of the cost of services * often treated inconsistently (that is, included in the costs of services delivered by most non-government service providers, but effectively costed at zero for many government service providers).   Notional UCC reflects the annual UCC per FTE student, and is set at 8 per cent of the value of non-current physical assets (for example, land, buildings, plant and equipment) which are re-valued over time.  Holding other factors constant, a low or decreasing UCC per student may represent better or improved efficiency.  Efficiency data are difficult to interpret and this indicator in particular is only partial in nature, as it does not reflect the full cost per student. While high or increasing UCC per student may reflect deteriorating efficiency, it may also reflect changes in aspects of schooling (broader curricula, enhanced facilities), or the characteristics of the education environment (such as population dispersion and/or rapid growth and more geographically remote students). Similarly, low or decreasing UCC per student may reflect improving efficiency or lower quality (less effective education) or fewer facilities or reduced capital maintenance. Efficiency data need to be interpreted within the context of the effectiveness and equity indicators to derive an holistic view of performance. |

### Student-to-staff ratio

Data quality information for this indicator has been drafted by the Secretariat in consultation with the ABS, with additional Steering Committee comments.

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| Indicator definition and description | |
| Element | Efficiency |
| Indicator | Student-to-staff ratio |
| Measure (computation) | Definition  The FTE (full-time equivalent) of students per FTE of staff. Data are reported for primary, secondary and all schools, and for teaching and non-teaching staff.  Numerator/s  The FTE of students  Denominator/s  The FTE of staff.  Computation/s:  The numerator (above) divided by the denominator (above) Data are reported for primary, secondary and all schools, and for teaching and non-teaching staff, by jurisdiction |
| Data source/s | Numerator and Denominator  Numerator: National Schools Statistics Collection (NSSC) data; and unpublished data from *Schools, Australia* ( cat. no. 4221.0).  The student to staff ratios for teaching staff are available directly from published data. The ratios for non-teaching staff and all staff are derived from a range of published NSSC data.  All data are available annually. |
| Data Quality Framework Dimensions | |
| Institutional environment | Data on government and non-government schools are collected from administrative school enrolment databases and collated by the ABS through the National Schools Statistics Collection (NSSC) (non-finance) and are based on the annual School census. This collection was established through the work of the former Australian Education Council, later the Ministerial Council on Education, Employment and Youth Affairs, now the Education Council.  For information on the institutional environment of the ABS, including the legislative obligations of the ABS, which cover this collection, please see ABS Institutional Environment. |
| Relevance | School student data are available by state/territory and for full-time students and full plus part-time students. Rates are based on FTE school students and FTE staff.  All data are collected to standard classifications as stated in the NSSC Notes, Instructions and Tabulations Manual. Data covers all students enrolled in school, some of whom may be taking additional educational activities such as VET in Schools (including through TAFE), school-based apprenticeships or traineeships, tertiary extension studies, work placements, or a combination of such programs. The workload of such activities is included if the activity is undertaken as part of the student’s school enrolment. |
| Timeliness | The NSSC is based on the school census that is conducted annually on the first Friday in August each year by state and territory departments of education. The results from the 2014 NSSC were released in March 2015. |
| Accuracy | Each school provides information on their enrolments to the relevant state education department, which then forwards aggregate data to the ABS. The collection of data on students in non-government schools is coordinated through the Australian Government Department of Education and Training.  The NSSC is based on information on each student enrolled at the time of the school census. |
| Coherence | Data for jurisdictions are comparable and are collected in accordance with national standards. Before sending data to the ABS, each state and territory education department cleans the data and removes duplicate records so that students are only counted once. Due to the different enrolment systems, the ability to remove duplicates varies among jurisdictions and this may result in over-reporting of school students in some jurisdictions.  Cross boarder enrolments may affect consistency between the populations at the numerator and denominator.  Each state and territory government reports on school students. The Australian Curriculum Assessment & Reporting Authority (ACARA) also reports on school students and the five-yearly ABS Census of Population and Housing includes information on children attending school. |
| Accessibility | *Schools, Australia* (cat. no. 4221.0) includes explanatory notes and a glossary available on the ABS website. |
| Interpretability | Published information is included in *Schools, Australia* (cat. no. 4221.0) on the ABS website. A range of time series data cubes, with a focus on state/territory level information, is also available on the ABS website. |
| Data Gaps/Issues Analysis | |
| Key data gaps/issues | The Steering Committee notes the following issues:   * efficiency data should be interpreted within the context of the effectiveness and equity indicators to derive an holistic view of performance. While a low or decreasing student-to-teacher ratio may reflect decreasing efficiency, it may also reflect a higher quality education system, if a lower ratio leads to better student outcomes * the student-to-staff ratio is aggregated across all subjects and Year levels, and does not distinguish between subjects and/or Year levels where different ratios may be appropriate * the student-to-staff ratio is affected by factors that may differ across the states and territories, including population dispersion (leading to a larger proportion of small schools), the proportion of special needs students, the degree to which administrative work is undertaken by people classified as teachers (such as principals, deputy principals and senior teachers), and the level of other inputs to school education (for example, non-teaching staff, computers, books and laboratory equipment). |

### Learning outcomes – Reading performance, writing performance, numeracy performance (NAPLAN)

Data quality information for this indicator has been drafted by the Secretariat in consultation with ACARA, with additional Steering Committee comments.

