

CURRICULUM GUIDE

YEAR 10



www.wbhs.co.nz

# Key Dates

## 2022

3 Wed Aug Subject Selection Evening 5:30pm - 7:30pm For students in Years 9 - 12 selecting 2023 subjects Senior staff, Head of Faculty staff, and Deans will be available to discuss subject selection with students and parents/caregivers Thu Aug Year 8 Open Evening 4:30pm - 7:00pm For students and parents/caregivers Tours will commence at 4:30pm, and the formal presentation will be from 6:00pm - 7:00pm Subject displays will be in the School Hall Fri 12 Final day for online subject selection via parent portal Aug for Years 10 - 13 students selecting 2023 subjects Wed - Thu 17 - 18 Year 8 Enrolment Interviews in the School Hall Aug Bookings are made through the School Office

## 2023

Tue - Thu	24 - 26	Jan	Years 9 – 13 Deans available for subject consultation for all returning students and new enrolments
Tue	31	Jan	First day of school, Y9 students and Y13 Prefects

### **USEFUL WEBSITES**

Career Central – www.careercentral.school.nz

**Vocational Pathways** – www.youthguarantee.net.nz

Careers New Zealand – www.careers.govt.nz

**Occupation Outlook app** – www.occupationoutlook.mbie.govt.nz

Just the Job - www.justthejob.co.nz

Student loans and allowances - www.studylink.govt.nz

Fees Free, Tertiary Education Committee – www.feesfree.govt.nz



### Year 10

# Information

In year 10, students study the compulsory subjects of English, Mathematics, Science, Social Studies, Health and Physical Education for the whole year. They also pick 6 option subject which run for half of the year.

#### **OPTION SUBJECTS:**

- Option subjects run for half of the year unless stated.
- Six option subjects are chosen.
- The selection must include at least one from Art, Drama, Junior Performing Arts and/or Photography and Design.
- The selection must include one of Design and Visual Communication, Digital Technology, Electronics, Food Technology, Materials Technology Metal, Materials Technology Wood, and/or Product Design.

#### Students may pick from:

- · Agriculture/Horticulture
- Art
- · Classical Studies
- Crunching Numbers
- Design and Visual Communication
- Digital Technology
- Drama
- Economics
- Electronics

- Enterprise
- Food Technology
- History
- Japanese
- Junior Māori Arts
- Junior Performing Arts
- Materials Technology Metal
- Materials Technology Wood

- Music
- Outdoor Education
- Photography and Design
- Product Design
- Spanish
- Sports Specific Training
- Te Reo Rangatira (full year)
- · Wealth by Stealth

There will also be a supported learning class with smaller numbers and consistent teaching across the compulsory classes. Students are placed in this class in consultation with whānau.

During subject selection, guidance is available from Whānau Teachers, Deans, Subject Teachers and the Careers staff at WBHS. Students are encouraged to take a broad range of subjects.

#### **NCEA Realignment**

Over the next few years, NCEA will transition from its current form into the new qualification. On the current time line, the new Te Reo Matatini me te Pāngarau | Literacy & Numeracy co-requisite is set to become a mandatory part of the qualification from 2023. It is a package of standards that sit outside of the 60 credits learners need for each

level of NCEA. These new standards assess learners on important foundational skills that will help them succeed in NCEA, further learning, life, and work.

To get the co-requisite, learners need to achieve the ten credits in:

- $\mathbf{a})$  either the Te Reo Matatini OR Literacy standards  $\mathbf{AND}$
- b) either the Pāngarau OR Numeracy standard

All learners will need to achieve the co-requisite in order to be awarded their NCEA qualification at any level. It can be achieved at any time from Year 9 – teachers will help learners to know when they are ready to be assessed against the standards and many students will have completed this by the end of Year 10.



### POINTS TO NOTE

### YEAR 9

Students study nine compulsory subjects and six option subjects. The selection must include at least one of Art, Drama, and/or Music.

### YEAR 10

Students study six compulsory subjects and six option subjects. The selection must include at least one of Art, Drama, Music, Junior Performing Arts and/or Photography and Design. The selection must also include one of Design & Visual Communication, Digital Technology, Electronics, Food Technology, Materials Technology Wood, and/or Product Design.

