# **Computational Thinking in Action**

A catalyst for growth and extension of Computational Thinking in the classroom.

## What is Computational Thinking?

Computational Thinking is a set of skills that underpin learning within the Digital Technologies classroom. These skills allow students to engage with processes, techniques and digital systems to create improved solutions to address specific problems, opportunities or needs.

## The six Computational Thinking skills:

## DECOMPOSITION

Breaking down data, processes, or problems into smaller, manageable parts.



#### **PATTERN RECOGNITION**

Observing patterns, trends, and regularities to make sense of data.



## ABSTRACTION

Identifying and extracting relevant information. The process of ignoring or removing unnecessary information.

#### **MODELLING AND SIMULATION**

Developing a model to imitate processes and problems.



## **ALGORITHMS**

Creating an ordered series of instructions for solving similar problems or for doing a task.



## **EVALUATION**

Determining the effectiveness of a solution and generalising. Applying that information to new problems.

