

Curriculum summary

English

[Rationale/Aims](#)

History

[Rationale/Aims](#)

Mathematics

[Rationale/Aims](#)

Science

[Rationale/Aims](#)

Learning area	English
Curriculum elements	Rationale/Aims
Year levels	Kindergarten Year 1 Year 2 Year 3 Year 4 Year 5 Year 6 Year 7 Year 8 Year 9 Year 10

English | Rationale/Aims

Rationale

The *Australian Curriculum: English* involves learning about English language, literature and literacy. These three interrelated areas of learning form the core of the English curriculum and provide the foundation for study across all curriculum areas.

Australia is a linguistically and culturally diverse country. Participation in many aspects of Australian life depends largely on effective communication in Standard Australian English (English). Australians also participate in a global communication environment in which proficiency in English is valuable. The *Australian Curriculum: English* contributes to both nation-building and internationalisation. It respects the value of Aboriginal and Torres Strait Islanders' contribution to Australian society, literary heritage and contemporary literature in Australia through their distinctive ways of representing and communicating knowledge and experience. The curriculum also places emphasis on understanding the cultures of Asia. The *Australian Curriculum: English* plays an important part in developing the understanding and capabilities of young people who will take responsibility for Australia in the future.

Through studying English students learn to listen, read and view, speak, write and create increasingly complex and sophisticated texts with accuracy, fluency and purpose. They acquire, use and display their knowledge in and out of school. Students come to an explicit understanding and appreciation of the nature of the English language and how it works to create various kinds of meanings. The study of English helps students to extend and deepen their relationships, to understand their identities and their place in a changing world, and to become citizens and workers who are ethical, thoughtful and informed. It also helps students to engage imaginatively with literature, to understand and value informed appreciation, criticism and literary history. In the senior years of school, studying English helps prepare students to pursue pathways in education, training and work.

Aims

In light of this rationale, the language, literature and literacy strands of the *Australian Curriculum: English* provide students with the opportunity to:

- understand and use Standard Australian English in its spoken and written forms and in combination with other non-linguistic forms of communication
- develop a sense of the capacity of Standard Australian English to evoke feelings, and to organise and convey information and ideas
- use language to inform, persuade, entertain and argue
- understand, interpret, reflect on and create an increasingly broad repertoire of spoken, written and multimodal texts across a growing range of settings
- develop interest and skill in inquiring into the aesthetic aspects of texts, an informed appreciation of literature, and an understanding of literary criticism, heritage and values
- develop proficiency in the increasingly specialised written and spoken language forms of schooling.

Learning area	History
Curriculum elements	Rationale/Aims
Year levels	Kindergarten Year 1 Year 2 Year 3 Year 4 Year 5 Year 6 Year 7 Year 8 Year 9 Year 10

History | Rationale/Aims

Rationale

History is a disciplined inquiry into the past that develops students' curiosity and imagination. It develops understanding of cultural, social and political events, processes and issues that have shaped humanity from earliest times. It enriches our appreciation of how the world and its people have changed, and the significant continuities that exist into the present. In this way, the study of history enables students to contribute more effectively to creating the future.

History, as a discipline, has its own methods and procedures that make it different from other ways of understanding human experience. Historical study is based on the evidence of the remains of the past. It is interpretative by nature, promotes debate and encourages thinking about human values, including present and future challenges. It develops transferable skills associated with the process of historical inquiry, including the ability to ask relevant questions, critically analyse and interpret sources, consider context, respect and explain different perspectives, develop and substantiate interpretations, and communicate effectively.

The curriculum set out here takes a world history approach. It does so to equip students for the world in which they will live. An understanding of world history will enhance students' appreciation of Australian history. It will enable them to appreciate Australia's distinctive path of social, economic and political development, its position in the Asia-Pacific region, and global interrelationships that are essential to an informed and active participation in Australia's diverse society.

This history curriculum also contributes to an understanding of Aboriginal and Torres Strait Islander cultures and identity and the role that Aboriginal and Torres Strait Islander Australians continue to play in national life.

Aims

The Australian Curriculum: History K-10 aims to develop in each student:

- Interest in, and enjoyment of, historical study for lifelong learning and work, including their capacity and willingness to be active and informed citizens
- Knowledge, understanding and appreciation of the past and the forces that shape societies, including Australian society
- Understanding and use of historical concepts, including evidence, continuity and change, cause and effect, significance, empathy, perspectives and contestability
- Capacity to undertake historical inquiry, including skills in the analysis and use of sources, communication and explanation.

Learning area	Mathematics
Curriculum elements	Rationale/Aims
Year levels	Kindergarten Year 1 Year 2 Year 3 Year 4 Year 5 Year 6 Year 7 Year 8 Year 9 Year 10

Mathematics | Rationale/Aims

Rationale

Learning mathematics enriches the lives of, and creates opportunities for, all Australians. The Australian mathematics curriculum provides students with essential mathematical skills and knowledge in number and algebra, measurement and geometry, and statistics and probability. It develops the numeracy capabilities that all students need in their personal, work and civic life, and provides the fundamentals required of mathematical specialists and professional users of mathematics.