### YEAR 11

Mathematics and English are compulsory. Students study six subjects all year.

### **YEAR 12**

Students select six subjects and a spare. It is important to identify subjects that lead to the trades and those that prepare students for University Entrance. It is possible to repeat Level 1.

### **YEAR 13**

Students select five subjects and a spare. They may also select from Year 11 and 12 subjects.

# SUPPORTED LEARNING

Extra learning support in a safe environment for those who do not cope with the structure of secondary school.

- ✓ These subjects are compulsory
- \* Option subjects
- Approved subjects for University Entrance

Faculty	Year 9	Year 10
The Arts	* Art  * Drama  * Music	<ul> <li>Art</li> <li>Junior Performing Arts</li> <li>Drama</li> <li>Music</li> <li>Photography and Design</li> </ul>
Health, Physical Education and Outdoor Education	<ul> <li>✓ Health</li> <li>✓ Physical Education</li> <li>Cutdoor Education</li> <li>Sports Specific Training</li> </ul>	<ul> <li>✓ Health</li> <li>✓ Physical Education</li> <li><b>*</b> Outdoor Education</li> <li><b>*</b> Sports Specific Training</li> </ul>
Languages	<ul> <li>✓ English</li> <li>★ Japanese</li> <li>★ Junior Māori Arts</li> <li>★ Te Reo Māori ESOL</li> <li>★ Spanish</li> <li>✓ Te Reo Māori</li> </ul>	<ul> <li>✓ English</li> <li>★ Japanese</li> <li>★ Junior Māori Arts</li> <li>★ Te Reo Māori ESOL</li> <li>★ Spanish</li> </ul>
Mathematics	✓ Mathematics	✓ Mathematics
Sciences	<ul><li>★ Agriculture/Horticulture</li><li>✓ Science</li></ul>	<ul><li>★ Agriculture/Horticulture</li><li>✓ Science</li></ul>
Social Sciences	<ul> <li>✓ Social Studies</li> <li>★ Innovation Stations</li> <li>★ The World of Money</li> <li>★ Ancient Mythology</li> </ul>	✓ Social Studies  ★ Crunching Numbers  ★ Enterprise  ★ Economics  ★ Wealth by Stealth  ★ Classical Studies  ★ History
Technology	<ul> <li>Design &amp; Visual Communication</li> <li>Digital Technology</li> <li>✓ Materials Technology</li> <li>Food Technology</li> </ul>	Design & Visual Communication     Digital Technology     Electronics     Product Design     Materials Technology Metal     Materials Technology Wood  Food Technology



Year 11 - Level 1	Year 12 - Level 2	Year 13 - Level 3
Art Digital Art Drama Music	Art Design Art Painting Drama Music Photography	+ Art Design + Art Painting + Drama + Music + Photography
Health Physical Education Physical Well-being Outdoor Education Personal & Social Development	Health Physical Education Physical Well-being Outdoor Education Personal & Social Development Senior Rugby Academy	<ul> <li>Health</li> <li>Physical Education</li> <li>Physical Well-being</li> <li>Outdoor Education</li> <li>Personal &amp; Social Development</li> <li>Senior Rugby Academy</li> </ul>
English English Language & Communication Japanese Senior Māori Arts Te Reo Rangatira ESOL	English English Language & Communication Japanese Senior Māori Arts Te Reo Rangatira ESOL	<ul> <li>English         English Language &amp; Communication</li> <li>Japanese         Senior Māori Arts</li> <li>Te Reo Rangatira         ESOL</li> </ul>
Mathematics with Externals Mathematics with Internals Mathematics Numeracy	Mathematics with Externals  Mathematics with Internals	<ul> <li>Mathematics with Calculus</li> <li>Mathematics with Internals</li> <li>Mathematics with Statistics</li> </ul>
Agriculture/Horticulture Science External Science Primary Industries	Agriculture/Horticulture Science Biology Primary Industries Chemistry Physics Forestry	<ul> <li>Agriculture/Horticulture (FarNet)</li> <li>Science</li> <li>Biology</li> <li>Chemistry</li> <li>Physics</li> <li>Forestry</li> </ul>
Accounting Business Studies Economics Getting Work Ready  Classical Studies Geography History	Accounting Business Studies Economics Personal Financial Management Sales & Customer Service Tourism & Travel Classical Studies Geography History Psychology	<ul> <li>Accounting</li> <li>Business Studies</li> <li>Economics</li> <li>Personal Financial Management</li> <li>Sales &amp; Customer Service</li> <li>Tourism &amp; Travel</li> <li>Classical Studies</li> <li>Geography</li> <li>History</li> <li>Psychology</li> </ul>
Design & Visual Communication Digital Technology Electronic Products Product Design Advanced Engineering Advanced Woodwork Engineering Trade Academy Food Technology	Design & Visual Communication Digital Technology Electronic Products Product Design Pre-trade Engineering & Automotive Pre-trade Woodwork Engineering Trade Academy Food Technology	Design & Visual Communication     Digital Technology     Electronic Products     Product Design     Pre-trade Engineering & Automotive     Pre-trade Woodwork



