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# MANSFIELD SECONDARY COLLEGE

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## 2024 Year 10 Curriculum Handbook

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## 2024 YEAR 10 CURRICULUM HANDBOOK

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## GENERAL INFORMATION

### INTRODUCTION

Mansfield Secondary College is an isolated rural Secondary College with approximately 420 students across years 7-12. We are committed to all students achieving excellence in both academic and vocational streams of education and have achieved consistently strong academic outcomes.

At Mansfield Secondary College we value:

- Respect: for self, others and the environment
- Persistence: doing your best all the time
- Curiosity: an interest in the world and our learning

This booklet includes details of the subjects available for Year 10, the structure of the curriculum, support services and general school requirements.

Work at this level can be challenging – the school expects students to strive to achieve personal excellence and to make full use of the resources within the school.

Year 10 is a time for development and preparation for Year 11 and 12. It is in this year that many students will make important and long-lasting decisions about the future – the subjects in which they intend to specialize in Years 11 & 12 and perhaps some choice in their intended career path. The curriculum structure at this level ensures that all students are exposed to a broad range of subjects in the electives areas thereby providing an excellent preparation for their next year while still allowing for some specialisation in areas of interest.

### IMPORTANT INFORMATION

In order to maintain a balanced curriculum and to ensure students experience a breadth of subjects, we have implemented the following subject selection guidelines:

- Every student in Year 10 is required to study the Core subjects: Maths, English, Science and Humanities for the full year, as well as Careers & Living
- Every student in Year 10 should study at least 2 Health or Physical Education elective units

**PLEASE NOTE:** Students are not required to complete a Language subject at Year 10.

However, students must keep in mind that if there is ANY chance they will want to study a Language at VCE level, they will need to continue to study it at Year 10. Students who undertake a Language study at Year 10 will be required to study it for the full year.

### ACADEMIC EXCELLENCE

Each student is encouraged to achieve their personal best and to develop a sense of pride in themselves, the College and their community. As well as enhanced in-class learning opportunities, students have the opportunity to pursue areas of individual interest and to develop a high level of competency by participating in a range of activities provided by the College and by external providers such as tertiary institutions and professional associations.

All classes provide differentiated activities and tasks, enabling students to work at their level and to aspire to complete extension work.



## STUDENT ASSESSMENT AND REPORTING

The 'progressive reporting' structure used at Mansfield Secondary College updates parents on how their child is progressing with their studies. 'Progressive reporting' builds throughout the year and provides students and parents with ongoing assessment of student learning. Parents are able to access results and feedback throughout the semester rather than waiting for a 'Semester Report' for indications on how their child is progressing.

### **Progressive Reporting**

Progressive Reporting allows parents and the students to see:

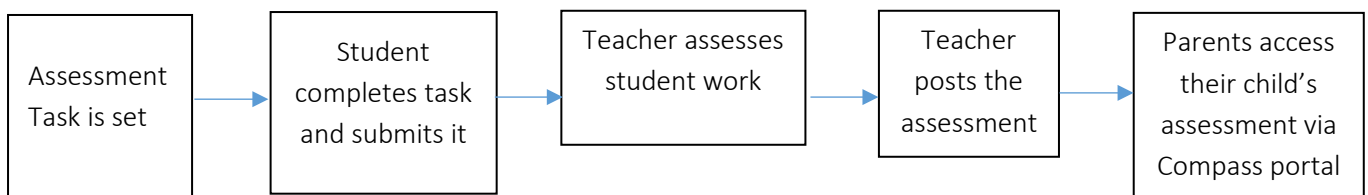
- What they have achieved
- What they need to improve and
- Suggested paths for improvement

### **Learning Tasks - posted throughout the semester (Years 7-10)**

Each semester parents will receive a minimum of two 'learning task' assessments per subject. The 'report' is an assessment of a particular task against the Victorian Curriculum. A comment outlines what the student did well, areas for improvement, and how to achieve that improvement.

Learning tasks will be posted on the Compass parent portal.

#### *The Assessment and Feedback Process*



### **Progress Report - twice a term**

Twice a term (around every 5 weeks depending on term length), a Progress Report will be available on the Compass portal. These are a good way to monitor whether the student is completing homework regularly, meeting deadlines, putting in enough effort, and if the quality of their work is suitable.

### **Semester Report - end of each semester**

At the end of each semester a summary report of student achievement will be posted on the Compass portal.

### **Parent Teacher interview sessions each semester**

Parent Teacher Interviews will be held twice a year for all students.



### STUDENT SUPPORT

#### Wellbeing

Mansfield Secondary College is committed to building a secure learning environment where all students feel safe and supported. MSC recognises the importance of developing students' resilience and social and emotional capabilities so that they can achieve their full academic potential. The College values of Respect, Persistence, and Curiosity are supported by both the student and teacher behavior matrix which provide a basis upon which appropriate programs and procedures are developed across the College. The School Wide Positive Behaviour Support Program (PBS) influences the implementation of all programs and procedures which are designed to: develop a culture that does not tolerate bullying and/or harassment while providing an effective framework within to restore positive relationships.

The College has a group of experienced staff members who support students in their learning and participation in school life. These include:

- A team of **Year Level Coordinators** who monitor overall student progress and provide support to students when required.
- A **Wellbeing Coordinator** who is responsible for overseeing the wellbeing of MSC students, providing support, developing programs and referring to external services where required.
- An **Adolescent Health Nurse** (School Nursing Program) who offers general health-related information and advice to students and is available by appointment.
- A **Mental Health Practitioner** (MHP) who provides mental health support to students. The MHP is accessed via the Wellbeing Coordinator.
- A **Youth Worker** providing counselling and support.

#### Specialist Services

To support student progress and development, Mansfield Secondary College has access to various onsite and visiting educational specialists. Your permission for referral, testing or support will be sought where a teacher considers that your child would benefit from these services. You may also request support through the class teacher if you have a specific concern regarding your child's social, emotional or educational needs.

- An Educational Psychologist is available to support students in a range of areas.
- Learning Support Staff are engaged in designing programs of enrichment or learning support as required and working with students within classrooms and in small groups.

These specialists work in partnership with parents, classroom teachers, teacher aides and specialist agencies to ensure that we provide our students with a diverse, responsive and supportive College environment.



### MIDDLE SCHOOL SECONDARY CURRICULUM

Mansfield Secondary College's Year 10 curriculum represents a sequence of carefully planned and balanced learning experiences designed to meet the current and future needs of our students. All subjects are aligned with the Victorian Curriculum.

Students will participate in four core subjects; English, Mathematics, Science and Humanities, as well as Careers & Living, which runs for two periods every Wednesday. They will choose three other subjects from a range of electives that cover the areas of Health, Physical Education, Arts, Technology, Business, Science and LOTE (Indonesian) or they can also enrol in the two trans-disciplinary subjects; Agribusiness and Adventure Challenge.

#### WORK EXPERIENCE

All Year 10 students are expected to take part in Work Experience which is completed in a 'block' release, during which time there will be no Year 10 classes running at the campus. All students will undertake Occupational Health and Safety (OH&S) training. Two modules will be completed, and a certificate awarded in a generic module and a module specific to their chosen work experience industry area.

Students are required to find their own placements for Work Experience. Advice will be given to all students at the end of Year 9, to allow them time to make inquiries for the following year's work placement.