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| Indicator definition and description | |
| Element | Outcome |
| Indicator | ‘Learning outcomes’ (reading performance, writing performance, numeracy performance) |
| Measure (computation) | Definition  Measures   * Proportion of students who achieved at or above the national minimum standard (for reading, writing and numeracy, in years 3, 5, 7 and 9) * NAPLAN mean scale scores for students (for reading, writing and numeracy in years 3, 5, 7 and 9)   Computation  The mean scale score is calculated as the average of the NAPLAN scale scores across all non-exempt students.  The proportion of students at or above the minimum standard is also calculated using NAPLAN scale scores.  Confidence intervals:   * Reading CIs: Confidence interval data for the “proportion of students who achieved at or above the national minimum standard” and “mean scale scores” in reading for Years 3, 5, 7 and 9 * Persuasive Writing CIs: Confidence interval data for the “proportion of students who achieved at or above the national minimum standard” and “mean scale scores” in persuasive writing for Years 3, 5, 7 and 9 * Numeracy CIs: Confidence interval data for the “proportion of students who achieved at or above the national minimum standard” and “mean scale scores” in numeracy for Years 3, 5, 7 and 9 |
| Data source/s | Student-level data includes NAPLAN test responses, some of which are scored by contractors, and student background variables which are provided by the schools. This data are collected at school–level and checked by Test Administration Authorities (TAAs). Student-level data are provided to ACARA by TAAs. A contractor uses this data to generate NAPLAN scale scores for all non-exempt students. That contractor performs the analyses for the National Report. . |
| Data Quality Framework Dimensions | |
| Institutional environment | Data Collector(s): Individual schools send this data under a set of protocols to the Test Administration Authorities for the states and territories  Collection authority: ACARA Act 2008  Data Compiler(s): ACARA's contractor |
| Relevance | *Level of geography:* Data are available at National and State/Territory levels, by general population, language background other than English, male and female, indigenous and non-indigenous, geographic location, indigenous and non-indigenous by geographic location, and parental education and parental occupation.  *Data completeness:* Yes.  *Numerator/Denominator source:* The numerator and denominator are compiled from a single source, with the exception of the national report aggregated data provided by ACARA's contractor.  *For* *Education indicators, are all types of schools, universities, technical colleges/TAFEs and correspondence schools included?* Schools included are those whose students sit NAPLAN tests.  *Have standard classifications been used?* Yes. |
| Timeliness | Collection interval/s: The NAPLAN tests are conducted annually.  Data available: The National Report: Achievement in Reading, Writing, Language Conventions and Numeracy 2015 was published by ACARA on 3 December 2015. |
| Accuracy | Method of Collection: Test Administration Authorities provide the data to ACARA. ACARA then provides the data to the National Report Contractor to generate the scale scores.  Data Adjustments: Raw NAPLAN scores are converted to scaled scores  Sample/Collection size: The collection size is a census of NAPLAN participating years (3,5,7,9)  Known Issues: Confidence intervals should be considered when ranking jurisdictions. The confidence intervals used to compare jurisdictions within a calendar year are not the same confidence intervals used to compare across calendar years  Year to year change: Caution should be exercised when using the data to measure small changes from year to year; 95 per cent confidence intervals have been provided to the Steering Committee  Is the data being used attitudinal or data? - Data  The abbreviation ‘**n.p.**’ indicates data not published as there were no students tested or the number of students tested was less than 30.  The abbreviation ‘..’ indicates that the geographic location code does not apply within this State/Territory or for this year level. |
| Coherence | Consistency over time: NAPLAN results are collected in a consistent manner annually  The numerator and denominator are compiled from a single source, with the exception of the national report aggregated data provided by ACARA's contractor  The data are consistent with data supplied in previous reporting rounds.  Jurisdiction estimate calculation: Yes |
| Accessibility: | The data are available in PDF format at http://www.nap.edu.au/results-and-reports/national-reports.html. |
| Interpretability | Other Supporting information: FAQs on (http://www.nap.edu.au/information/faqs/faqs.html).  Socioeconomic status derivation: NA  Socioeconomic status quintiles derivation: NA The data are available in PDF format at (http://www.nap.edu.au/results-and-reports/national-reports.html). |
| Data Gaps/Issues Analysis | |
| Key data gaps/issues | The Steering Committee notes the following issues:   * Students are classified in four ways: present, exempt, absent, withdrawn. Exempt students are deemed not to have met the national minimum standard |

### Learning outcomes – Science literacy performance - NAP

Data quality information for this indicator has been drafted by the ACARA, in consultation with the School Education Working Group, with additional Steering Committee comments.

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| Indicator definition and description | |
| Element | Outcome |
| Indicator | ‘Learning outcomes’ – science literacy performance |
| Measure (computation) | Definition  Percentage of students achieving at or above the proficient standard on the scientific literacy scale by jurisdiction. These data are also reported by sex, Indigenous status, and geolocation for 2003, 2006, 2009 and 2012, and by LBOTE status for 2003, 2009 and 2012. The proficient standard for performance in scientific literacy is set at proficiency level 3.2 (of Level 2 and below to Level 4 and above) for year 6.  Numerator  Number of year 6 students assessed achieving at or above proficiency level 3.2 on the scientific literacy scale  Denominator  Number of year 6 students assessed on scientific literacy  Computation/s:  The proportion of assessed year 6 students who achieve at or above the proficient standard for scientific literacy. |
| Data source/s | Published report by ACARA (2013). |
| Data Quality Framework Dimensions | |
| Institutional environment | Data Collector(s): The Contractor/Data Compiler collects data under a set of protocols from a sample of schools selected to participate in the test. Student background data at the school level are provided by education authorities to the contractor. Student responses are scanned and marked by the contractor, who undertakes analysis to enable reporting of results at the national, state and territory level.  Collection authority: ACARA Act  Data Compiler(s): the contractor (in 2012, the contractor was Educational Assessment Australia, EAA) |
| Relevance | Level of Geography: Data are available by National, State and Territory, and geo-location levels.  Data Completeness: data are complete  Indigenous Statistics: Data are available by Indigenous status by geo-location by state and territory.  Socioeconomic status data: Limited data are available by parental education and parental occupation, by State and Territory  Numerator/Denominator Source: The numerator and denominator are compiled from a single source, with the exception of the national report aggregated data provided by ACARA's contractor.  The original purpose for collecting the data are to report against the national key performance measure detailed in the Measurement Framework for Schooling in Australia, which provides the basis for Australian, State and Territory Governments to report on the performance of schooling in accordance with the Melbourne Declaration on Educational Goals for Young Australians.  Have standard classifications been used? If not, why not? Yes they have been used. |
| Timeliness | Collection interval/s: The Science Literacy test is conducted every three years.  Data available: (for most recent data – 2012) The 2012 National Assessment Program – Science Literacy (NAP-SL) Public Report and the 2012 NAP-SL Technical Report were both released by ACARA in 2013.  Updates to the data after its release are not likely. |
| Accuracy | Method of Collection: Is collected at school level by ACARA's contractor, who then provides the data to ACARA.  Data Adjustments: Raw NAP-SL scores are converted to scaled scores.  Sample/Collection size: The collection size is a nationally representative sample of Year 6 students.  Standard Errors: The standard errors have been used to calculate 95 per cent confidence intervals for all the data provided.  Known Issues: Confidence intervals should be considered when ranking jurisdictions.  Changes between cycles: Caution should be exercised when using the data to measure small changes from one cycle to the next; 95 per cent confidence intervals have been provided.  The following quality control measures were undertaken:   * Student responses/scores were entered separately by two trained operators and a program compared the scores from each entry and identified any discrepancies. Any discrepancy was highlighted and checked by the supervisor and the correct response/score recorded. Range check validations were also conducted. * Parallel processing: Procedures undertaken for the conduct of the sampling, data analysis and equating were carried out by the contractor and a subcontractor independently, with results from each cross-checked for accuracy. |
| Coherence | Consistency over time: NAP-SL results are collected in a consistent manner every three years.  State and Territory data are consistent with each other and the Australian level.  The numerator and denominator are compiled from a single source.  The data are consistent with data supplied in previous reporting round.  Jurisdiction estimate calculation: Yes  Jurisdiction/Australia estimate calculation: Yes |
| Interpretability | Context: Yes, this is within the context of the NAP-SL testing and reporting environment.  Other Supporting information: FAQs and Glossary on www.nap.edu.au  Socioeconomic status definition: Parental education represents the highest level of parental school or non-school education that a parent/guardian has completed. This includes the highest level of primary or secondary school completed or the highest post-school qualification attained. Parental occupation represents the occupation group which includes the main work undertaken by a parent/guardian. If a parent/guardian has more than one job, the occupation group which reflects their main job is reported  Socioeconomic status derivation: Not available  Socioeconomic status quintiles derivation: Not available |
| Accessibility | Data publicly available on www.nap.edu.au  Data are not available prior to public access.  Supplementary data are available upon request.  The data are available in PDF format. |