### **VOCATIONAL PATHWAYS**



### **Creative, Cultural** & Recreational Industries

- Actor
- Advertising Executive
   Fashion Designer
   Publisher
- Animator
- Artist

- Copywriter

- Musician
- Photographer
- Graphic Designer
   Stage/Set Designer
  - Web Designer

# Health, Community & Social Industries

- Ambulance Officer
- Chiropractor
- Counsellor
- Dentist
- Doctor
- Educator
- Nurse
- Osteopath
- Pharmacist
- Physiotherapist
- Surgeon
- Social Worker

### **Services Industries**

- Aviation
- Baker
- Chef
- Customs Officer
- Bar ManagerFirefighter
  - Hairdresser
  - Hospitality Worker
     Travel Agent
- Cleaner
- Police Officer
- Retail Salesperson
- Hotel/Restaurant Manager

# **Primary Industries**

- Animal Attendant
- Beekeeping
- Dairy Farmer
- Ecologist
- Forestry
- Fishery Officer
- Horticultural Worker
   Winemaker
- Landscape Gardener
   Veterinarian
- Marine Biologist
- Microbiologist

### Construction & Infrastructure Industries

- Architect
- Builder
- Carpenter
- Driller
- Electrician
- Glazier
- Mining
- Planner
- Plumber
- Roading
- Roofing
- Surveyor

### Manufacturing, Engineering, **Logistics & Technology Industries**

- Automotive
- Boat Builder
- **CAD Operator**
- Designer
- **Truck Driver**
- Engineer
- Fabrication
- Machine Operator
- Photographer
- Fork-lift Operator
- Programmer
- Technician
- Telecommunications
- Website Developer



# Note: English and Mathematics are compulsory until NCEA Level 1. It is important to include English, Mathematics and Science for most career options.

- Drama
- Dance
- Māori Performing Arts
- Music

- Media Studies
- Art Design
- Art
- Photography
- DVC
- Science
- Digital Technology
- Physical Education
- Maths
- Biology
- Outdoor Education
- Sales & Customer Service

- Science
- Health
- Chemistry
- Maths

- Physics
- Biology
- Language
- Geography
- Social Studies
- History
- Psychology
- Economics

- Business Studies
- Economics
- Sales & Customer Service
- Accounting
- Geography
- Tourism
- Languages
- Digital Technology
- Science

Statistics

- Hospitality
- Psychology
- Food Technology

- Agriculture/ Horticulture
- Economics
- Science

- Chemistry
- Accounting
- Forestry
- Primary Industries
- Biology
- Business Studies

- Woodwork
- DVC
- Metalwork
- Maths

- Automotive
- Science
- Physics
- Chemistry
- Geography
- Sales & Customer Service
- Digital Technology
- Language
   Rich Subject
- Calculus

- Maths
- Sciences
- Metalwork
- Physics
- Chemistry
- Digital Technology
- Language Rich Subject
- Geography
- Automotive
- Woodwork
- Calculus
- Electronics



### **ARTS FACULTY**

### ART (10ART)

WHO ARE WE I AM ME

This course is designed to extend students in the area of visual arts, giving a strong foundation in drawing, painting, printmaking and mixed-media techniques. A range of exercises informed by contemporary New Zealand and International artists and their practice, will encourage students to explore personal creativity while addressing their personal, cultural and environmental identity.