Work Experience is an invaluable component in the planning for students' future pathways, as it provides an opportunity for students to assess the suitability of various jobs and careers.



### CO-CURRICULAR ACTIVITIES

Mansfield Secondary College provides several different avenues for students to pursue interests outside of the formal classroom. The College provides a range of camps and leadership programs, such as:

- Year 7-10 Snowsports Program, term 3
- Year 7 Howqua Camp
- Year 8 Rubicon Camp
- Year 8 Surf Camp
- Year 9 School for Student Leadership Program
- Year 9 Humanities Beechworth & Melbourne Trips
- Year 9 and 10 Indonesian Melbourne Trip
- Year 9 and 10 Agribusiness Seymour Alternative Farming Expo
- Year 9 and 10 Adventure Challenge camps and day trips throughout the year
- Year 9 and 10 Philosophy Camp
- Year 11 and 12 Outdoor Education camps and day trips throughout the year
- Year 11 Kinglake Forest Adventure Camp
- Senior School Retreat Days
- Senior School Melbourne Careers Expo

We have embedded programs that utilize community partnerships to extend the learning environment and experiences beyond school grounds. Programs include:

- Australian School Based Apprenticeships (ASBA)
- Agribusiness program that has a farm placement component
- Year 10 Work Experience program
- Year 10 mock interviews with local employers

Our strong sporting tradition is supported by our involvement in:

- Mt Buller Annex Term 3
- Snowsports program Term 3
- Interschool Snowsports Competition Term 3
- Round Robic Sparts Term 1,2 & 3
- Interschool Sports throughout the year
- Adventure Challenge Outdoor & Environmental Studies (Years 11 & 12)





## CORE SUBJECT INFORMATION

### ENGLISH

**Prerequisites/Special Requirements (if any):** Nil

**Length of course:** Two semesters / 4 periods per week

**Brief Description / Outline:** In the Year 10 English course, students interact with peers, teachers, individuals, groups and community members in a range of face-to-face and online environments to create a range of imaginative, informative and persuasive types of texts including narratives, procedures, performances, reports, discussions, literary analyses, transformations of texts and reviews.

Students engage with a variety of texts for enjoyment and learning. They interpret, create, evaluate, discuss and perform a wide range of literary texts in which the primary purpose is aesthetic, as well as texts designed to inform and persuade. Students also develop critical understanding of the contemporary media, and the differences between media texts.

Compared to previous years, text structures are more complex including chapters, headings and subheadings, tables of contents, indexes and glossaries. Language features include successive complex sentences with embedded clauses, a high proportion of unfamiliar and technical vocabulary, figurative and rhetorical language, and dense information supported by various types of graphics and images. In order to ensure student engagement, the course and assessment tasks are differentiated to enable students of varying ability to engage with the curriculum.

**Brief Course and Assessment outline:**

	Course Outline	Assessment Summary
Semester 1	<ul style="list-style-type: none"><li>• Text Responses</li><li>• Presentation Skills</li><li>• Language Analysis</li></ul>	<ul style="list-style-type: none"><li>• Differentiated Text Response</li><li>• Coursework</li><li>• Oral Presentation</li><li>• Semester 1 Exam</li></ul>
Semester 2	<ul style="list-style-type: none"><li>• Text Studies</li><li>• Personal Responses</li><li>• Language Analysis</li></ul>	<ul style="list-style-type: none"><li>• Differentiated Text Response</li><li>• Coursework</li><li>• Oral Presentation</li><li>• Semester 2 Exam</li></ul>

**Future Pathways:** VCE English and VCE Literature



## MATHEMATICS

**Prerequisites/Special Requirements (if any):** Nil

**Length of course:** Two semesters / 4 periods per week

**Brief Description / Outline:** The Year 10 Mathematics program has been developed to take into account that different students develop at different rates and provides the skills and knowledge required for study of all VCE Mathematics subjects.

An extension class runs all year for those students planning to study General Maths and Mathematical Methods in Year 11 or who wish to study some extension topics.

All students not in the extension class study a common curriculum. At the beginning of a topic, students will sit a pre-test that will determine where they need to start in the topic. The worksheets, exercises and activities will be selected so that individuals will be working at their level. A post-test will determine the progress made by the student.

The appropriate use of calculators and technology is an important skill that is necessary in Mathematics. In Year 10 it is assumed that students have access to a scientific calculator. Students who plan to continue their Mathematics education in VCE are encouraged to purchase the TI-Nspire CAS CX calculator.

### **Brief Course and Assessment outline:**

CORE Mathematics:

	Course Outline	Assessment Summary
<b>Term 1</b>	Topic 1: Chance Topic 2: Pythagoras' Theorem	Pre & post tests
<b>Term 2</b>	Topic 3: Perimeter, Area & Volume Topic 4: Problem Solving Topic 5: Data	Pre & post test Assignment Assignment
<b>Term 3</b>	Topic 6: Linear Equations & Graphs Topic 7: Trigonometry Topic 8: Indices & Scientific Notation	Pre & post tests
<b>Term 4</b>	Topic 9: Financial Arithmetic Topic 10: Rates, Ratio & Similarity	Pre & post tests



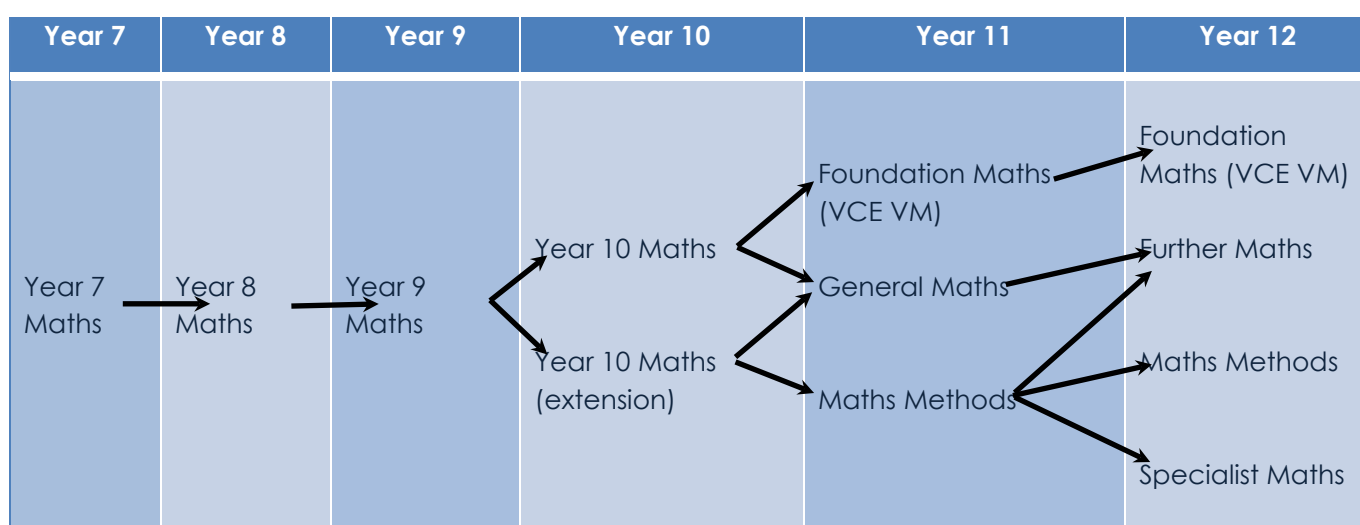
EXTENSION Mathematics:

	Course Outline	Assessment Summary
<b>Term 1</b>	Topic 1: Linear Equations & Graphs Topic 2: Trigonometry & Pythagoras	Test Test / Assignment
<b>Term 2</b>	Topic 3: Algebra Skills / Quadratics Topic 4: Problem Solving	Pre & post test Assignment
<b>Term 3</b>	Topic 5: Data Topic 6: Financial Arithmetic Topic 7: Indices & Surds / Exponential & Logarithms	Assignment Test Pre & post test
<b>Term 4</b>	Topic 8: Sets & Number Theory Topic 9: Chance	Test Test

**Homework Program:**

Weekly homework sheets are assigned in Year 10 that consolidate work covered in class as well as revising skills from past topics. The homework sheets are designed so that questions involve the same topic area every week (eg. Question 1 might always be about rounding decimals). Progress sheets indicate questions that are areas of concern and students are encouraged to seek help for these questions in class or at Maths Help.

