**STEAM**

Year 1 Scope & Sequence

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| **Year Level:** | Year 1 | | |
| **Domain:** | **Design and Technologies** aims to develop the knowledge, understanding and skills to ensure that students:   * become critical users of technologies, and designers and producers of designed solutions * can investigate, generate and critique designed solutions for sustainable futures * use design and systems thinking to generate innovative and ethical design ideas, and communicate these to a range of audiences * create designed solutions suitable for a range of contexts by creatively selecting and safely manipulating a range of materials, systems, components, tools and equipment * learn how to transfer the knowledge and skills from design and technologies to new situations * understand the roles and responsibilities of people in design and technologies occupations, and how they contribute to society. | **Media Arts** aims to develop students’:   * conceptual and perceptual ideas and representations through design and inquiry processes * understanding of the use of the techniques, materials, processes and technologies * critical and creative thinking skills, Media Arts languages, knowledge of Media Arts theories and practices * respect for and acknowledgement of the diverse roles, innovations, traditions, histories and cultures of artists, designers, commentators and critics * understanding of Media Arts social, cultural and industry practices * confidence, curiosity, imagination, enjoyment and a personal aesthetic. | The **Digital Technologies** curriculum aims to ensure that students can:   * design, create, manage and evaluate sustainable and innovative digital solutions to meet and redefine current and future needs * use computational thinking and the key concepts of abstraction; data collection, representation and interpretation; specification, algorithms and development to create digital solutions * apply systems thinking to monitor, analyse, predict and shape the interactions within and between information systems and the impact of these systems on individuals, societies, economies and environments * confidently use digital systems to efficiently and effectively automate the transformation of data into information and to creatively communicate ideas in a range of settings * apply protocols and legal practices that support safe, ethical and respectful communications and collaboration with known and unknown audiences. |
| **Victorian Curriculum Strands and Sub-Strands:** | Technologies and SocietyThe Technologies and Society strand focuses on how people use and develop technologies. It takes into account economic, environmental, ethical, legal, aesthetic and functional factors, and the impact of technologies on individuals, families, local, regional and global communities, and the environment.Technologies Contexts The Technologies Contexts strand focuses on the characteristics and properties of technologies contexts, and how they can be used to create innovative designed solutions. It explores four particular contexts, organised under the following sub-strands:   * Engineering principles and systems explores how forces can be used to create light, sound, heat, movement, control or support in systems. Students develop an understanding of how forces and the properties of materials affect the behaviour and performance of designed engineering solutions. * Food and fibre production focuses on food and fibre as human-produced or harvested resources, and how food and fibre are produced in managed environments such as farms or plantations, or harvested from wild stocks. Students develop an understanding of the challenges involved in managing these resources within sustainable agricultural systems. They develop their knowledge and understanding about the managed systems that produce food and fibre through creating designed solutions. * Food specialisations explores the application of nutrition principles and the characteristics and properties of food, food selection and preparation, and contemporary food issues. Students come to understand the importance of a variety of foods, sound nutrition principles, food preparation skills and food safety. * Materials and technologies specialisations explores a broad range of traditional, contemporary and emerging materials, and specialist areas that involve an extensive use of technologies. Students learn to make ethical and sustainable decisions about designed solutions and processes by learning about and working with materials and production processes.  