MEDIA RELEASE

NEW REPORT SHOWS OVERALL SCIENCE SCORES REMAIN STEADY BUT DISPARITIES PERSIST DEPENDING ON A STUDENT'S BACKGROUND

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The latest National Assessment Program report from the Australian Curriculum, Assessment and Reporting Authority (ACARA) shows that results in science literacy for students across Australia have overall remained steady.

The 2023 National Assessment Program – Science Literacy (NAP–SL) Report released today provides results from the NAP Science Literacy sample assessments undertaken in 2023. The assessments test students' general science literacy skills and knowledge in a sample of schools across the country.

The 2023 report shows that, at the national level, results have remained broadly stable since the last assessment undertaken in 2018:

- 57 per cent of Year 6 students attained the proficient standard compared to 58 per cent in 2018.
- 54 per cent of Year 10 students attained the proficient standard compared to 50 per cent in 2018.

The report includes further information on performance results for sub-groups of students based on their background and demographics, and shows that disparities for some of these groups persist, including:

- The gap between Indigenous and non-Indigenous students attaining the proficient standard in Year 6 remained large in 2023 and has not changed since 2018 (24 percentage points). The gap is slightly larger for Year 10 than for Year 6 (27 percentage points). 34 per cent of Indigenous Year 6 students and 28 per cent of Indigenous Year 10 students attained the proficient standard.

- Science literacy achievement gradually increased with increasing levels of parental occupation and parental education, resulting in large, significant differences between the highest and the lowest occupational and educational groups.

- Students from a metropolitan location tended to have higher levels of science literacy than students from a regional or remote location for both Years 6 and 10.

This latest assessment also had a stronger focus on Critical and Creative Thinking (CCT), which tests skills in reasoning, analysing and evaluating. The results indicate that students who reported engaging more frequently in CCT activities tended to have higher levels of science literacy.

Commenting on the report, ACARA's Acting CEO Stephen Gniel said:

"Science is one of the cornerstones of 21st century society. It drives technological change, improves our quality of life and helps us understand the world around us.

"Therefore, it's critical we are arming Australian students with the science literacy necessary not only to be able to participate as active citizens in our ever-advancing technological society, but also to help overcome its challenges, minimise its risks and contribute to its development.

"The latest NAP Science Literacy report offers a wealth of information on the knowledge, understandings and abilities of Year 6 and Year 10 students within a science literacy context.

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"The report also provides valuable insights for policymakers in education, including ministers and senior education officials, as well as school leaders, teachers and all those committed to improving educational outcomes for all young Australians."

In addition to the NAP sample assessment, students complete a questionnaire about their attitudes to science and their science learning experiences at school.

Key findings from this questionnaire include:

- Most students at both year levels had positive attitudes towards science, showed an interest in science and stressed the importance of science for society.
- At a national level, more than two-thirds of Year 6 students reported undertaking science lessons once a week or more. 5% of Year 6 students reported that they never undertook science lessons at school.
- Less than half of students at either year level reported having "in-depth discussions about science ideas" in their science lessons, with more than 10% of students reporting that they never did this.
- Students at both year levels were broadly positive about the equality that exists for people of different cultures, gender and ages in their involvement with science. There were no gender differences in how students perceived equality in science, but Year 6 students perceived greater equality than Year 10 students, with just over half of Year 10 students responding that they believed female scientists get as much recognition as male scientists.
- Family support for CCT was positively associated with student achievement in science literacy. This was true in both Year 6 and Year 10 and for both male and female students.
- Year 10 students who more frequently participated in science-related activities outside of school (for example, "Talk about science with my family") tended to perform better on the NAP–SL assessment.

The full report, NAP Science Literacy 2023, can be found online at www.nap.edu.au/nap-sample-assessments/results-and-reports.

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Notes for editors

- NAP sample assessments test students' skills and understanding in science literacy, civics and citizenship, and information and commination technology (ICT) literacy.
- NAP sample assessments began in 2003 and are held on a rolling 3-yearly basis (i.e. one subject is tested every 3 years) but were cancelled in 2020 and 2021 due to the pandemic.
- The 2023 NAP–SL assessment was held in May (Term 2) 2023 and was delivered online to students in Year 6 and Year 10 (6,069 Year 6 students in 368 schools and 3,433 Year 10 students in 221 schools).
- Students were selected by drawing a random sample of schools in each state and territory across Australia and then a sample of students within each of these schools was tested.
- The 2023 report presents the findings of the seventh NAP–SL assessment, the previous SL assessment being undertaken in 2018. There is a 5-year gap due to the cancellation of NAP sample assessments in 2020 and 2021 because of the COVID-19 pandemic.
- The assessments measure and report on progress towards the achievement of the objectives outlined in the Melbourne Declaration on Educational Goals for Young Australians 2008.

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