**Future Pathways:**





## MATHEMATICS EXTENSION & SUPPORT

### Maths Help

Once a week, teachers volunteer their time to run Maths Help, a 1-hour session available to all students from Years 7 to 12. Students are encouraged to ask questions about work from class, get assistance with their weekly homework sheets or just use the productive environment to work on tasks.

### Australian Mathematics Competition

The AMC is for students of all standards and year levels and is conducted in Term 3. Students are asked to solve thirty problems in 75 minutes. The problems get progressively more difficult and the last few are challenging to the most gifted student.

The aims of the competition are threefold:

- To highlight the importance of mathematics as a curriculum subject
- To give students an opportunity to discover talent in mathematics, by applying their problem-solving skills
- To provide resources for the classroom and to stimulate discussion about methods of solution

### Mathematics Challenge for Young Australians

The Maths Challenge targets the top 20% of secondary students and Mansfield Secondary College has been involved in this problem-solving task for the last 15 years, with students achieving consistent excellent results. The Challenge (held during a consecutive 3-week period in Term 2) comprises six challenging problems.

The aims of the Challenge include:

- Encouraging students to attempt interesting and unfamiliar problems
- Fostering a greater interest in and awareness of the power of mathematics
- Allowing the discovery of the joy of solving problems in mathematics
- Identifying talented young Australians, recognising their achievements and providing support that will enable them to reach their own levels of excellence

### Australian Informatics Competition

Students who have achieved excellent results in the Australian Mathematics Competition can be invited to enter the Australian Informatics Competition. This involves a one-hour paper which is in multiple choice and short answer format. The questions involve some mathematical ideas related to computing and determine whether a student might have a talent for designing and writing programs. No experience in computer programming is necessary.

### Enrichment Program for Young Australians

The Enrichment Program, written and organised by the Australian Maths Trust, is a six-month program that commences in April. It comprises comprehensive student and teacher support notes. The materials are designed to be a systematic structured course over the duration of the program and which students are intended to keep for on-going reference.

The Enrichment Program is not run as a formal class but is available to interested students who wish to study areas of mathematics outside the normal curriculum.



## SCIENCE

**Prerequisites/Special Requirements (if any):** Nil

**Length of course:** Two semesters / 4 periods per week

**Brief Description / Outline:** Students undertake a range of studies in different scientific fields, these will include, biology, physics, chemistry, earth sciences and investigation. They will continue to learn to investigate scientific theories and practice through the use of investigation practicals and research. From Newtons laws of motion through to chemical equations and theories such as Darwinism and survival of the fittest students will be challenged and extend their scientific knowledge.

Assessment is based on key criteria and progression through these criteria can be tracked from year to year. Knowledge and skills are demonstrated across a range of differentiated tasks. These include: topic tests, practical logbook, scientific posters, extended investigations and oral presentations.

### Brief Course and Assessment outline:

	Course Outline	Assessment Summary
Topic 1	Chemistry (~9 weeks) Periodic table, reaction types & reactivity of metals.	<ul style="list-style-type: none"> <li>• Practical work</li> <li>• Topic tests</li> <li>• Project/research assignments</li> </ul>
Topic 2	Physics (~9 weeks) Newtons laws of motion and kinematics	
Topic 3	Genetics (~9 weeks) DNA and Evolution	
Topic 4	Research & Extended Practical Investigation (~8 weeks) Earth systems and the Universe. Experimental design and reporting.	

### Future Pathways:

Year 7	Year 8	Year 9 (1 term each)	Year 10 (1 term each)	VCE
All students complete the same course.	All students complete the same course.	Chemistry	Chemistry	Biology
		Biology	Physics	Chemistry
		Physics	Biology	Physics
		Ecology	Research & Investigation	Psychology



### SCIENCE – EXTENSION & ENRICHMENT

Mansfield Secondary College provides many opportunities for high achieving students to be extended and enriched. Students at each year level are identified using our data or through teacher recommendation.

#### **Big Science Competition**

This international competition tests critical thinking and problem-solving skills as well as science knowledge. The competition is organised by Australian Science Innovations, a not-for-profit organisation committed to providing high quality science extension programs that inspire, challenge and raise the aspirations of students in science. The results of this competition is often used to offer students other opportunities and residential programs and camps. Website: [Australia Science Innovations » Big Science Competition \(asi.edu.au\)](http://www.asi.edu.au)

#### **Emerging Sciences Victoria (ESV)**

ESV offers a 15 weeklong course in Semester 1 and a different 15 week long course in semester 2. Students are online for 2 x 1-hour classes per week and the content level is aimed at Year 10 students, but if you are passionate about science and not in Year 10 students may be eligible to participate. Examples of courses offered are astrophysics, biotechnology and nanotechnology. Website: <http://www.emsci.vic.edu.au/>

#### **Science Experience**

Available for Year 9 and 10 students, each program is designed to provide students who have an interest in science with an opportunity to engage in a wide range of fascinating science activities under the guidance of scientists who love their work. The program takes place in over thirty-five universities and tertiary institutions, within many different laboratories and lecture theatres. Participants perform experiments in the laboratories, meet and hear senior lecturers in the lecture theatres, attend site visits and walk around and experience what it is like to be on the campus of a university or tertiary institution. The program also provides information about further studies in science, technology and engineering. It highlights the wide range of careers that allow students to pursue their interest and abilities in the sciences. One aspect of the program often commented on by participants is the opportunity to meet and share ideas with students from different schools. Website: <http://www.scienceexperience.com.au/about-the-program/about-the-program>

#### **Quantum Science Victoria**

In Term 4 there will be an all-day excursion to Quantum Science Victoria where students will participate in a Forensic Science Investigation and immerse themselves in different aspects associated with a crime scene and the role undertaken by a forensic investigator/detective as they solve a crime.

#### **Australian Brain Bee Challenge**

The Australian Brain Bee Challenge (ABBC) is a competition for high school students in year 10 to learn about the brain and its functions, learn about neuroscience research, find out about careers in neuroscience and to dispel misconceptions about neurological and mental illnesses. Information is distributed in class. Website: [Australian Brain Bee Challenge - Australasian Neuroscience Society Inc \(ans.org.au\)](http://www.ans.org.au)



## HUMANITIES

**Prerequisites/Special Requirements (if any):** Nil

**Length of course:** Two semesters / 4 periods per week

**Brief Description / Outline:** The Year 10 Humanities program is based around History and Civics and Citizenship Victorian Curriculum and develops in students the skills required to enter into VCE History and Legal Studies. Semester 1 has a focus on the Modern World and Australia, while Semester 2 focuses on Australia's legal and governance systems. The course and assessment tasks are differentiated to enable students of varying ability to access the curriculum.