Creating Designed Solutions The Creating Designed Solutions strand is based on the major aspects of design thinking, design processes and production processes. The content descriptions in this strand reflect a design process and would typically be addressed through a design brief. Creating Designed Solutions is organised by five sub-strands:   * Investigating – students critique, explore and investigate needs and opportunities, reflecting on how the choices they make have implications for the individual, society and the environment. * Generating *–* students develop and communicate ideas for a range of audiences. Students make choices, weigh up options, consider alternatives and document the various design ideas and possibilities. * Producing – students apply a variety of skills and techniques to make designed solutions to meet specific purposes and user needs. They apply knowledge about components and materials, including their characteristics and properties, to ensure their suitability. Students learn about the importance of adopting safe work practices. They develop accurate production skills to achieve quality designed solutions. * Evaluating – students evaluate and make judgments throughout a design process, about the quality and effectiveness of their designed solutions and others. They determine effective ways to test and judge their designed solutions and reflect on processes used and how they could transfer what they have learnt to other design opportunities. * Planning and managing – students learn to plan and manage time, along with other resources, to effectively create designed solutions. Working individually and collaboratively, students’ progress from planning steps in a project, through to more complex project management activities that consider factors such as cost, risk and quality control. | **Explore and Represent Ideas**  Experiment with ideas and develop characters and settings through stories using images, sounds and text  **Media Arts Practices**  Use media technologies to capture and edit images and sounds and text to tell stories  **Present and Perform**  Create and present media artworks that communicate ideas and stories to an audience  **Respond and Interpret**  Respond to media artworks and consider where and why people in their local area make media artworks, including media artworks of Aboriginal and Torres Strait Islander peoples | **Digital Systems**  Focuses on the hardware, software and network components of digital systems. Students initially learn about a range of hardware and software, and progress to an understanding of how data are transmitted between components within a system, and how the hardware and software interact to form networks.  **Data and Information**  Focuses on the properties of data, how they are collected and represented, and how they are interpreted in context to produce information. Students learn how data are represented and structured symbolically for use by digital systems, as well as techniques for collecting, managing and organising data that is used to solve problems and create and communicate ideas and information.  **Creating Digital Solutions**  Explores the interrelated processes and associated skills by which students create digital solutions. Students engage in the four processes of analysing, designing, developing and evaluating. Creating Digital Solutions requires skills in using digital systems and computational, design and systems thinking, and interacting safely by using appropriate technical and social protocols. |