Mathematics has its own value and beauty and it is intended that students will appreciate the elegance and power in mathematical reasoning. Mathematical ideas have evolved over centuries and across all cultures and they continue to expand. Digital technologies are contributing to this expansion of ideas and provide access to new tools for continuing mathematical exploration and invention. The Australian mathematics curriculum focuses on developing increasingly sophisticated and refined mathematical understanding, fluency, logical reasoning, analytical thought processes and problem-solving skills to enable students to respond to familiar and unfamiliar situations by employing mathematical strategies to make informed decisions and solve problems efficiently.

The Australian mathematics curriculum ensures that the links between the various components of mathematics, and to other disciplines, are made clear. Mathematics is composed of multiple but interrelated and interdependent concepts and systems which students apply in other disciplines. In science, for example, understanding sources of error and their impact on the confidence of conclusions is vital, as is the use of mathematical models; in geography, interpretation of data underpins the study of human populations and their physical environments; in history, students need to be able to imagine timelines and time frames to reconcile relativities of related events; and in English, deriving quantitative and spatial information is an important aspect of making meaning of texts.

The curriculum is written with the expectation that schools will ensure that all students benefit from access to the power of mathematical reasoning and be able to apply their mathematical understanding creatively and efficiently. The mathematics curriculum provides students with carefully paced, in-depth study of critical skills and concepts. It encourages teachers to facilitate students to become self-motivated, confident learners through inquiry and active participation in challenging and engaging experiences.

Aims

The Australian mathematics curriculum aims to ensure that students are confident, creative users and communicators of mathematics, able to investigate, represent and interpret situations in their personal and work lives and as active citizens.

It aims to ensure students develop increasingly sophisticated understanding of mathematical concepts and fluency with processes, able to pose and solve problems and reason in number and algebra; measurement and geometry; and statistics and probability.

It aims to ensure students recognise connections between the areas of mathematics and other disciplines and appreciate mathematics as an accessible and enjoyable discipline to study.

Learning area	Science
Curriculum elements	Rationale/Aims
Year levels	Kindergarten Year 1 Year 2 Year 3 Year 4 Year 5 Year 6 Year 7 Year 8 Year 9 Year 10

Science | Rationale/Aims

Rationale

Science provides an empirical way of answering interesting questions about the biological, physical and technological world. The knowledge it produces has proved to be a reliable basis for action in our personal, social and economic lives. Science is a dynamic, collaborative and creative human endeavour arising from our curiosity and interest in making sense of our world through exploring the unknown, investigating universal mysteries, making predictions and solving problems.

The Australian Curriculum: Science provides opportunities for students to develop understandings about science and its processes, the scope of its contributions to our culture and society, and its applications in our daily lives. The science curriculum addresses the diverse needs of Australian students by providing them with scientific knowledge, understandings and skills to make informed and responsible personal, social, technological and environmental decisions that impact at the local, national and global levels and to participate, if they so wish, in science-rich careers.

In addition to its practical applications, learning science is a valuable pursuit in its own right, providing opportunities for critical and creative thinking, challenge and leisure. The science curriculum provides opportunities for students to experience the joy of scientific discovery and to nurture students' natural curiosity about the world around them. These ideas resonate with the concept of scientific literacy, a term that is well established in the science education literature.

The Australian Curriculum: Science encompasses the three interrelated areas of *Science inquiry skills* (incorporating skills and understanding of science as a way of knowing and doing), *Science as a human endeavour* (incorporating knowledge and understanding of the personal, social, environmental, cultural and historical significance and relevance of science), and *Science understanding* (incorporating knowledge and understanding of the biological, physical, and earth and space sciences).

Aims

The aims of the Australian Curriculum: Science are for students to develop:

- an interest in science and a curiosity and willingness to explore, ask questions and speculate about the changing world in which they live
- an ability to investigate questions about the world using scientific inquiry methods, including questioning, planning and conducting experiments and investigations based on ethical principles, collecting and analysing data, evaluating results, and drawing critical, evidence-based conclusions
- an ability to communicate their scientific understandings and findings to a range of audiences, to justify their own ideas on the basis of evidence, and to evaluate and debate scientific arguments and claims whilst respecting alternative viewpoints and beliefs
- an ability to solve problems and make informed, evidence-based decisions about current and future applications of science while taking into account moral, ethical and social implications
- an understanding of historical and cultural aspects of science as well as contemporary science issues and activities and an understanding of the diversity of careers related to science
- a solid foundation in science knowledge and understanding of the biological, physical and earth and space sciences, including being able to select and integrate science understanding in order to explain and predict phenomena, to apply that understanding to new situations and events, and to appreciate the dynamic nature of science knowledge.

science knowledge.