### History

Students sequence events and developments within a chronological framework and identify relationships between events across different places and periods of time. They locate and select historical sources and identify their origin, purpose and content features. They compare and contrast historical sources and evaluate their accuracy, usefulness and reliability.

### Civics and Citizenship

Students evaluate features of Australia's political system and identify and analyse people's electoral choices. They compare and evaluate the key features and values of systems of government. They explain the key principles of Australia's system of justice and analyse the role of Australia's court system.

### Brief Course and Assessment outline:

	Course Outline	Assessment Summary
Term 1	<ul style="list-style-type: none"> <li>• Rights and Freedoms (Indigenous studies)</li> <li>• World War 2</li> </ul>	2 differentiated assessment tasks
Term 2	<ul style="list-style-type: none"> <li>• World War 2 continued</li> <li>• Migration Experiences <u>or</u> Popular Culture</li> </ul>	A written report
Term 3	<ul style="list-style-type: none"> <li>• Laws and Citizens</li> </ul>	Community forum
Term 4	<ul style="list-style-type: none"> <li>• Government and Democracy</li> </ul>	Law changes report

**Future Pathways:** VCE History and Legal Studies



## ELECTIVE SUBJECT INFORMATION

### ADVENTURE CHALLENGE

**Prerequisites / Special Requirements (if any):** Application form

**Length of course:** Two semesters / 4 periods per week

**Brief Description / Outline:** In this unit, students participate in outdoor educational experiences, such as hiking and rock climbing at locations such as the Alpine National Park, Mount Samaria and Mount Arapiles. These experiences develop in students an understanding of sustainable and safe recreational practices while enjoying some of the best environments Victoria has to offer.

In Term 3, students participate in a community service program where they learn about the history and current work of Landcare Australia and complete practical field trips at a local Landcare site learning about land impacts and water quality

Students investigate the interaction of human activities with natural environments through a study of land degradation, the Australian Alps and the local area. Students develop skills to evaluate the factors contributing to the development of environmental issues in these areas and identify strategies to address them and explore ways of managing them. Students interpret information from different types of maps and photographs and use these facts to support explanations and make predictions. They collect information gathered from fieldwork and present their findings.

Adventure Challenge aims to build in students the following skills on top of what would normally be expected in Humanities classes –

- Teamwork when working with the CFA and participating in outdoor education activities
- Map reading
- Camp craft
- Survival skills and first aid
- An ability to use draw field sketches and use photography in reports
- Fieldtrip data gathering and using this information in student work
- Fieldtrip report writing
- Skills and knowledge for VCE Outdoor & Environmental Studies

**Entry into this unit is through a selection process involving the completion of an application form and questions.**





**Brief Course and Assessment outline:**

	Course Outline	Assessment Summary
<b>Term 1</b>	<ul style="list-style-type: none"> <li>• Navigation themes</li> <li>• Using the environment</li> <li>• Preparing for bushwalks</li> <li>• Minimal impact bushwalking</li> </ul>	<ul style="list-style-type: none"> <li>• An assessment task on understanding topographic maps</li> <li>• An assessment task on a fieldtrip</li> <li>• Classwork</li> <li>• Preparation for and participation in bushwalks</li> </ul>
<b>Term 2</b>	<ul style="list-style-type: none"> <li>• Participating in hikes</li> <li>• Land degradation/ cause and effect</li> <li>• Fieldtrips</li> <li>• Human interaction with the environment</li> </ul>	<ul style="list-style-type: none"> <li>• An assessment task on land degradation</li> <li>• Preparation for and participation in bushwalks</li> <li>• Assessment on 'User groups in the Alps '</li> <li>• Classwork</li> </ul>
<b>Term 3</b>	<ul style="list-style-type: none"> <li>• Community Service- Landcare- include a field trip to local Landcare project</li> <li>• Participation in cross country skiing on Mt Stirling</li> <li>•</li> </ul>	<ul style="list-style-type: none"> <li>• Multi-modal presentation on field trip data including land and water and rehabilitation planning.</li> </ul>
<b>Term 4</b>	<ul style="list-style-type: none"> <li>• Arapiles climbing camp</li> <li>• Eco tourism</li> </ul>	<ul style="list-style-type: none"> <li>• Classwork</li> <li>• Climbing camp</li> </ul>

**Cost Applicable**

**Materials:** Students must have a pair of sturdy hiking boots that can be used in snowy conditions, thermal underwear both top and bottom, water bottles, utensils, an exercise book and a laptop computer. A full range of hiking and climbing equipment can be borrowed from the College.

**Future Pathways:** VCE Outdoor and Environmental Studies, Units 1 – 4.



## AGRIBUSINESS

**Prerequisites/Special Requirements (if any):** Nil

**Length of course:** Two semesters / 8 periods per week

**Brief Description / Outline:** Agribusiness is a year-long course based on all aspects of agriculture. There is a large emphasis on students undertaking practical activities in agricultural settings and there are multiple excursions to expos, training days and a wide variety of farms.

Students complete TAFE modules of the Certificate 2 in Agriculture (RTO 3097 Wodonga TAFE) and combine this with tasks relating to Science and Humanities. The TAFE modules relating to the Certificate 2 in Agriculture require students to demonstrate the ability to work independently through extended activities and relate to Certificate II in Agriculture, Handling and Caring for Livestock and Workplace Skills.

For the Humanities component of this subject, the following skills and knowledge are covered:

Geography:

- i) the distinctive climates, soils, vegetation and productivity of our area
- ii) the environmental effects of food and fibre production
- iii) the capacity of our environment to sustainably and securely feed the projected future population

Economics:

- i) identifying the effects of international trade in consumer products on Australian practices
- ii) cost benefit analyses

During Semester 2, all students have work placement on a farm for 4 periods on a Thursday.

**Entry into this unit is through a selection process involving the completion of an application form and questions.**



## PHILOSOPHY

**Prerequisites/Special Requirements (if any):** Nil

**Length of course:** One semester / 4 periods per week

**Brief Description / Outline:** Philosophy provides students with a unique perspective to investigate some of life's most intriguing questions in the pursuit of wisdom.

*How can one live a good life? What makes someone a good person? Does God exist? Who am I? How did the universe begin? What happens when we die?*

The subject aims to answer these questions and more, through the use of reason, logic and the analysis of established scientific and philosophical thinking. In doing so, the course combines strands from various domains including English, Humanities, Science and Personal and Social Learning.

Philosophy provides an excellent pathway into the VCE Subject as well as general humanities subjects. Importantly, Philosophy equips students with an invaluable set of skills in a world that increasingly values confident, creative, and analytical thinkers.