| **Victorian Curriculum Content Descriptions**  [**Link to Curriculum Audit**](https://drive.google.com/open?id=1anR1JGiRAfORMqY2roNt4PWvoDme4hAsGGMQNZsURf8) | **Digital Technologies**  Identify and explore digital systems (hardware and software components) for a purpose [(VCDTDS013)](http://victoriancurriculum.vcaa.vic.edu.au/Curriculum/ContentDescription/VCDTDS013)  Recognise and explore patterns in data and represent data as pictures, symbols and diagrams [(VCDTDI014)](http://victoriancurriculum.vcaa.vic.edu.au/Curriculum/ContentDescription/VCDTDI014)  Collect, explore and sort data, and use digital systems to present the data creatively [(VCDTDI015)](http://victoriancurriculum.vcaa.vic.edu.au/Curriculum/ContentDescription/VCDTDI015)  Independently and with others create and organise ideas and information using information systems, and share these with known people in safe online environments [(VCDTDI016)](http://victoriancurriculum.vcaa.vic.edu.au/Curriculum/ContentDescription/VCDTDI016)  Follow, describe and represent a sequence of steps and decisions (algorithms) needed to solve simple problems [(VCDTCD017)](http://victoriancurriculum.vcaa.vic.edu.au/Curriculum/ContentDescription/VCDTCD017)  Explore how people safely use common information systems to meet information, communication and recreation needs [(VCDTCD018)](http://victoriancurriculum.vcaa.vic.edu.au/Curriculum/ContentDescription/VCDTCD018)  **Design & Technologies**  Identify how people create familiar designed solutions and consider sustainability to meet personal and local community needs [(VCDSTS013)](http://victoriancurriculum.vcaa.vic.edu.au/Curriculum/ContentDescription/VCDSTS013)  Explore needs or opportunities for designing, and the technologies needed to realise designed solutions[(VCDSCD018)](http://victoriancurriculum.vcaa.vic.edu.au/Curriculum/ContentDescription/VCDSCD018)  Visualise, generate, and communicate design ideas through describing, drawing and modelling[(VCDSCD019)](http://victoriancurriculum.vcaa.vic.edu.au/Curriculum/ContentDescription/VCDSCD019)  Use materials, components, tools, equipment and techniques to produce designed solutions safely[(VCDSCD020)](http://victoriancurriculum.vcaa.vic.edu.au/Curriculum/ContentDescription/VCDSCD020)  Use personal preferences to evaluate the success of design ideas, processes and solutions including their care for environment [(VCDSCD021)](http://victoriancurriculum.vcaa.vic.edu.au/Curriculum/ContentDescription/VCDSCD021)  Sequence steps for making designed solutions[(VCDSCD022)](http://victoriancurriculum.vcaa.vic.edu.au/Curriculum/ContentDescription/VCDSCD022)  **Media Arts**  Experiment with ideas and develop characters and settings through stories using images, sounds and text [(VCAMAE021)](http://victoriancurriculum.vcaa.vic.edu.au/Curriculum/ContentDescription/VCAMAE021)  Use media technologies to capture and edit images and sounds and text to tell stories [(VCAMAM022)](http://victoriancurriculum.vcaa.vic.edu.au/Curriculum/ContentDescription/VCAMAM022)  Create and present media artworks that communicate ideas and stories to an audience [(VCAMAP023)](http://victoriancurriculum.vcaa.vic.edu.au/Curriculum/ContentDescription/VCAMAP023)  Respond to media artworks and consider where and why people in their local area make media artworks, including media artworks of Aboriginal and Torres Strait Islander peoples [(VCAMAR024)](http://victoriancurriculum.vcaa.vic.edu.au/Curriculum/ContentDescription/VCAMAR024) | | |
| **Victorian Curriculum Achievement standard:** | **Digital Technologies**  By the end of Level 2, students identify how common digital systems are used to meet specific purposes.  Students use digital systems to represent simple patterns in data in different ways and collect familiar data and display them to convey meaning.  Students design solutions to simple problems using a sequence of steps and decisions. They create and organise ideas and information using information systems and share these in safe online environments.  **Design & Technologies**  By the end of Level 2, students describe the purpose of familiar designed solutions and how they meet the needs of users and affect others and environments. They identify the features and uses of some technologies for each of the prescribed technologies contexts.  