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| Interpretability | Context: Yes, this is within the context of the NAP-SL testing and reporting environment.  Other Supporting information: FAQs and Glossary on www.nap.edu.au  Socioeconomic status definition: Parental education represents the highest level of parental school or non-school education that a parent/guardian has completed. This includes the highest level of primary or secondary school completed or the highest post-school qualification attained. Parental occupation represents the occupation group which includes the main work undertaken by a parent/guardian. If a parent/guardian has more than one job, the occupation group which reflects their main job is reported  Socioeconomic status derivation: Not available  Socioeconomic status quintiles derivation: Not available |
| Data Gaps/Issues Analysis | |
| Key data gaps/issues | The Steering Committee notes the following issues:   * •This is a three yearly sample assessment and therefore may not necessarily represent the outcomes were all students tested. Confidence intervals are provided. |

### Learning outcomes – Civics and citizenship performance – NAP

Data quality information for this indicator has been drafted by the ACARA, in consultation with the School Education Working Group, with additional Steering Committee comments.

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| Indicator definition and description | |
| Element | Outcome |
| Indicator | ‘Learning outcomes’ – civics and citizenship performance (NAP) |
| Measure (computation) | Proportion of sample of year 6 and year 10 students achieving at or above the proficient standard for civics and citizenship by jurisdiction. These data are also reported by sex, Indigenous status, LBOTE status, country of birth, socioeconomic status and geolocation (national data only for subgroups). The proficient standard for civics and citizenship performance is set at proficiency level 2 for year 6, and at level 3 for year 10, (of below level 1 to level 5).  Numerator  Number of year 6 and year 10 students assessed achieving proficiency level 2 or above for year 6, and at level 3 or above for year 10 for civics and citizenship performance  Denominator  Number of year 6 and year 10 students assessed on civics and citizenship knowledge and understanding  Computation/s:  The proportion of assessed year 6 and year 10 students who achieve at or above proficiency level 2 for year 6, and at or above level 3 for year 10 for civics and citizenship performance |
| Data source/s | Published report by ACARA (2014) |
| Data Quality Framework Dimensions | |
| Institutional environment | Data Collector(s): The Contractor/Data Compiler collects data under a set of protocols from a sample of schools selected to participate in the test.. Student background data at the school level are provided by education authorities to the contractor. Student responses are scanned and marked by the contractor, who undertakes analysis to enable reporting of results at the national, state and territory level.'  Collection authority: ACARA Act  Data Compiler(s): the contractor (in 2013, the contractor was the Australian Council for Educational Research, ACER) |
| Relevance | Level of Geography: Data are available by National, State and Territory, and geo-location levels.  Data Completeness: data are complete  Indigenous Statistics: Data are available by Indigenous status by geo-location by state and territory.  Socioeconomic status data: Limited data are available by parental education and parental occupation, by State and Territory  Numerator/Denominator Source: The numerator and denominator are compiled from a single source, with the exception of the national report aggregated data provided by ACARA's contractor.  The original purpose for collecting the data are to report against the national key performance measure detailed in the Measurement Framework for Schooling in Australia, which provides the basis for Australian, State and Territory Governments to report on the performance of schooling in accordance with the Melbourne Declaration on Educational Goals for Young Australians.  Have standard classifications been used? If not, why not? Yes they have been used. |
| Timeliness | Collection interval/s: The Civics and Citizenship test is conducted every three years.  Data available: (for most recent data – 2013) The 2013 NAP Civics and citizenship Year 6 and Year 10 Report and the 2013 NAP Civics and citizenship Technical Report were released by ACARA in (month) 2014.  Updates to the data after its release are not likely. |
| Accuracy | Method of Collection: is collected at school-level by ACARA's contractor, who then provides the data to ACARA.  Data Adjustments: Raw NAP CC scores are converted to scaled scores.  Sample/Collection size: The collection size is a nationally representative sample of Year 6 and Year 10 students.  Standard Errors: The standard errors have been used to calculate 95 per cent confidence intervals for all the data provided.  Known Issues: Confidence intervals should be considered when ranking jurisdictions.  Changes between cycles: Caution should be exercised when using the data to measure small changes from one cycle to the next. |
| Coherence | Consistency over time: NAP CC results are collected in a consistent manner every three years.  State and Territory data are consistent with each other and the Australian level.  The numerator and denominator are compiled from a single source.  The data are consistent with data supplied in previous reporting round.  Jurisdiction estimate calculation: Yes  Jurisdiction/Australia estimate calculation: Yes |
| Interpretability | Context: Yes, this is within the context of the NAP CC testing and reporting environment.  Other Supporting information: FAQs and Glossary on www.nap.edu.au  Socioeconomic status definition: Parental education represents the highest level of parental school or non-school education that a parent/guardian has completed. This includes the highest level of primary or secondary school completed or the highest post-school qualification attained. Parental occupation represents the occupation group which includes the main work undertaken by a parent/guardian. If a parent/guardian has more than one job, the occupation group which reflects their main job is reported  Socioeconomic status derivation: Not available  Socioeconomic status quintiles derivation: Not available |
| Accessibility | Data publicly available on www.nap.edu.au  Data are not available prior to public access.  Supplementary data are available upon request.  The data are available in PDF format. |
| Data Gaps/Issues Analysis | |
| Key data gaps /issues | The Steering Committee notes the following issues:   * This is a three yearly sample assessment and therefore may not necessarily represent the outcomes were all students tested. Confidence intervals are provided. |

### Learning outcomes – ICT literacy performance – NAP

Data quality information for this indicator has been drafted by the ACARA, in consultation with the School Education Working Group, with additional Steering Committee comments.