### **Brief Course and Assessment outline:**

Course Outline	Assessment Summary
Introduction to Philosophy and philosophical thinking	Projects, essays, experiments
Research of famous philosophers and philosophical frameworks.	
Metaphysics: what exists and doesn't?	Essay
Personal Identity: what makes you who you are?	Digital Presentation
Ethics: what is it to be a good person?	Oral Presentation



### HEALTH AND PHYSICAL EDUCATION (HPE)

#### **Brief Description / Outline:**

Welcome to Year 9 and 10 Health and Physical Education (HPE)! This dynamic and comprehensive program is designed to empower students with the knowledge and skills necessary to make informed decisions about their physical and mental well-being. Classes are mixed with both Year 9 and Year 10 students, fostering an inclusive and collaborative learning environment.

#### **Physical Education Units**

**Striking Sports:** In this unit, students will explore various sports and activities that involve striking objects such as racquets, bats, and clubs. They will develop skills in sports like tennis, cricket, and golf while improving their hand-eye coordination and technique.

**Ball Sports:** This unit focuses on team-based ball sports, emphasizing the importance of teamwork, communication, and strategy. Students will engage in games like soccer, basketball, and volleyball, enhancing their understanding of these popular sports.

**Sports Leadership:** Leadership is an essential skill in sports and life. This unit will guide students in developing leadership qualities, teamwork, and effective communication within a sports context. They will learn to lead warm-ups, drills, and small-group activities.

**Personal Training and Fitness:** Students will gain a deeper understanding of personal fitness and well-being. They will explore concepts related to nutrition, exercise routines, and setting fitness goals. Practical workouts will be incorporated to promote physical fitness and a healthy lifestyle.

#### **Health Curriculum Topics**

**Sex Education:** This module provides age-appropriate information on sexual health, relationships, and consent. It aims to equip students with the knowledge to make informed decisions and promote healthy and respectful relationships.

**Health Dimensions:** Students will explore the various dimensions of health, including physical, mental, emotional, and social well-being. They will learn how these dimensions are interconnected and crucial for overall health.

**Health Status & Health Promotion:** This unit delves into understanding personal health status and strategies for health promotion. Students will explore factors influencing health, such as diet, exercise, and mental well-being, and learn how to make healthier choices.

**Risk Taking & Harm Minimisation:** Students will examine various risk-taking behaviors and their potential consequences. The focus is on developing decision-making skills to minimize harm and make responsible choices.

**Self-Awareness – Stress Management:** Building self-awareness is key to managing stress and maintaining mental health. Students will learn stress management techniques, mindfulness exercises, and strategies for improving emotional well-being.



**Respectful Relationships:** This module emphasizes the importance of respect, communication, and consent in relationships. It aims to foster healthy and respectful interactions among students, peers, and within the community.

**Driver Education:** Understanding safe driving practices and road safety is crucial for young adults. This unit provides essential knowledge and skills for responsible and safe driving.

**Assessment:** Assessment in Year 9 and 10 HPE will be based on participation, skill development, teamwork, leadership, and knowledge of health and fitness concepts. Students will have the chance to showcase their progress through practical assessments, presentations, and written assignments.

Year 9 and 10 HPE aims to create well-rounded individuals who are physically active, informed about their health, and equipped with the tools to navigate life's challenges. This program encourages active participation, critical thinking, and personal growth, setting a strong foundation for a healthy and fulfilling future.

All students must do PE throughout the year and select one class from the elective blocks each semester. Year 10 students can select **Intro to VCE PE and Health** in semester 1 as an alternative.



## INTRODUCTION TO VCE PHYSICAL EDUCATION / HEALTH

**Prerequisites/Special Requirements (if any):** This unit is only available to Year 10 students.

**Length of course:** One semester / 4 periods per week

### Brief Description / Outline:

This unit is highly recommended for any student intending to do Physical Education or Health in Year 11 & 12. Students will participate in a mix of theory and practical classes each week. Areas of study will include:

- Body systems and the effect of exercise on these systems.
- Motivation for participation in physical activity
- Skill development
- Coaching
- Adolescent health and development
- Adult health and development
- Healthcare and Careers in Health

**Assessment:** Completion of work requirements, including unit tests – application to skills development and practice exercises, completion of theory and/or project work and use of appropriate safety procedures.

### Brief Course and Assessment outline:

	Course Outline	Assessment Summary
1 <sup>st</sup> Term	<ul style="list-style-type: none"> <li>● Muscular and skeletal systems</li> <li>● Muscular contractions</li> <li>● Food fuels and energy systems</li> <li>● Health and human development</li> <li>● Youth health status</li> <li>● Nutrition</li> <li>● Global marketing</li> </ul>	<ul style="list-style-type: none"> <li>● Structure of bone laboratory</li> <li>● Gym circuit analysis</li> <li>● Volleyball analysis</li> <li>● Muscular and skeletal systems test</li> <li>● Analysis of energy systems during fitness tests</li> <li>● Food fuels and energy systems test</li> <li>● Class work / topic tests</li> </ul>
2 <sup>nd</sup> Term	<ul style="list-style-type: none"> <li>● Acute cardiovascular responses</li> <li>● Acute respiratory responses</li> <li>● Acute muscular responses</li> <li>● Chronic adaptations to exercise</li> <li>● Sustainable development goals</li> <li>● National health priority areas</li> <li>● Ottawa charter</li> <li>● Medicare and private health insurance</li> </ul>	<ul style="list-style-type: none"> <li>● Practical analysis of acute and chronic responses</li> <li>● End of unit exam</li> </ul>



## HEALTH & FIRST AID

**Prerequisites/Special Requirements (if any):** Nil

**Length of course:** One semester / 4 periods per week

**Brief Description / Outline:** The emphasis of the subject is based on First Aid and its application in an emergency and various settings. The health aspect of the subjects is focussed on students investigating and discussing issues relating to themselves, their development and safety within the community.

This is achieved through:

- Studying various organs and systems of the human body, how to keep them healthy, common conditions affecting them, and any relevant first aid.
- evaluating community programs addressing health and safety issues.
- developing personal decision-making skills, including alcohol and drug use.
- focus on healthy lifestyle practices, nutrition and healthy eating.

**Brief Course and Assessment outline:**

Course Outline	Assessment Summary
First Aid	Practical & theory
Injury & Illness	Research assignment
Health & Wellbeing	Practice & discussion

**Cost Applicable**



## INDONESIAN

**Prerequisites/Special Requirements (if any):** Nil

**Length of course:** Two semesters / 4 periods per week

**Brief Description / Outline:** Looking to learn even more about the culture and people of Indonesia? Interested in taking your knowledge of Indonesian to the next level? Year 10 Indonesian is an opportunity to work in small groups and really dive in deep to all aspects of Indonesia. By the end of the year, you'll be more confident speaking, writing and understanding Indonesian and ready for new challenges.

This is a subject for students who think they might like to study Indonesian at VCE or would just like to learn about Indonesian language, life and culture.

**Brief Course and Assessment outline:**

	Course Outline	Assessment Summary
<b>Semester 1</b>	<ul style="list-style-type: none"> <li>• Ceremonies and celebrations in Indonesia, both religious and secular</li> <li>• Student exchanges</li> </ul>	<ul style="list-style-type: none"> <li>• Weekly homework</li> <li>• Conversation about an event you are planning</li> <li>• Write a letter about going on exchange</li> <li>• End of term tests</li> </ul>
<b>Semester 2</b>	<ul style="list-style-type: none"> <li>• Health               <ul style="list-style-type: none"> <li>- going to the doctor, pharmacy, hospital...</li> <li>- the health system in Indonesia</li> </ul> </li> <li>• Films and pop culture</li> </ul>	<ul style="list-style-type: none"> <li>• Weekly homework</li> <li>• Role-play between a doctor and a patient</li> <li>• Writing portfolio based on film study</li> <li>• End of term tests</li> </ul>

**Future Pathways:** VCE Indonesian

## INDONESIAN EXTENSION

- Participate in on-line language learning activities and competitions.
- Sayembara Lisan speaking competition.
- Opportunity to go to Indonesia as an exchange student and/or host an Indonesian exchange student (this opportunity is also available in Year 11).