With guidance, students create designed solutions for each of the prescribed technologies contexts. They describe given needs or opportunities. Students create and evaluate their ideas and designed solutions based on personal preferences. They communicate design ideas for their designed solutions, using modelling and simple drawings. Following sequenced steps, students demonstrate safe use of tools and equipment when producing designed solutions.  **Media Arts**  By the end of Level 2, students describe the media artworks that they make and view, and describe where and why media artworks are made. Students use the story principles of structure, character, intent and setting, media technologies and the elements of media arts to make and share media artworks. | | |

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| **Term 1** | | | |
| **Unit Title** | Arty Pants | | |
| **Key Understandings** | * art can be created using technology * media art is multi-modal and can be used for a variety of purposes * many iPad apps can be used to create one piece of Media Art | | |
| **Vocabulary** | edit, manipulate, import, export, app smash, audio | | |
| **Week** | **Learning Intention** | **Task/ Activities** | **Resources/ Linked Achievement Standard** |
| **1** | To understand what the STEAM classroom looks like, feels like, sounds like. | Start up   * Setting expectations (Co-constructed)   + STEAM Room   + Resources   + Word Wall Set up   + Reward system * Rotational STEAM activities | * Marble run * Blocks |
| **2** | To understand what the STEAM classroom looks like, feels like, sounds like. | Start up   * Review expectations and model * Rotational STEAM activities | * Marble run * Blocks |
| **3** | To understand what the STEAM classroom looks like, feels like, sounds like. | Start up   * Review expectations and model * Rotational STEAM activities (unplugged) | * Marble run * Blocks |
| **4** | To understand how to share our learning. | * Seesaw: Intro to Activities | VCAMAR024 |
| **5** | To manipulate images using technology | * Colourscape | VCAMAM022  VCAMAP023 |
| **6** | To arrange and manipulate images using technology | * Adobe Spark | VCAMAM022  VCAMAP023 |
| **7** | To understand how to use audio to support images | * Keynote: Importing images and recording audio/sound effects | VCAMAM022  VCAMAP023 |
| **8** | To share our understanding of media arts | * Student choice Keynote project: * My favourite... | VCAMAE021  VCAMAM022  VCAMAP023  VCAMAR024 |
| **9** | To share our understanding of media arts | * Student choice Keynote project: * My favourite... | VCAMAE021  VCAMAM022  VCAMAP023  VCAMAR024 |
| **10** | To reflect on what we know about media arts. | * Reflection | VCAMAR024 |
| **Assessment** | Key Assessment Task:  Students were encouraged to share their understanding of Media Arts by creating a personal choice project using the variety of apps and skills they have learnt during Term 1 and presenting it in the app, Keynote.  Achievement Standards to assess this term: | | |

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| **Term 2** | | | |
| **Unit Title** | Scratch Ya Head! | | |
| **Key Understandings** | * know what an algorithm is * Computers need clear instructions to work * Solving problems (debugging) is essential when thinking like a computer | | |
| **Vocabulary** | algorithm, coding, program, instructions, forwards, backwards, left, right, reset, pause, sustainable, debug | | |
| **1** | To understand what block code is and how we can use it. | * Intro to Scratch Jr app * Scratch Jr activity 1 | <https://www.scratchjr.org/teach/activities>  <https://www.youtube.com/watch?v=ciWPaEgscr0&feature=youtu.be>  [VCDTDS013](http://victoriancurriculum.vcaa.vic.edu.au/Curriculum/ContentDescription/VCDTDS013)  [VCDTDI014](http://victoriancurriculum.vcaa.vic.edu.au/Curriculum/ContentDescription/VCDTDI014)  [VCDTCD017](http://victoriancurriculum.vcaa.vic.edu.au/Curriculum/ContentDescription/VCDTCD017)  [VCDSCD018](http://victoriancurriculum.vcaa.vic.edu.au/Curriculum/ContentDescription/VCDSCD018)  [VCDSCD022](http://victoriancurriculum.vcaa.vic.edu.au/Curriculum/ContentDescription/VCDSCD022)  [VCCCTQ003](http://victoriancurriculum.vcaa.vic.edu.au/Curriculum/ContentDescription/VCCCTQ003)  [VCCCTM009](http://victoriancurriculum.vcaa.vic.edu.au/Curriculum/ContentDescription/VCCCTM009) |