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| Indicator definition and description | |
| Element | Outcome |
| Indicator | ‘Learning outcomes’ – Information and communication technologies (ICT) literacy performance (NAP) |
| Measure (computation) | Proportion of sample of year 6 and year 10 students achieving at or above the proficient standard in ICT literacy by jurisdiction. These data are also reported by sex, Indigenous status, LBOTE status, country of birth, socioeconomic status and geolocation (national data only for subgroups). The proficient standard for ICT literacy performance is set at the boundary between proficiency levels 2 and 3 for year 6, and at the boundary between proficiency levels 3 and 4 for year 10, (of levels 1 to 6). Data are reported for 2005, 2008, 2011 and 2014.  Numerator  Number of year 6 and year 10 students assessed achieving proficiency level 3 or above for year 6, and at level 4 or above for year 10 on ICT literacy knowledge and understanding  Denominator  Number of year 6 and year 10 students assessed on the ICT literacy knowledge and understanding  Computation/s:  The proportion of assessed year 6 and year 10 students who achieve at or above proficiency level 3 for year 6, and at level 4 or above for year 10 on the ICT literacy performance. |
| Data source/s | Published reports by MCEECDYA (2010) ACARA (2012) and ACARA (2015) |
| Data Quality Framework Dimensions | |
| Institutional environment | Data Collector(s): The Contractor/Data Compiler collects data under a set of protocols from a sample of schools selected to participate in the test.. Student background data at the school level are provided by education authorities to the contractor. Student responses are scanned and marked by the contractor, who undertakes analysis to enable reporting of results at the national, state and territory level.'  Collection authority: ACARA Act  Data Compiler(s): the contractor (in 2011, the contractor was the Australian Council for Educational Research, ACER)) |
| Relevance | Level of Geography: Data are available by national, state and territory, and geo-location levels.  Data Completeness: data are complete  Indigenous Statistics: Data are available by Indigenous status by geo-location by state and territory.  Socioeconomic status data: Limited data are available by parental education and parental occupation, by State and Territory  Numerator/Denominator Source: The numerator and denominator are compiled from a single source, with the exception of the national report aggregated data provided by ACARA's contractor.  The original purpose for collecting the data are to report against the national key performance measures detailed in the Measurement Framework for Schooling in Australia, which provides the basis for Australian, State and Territory Governments to report on the performance of schooling in accordance with the Melbourne Declaration on Educational Goals for Young Australians.  Have standard classifications been used? If not, why not? Yes they have been used. |
| Timeliness | Collection interval/s: The ICT Literacy test is conducted every three years.  Data available: (for most recent data – 2014) The 2014 NAP ICT Literacy Year 6 and Year 10 Report and the 2014 NAP ICT Literacy Technical Report were both released by ACARA in 2015.  Updates to the data after its release are not likely. |
| Accuracy | Method of Collection: Is collected at the school-level by ACARA's contractor who then provides the data to ACARA.  Data Adjustments: Raw NAP ICT Literacy scores are converted to scaled scores.  Sample/Collection size: The collection size is a nationally representative sample of Year 6 and Year 10 students.  Standard Errors: The standard errors have been used to calculate 95 per cent confidence intervals for all the data provided.  Known Issues: Confidence intervals should be considered when ranking jurisdictions.  Changes between cycles: Caution should be exercised when using the data to measure small changes from one cycle to the next. |
| Coherence | Consistency over time: NAP ICT Literacy results are collected in a consistent manner every three years.  State and Territory data are consistent with each other and the Australian level.  The numerator and denominator are compiled from a single source.  The data are consistent with data supplied in previous reporting round.  Jurisdiction estimate calculation: Yes  Jurisdiction/Australia estimate calculation: Yes |
| Interpretability | Context: Yes, this is within the context of the NAP ICT Literacy testing and reporting environment.  Other Supporting information: FAQs and Glossary on www.nap.edu.au  Socioeconomic status definition: Parental education represents the highest level of parental school or non-school education that a parent/guardian has completed. This includes the highest level of primary or secondary school completed or the highest post-school qualification attained. Parental occupation represents the occupation group which includes the main work undertaken by a parent/guardian. If a parent/guardian has more than one job, the occupation group which reflects their main job is reported  Socioeconomic status derivation: Not available  Socioeconomic status quintiles derivation: Not available |
| Accessibility | Data publicly available on www.nap.edu.au  Data are not available prior to public access.  Supplementary data are available upon request.  The data are available in PDF format. |
| Data Gaps/Issues Analysis | |
| Key data gaps /issues | The Steering Committee notes the following issues:   * This is a three yearly sample assessment and therefore may not necessarily represent the outcomes were all students tested. Confidence intervals are provided. |

### Learning outcomes – The proportion of students in the achieving at or above the proficient standard, and in bottom and top levels of performance in international testing (PISA 2012, TIMSS 2011 and PIRLS 2011).

Data quality information for this indicator has been has been drafted by the School Education Working Group, (data supplied by ACER), with additional material supplied by ACER and Steering Committee comments.