### 2D ART

**Prerequisites/Special Requirements (if any):** Nil

**Length of course:** One semester / 4 periods per week

**Brief Description / Outline:** Students explore a variety of media including painting, drawing, printmaking, collage, photography, and digital art forms. They are encouraged to explore a range of concepts and ideas and explore a range of techniques and processes. Students follow the artistic studio process followed by VCE level students, and this includes researching and investigating the work of other artists in contemporary and historical contexts. The use of a visual diary to record research, trials, notes, and evaluation plays a crucial role in the assessment of classwork, alongside final artworks.

**Assessment:** Folio of finished artworks, visual diary, research/analysis assignments.

**Future Pathways:** VCE Studio Arts (Units 1-4)

### 3D ART

**Prerequisites/Special Requirements (if any):** Nil

**Length of course:** One semester / 4 periods per week

**Brief Description / Outline:** Students investigate both the theoretical and practical aspects of 3D art throughout the semester building skills and knowledge. Students develop a deeper understanding of the Elements and Principals of art and how they are used to create work. Students focus on contemporary Visual Arts practices of other artists from Australia, Indigenous Australia and South-East Asia.

In the practical component of the unit students explore, develop, refine, reflect and create Artworks using a variety of 3D materials including ceramics, wire, wood, papier-mâché, found object and assemblage. These practical outcomes can be individual and collaborative.

Students use a digital platform as a journal to present ideas and record the development of their 3D practice.

**Assessment:** Digital folio, comparative essay, practical work.

**Cross-Curricular Outcomes:** Literacy, Numeracy.

**Future Pathways:** VCE Studio Arts (Units 1-4)



## MEDIA

**Prerequisites/Special Requirements (if any):** Nil

**Length of course:** One semester / 4 periods per week

**Brief Description / Outline:** This course emphasises knowledge and skills that will enable you to understand digital media communications in the twenty-first century and to use media effectively and responsibly. Through analysing the forms and messages of a variety of digital media works and audience responses to them, as well as creating your own digital media products, using Adobe Photoshop, Adobe Premier Pro and Audition, you will develop critical thinking skills, aesthetic and ethical judgment, and skills in viewing, listening, reading, interpreting, speaking, writing and representing in digital media formats.

### **Brief Course and Assessment outline:**

Course Outline	Assessment Summary
Images – topics include memes and photography	Production of memes and photographic series.
Sound – radio production and creating pod casts	Production of a radio show / podcast
Audio visual – Film, short film, script writing, filming, editing, and producing an "avant-garde short film".	Production of short film or music video



## VISUAL COMMUNICATION DESIGN (VCD)

**Prerequisites/Special Requirements (if any):** Nil

**Length of course:** One semester / 4 periods per week

**Brief Description / Outline:** Students complete a range of tasks relating to design briefs in the three design fields of communication design, industrial design & environmental design. Students use the design process to research, explore and develop ideas. They then respond to peer and teacher feedback to further refine their ideas and create high-quality presentations. Students explore a range of traditional and digital media to realise their ideas, whilst also considering the design elements and principles as ways to improve upon their designs. The exploration of case studies allows them to see and understand the way professional design is applied beyond formal education.

**Brief Course and Assessment outline:**

Assessment Tasks		
1.	Design Process, Design Elements & Principles, Using Adobe Illustrator	Design Process, Design Elements & Principles, Using Adobe Illustrator
2.	Technical Drawing - Isometric & Third-angle Orthogonal, Design Process, Rendering textures and surfaces.	Technical Drawing - Isometric & Third-angle Orthogonal, Design Process, Rendering textures and surfaces.
3.	Technical Drawing - Scale, Floor plans, Elevations, Industry conventions.	Technical Drawing - Scale, Floor plans, Elevations, Industry conventions.

**Future Pathways:** VCE Visual Communication Design (Units 1-4)



## DRAMA

**Prerequisites/Special Requirements (if any):** Nil

**Length of course:** One semester / 4 periods per week

**Brief Description / Outline:** In Years 9 and 10, Drama students continue to develop and apply their knowledge of Drama terminology and techniques, particularly Dramatic Elements. Eg. voice, movement, gesture, space, focus, language etc. Students will be required to research, explore, create and respond to various theatrical styles and/or cultural influences.

The foci for students are: the development and influences of theatre throughout the ages, scripting, playmaking, performance, reflection and evaluation, with emphases on participation, co-operation and contribution. Additionally, this course introduces “Non-Naturalism”, the style of acting used in the VCE Drama course.

### Brief Course and Assessment outline:

	Course Outline	Assessment Summary
Topic 1	The actor – “Tools of the Trade”: the body, breath, voice, & imagination	
Topic 2	History of theatre	Research and presentation task - ensemble
Topic 3	Comedic Theatre	Practical Task – individual creation and performance
Topic 4	Class Performance	Contribution to both playmaking and performance
Topic 5	Introduction to Non-Naturalism	Written comparison of Realism and Non-Naturalistic styles of acting.
	<ul style="list-style-type: none"> <li>• Maintained Drama diary – class notes and playmaking ideas</li> <li>• Written analysis following the completion of each performance task</li> </ul>	

**Future Pathways:** VCE Drama, VCE Theatre Studies.



## MUSIC

**Prerequisites/Special Requirements (if any):** Nil

**Length of course:** One semester / 4 periods per week

**Brief Description / Outline:** In this unit music students continue to build on their performance and technical skills with graded playing challenges. Students observe, evaluate and reflect on their own and other's performances. Theory and aural skills are further developed as a potential pathway to VCE. Development of aural skills, including chord progressions and rhythmic transcription are continued. Analysis of varying music forms and styles are studied, particularly within the genres of rock as well as the history of music. Students explore creative composition with simple arranging and improvisation techniques.

### Brief Course and Assessment outline:

	Course Outline	Assessment Summary
Topic	Performance and Technical skills	Practical performances
Topic	Theory and Aural skills	Sequential assessment tasks
Topic	Listening and analysis	Completed listening charts
Topic	Creative composition	Transcribed and performed

### Future Pathways:

Year 10	Year 11	Year 12
Year 10 Music (elective) Unit 1&2 VCE Music	Unit 1&2 VCE Music Unit 3&4 VCE Music	Unit 3&4 VCE Music



## MUSIC TECHNOLOGY

**Prerequisites/Special Requirements (if any):** Nil

**Length of course:** One semester / 4 periods per week

**Brief Description / Outline:** In this unit you will create compositions using Music Technology and learn about loops, tracks, sequencing and automation. You will continue to build on your playing and performance skills, choosing a main instrument on which to focus as you record music on Ableton. You will create original pieces of music using BandLab and Ableton that will require you to perform in both solo and group situations, as well as learn how to set up speakers and work a mixing desk and how to balance sound. Listening and aural skills make a great musician so we will practise these as well as increasing knowledge of music genres. You will continue to respond, analyse and evaluate your compositions as you composing music using a DAW. You will discuss the role of a music producer and music engineer in the workings of a recording studio. After completing this subject, you will be a more confident musician, producer and audio engineer, with a clearer idea of what is involved taking this subject as a digital pathway towards V.C.E.

