Year Level Plan	Year 8	Digital Technologies	Australian CURRICULUM

Business

Semester Unit

Overview

Integrated Approach

In this unit students will transform data into information, and explore and analyse the properties and components of networked systems and data transmission. Students will 'join' a fictional agency to create a range of digital solutions.

Students will apply a range of skills and processes when creating digital solutions. They will:

- explore the reliability and speed of data transmission through different networks (wired, wireless and mobile), examining the impacts of specifications on performance
- explore different communication protocols for transmitting data in networks
- acquire data from a range of sources and explore techniques for efficient, targeted online data collection
- evaluate data accuracy, authenticity and timeliness
- analyse and manage data using spreadsheets
- decompose real-world problems considering functional requirements, and usability, economic, social, environmental and technical constraints
- evaluate how student solutions and existing information systems meet needs and take account of sustainability.
- plan and manage projects that create and communicate ideas and information collaboratively online, taking safety and social contexts into account
- explore emerging technologies

Assessment Tasks

Assessment Task 1:
Digital Project - Networks

Students demonstrate knowledge and understanding of digital systems and apply skills in defining, designing, implementing and a digital solution.

Digital Project - Networks
This assessment provides opportunities to gather evidence of student learning in:
Digital Technologies - Knowledge and Understanding
- Investigate how data is transmitted and secured in wired, wireless and mobile networks.

Digital Technologies
Processes and Production Skills
- Acquire data from a range of sources and evaluate authenticity, accuracy and timeliness
- Analyse and visualise data using a range of software to create information; and use structured data to model objects or events
- Design the user experience of a digital system, generating, evaluating and communicating alternative designs
- Plan and manage projects that create and communicate ideas and information collaboratively online, taking safety and social contexts into account

Assessment Task 2:
Examination Combination - Spreadsheet Applications
- **Part A - Short Response**
- **Part B - Processes and Production Skills**

Students use features and functions Excel software to:
- summarise data to create information
- visualise data to create information
- apply a set of conditions to organise and filter data

Examination Combination - Spreadsheet Applications
This assessment provides opportunities to gather evidence of student learning in:
Digital Technologies - Knowledge and Understanding
- Investigate how digital systems represent text data.

Digital Technologies
Processes and Production Skills
- Acquire data from a range of digital sources and evaluate its authenticity, accuracy and timeliness
- Analyse and visualise data using a range of software to create information; and use structured data to model objects or events
- Define and decompose real-world problems taking into account functional requirements and economic, environmental, social, technical and usability constraints
- Design the user experience of a digital system, generating, evaluating and communicating alternative designs