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| Indicator definition and description | | | |
| Element | Outcome | | |
| Indicator | ‘Learning outcomes’ – (reading literacy, scientific literacy, mathematical literacy performance) | | |
| Measure | Proportion of students that achieved at or above the nationally agreed proficiency level   * Numerator: number of students who achieved at or above the nationally agreed proficiency level * PISA: level 3 for each of reading literacy, mathematical literacy and scientific literacy * TIMSS: intermediate and above (years 4 and 8 mathematics achievement and science achievement) * PIRLS: intermediate and above (year 4 reading literacy performance) * Denominator: total population of all students (15 year old students participating in PISA; years 4 and 8 students participating in TIMSS and PIRLS)   Proportion of students in top and bottom levels of performance   * Numerator top level*:* number of students who achieved: * PISA: at level 5 and level 6 on each of reading literacy, mathematical literacy and scientific literacy * TIMSS and PIRLS: above the Intermediate benchmark on each of reading literacy performance (PIRLS Year 4); mathematics achievement and science achievement (TIMSS years 4 and 8). * Numerator bottom level*:* number of students who achieved * PISA: at level 1 or below on each of reading literacy, mathematical literacy and scientific literacy * TIMSS and PIRLS: below the Intermediate benchmark on each of reading literacy performance (PIRLS Year 4); mathematics achievement and science achievement (TIMSS years 4 and 8). * Denominator: total population of all students (15 year old students participating in PISA; years 4 and 8 students participating in TIMSS and PIRLS). | | |
| Data source | PISA 2012 and earlier PISA cycles; TIMSS 2011 and earlier TIMSS cycles; PIRLS 2011 | | |
| Data Quality Framework Dimensions | | | |
| Institutional Environment | The data were collected by the Australian Council for Educational Research (ACER). ACER is an independent not for profit educational research company.  ACER are contracted by the Australian and State and Territory Governments to manage PISA, TIMSS and PIRLS in Australia  Data are collected from students, teachers and schools directly by ACER. Statistical confidentiality is assured. All identifying data are removed from the data file prior to submission to the International Study Centre.  The data are collected as part of the National Assessment Program. Participation of selected schools is mandatory, participation of students is voluntary. | | |
| Relevance | Level of Geography: State/Territory, Metropolitan, Provincial and Remote  Data Completeness: All data are available from this data source  Indigenous Statistics: Indigenous status is obtained from students  Socioeconomic status data: Socioeconomic status is available at all data levels  Numerator/Denominator Source: Yes | | |
| Timeliness | Collection interval/s: every 3 years (PISA); every 4 years (TIMSS); every 5 years (PIRLS).  Data available: December 2013 (PISA 2012); December 2012 (TIMSS 2011; PIRLS 2011)  Referenced Period: The data are collected during the 2012 school year (PISA 2012); 2010 school year (TIMSS 2011; PIRLS 2011)  No revisions likely.  Single data source only  No other less frequent data sources that contain more detailed data can be used in other reporting years | | |
| Accuracy | Method of Collection: For PISA the test and questionnaires are administered to selected students in selected schools by independent test administrators who are employed by and trained by ACER. For TIMSS and PIRLS the test and questionnaires are administered to selected classes in selected schools by teachers at the school who are not teachers of the selected students.  Data Adjustments: data are weighted only.  Sample/Collection size: 14 481 students aged who are aged between 15 years and 3 months and 16 years and 2 months at the beginning of the testing period (PISA 2012). The TIMSS 2011 and PIRLS 2011 sample is about 6 150 students at Year 4 and the TIMSS 2011 sample is about 7 500 students at Year 8.  Response rate: Student response rate is about 95 per cent.  Standard Errors: These vary but are included in tables where required.  Data are test achievement data.  There are no particular data tables for the performance indicator that require more detailed information or explanation.  There are no external factors that may impact on the consistency of the data for the performance indicator.  There are no revisions expected. | | |
| Coherence | The data are internally consistent.  The numerator and denominator are compiled from a single source.  The data are consistent with data supplied in previous reporting rounds.  There have been no changes to the underlying data collection.  No real world events have impacted on the data or its management.  These data are not comparable with any other data sources. | | |
| Interpretability | All terms used in analysis are explained in the reports available from www.acer.edu.au/timss and from www.acer.edu.au/ozpisa  There are no ambiguous terms. | | |
| Accessibility | Data are publicly available from www.acer.edu.au/timss and from www.acer.edu.au/ozpisa. Some unpublished data have been provided by ACER for this report. | | |
| Data Gaps/Issues Analysis | |  | |
| Key data gaps/issues | The Steering Committee notes the following issues:   * The population sample for this data collection does not support disaggregation at the State and Territory level by Indigenous status. Further analysis is required to determine whether an alternative data source is necessary and/or more refined indicators/measures developed. * The disaggregation of data to report students in the ‘top’ and ‘bottom’ levels of performance has resulted in larger RSEs than for the disaggregation of data to report students ‘at or above the national minimum standard’. The size of the RSEs affects the ability to identify small movements over time. * PISA data do not account for the differences in school starting ages across states and territories — a 15 year old in one jurisdiction could be in year 9, while a 15 year old in another jurisdiction could be in year 11. | | |

### Learning outcomes – The proportions of sampled students achieving at various proficiency levels, and mean scale scores on the ICILS.

Data quality information for this indicator has been has been drafted by the School Education Working Group, with additional material supplied by ACER and Steering Committee comments.

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| **Indicator definition and description** | | | |
| **Element** | Outcome | | |
| **Indicator** | ‘Learning outcomes’ | | |
| **Measure** | 1. Proportion of students that achieved at each proficiency level (there is no nationally agreed proficiency level)  Numerator: number of students who achieved at each proficiency level  Denominator: total population of year 8 students participating in ICILS  2. the mean score for students | | |
| **Data source** | ICILS 2013 | | |
| **Data Quality Framework Dimensions** | | | |
| **Institutional Environment** | The data were collected by the Australian Council for Educational Research (ACER). ACER is an independent not for profit educational research company.  Data are collected from students, teachers and schools directly by ACER. Statistical confidentiality is assured.  Participation of selected schools is voluntary. | | |
| **Relevance** | Level of Geography: All students, geographically remote students  Data Completeness: All data are available from this data source  Indigenous Statistics: Indigenous status is obtained from students  Socioeconomic status data: Socioeconomic status is available  Numerator/Denominator Source: Yes | | |
| **Timeliness** | Collection interval/s: This is the first collection of ICILS data..  Data available: November 2014  Referenced Period: Australian data are collected in November 2013  No revisions likely.  Single data source only  No other less frequent data sources that contain more detailed data can be used in other reporting years | | |
| **Accuracy** | Method of Collection: The test and questionnaires are administered to selected classes in selected schools by external Test Administrators. The ICILS student assessment and questionnaire were administered solely on computer.  Data Adjustments: data are weighted.  Sample/Collection size: 5326 students in Year 8.  Response rate: Student response rate is about 88 per cent.  Standard Errors: These vary but are included in tables where required.  Data are test achievement data.  There are no particular data tables for the performance indicator that require more detailed information or explanation.  There are no external factors that may impact on the consistency of the data for the performance indicator.  There are no revisions expected. | | |
| **Coherence** | The data are internally consistent.  The numerator and denominator are compiled from a single source.  The data are consistent with data supplied in previous reporting rounds.  There have been no changes to the underlying data collection.  No real world events have impacted on the data or its management.  These data are not comparable with any other data sources. | | |
| **Interpretability** | All terms used in analysis are explained in the reports available from http://www.acer.edu.au/aus-icils/reports  There are no ambiguous terms. | | |
| **Accessibility** | Data will be publicly available from February 2015 at http://www.acer.edu.au/aus-icils/data  Some unpublished data have been provided by ACER for this report. | | |
| **Data Gaps/Issues Analysis** | |  | |
| **Key data gaps/issues** | The Steering Committee notes the following issues:  The sample for this data collection does not support disaggregation at the State and Territory level by Indigenous status. | | |

### Completion (year 12)

Data quality information for this indicator has been drafted by the Australian Government Department of Education and Training with additional Steering Committee comments.