| **2** | To understand what block code is and how we can use it. | * Scratch Jr activity 2 * Screen recording | [VCDTDS013](http://victoriancurriculum.vcaa.vic.edu.au/Curriculum/ContentDescription/VCDTDS013)  [VCDTDI014](http://victoriancurriculum.vcaa.vic.edu.au/Curriculum/ContentDescription/VCDTDI014)  [VCDTCD017](http://victoriancurriculum.vcaa.vic.edu.au/Curriculum/ContentDescription/VCDTCD017)  [VCDSCD018](http://victoriancurriculum.vcaa.vic.edu.au/Curriculum/ContentDescription/VCDSCD018)  [VCDSCD022](http://victoriancurriculum.vcaa.vic.edu.au/Curriculum/ContentDescription/VCDSCD022)  [VCCCTQ003](http://victoriancurriculum.vcaa.vic.edu.au/Curriculum/ContentDescription/VCCCTQ003)  [VCCCTM009](http://victoriancurriculum.vcaa.vic.edu.au/Curriculum/ContentDescription/VCCCTM009) |
| **3** | To understand what block code is and how we can use it. | * Scratch Jr activity 3&4 | [VCDTDS013](http://victoriancurriculum.vcaa.vic.edu.au/Curriculum/ContentDescription/VCDTDS013)  [VCDTDI014](http://victoriancurriculum.vcaa.vic.edu.au/Curriculum/ContentDescription/VCDTDI014)  [VCDTCD017](http://victoriancurriculum.vcaa.vic.edu.au/Curriculum/ContentDescription/VCDTCD017)  [VCDSCD018](http://victoriancurriculum.vcaa.vic.edu.au/Curriculum/ContentDescription/VCDSCD018)  [VCDSCD022](http://victoriancurriculum.vcaa.vic.edu.au/Curriculum/ContentDescription/VCDSCD022)  [VCCCTQ003](http://victoriancurriculum.vcaa.vic.edu.au/Curriculum/ContentDescription/VCCCTQ003)  [VCCCTM009](http://victoriancurriculum.vcaa.vic.edu.au/Curriculum/ContentDescription/VCCCTM009) |
| **4** | To understand what block code is and how we can use it. | * Scratch Jr activity 5&6 | [VCDTDS013](http://victoriancurriculum.vcaa.vic.edu.au/Curriculum/ContentDescription/VCDTDS013)  [VCDTDI014](http://victoriancurriculum.vcaa.vic.edu.au/Curriculum/ContentDescription/VCDTDI014)  [VCDTCD017](http://victoriancurriculum.vcaa.vic.edu.au/Curriculum/ContentDescription/VCDTCD017)  [VCDSCD018](http://victoriancurriculum.vcaa.vic.edu.au/Curriculum/ContentDescription/VCDSCD018)  [VCDSCD022](http://victoriancurriculum.vcaa.vic.edu.au/Curriculum/ContentDescription/VCDSCD022)  [VCCCTQ003](http://victoriancurriculum.vcaa.vic.edu.au/Curriculum/ContentDescription/VCCCTQ003)  [VCCCTM009](http://victoriancurriculum.vcaa.vic.edu.au/Curriculum/ContentDescription/VCCCTM009) |
| **5** | To understand what block code is and how we can use it. | * Scratch Jr activity 7&8 | [VCDTDS013](http://victoriancurriculum.vcaa.vic.edu.au/Curriculum/ContentDescription/VCDTDS013)  [VCDTDI014](http://victoriancurriculum.vcaa.vic.edu.au/Curriculum/ContentDescription/VCDTDI014)  [VCDTCD017](http://victoriancurriculum.vcaa.vic.edu.au/Curriculum/ContentDescription/VCDTCD017)  [VCDSCD018](http://victoriancurriculum.vcaa.vic.edu.au/Curriculum/ContentDescription/VCDSCD018)  [VCDSCD022](http://victoriancurriculum.vcaa.vic.edu.au/Curriculum/ContentDescription/VCDSCD022) |
| **6**  **Reconciliation Week** | To understand what block code is and how we can use it. | * Retell a Dreamtime story using Scratch Jr | [VCDTDS013](http://victoriancurriculum.vcaa.vic.edu.au/Curriculum/ContentDescription/VCDTDS013)  [VCDTDI014](http://victoriancurriculum.vcaa.vic.edu.au/Curriculum/ContentDescription/VCDTDI014)  [VCDTCD017](http://victoriancurriculum.vcaa.vic.edu.au/Curriculum/ContentDescription/VCDTCD017)  [VCDSCD018](http://victoriancurriculum.vcaa.vic.edu.au/Curriculum/ContentDescription/VCDSCD018)  [VCDSCD022](http://victoriancurriculum.vcaa.vic.edu.au/Curriculum/ContentDescription/VCDSCD022)  VCAMAR024 |
| **7** | To understand what block code is and how we can use it. | * Scratch Jr Assessment | [VCDTDS013](http://victoriancurriculum.vcaa.vic.edu.au/Curriculum/ContentDescription/VCDTDS013)  [VCDTDI014](http://victoriancurriculum.vcaa.vic.edu.au/Curriculum/ContentDescription/VCDTDI014)  [VCDTCD017](http://victoriancurriculum.vcaa.vic.edu.au/Curriculum/ContentDescription/VCDTCD017)  [VCDSCD018](http://victoriancurriculum.vcaa.vic.edu.au/Curriculum/ContentDescription/VCDSCD018)  [VCDSCD022](http://victoriancurriculum.vcaa.vic.edu.au/Curriculum/ContentDescription/VCDSCD022) |
