

# Information and Communication Technologies (ICTs)

# **Cross-curriculum priority** by the end of **Year 5**

Students live in a technological world where information and communication technologies (ICTs) are integral to everyday situations. ICTs include the hardware, software, peripheral devices and digital systems that enable data and information to be managed, stored, processed and communicated. Students independently and collaboratively work in online and stand-alone environments across a range of learning contexts.

Students use a range of ICT functions and applications in purposeful ways. They develop the knowledge, skills and capacity to select and use ICTs to inquire, develop new understandings transform information and construct new knowledge for a specific purpose or context. They communicate with others in an ethical, safe and responsible manner. They develop understandings of the impact of ICTs on society.

Applying ICTs as a tool for learning assists students to become competent, discriminating, creative and productive users of ICTs. ICTs can be integrated in a variety of ways within and across all key learning areas to support thinking, learning, collaboration and communication.

### **Inquiring with ICTs**

Students explore, select and use ICTs in the processes of inquiry across key learning areas. They:

- identify the inquiry focus and match appropriate ICTs and possible digital information sources and ways of gathering data and information
- plan, conduct and manage structured searches for data and information
- organise and identify relationships between data and information from a variety of sources
- evaluate the data and information gathered for usefulness, credibility, relevance and accuracy
- reflect on and analyse how ICTs have assisted in meeting the inquiry purposes and in developing new understandings.





## **Creating with ICTs**

Students experiment with, select and use ICTs to create a range of responses to suit the purpose and audience. They use ICTs to develop understanding, demonstrate creativity, thinking, learning, collaboration and communication across key learning areas. They:

- · develop simple plans to create imaginative responses
- express and represent ideas, information and thinking
- create imaginative responses that demonstrate required features
- reflect on their use of ICTs as creative tools and evaluate their choice of ICTs, their ICT responses, and the effectiveness of the ICT features in meeting requirements.

### **Communicating with ICTs**

Students experiment with, select and use ICTs across key learning areas to collaborate and enhance communication in different contexts for an identified purpose and audience. They:

- collaborate and communicate ideas, understandings, information and responses
- · consider how communication with ICTs varies in different social and cultural contexts
- · apply appropriate communication conventions
- · use a variety of digital media to improve communication
- · express a personal image and an identity in communication
- reflect on their use of ICTs and analyse and identify ways to improve the effectiveness of their collaboration and communication.

#### **Ethics, issues and ICTs**

Students understand the role and consider the impact of some ICTs in society. They develop and apply ethical, safe and responsible practices when working with ICTs in online and stand-alone environments. They:

- develop and apply codes of practice that promote safety, security, responsibility and respect
- examine practices in a variety of ICT environments and identify underlying values
- identify owner(s)/creator(s) of digital information sources and apply sound practices to acknowledge them
- apply a range of preventative strategies to address issues relating to health and safety when using ICTs
- · develop and apply strategies for the security of personal information when using ICTs
- reflect on and analyse the use of ICTs in the workplace and identify their impact in society.

#### **Operating ICTs**

Students use a range of ICT functions and applications across key learning areas to inquire, create, collaborate and communicate, and to manage information and data. They:

- experiment with operational processes and use the basic capabilities of a range of ICT devices
- · access appropriate network, personal system and device information
- make selections from common input, output and storage devices
- adopt basic recognised ICT conventions and manage personal ICT resources to enhance operational efficiency
- describe common ICT devices and operational processes using ICT-specific terminology
- develop and apply "help" strategies for effective use of ICTs
- · explain some management processes when working with content in digital environments
- reflect on and analyse their operational skills and identify ways to improve their effectiveness.