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| Indicator definition and description | |
| Element | Outcome |
| Indicator | Completion |
| Measure (computation) | Definition  The number of students who meet the requirements of a year 12 certificate or equivalent expressed as a percentage of the estimated potential year 12 population, by socio-economic status and geolocation.  Numerator/s  The number of students who meet the requirements of a year 12 certificate or equivalent (these criteria vary across jurisdictions) by socio-economic status and geolocation.  Denominator/s  The estimated potential year 12 population (an estimate of a single year age group which could have attended year 12 that year, calculated as the estimated resident population aged 15–19 divided by five) by socio-economic status and geolocation.  Computation/s:  The number of students who meet the requirements of a year 12 certificate or equivalent divided by the estimated potential year 12 population. These are provided as follows for socio-economic status (high, medium, low) and by geolocation (metropolitan, provincial, remote, very remote):  Socio-economic status: The ABS Postal Area Index of Relative Socio-economic Disadvantage is used to calculate socioeconomic status on the basis of postcode of students’ home addresses.  Geolocation: Definitions for geolocation are based on the agreed MCEECDYA Geographic Location Classification adapted to the Australian Statistical Geography Standard (ASGS) which was introduced in 2011.  A common total for socio-economic status and geolocation is selected for reporting all students' rates and this may mean totals for socioeconomic status differ slightly to those in other publications. |
| Data source/s | Numerator/s:  Australian Government Department of Education and Training (unpublished) – sourced from states and territories qualification authorities.  Denominator/s:  Australian Government Department of Education and Training (unpublished) – sourced from ABS population data based on the 2011 Census of Population and Housing |
| Data Quality Framework Dimensions | |
| Institutional environment | Data Collector(s): The data were collected by each of the eight state/territory Australian Curriculum, Assessment and Certification Authorities (ACACA) boards.  Collection authority: Collected at request of Education Council and Steering Committee for the Review of Government Service Provision  Data Compiler(s): Compiled by the Australian Government Department of Education and Training  Australian Government Department of Education and Training requests summary data at the postcode level. Significant errors picked up in subsequent report periods. |
| Relevance | Data topic: Students under 20 years of age, issued with Year 12 Certificates by sex and postcode. The certificates reported include:   * NSW - Year 12 Students Completing the Requirements of the High School Certificate (HSC); * VIC - Year 12 Students Completing the Requirements of the Victorian Certificate of Education (VCE) ) and Victorian Certificate of Applied Learning (VCAL) - Intermediate and Senior levels; * QLD - Year 12 Students who received a Senior Statement; * WA - Year 12 Students Receiving a Statement of Results for Completing at least one full year Curriculum Council Subject; * SA - Students completing the SACE requirements and students receiving a Record of Achievement for completion of at least one full year (20 credit) Stage 2 SACE subject.In 2011 the SACE Board of South Australia introduced a new South Australian Certification of Education (SACE). 2011 data for South Australia includes students completing the SACE requirements and students receiving a Record of Achievement for completion of at least one full year (20 credit) Stage 2 SACE subject. This constitutes a break in series for these data. * TAS\*- Year 12 Students Completing the Requirements of the Tasmanian Certificate of Education ; * ACT - Year 12 Students Completing the Requirements of the ACT Year 12 Certificate. * NT - Year 12 Students Completing the Requirements of the Northern Territory Certificate of Education;   \* In 2009 the Tasmanian Qualifications Authority introduced a new Tasmanian Certificate of Education (TCE). This requires students to meet a set of standards for achievement, everyday adult reading, writing, mathematics and use of computers. In previous years the TCE was awarded to students completing at least one senior secondary course. This represents a break in the time series.  Level of geography: Data are collected at the postcode level.  Key Data Items: Year 12 completion rates, by region and SES status, which are both calculated from postcode data.  Numerator/Denominator Source: The numerator is calculated based on Year 12 certificate data supplied by the state/territory examination boards. The denominator is based on Estimated Resident Population data released by the ABS at the SLA level for 15 to 19 year olds by sex.  Year 12 Completions data are collected to construct indicators showing the relative rates of young people completing senior secondary school education across different socio economic groups and across geographic regions by state. The collection has limited scope. The data refer predominantly to Year 12 Certificates issued from mainly academic streams, and so does not include completions from courses that have a large vocational component. The collection is therefore not suitable as a measure of Year 12 or equivalent attainment. Definitions of completions differ widely across states, so indicators are not comparable across states. Also, in three states, the completions numbers relate to students who have been issued certificates in at least one subject, whilst in other states the data refer to numbers of students who have successfully completed a Year 12 course over a number of subject areas. |