**Duration:** One semester

**Entry requirement:** Although it is preferential to have done Year 9 Art, it is not essential.

**Cost:** Take home component \$10 **Contact person:** Mrs V. Luders

## PHOTOGRAPHY AND ART DESIGN (10 PAD)

**DOUBLE EXPOSURE** 

This course will introduce students to photography and photoshop foundation skills which will be a stepping stone for Year 11 PAD. Essential skills will be taught through a thematic approach combining photography and design.

**Duration:** One Semester

**Entry requirement:** Although it is preferential to have done Year 9 Art, it is not essential

Cost: Take home component \$10

Contact person: Mrs V. Luders

#### **DRAMA** (10DRA)

This course continues working on students' co-operative learning skills through group tasks. Students will become familiar with drama techniques, elements and conventions. They will be given the opportunity to show their understanding of these drama aspects through performance assessments.

Students will perform scenes from plays, learn about a variety of theatre styles, develop improvisation skills and have the opportunity to devise their own drama within a group.

**Duration:** One semester

**Entry requirement:** Willingness to perform in front of peers. Successful participation in year 9 Drama is preferred.

**Cost:** There will be further charges necessary to help pay for viewing live performances throughout the year.

Contact person: Ms F. Churcher

### MUSIC (10MUS)

This is an option subject that develops practical and theory components of music making. The course is based on playing instruments, creating music on digital audio workstations, music/ sound technology and developing music knowledge skills. Students are strongly encouraged to take advantage of the free itinerant music teaching programme to learn instruments such as trumpet, saxophone, keyboard, guitar, drums, flute and clarinet. Students who show advanced performance skills will be encouraged to attempt Level 1 performance achievement standards 91090 and 91091. This course leads to NCEA Level 1 Music.

**Duration:** One semester

Cost: A contribution towards field trips

may be required

Contact person: Ms V. Hill

### JUNIOR PERFORMING ARTS

(10JAR)

This course combines elements of drama, dance, music and performing arts technology to provide students who are multi-disciplinary in the performing arts with the opportunity to develop their skills. The course may lead to Performing Arts Technology, Drama and/or Music in the senior school.

**Duration:** One semester

**Entry requirement:** A keen interest in the performing arts and/or performing arts technology

**Cost:** A contribution towards viewing live performance may be required

Contact persons: Ms. V Hill or Ms. F Churcher

# HEALTH, PHYSICAL EDUCATION & OUTDOOR EDUCATION FACULTY

#### **HEALTH** (10HLT)

This course assists students and builds on the learning experiences of Year 9:

- Develop the knowledge, understandings, skills and attitudes needed to maintain and enhance personal health and physical development
- Develop understandings, skills and attitudes that enhance interactions and relationships with other people
- Participate in creating healthy communities and environments by taking responsible and critical action

**Duration:** Full year

Contact person: Mrs D. Cooper

### **OUTDOOR EDUCATION**

(100ED)

This course assists students in developing personal growth and technical skills within the outdoors. This course is designed to imbue students with a sense of leadership and the ability to work together as a team.

This course involves a variety of outdoor pursuits that include:

- Adventure based learning/ Problem solving and teamwork activities
- · Navigation/Orienteering
- · Bushcraft
- · Rope skills
- · First aid

**Duration:** One semester

Contact persons: Mr S. Huurnink & Mr J. Loft

### PHYSICAL EDUCATION

(10PE)

This course builds on the learning experiences of the Year 9 course with continued emphasis on participation in a range of physical activities aimed at Level V of the Health and Physical Education curriculum.

**Duration:** Full year

Contact person: Mr P. Tyslic

### SPORTS SPECIFIC TRAINING

(10SPT)

This course looks to develop young sportsmen by having a better understanding of how to be fitter, faster and stronger.

This course will cover:

- · Fitness testing
- · Speed training
- · Introduction to weight training
- · Sport coaching
- Principles of training

**Duration:** One semester **Contact person:** Ms S. Penney

# INCLUSIVE LEARNING EDUCATION FACULTY

### SUPPORTED LEARNING

(10T)

A Supported Learning class operates in Year 10 for boys who have learning challenges or who do not cope well with the structure of secondary school learning. This class gives students who need extra help to cope with the secondary school curriculum the maximum opportunity to find success. Students receive extra learning support and develop positive relationships with their teacher in a stable, secure learning environment.