### Future Pathways:

Year 10	Year 11	Year 12
Year 10 Music (elective)	Unit 1&2 VCE Music	Unit 3&4 VCE Music
Unit 1&2 VCE Music	Unit 3&4 VCE Music	



## CODING

**Prerequisites/Special Requirements (if any):** Nil

**Length of course:** One semester / 4 periods per week

**Brief Description / Outline:** Coding is an exciting brand-new subject in Information Technology. Students learn what it takes to make web applications through HTML, CSS and JavaScript. They investigate the world of app-making by learning how to get their apps onto the iTunes store and Google Play. Students become informed customers by understanding the components inside smartphones and laptops, and they investigate the latest advancements in technology from around the globe, including the people who have become billionaires through their technology ideas. Students find out how easy it is to make their own computer game and learn about the different types of computer viruses and how to protect their devices. Students who complete this subject will be well-prepared to jump into the world of digital technologies that awaits them!

### Brief Course and Assessment outline:

Course Outline	Assessment Summary
<ul style="list-style-type: none"><li>● Drag &amp; drop programming</li><li>● Modifying webpages</li><li>● HTML</li></ul>	<ul style="list-style-type: none"><li>● Research Assignments</li><li>● HTML modules</li><li>● HTML tests</li></ul>
<ul style="list-style-type: none"><li>● Computer components</li><li>● Emerging technologies</li><li>● HTML – CSS</li></ul>	
<ul style="list-style-type: none"><li>● Smartphones</li><li>● HTML – CSS - JavaScript</li></ul>	
<ul style="list-style-type: none"><li>● Python</li><li>● Apps</li><li>● Game maker</li></ul>	



## ROBOTICS

**Prerequisites/Special Requirements (if any):** Nil

**Length of course:** One Semester / 4 periods per week.

**Brief Description / Outline:** Robotics is a new subject within Technology. With STEAM education being a major focus within education it is important that you understand how advancements in robotics will influence the world. You will learn how to program robots to complete simple and complex tasks. You will learn to build various types of robots that will complete courses, play games and respond to their environments through the programming that you will learn. This may involve team competition style lessons where you will compete against other teams within the class to demonstrate your skills in building and programming your robot. The course starts from the basics and will be limited by your interest and ability to be creative within this exciting STEAM education class.

**Brief Course and Assessment outline:**

Course Outline	Assessment Summary
<ul style="list-style-type: none"><li>● Introduction to robotics</li><li>● Introduction to coding languages</li><li>● Introduction to building robots</li></ul>	<ul style="list-style-type: none"><li>● Research Assignments</li><li>● Coding demonstration</li><li>● Competition (demonstration of teamwork and coding proficiency)</li></ul>
<ul style="list-style-type: none"><li>● Robot components</li><li>● Development of skills in coding</li><li>● Drop drag through to coding language</li></ul>	
<ul style="list-style-type: none"><li>● Building, adjustment and coding of robots</li></ul>	
<ul style="list-style-type: none"><li>● Competing against other teams in the robotics</li></ul>	





## FOOD TECHNOLOGY A – Healthy Choices

**Prerequisites/Special Requirements (if any):** Nil

**Length of course:** One semester / 4 periods per week

**Brief Description / Outline:** This unit will enable students to learn a lot of helpful information about how to cook and eat well, as well as organize themselves in the kitchen. They will make healthy choices when planning for meals and find out how to put together great meals and snacks for friends and family. This will give students the opportunity to try spicy beef enchiladas, apple and filo parcels or making their own bread, as well as the opportunity to design and prepare their own creations.

**Brief Course and Assessment outline:**

	Course Outline	Assessment Summary
Topic 1	Exploring Food	Research
Topic 2	Healthy options	Design brief
Topic 3	Food for teenagers	Design brief, Practical observation
Topic 4	Hot topics	Portfolio



## FOOD TECHNOLOGY B – Foods of the World

**Prerequisites/Special Requirements (if any):** Nil

**Length of course:** One semester / 4 periods per week

**Brief Description / Outline:** This unit has a bit of an international flair to it. Students get to challenge their taste buds by preparing and tasting some foods they may not have tried before, as well as some old favourites. They will make meals originating from a variety of countries and design their own two-course meal from a particular country. As well as finding out great tips on setting themselves up in the kitchen and producing food efficiently, they will get an insight into how Australian Cuisine has been influenced by the world around us.

**Brief Course and Assessment outline:**

	Course Outline	Assessment Summary
Topic 1	Food hygiene & safety	Written tasks on food handling and physical contaminants
Topic 2	An International Cuisine	Travel Blog
Topic 3	Indigenous Cuisine	Practical observation, Portfolio
Topic 4	Food Fusion	Portfolio Task



## FOOD TECHNOLOGY C – Food for Celebrations

**Prerequisites/Special Requirements (if any):** Nil

**Length of course:** One semester / 4 periods per week

**Brief Description / Outline:** This unit explores food for celebrations – planning for and producing a variety of finger foods, snacks and dishes that could be provided at celebratory events. Think a birthday party, a family gathering and, of course, Christmas. Students will learn about what foods are used for celebrations in other countries around the world. They will also find out how to cook in larger quantities since they may need to feed a group of people, rather than just themselves.

**Brief Course and Assessment outline:**

	Course Outline	Assessment Summary
Topic 1	Environmental considerations when planning food celebrations	Practical observation
Topic 2	Dietary requirements for guests at celebrations	Design brief
Topic 3	International celebrations	Research project and presentation
Topic 4	Cooking for celebrations	Practical observation



## FOOD TECHNOLOGY D – Dietary Challenges

**Prerequisites/Special Requirements (if any):** Nil

**Length of course:** One semester / 4 periods per week

**Brief Description / Outline:** This unit is set up for students to use the knowledge and skills they have learnt over the past few years. Within this course we explore a range of dietary challenges that face members of our community, such as diabetes, dairy, nut and egg allergies. Students will explore suitable substitutes that will cater to their needs. Students' skills will be put to the test! They will learn how to perfect their kitchen organizational skills and continue applying their healthy eating knowledge.

### **Brief Course and Assessment outline:**

	Course Outline	Assessment Summary
Topic 1	Food hygiene & safety	Practical observation
Topic 2	Allergies and Intolerances	Portfolio
Topic 3	Menu Design	Design brief
Topic 4	Dietary Choices	Research assignment and presentation



## FOOD TECHNOLOGY E – Paddock to Plate

**Prerequisites/Special Requirements (if any):** Nil

**Length of course:** One semester / 4 periods per week

**Brief Description / Outline:** *Paddock To Plate* gives students the opportunity to study the interactions between agricultural production, marketing and management, and give consideration to the issue of sustainability of the farming system. Students will explore a variety of virtual video excursions to a broad range of industries and use this information to understand the importance of on farm management to maximise productivity and environmental sustainability. Students will delve into the production of beef, fish, eggs, honey, fruits, nuts, vegetables, milk and cereals and prepare and taste a wide variety of meals using such produce.