| Timeliness | Data collected: Annually. The Year 12 certificate data become available in January / February in the year following the reference year, whilst the estimated resident population data become available in July or August following the reference year.  Data available: The indicators are generally available four weeks after the estimated resident population data become available.  Referenced Period: The reference period for the Year 12 certificate data are the school calendar year. The estimated resident population data refer to 30 June of the reference year.  Data are unlikely to be updated after release, though the indicators are recalculated every five years as the ABS Estimated Resident Population series is rebased after each population census. In some years data have been revised, due to annual revisions in data becoming available.  The only alternative data source, in relation to the socioeconomic status and geography of Year 12 completers, is from the ABS Census of Population and Housing. |
| Accuracy | Method of Collection: Year 12 Completions data are supplied by the relevant qualifications authorities in annual data submissions to the Australian Government Department of Education and Training.  The population data are published by the ABS.  Data Adjustments: The postcodes are mapped to Statistical Local Areas, as per the Australian Standard Geographical Classification, as published for the most recent census year. Where postcodes refer to post office boxes, these postcodes are mapped on to the delivery postcode that the post office box is located in. Newly created postcodes are mapped to the existing postcode that covers the new postcode area. Completions for student addresses that are postcodes allocated to military bases and universities are excluded.  Sample size: Estimates are based on full counts of completions.  Collection size: About 190,000.  Standard errors: Not calculated.  Under Counts: There are no known issues with under counts.  Over Counts: Given that in some states, the completion count refers to numbers of students receiving a completion certificate for completing at least one Year 12 subject, it is likely that a number of these students will receive certificates over at least a two year period.  As the indicator was not designed to be used to be a measure of completion levels, this is not considered to be a major issue.  Sensitive Questions - Not applicable. Steps have been taken to minimise processing errors - incoming completions data are checked for reasonableness. Reporting rates - Not applicable. Coverage issues - none |
| Coherence | Consistency over time: The series has changed over time, as Year 12 qualifications have changed. For example, in 2009 the Tasmanian Qualifications Authority introduced a new Tasmanian Certificate of Education (TCE). This requires students to meet a set of standards for achievement, everyday adult reading, writing, mathematics and use of computers. In previous years the TCE was awarded to students completing at least one senior secondary course. This represents a break in the time series.  WA changed the pre-year one entry age in 2002 resulting in approximately half the normal intake of students for that year level. Therefore in 2014, Year 12 had significantly lower enrolments when compared to the population of the year 12 age group. For this reason, WA data for 2014 should not be compared with earlier years.  The Northern Territory also had a similar break in series some years ago, whilst South Australia has also changed its definition, as stated in the relevance section.  Consistency of jurisdictions: Data are not comparable across states and territories. State and territory data submissions vary substantially.  Numerator/denominator: The numerator is based on the numbers of Year 12 certificates issued to people who are either less than twenty year of age, or are in the 15-19 age group, as of December in the reference year. The difference in the definition of age group is not considered significant.  The denominator is based on numbers of people in the 15 to 19 year age group. The difference in age groups is not considered significant.  The data have been collected and processed consistently over time. In 2009 the Tasmanian Qualification Authority introduced a new Tasmanian Certificate of Education, which is based on students satisfactorily completing a number of senior secondary subjects before being eligible for the certificate. In previous years, the collection related to the numbers of students being issued a certificate for completing at least one Year 12 subject. This break in series will be documented. There is no alternative annual data source for this collection but a nationally agreed measure is under development. Similar indicators could be published quinquennially from ABS Census of Population and Housing data. |
| Accessibility | Contact details: (02) 6240 9281  Data are available in Excel tables. Low level data are not released. |
| Interpretability | Context: As the Year 12 completions data are not strictly comparable across jurisdictions, care must be taken in making interstate comparisons.  The coverage of Year 12 courses is limited, so the indicators are not suitable to be used to measure progress towards achieving the ‘Year 12 or equivalent’ COAG targets, though they can provide an indication of which socioeconomic and geographical groups are most in danger of not completing Year 12 level education.  Other Supporting information:  Information about Year 12 certificates can be found at the ACACA website at http://acaca.bos.nsw.edu.au/.  The ABS web site on the Socio-Economic Indexes for Areas (SEIFA).  The ABS publication, Schools Australia for information on numbers enrolled in Year 12.  Technical documentation published by the ABS explaining the ABS Estimated Resident Population series.  Year 12 completion refers to state Year 12 certificates. See ‘relevance’ section for names of these certificates. |
| Data Gaps/Issues Analysis | |
| Key data gaps/issues | The Steering Committee notes the following issues:   * The aggregation of all postcode locations into three socioeconomic status categories — high, medium and low — means there may be significant variation within the categories. Low deciles, for example, will include locations ranging from those of extreme disadvantage to those of moderate disadvantage. These data are not comparable as states and territories hold different requirements to achieve year 12 completion. Work is continuing to develop comparable measures. |