| **8** | To understand what block code is and how we can use it. | * Student choice Scratch project | [VCDTDS013](http://victoriancurriculum.vcaa.vic.edu.au/Curriculum/ContentDescription/VCDTDS013)  [VCDTDI014](http://victoriancurriculum.vcaa.vic.edu.au/Curriculum/ContentDescription/VCDTDI014)  [VCDTCD017](http://victoriancurriculum.vcaa.vic.edu.au/Curriculum/ContentDescription/VCDTCD017)  [VCDSCD018](http://victoriancurriculum.vcaa.vic.edu.au/Curriculum/ContentDescription/VCDSCD018)  [VCDSCD022](http://victoriancurriculum.vcaa.vic.edu.au/Curriculum/ContentDescription/VCDSCD022) |
| **9** | To understand what block code is and how we can use it. | * Student choice Scratch project | [VCDTDS013](http://victoriancurriculum.vcaa.vic.edu.au/Curriculum/ContentDescription/VCDTDS013)  [VCDTDI014](http://victoriancurriculum.vcaa.vic.edu.au/Curriculum/ContentDescription/VCDTDI014)  [VCDTCD017](http://victoriancurriculum.vcaa.vic.edu.au/Curriculum/ContentDescription/VCDTCD017)  [VCDSCD018](http://victoriancurriculum.vcaa.vic.edu.au/Curriculum/ContentDescription/VCDSCD018)  [VCDSCD022](http://victoriancurriculum.vcaa.vic.edu.au/Curriculum/ContentDescription/VCDSCD022) |
| **10** | To reflect on what we have learnt this term. | End of Semester Reflection   * reflecting on our learning * coding/ algorithm activities | [VCDTDI016](http://victoriancurriculum.vcaa.vic.edu.au/Curriculum/ContentDescription/VCDTDI016)  [VCDSCD021](http://victoriancurriculum.vcaa.vic.edu.au/Curriculum/ContentDescription/VCDSCD021) |
| Assessment | Key Assessment Task:   * NA   Achievement Standards to assess this term: | | |

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| **Term 3** | | | |
| **Unit Title** | My Green City | | |
| **Key Understandings** | * Sustainable materials are… * We can use sustainable materials to create * Planning is an essential part of building | | |
| **Vocabulary** | sustainability, community, engineering design process, plan, create, improve, feedback, measurement | | |
| **1** | To understand what sustainability is and how we see it in our community  To understand what sustainable materials are and how we can use them | Introduction to Sustainability   * A look at the Doreen community (habitats, green spaces, community spaces) * Why are green spaces important? | VCDSTS013  VCDSCD018  VCDSCD019 |
| **2** | To understand how we can use sustainability when designing new places. | Sustainability   * What could we create to mimic a sustainable city? * Creating a simple map with parks, community facilities, wildlife reserves, etc | VCDSTS013  VCDSCD018  VCDSCD019 |
| **3** | To understand the Engineering Design Process so that we can use it to solve a problem. | Introduction to the major activity - students to design and build a green city with sustainability in mind  Intro to Engineering Design Process   * Ask, Imagine, Plan | VCDSCD018  VCDSCD019  VCDSCD022 |
| **4** | To understand the importance of creating a plan when solving a problem. | Engineering Design Process   * Students create a plan of the part of their city they want to build * carefully selecting resources | VCDSCD018  VCDSCD019  VCDSCD022 |
| **5** | To understand the importance of feedback when creating new designs | * Learning how to ask for feedback from peers before beginning construction * Building Skills Workshop | VCDSTS013  VCDSCD021 |
| **6** | To use our knowledge of sustainability to build a ‘Green City’. | Engineering Design Process   * create phase | VCDSTC017  VCDSCD018  VCDSCD019  VCDSCD020  VCDSCD021  VCDSCD022 |
| **7** | To use our knowledge of sustainability to build a ‘Green City’. | Engineering Design Process   * create phase | VCDSTC017  VCDSCD018  VCDSCD019  VCDSCD020  VCDSCD021  VCDSCD022 |
| **8** | To use our knowledge of sustainability to build a ‘Green City’. | Engineering Design Process   * create phase * improve phase | VCDSTC017  VCDSCD018  VCDSCD019  VCDSCD020  VCDSCD021  VCDSCD022 |