**Contact persons:** Ms H. Ferguson & Mrs. L. du Preez



# LANGUAGES FACULTY

### **ENGLISH (10ENG)**

This compulsory course prepares students for the challenges of NCEA Level 1 English, including the Literacy Standards. Opportunities to develop reading, writing, presentation and oral skills are provided through two semester-based thematic units.

**Duration:** Full year

**Contact persons:** Mrs J. Morrison & Mrs K. Trimmer

### ESOL (10ESL)

This is a basic English language course for students with English as a second language. It covers reading, writing, listening, speaking and grammar skills. This course is designed to give students English communication skills and to increase their confidence in using English in everyday situations as well as in the classroom setting to access the New Zealand curriculum.

**Duration:** Full year

**Entry requirement:** Pre-entry test **Contact person:** Mrs J. Morrison

### **JAPANESE** (10JAP)

This course gives the student an opportunity to increase their language skills and learn more about the culture of Japan.

Topics covered are:

- Mastery of the Katakana syllabary and further development of the Kanji script
- · Family and occupations
- · Spare time activities
- · Weather and seasons
- Descriptions
- Cultural practices festivals, food and pop culture

**Duration:** One semester

Entry requirement: Year 9 Japanese or

HoF approval

Contact person: Ms R. Murphy

### JUNIOR MĀORI ARTS (10JMA)

This course provides a cross curricular theme of Kapahaka, Mau Rākau and Tikanga. It also creates a pathway to Senior Māori Visual and Performing Arts.

Topics covered are:

- · Mau Rākau
- Kapahaka
- · Tikanga and Kai Māori
- Mihimihi
- · Traditional games

**Duration:** One semester

Contact person: Matua Willie Cooper

### SPANISH (10SPA)

This course gives the student an opportunity to increase their language skills and learn more about the cultures of Spain and South America.

Topics covered are:

- · Likes and dislikes
- · Classroom language
- · Family and occupations
- · Spare time activities
- · Weather and seasons
- DescriptionsSpanish food

**Duration:** One semester **Contact person:** Ms A. Paul

### TE REO MĀORI (10TRM)

This course is for students with prior Te Reo Māori learning. It builds and extends on existing skills.

Topics covered include:

- Tāngata rongonui (A well-known personality)
- · Tōku ao (My world)
- · Nga pūrongo (event writing)
- · Nga hui Māori (Māori hui)
- · Mahi a rēhia (my interests)

**Duration:** Full year

**Entry requirement:** Year 9 Te Reo Māori or HoD approval

Contact person: Matua Willie Cooper

# MATHEMATICS FACULTY

#### **MATHEMATICS** (10MAT)

Year 10 Mathematics explores and develops the ideas and content from Levels 4, 5 and 6 of the New Zealand Mathematics Curriculum. Learning will occur within a variety of meaningful contexts to help develop the ability and inclination to use mathematics and statistics to solve problems. Results from this course will help to determine class placement in Year 11.

The topics taught in Year 10 are:

- Number
- · Algebra
- · Geometry
- Measurement
  - Statistics
- · Probability

**Duration:** Full year

**Equipment recommended:** Casio 9750 or 9860 Graphic calculator or an FX82 Calculator

Contact person: Mr R. Price

### **SCIENCE FACULTY**

### AGRICULTURE/ HORTICULTURE (10AHS)

Research and recording skills will be developed through project work and recording the results of practical work. An agricultural unit has been included in the course to stimulate interest in farming and other land-based industries.

The course structure will be:

- · Garden planning
- · Plant husbandry
- · Types & uses of plants
- · Soils plant propagation
- · Plant structure
- Agriculture
- Environment
- · Pests and diseases

**Duration:** One semester **Entry requirement:** Open entry **Contact person:** Mr D. Jennings

### **SCIENCE** (10SCI)

This course continues to develop the skills and processes that have been introduced at Year 9 through topics from the following strands:

- · The Living World
- · The Material World
- · The Physical World
- · Planet Earth and Beyond

**Duration:** Full year

Cost: Kiwi Science Competition approx.