### Destination

Data quality information for this indicator has been drafted by the Secretariat in consultation with the ABS, with additional Steering Committee comments.

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| Indicator definition and description |

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| Indicator | Destination | |
| Measure/s (computation) | Definition  1. The proportion of school leavers aged 15–24 who left school at any time, who are fully participating in education and/or training, or employment.  2. The proportion of school leavers aged 15–24 who left school in the previous year, who are participating in work or study.  3  The proportions of 15–19 and 20–24 year olds who are not in school, who are participating in full or part time study and full or part time work. Data are reported by highest level of qualification.  Numerator  1. Number of 15-24 year olds who left school at any time and are participating in work or study.  2. The number of school leavers aged 15–24 who left school in the previous year, who are participating in work or study.  3. The number of 15–19 and 20–24 year olds who are not in school, who are participating in full or part time study and full or part time work.  Denominator  1. Number of 15–24 year olds who have left school at any time.  2. Number of 15–24 year olds who have left school in the last year  3. The proportions of 15–19 and 20–24 year olds who are not in school,  Computation  1. Numerator (1) divided by denominator (1). Data are reported for school leavers whose highest level of school completed was year 12, and year 11 and below  2. Numerator (2) divided by denominator (2). Data are reported for school leavers whose highest level of school completed was year 12, and year 11 and below  3. Numerator (3) divided by denominator (3). Data are reported by highest level of qualification. | |
| Data source/s | Numerator/Denominator  (1) and (2): ABS (unpublished) *Education and Work, Australia, 2014,* Cat. no. 4402.0,Canberra.  (3): ABS *Census of Population and Housing 2011* | |
| Data Quality Framework Dimensions | |  |
| Institutional environment | The SEW and Census is collected by the ABS under the Census and Statistics Act 1905.  For information on the institutional environment of the ABS, including the legislative obligations of the ABS, financing and government arrangements, and mechanisms for scrutiny of ABS operations, see ABS Institutional Environment on the ABS website. | |
| Relevance | SEW data are available by State/Territory. The SEW collects information on the highest year of school completed and highest level of non-school qualification. The classification of qualifications used is the Australian Standard Classification of Education. For some respondents, information is supplied by another household resident, such as a parent, partner or unrelated adult (Any Responsible Adult). While this is a standard survey methodology, answers to some questions may occasionally differ from those that would have been supplied directly by the selected respondent.  The Australian Census of Population and Housing is the official count of population and dwellings and collects details of age, sex and other characteristics of the population.  The Census aims to measure the number and key characteristics of people in Australia on Census Night. All people in Australia on Census Night are in scope, except foreign diplomats and their families. Visitors to Australia are counted regardless of how long they have been in the country or how long they plan to stay. Australian residents not in the country on Census Night are out of scope of the Census. | |
| Timeliness | The SEW is conducted annually in May as a supplement to the monthly LFS. The Census of Population and Housing is conducted every 5 years.  The *Census and Statistics Act 1905* requires the Australian Statistician to conduct a Census on a regular basis. Since 1961, a Census has been held every 5 years. The 2011 Census was the 16th national Census, and marked the centenary of national Censuses in Australia. It was held on 9 August 2011. | |
| Accuracy | The SEW has a response rate of 95 per cent (39 500 completed interviews).  The data for the SEW are collected from an ARA (Any Responsible Adult) on behalf of other members of the household and are weighted for non-response.  The data are event data that can be used to measure year to year changes provided that the changes are significant enough to account for the RSE of estimates. The LFS sample was reduced by 20 per cent in 2009, but the full sample was reinstated from 2010 onwards.  The sampling error of an estimate is a measure of the variability that occurs by chance because a sample, rather than the entire population, is surveyed. Since the indicators produced from the SEW are based on information obtained from occupants of a sample of dwellings they are subject to sampling variability; that is they may differ from the figures that would have been produced if all dwellings had been included in the survey. One measure of the likely difference is given by the standard error (SE). There are about two chances in three that a sample estimate will differ by less than one SE from the figure that would have been obtained if all dwellings had been included, and about 19 chances in 20 that the difference will be less than two SEs.  The interval of two SEs about an estimate is referred to as the 95 per cent CI. Small SEs are associated with small CIs and large SEs with large CIs. The CI is a useful measure of reliability as it measures percentage point variability around the indicator. The confidence interval should be considered when comparing the performance of states and territories.  Another measure of the likely difference between a sample estimate and the actual population result, is the RSE, which is obtained by expressing the SE as a percentage of the estimate. The RSE is a useful measure in that it provides an immediate indication of the percentage errors likely to have occurred due to sampling, and thus avoids the need to refer also to the size of the estimate.  More details can be found within the text surrounding this image.  The smaller the estimate the higher is the RSE. Likewise, the smaller the underlying sample size on which an estimate is based, the higher the SE and therefore the higher the corresponding RSE. Very small estimates and those based on very small samples are subject to such high SEs (relative to the size of the estimate) as to detract seriously from their value for most reasonable uses. In general, the ABS considers that only estimates with RSEs less than 25 per cent are sufficiently reliable for most purposes. Estimates with larger RSEs, between 25 per cent and less than 50 per cent should be used with caution and estimates with RSEs of 50 per cent or more are considered unreliable for most purposes. In the attachment tables in this Report, estimates based on the SEW with RSEs between 25 per cent and less that 50 per cent are indicated in italics. Estimates of RSEs of 50 per cent or more are generally identified as ‘np’ (not published).  The sampling error associated with SEW and other survey estimates can be large, especially for the smaller jurisdictions and/or when focusing on small subpopulations, such as 20-24 year olds.  The ABS aims to produce high quality data from the Census. To achieve this, extensive effort is put into Census form design, collection procedures and processing. There are four principal sources of error in Census data which quality management aims to reduce as much as possible; they are respondent error, processing error, partial or non-response and undercount. For more detail, see *2011 Census Dictionary* (cat. no. 2901.0) entry Managing Census Quality.  The Census is self-enumerated, and respondents sometimes do not return a Census form or fail to answer every applicable question. Persons are imputed into dwellings for which no form was returned, together with some demographic characteristics for these people. These same demographic characteristics are imputed if not provided by respondents on a returned form. However, the majority of output classifications include a 'Not Stated' category to record the level of non-response for that data item. Data quality statements are produced for each Census data item and include the non-response rate for each variable and a brief outline of any known data quality problems, as well as a comparison with the non-response rate for the 2006 Census. These can be accessed through the Data quality statements. | |
| Coherence | For measures (1) and (2) both the numerator and denominator come from the SEW. Prior to 2009 all persons in very remote areas were excluded from SEW. Very remote areas represent about 2 per cent of the total Australian and 20 per cent of the NT population. From 2009 onwards the SEW has a wider scope. It includes people in very remote areas but excludes people in Aboriginal and Torres Strait Islander communities in very remote areas. The current exclusion has only a minor impact on national estimates or estimates by State/Territory except for the NT where such persons account for about 15 per cent of the population.  For the 2013 SEW, a small number of households provided data via a web based collection instrument, rather than through telephone or personal interview. This is not expected to significantly impact of the coherence of the data between the current and previous collection cycles.  The Australian Standard Classification of Education (ASCED) (Cat. No. 1272.0) has been used in all surveys with education items since 2001 and allows the education and training items between different surveys to be compared.  It is important for Census data to be comparable and compatible with previous Censuses and also with other data produced by the ABS and wider community. The ABS, and the Census, uses Australian standard classifications, where available and appropriate, to provide data comparability across statistical collections. These include, for example, standards for occupation and geographic areas. For more details regarding classifications used in the Census, see the *Census Dictionary, 2011* (cat. no. 2901.0) entry About Census Classifications, and the relevant entries for each classification.  The Census of Population and Housing and publication Learning and Work, Australia (www.abs.gov.au/ausstats/abs@.nsf/mf/4235.0) (Cat. no. 4235.0) also provide information on educational attainment. | |
| Accessibility | The data for the SEW are available via the ABS website in the publication Education and Work, Australia.  Additional data are available at cost upon request through the NIRS.  Further data, including Census data, are available by the licensed Survey TableBuilder product. | |
| Interpretability | Information on how to interpret and use the data appropriately is available on the ABS website; see Explanatory Notes in Education and Work, Australia, (Cat. no. 6227.0); The Census provides a wealth of data about the Australian community through a suite of standard products, and data customised for individual requirements. The Census Dictionary, 2011 (cat. no. 2901.0) is a comprehensive reference guide designed to assist users to determine and specify their data requirements, and to understand the concepts underlying the data. It provides details of classifications used and a glossary of definitions of Census terms.. | |
| Data Gaps/Issues Analysis | |  |
| Key data gaps /issues | The Steering Committee notes the following issues:   * A higher or increasing estimated proportion of school leavers participating in further education, training or full time employment is likely to result in improved educational and employment outcomes in the longer term. * The Survey of Education and Work data reported for this indicator relate to the jurisdiction in which the young person was resident the year of the survey and not necessarily the jurisdiction in which they attended school. | |