| **9** | To use our knowledge of sustainability to build a ‘Green City’. | Engineering Design Process   * improve phase   Putting our city together | VCDSTC017  VCDSCD018  VCDSCD019  VCDSCD020  VCDSCD021  VCDSCD022 |
| **10** | To reflect on what we have learnt this term. | End of Semester Reflection   * reflecting on our learning * putting our city together to take photos and upload to Seesaw. | VCDSTC017  VCDSCD018  VCDSCD019  VCDSCD020  VCDSCD021  VCDSCD022 |
| Assessment | Key Assessment Task:  Achievement Standards to assess this term: | | |

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| **Term 4** | | | |
| **Unit Title** | Simple Machines | | |
| **Key Understandings** | * simple machines allow us to work more efficiently * simple machines work by applying different forces | | |
| **Vocabulary** | simple machine, forces, push, pull, lift, work, level, incline, wedge, screw, wheel, axle | | |
| **1** | We are learning to understand how simple machines make our life easier. | * What is work? Intro to push, pull, lift * Introduction to simple machines. Why do we need simple machines? * What are their purposes (matching and brainstorming activities - where do we see them?) | [Simple Machines Resource Unit](https://docs.google.com/document/d/1MdkL4chKypcbkfDqgN4MzIkLpCm2dherFzYxcUWWZn0/edit) |
| **2** | We are learning to create our own simple machines so that we can understand their abilities. | * Creating simple machines with pasta (creating a simple machine card) * Reflecting on where we would use these simple machines | [Simple Machines Resource Unit](https://docs.google.com/document/d/1MdkL4chKypcbkfDqgN4MzIkLpCm2dherFzYxcUWWZn0/edit)  [Pasta Activity](https://i.pinimg.com/originals/cb/d1/74/cbd17429b42b2b73d18a947d6be9eb0c.jpg) |
| **3** | We are learning to identify simple machines in our community so that we can understand their importance to us. | * Brainstorm where we see the different simple machines in real life (lever, inclined plane, wedge, screw, wheel and axle, pulley) * What materials can we use to create simple machines? Where can we find them? - Brainstorm and bring from home. * Exploring and investigating simple machines (digital activity) * Detailed reflection of our findings |  |
| **4** | We are learning to explain our understanding of simple machines. | * **Key Assessment Task** * Using Seesaw to demonstrate understanding of Simple Machines (See KAT description below) | Sample KAT  Students will re-create simple machines in Seesaw using shapes and drawings. |
| **5**  **STEAM WEEK** | We are learning to apply our knowledge of simple machines so that we can plan our own. | * Planning to create our own simple machine (park equipment, amusements, arcade activities). |  |
| **6** | We are learning to use our plan to create our own simple machine. | * building our simple machine |  |
| **7** | We are learning to use our plan to create our own simple machine. | * building our simple machine |  |
| **8** | We are learning to use our plan to create and improve our own simple machine. | * How can we improve our simple machines * continuing to build our simple machines |  |
| **9** | We are learning to test our simple machine so that we can see that it functions as planned. | * Testing our simple machines * Gallery walk with other’s simple machines * uploading a photo to Seesaw of our simple machines |  |
| **10** | To reflect on what we have learnt this term. | End of Semester Reflection   * [Reflection](https://education.makewonder.com/assets/files/resources.pdf) | [VCDTDI016](http://victoriancurriculum.vcaa.vic.edu.au/Curriculum/ContentDescription/VCDTDI016)  [VCDSCD021](http://victoriancurriculum.vcaa.vic.edu.au/Curriculum/ContentDescription/VCDSCD021) |
| **11** | Activities Week | * STEAM Activities * Tinker Time * Clean Up |  |
| Assessment | Key Assessment Task:   * Students demonstrate their knowledge of simple machines by creating a simple poster to explain three different machines they have learnt about.   Achievement Standards to assess this term: | | |