\$10 (optional)

Contact person: Mr H. Dunckley

# SOCIAL SCIENCE FACULTY

### **SOCIAL STUDIES (10SOS)**

Social Studies is a broad subject that combines aspects of History, Geography, Psychology, and Economics. It examines the past, present, and future and encourages students to consider their place in the world and how they can be active, informed and socially conscious citizens.

Four major units of learning are covered:

- · Sustainability
- · Human Rights
- Ti Tiriti o Waitangi Responses
- · Game changers

Includes a field trip to Waitangi Treaty Grounds in Term 3 (dependant on funding and other factors).

**Duration:** Full year

Contact person: Ms L. Ross



### **CLASSICAL STUDIES (10CLS)**

Classical Studies is the study of the Greek and Roman civilisations and their art, history, culture, society, and literature. Topics covered include Greek gods and heroes, the Trojan War, the Roman Empire and army, and finally the buried city of Pomepeii.

**Duration:** One semester **Contact person:** Mr R. Burrows

### HISTORY: MYTH AND REALITY (10HIS)

This course is for anyone who is interested in learning about the history of New Zealand and the controversial events and myths in our past. Students will uncover the truth behind the events that have shaped our understanding of the past and how these have influenced our view of ourselves as Kiwis.

Topics include:

- Leading the world fact or fiction?
   Votes for women, the pension, nuclear-free, and gay marriage
- New Zealand at war and the price of citizenship
- The Springbok Tour rugby and racism at home

Key skills include understanding differing perspectives and researching using primary sources.

**Duration:** One semester **Contact person:** Mr R. Burrows

## WEALTH BY STEALTH (10WBS)

This project-based course establishes essential financial capability skills and will help students learn how to create their own wealth

In this subject students will create virtual investments in:

- · Property
- · The share market
- Businesses and other investment options

They will also learn how to:

- · Secure a Mortgage
- · Calculate Return on Investment

**Duration:** One semester **Contact person:** Ms K. Price

### CRUNCHING NUMBERS

(10CRN)

Sharpen your pencil and grab your calculator! This half year course exposes students to the financial wizardry of Business Accounting.

In this subject students will learn about:

- · Types of Business Ownership
- · The Accounting Equation
- Classifying Revenues and Expenses
- Creating Statements of Financial Position

**Duration:** One semester **Contact person:** Ms K. Price

### **ENTERPRISE** (10ENT)

This course promises to be an exciting half year where students develop their entrepreneurial capability, take the plunge and create their own business (with a group of classmates).

Some key content areas include:

- · Business Basics
- · Innovation and Entrepreneurship
- · Product development
- · Intellectual Property
- Marketing
- · Consumer Law
- · WBHS Dragon's Den

**Duration:** One semester **Contact person:** Ms K. Price

### **ECONOMICS** (10ECO)

Get the lowdown on how the economy actually works... What is the government up to when it decreases income tax or increases benefit payments? What role does business play? How do interest rates affect the amount households spend or businesses invest? And how do exchange rates change?

#### Learn about:

- Businesses how they make decisions about production
- Households the world of work and what households spend their money on
- Taxation who pays tax and is it fair... and what does the Government do with the money?
- Interest rates and exchange rates how they interact with saving and investment, exports and imports
- Booms and busts how does the Government keep control of our economy?

**Duration:** One semester **Contact person:** Ms K. Price

# TECHNOLOGY FACULTY

## **DESIGN & VISUAL COMMUNICATION** (10 DVC)

This course of study equips students to use a design process to create a unique solution. The Year 10 programme builds on the core skills learned in Year 9 and provides the essential skills and learning for success at Year 11. DVC seeks to enable students to communicate ideas clearly and precisely through:

- Freehand drawing and rendering techniques
- Developing aesthetic awareness in students

At Year 10 the programme centres on:

- How to develop and refine design ideas to a final outcome
- Multi-view drawing and sectioning
- Modelling
- · Perspective illustration
- CAD programmes; Google Sketchup and 2D Design

**Duration:** One semester

**Equipment required:** 2H and F pencils

and eraser

Contact person: Mr. D. De Weerd

## DIGITAL TECHNOLOGY (10DGT)

In this course the emphasis is on developing a broad range of skills in communicating information and ideas, and in accessing, planning, managing, and processing information. Successful completion of the course is a pre-requisite for entry into Level 1 Digital Technology in Year 11. All other applicants will be tested for entry to Year 11.