## WOOD TECHNOLOGY

**Prerequisites/Special Requirements (if any):** Nil

**Length of course:** One semester / 4 periods per week

**Brief Description / Outline:** This unit is an introduction to the design process as it applies to wood technology. Students gain the following skills and knowledge:

- design and research
- portfolio presentation
- use of appropriate technology language
- developing the varied techniques and finer skills needed to join and finish timber projects
- assess the safe use and skills needed for a variety of hand and power tools
- further develop the skills needed to design draw and cost out a project



## RULERS OF THE UNIVERSE (Astronomy)

**Prerequisites/Special Requirements (if any):** Nil

**Length of course:** One semester / 4 periods per week

**Brief Description / Outline:** This elective will provide young scientists with a unique opportunity to recreate some of the historical and current experiments and activities that have enabled us to determine our place in space and the nature of celestial objects in it such as stars and galaxies.

*How big is the Sun? How far away is the Moon? Where were you 4 years and 4 months ago? And what has this got to do with anything? Why are astronomers so interested in the light that comes from stars? Why do astronomers make these sorts of measurements? What types of 'rulers' do they have in their scientific toolbox?*

'Rulers of the Universe' aims to answer these questions and more, through participation in experimental activities based on the scientific method, questioning, reasoning and the use of logical thinking. In doing so, the elective combines strands from various domains including Science, Mathematics and English via communication and collaboration with similar young scientists from other schools.

This elective will provide and help reinforce many of the skills and thought processes required by VCE Science Subjects.

### Brief Course and Assessment outline:

Course Outline	Assessment Summary
Measuring distance and the scale of the universe and the objects in it.	Experimental activities, analysis tasks, research tasks and tests.
Using visible and non-visible light to unlock the structure and lifecycle of stars.	
Investigating the function and construction of optical tools as used by astronomers.	



## BUSINESS MANAGEMENT

**Prerequisites/Special Requirements (if any):** Nil

**Length of course:** One semester / 4 periods per week

**Brief Description / Outline:** Business Studies is a contemporary unit and is subject to ongoing change. The areas of study may vary in light of student interests, current affairs and events and trends that impact the business environment.

The key objective of this unit is to introduce students to a range of financial and business skills which lay the foundation for their successful participation in society as young adults. It introduces aspects of accounting, legal studies, business management and economics and allows students to gain initial awareness of these subject areas.

The course integrates the use of computers in key areas of reporting, analysing and researching information. Students develop skills in the use of spreadsheets as a financial tool and make extensive use of the internet in researching information and implementing decisions.

### **Curriculum Links:**

The Economics and Business curriculum aims to develop students':

- enterprising behaviours and capabilities that are transferable into life, work and business opportunities and contribute to the development and prosperity of individuals and society
- understanding of the ways society allocates limited resources to satisfy needs and wants, and how they participate in the economy as consumers, workers and producers
- understanding of the work and business environments within the Australian economy and its interactions and relationships with the global economy, in particular the Asia region
- reasoning and interpretation skills to apply economics and business concepts and theories to evaluate information they encounter, make informed decisions and use problem-solving skills to respond to economics and business issues and events
- understanding of economics and business decision-making and its role in creating a prosperous, sustainable and equitable economy for all Australians
- knowledge, understandings and skills that will enable them to participate actively and ethically in the local, national, regional and global economy as economically, financially and business-literate citizens.

### **Key Inquiry Questions:**

- What does innovation look like in our society?
- What is the essence to being a successful entrepreneur?
- How do economic events impact our society?
- What business ideas can students identify and produce "Shark Tank Style"



### Possible Areas of Study

#### **Innovation, Enterprise and Marketing**

Students develop an awareness of the skills and initiative required for business success.

Areas covered include:

- Types of business and types of activities including the development of detailed Business and Marketing plans to establish a start-up business.
- Approaches to innovation in a start-up business.
- Entrepreneurial skill development in commercial and social business settings.

#### **Economics**

Students explore the impact of economic events on financial decisions. Areas covered include:

- How resources are allocated in the global economy.
- Assessment of the impact of economic events on society.

Other areas include: accounting, business numeracy and finance, advertising and ethics (legal).

#### **Brief outline:**

Business Development	Students prepare the launch of a product or service using detailed business and marketing plans and a "Shark Tank" style presentation.
Tests and Quizzes	Tests/Quizzes are given at the end of most areas of study.
Peer Feedback	Students provide feedback on business ideas shared by other students using a rubric.





## ENVIRONMENTAL SCIENCE

**Prerequisites/Special Requirements (if any): Nil**

**Length of course:** One semester / 4 periods per week

**Brief Description / Outline:** This elective will provide students with an opportunity to participate in fieldwork and a science inquiry unit based in the Victorian High Country. Drawing on interdisciplinary science understanding, you will learn to think deeply about questions that do not always have a straightforward answer and participate in both practical and theoretical components. This will allow for a better comprehension of current and future environmental issues, varying perspectives and the interconnectedness of people and places across local and global systems.

In this unit you will have the opportunity to investigate environmental issues, explore theory related to resource and land management practices, gain practical surveying skills and work alongside local Landcare groups. You will employ a range of tools used by scientists and managers to discover how resources are acquired, used, cycled and lost within a landscape, examine the interconnectedness of environments and produce primary data through fieldwork. At its conclusion, you should have gained an understanding for how we manage our resources and the driving forces behind global warming, as well as how this is linked to our everyday lives.

This elective will reinforce skills and understanding required for VCE Science Subjects.

### **Brief Course and Assessment outline:**

Course Outline	Assessment Summary
Examine the way physical and biophysical resources are acquired, used, cycled and lost from landscapes, including fieldwork and collaboration with local Landcare groups	Primary fieldwork data, annotated fieldwork notes
The influence of land management practices on ecosystem function, including indigenous perspective	Report: Land Function Analysis
The influence of climate change on ecosystem function	



## THE SCIENCE OF HUMAN CONFLICT

**Prerequisites/Special Requirements (if any):** Nil

**Length of course:** One semester / 4 periods per week

**Brief Description / Outline:** Science of Human Conflict sees the students engaged in a number of topics of interdisciplinary studies. The students are investigating a range of scientific principles that relate to rocketry, medicine, flight, submarines, hot air balloons and nanotechnology. An extended investigation on The Manhattan Project is also completed, with the students researching and presenting their information to their peers.

This elective will, through experimentation and construction of functional models, provide students with a unique opportunity to apply their understanding of forces acting on objects and Newton's Laws of motion to help them understand the scientific principles governing flight.

Students will, participate in experimental activities and the construction and testing of hot air balloons, hand launched balsa wood gliders and a sugar-fuelled rocket. In doing so, the elective combines strands from various domains including Science, Mathematics, Engineering, History and English.

This elective will provide and help reinforce many of the skills and thought processes required by VCE Science Subjects.

### **Brief Course and Assessment outline:**

Course Outline	Assessment Summary
Investigate the nature and properties of the fluid (air) that aircraft have to manoeuvre through.	Experimental activities, analysis tasks, research tasks and tests.
Investigate balanced and unbalanced forces and their effect on an object's motion in the context of flight.	
Investigate the various means of propulsion available to aircraft - including rockets, in the context of energy efficiency.	
Investigate the energy released in chemical reactions for explosives and propellants.	
Investigate the biology of infections and treatment of wounds in the battlefield and the consequent advancement of medicine.	