- Word processing letters, reports and articles - Word
- Spreadsheets budgeting and graphical presentation of data - Excel, formula
- Desktop publishing posters, flyers, newsletter design - Publisher
- Graphics photo editing, visual effects Adobe Photoshop, GIMP
- · Game programming Scratch
- Web design basic web page design -Adobe Dreamweaver, Notepad ++
- Presentations digital presentations PowerPoint
- Planning and creating a computer program - Python programming

**Duration:** One semester **Contact person:** Mr J. Clark



### **ELECTRONICS** (10ELE)

This is an introductory course for students interested in Electronics and Design.

The course is based around the study of the component theory, the investigation of circuit designs, and the building of practical electronic products.

Students will be taught:

- Soldering techniques
- · PCB production techniques
- · Component recognition
- · The theory of electronics
- PCB Design (including the use of CAD)
- · Circuit testing and fault finding
- · Robot building and programming

**Duration:** One semester

**Entry requirement:** At HoD discretion **Equipment required:** 2 Ltr container, A4 folder, file dividers, lined pad, and a USB flash drive

**Cost:** Take home component \$25 (approx.) **Contact person:** Mr J. Anderson

### FOOD TECHNOLOGY (10FOOD)

This course is open to all year 10 students. Increase your cookery skills and knowledge leading into Level 1. The course covers the following topic:

- · Affordable and healthy kai
- · Cuisine from around the world
- Shared vision; (Students learn to design, produce and develop their own food product for home.)
- Preserving Foods

**Duration:** One semester

Entry requirement: At HoD discretion Equipment required: Covered shoes Cost: Take home component TBC Contact person: Mr.T Hayman

### MATERIALS TECHNOLOGY WOOD (10TMW)

Students will learn about and implement the design process to solve a problem or need. Practical projects will be produced with each design project.

This semester based course, provides students with an introduction to working with wood and construction materials. Scaffolding learning opportunities and experience needed to make an informed choice regarding this subject at a senior level, and introduce the student to the possibilities of careers in Carpentry, Building and associated trades.

**Duration:** One semester

Entry requirement: At HoD or TiC

discretion

Cost: Take home component \$20 (approx.)

Contact person: Mrs. S Byrne

## MATERIALS TECHNOLOGY METAL (10TMM)

Students will develop skills and safety practices, using both hand, and machine tools. Practical projects will be produced with each design project.

This semester based course, provides students with an introduction to working with ferrous and non-ferrous materials. Scaffolding learning opportunities and experience needed to make an informed choice regarding this subject at a senior level, and introduce the student to the possibilities of careers in the Engineering, Automotive and the many associated trades.

**Duration:** One semester

**Entry requirement:** At HoD or TiC

discretion

Cost: Take home component \$20 (approx.)

Contact person: Mrs. S Byrne

### **PRODUCT DESIGN** (10PRD)

This course is designed to complement the Year 10 Electronics and DVC courses and build skills that will lead on to Year 11 Product Design.

The course will centre around three design and make projects, looking at a variety of materials and different design processes.

Students will learn to combine art, science and technology to design and create their products, utilising computer aided design and manufacture.

Product design will teach students to:

- Effectively communicate design ideas through freehand drawing and rendering techniques
- Develop these ideas through to a viable outcome
- Refine and communicate their final design ideas through the use of 2D and 3D computer software
- Recognise the properties and limitations of different types of resistant materials
- Construct their finished design to a high standard

**Duration:** One semester

Entry requirement: At HoD discretion

**Equipment required:** An A4 sketch pad, USB flash drive, pencils, coloured pencils, eraser, etc

**Cost:** Take home component \$20 (approx.) **Contact person:** Mr. D. De Weerd





# WHANGĀREI BOYS' HIGH SCHOOL

DEVELOPING BOYS INTO FINE MEN

### **CONTACT US**

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