**Sample Course Outline**

Food Science and Technology

General Year 11

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# Sample course outline

# Food Science and Technology – General Year 11

## Unit 1 – Food choices and health and Unit 2 – Food for communities

#### Semester 1

| **Week** | **Syllabus content** |
| --- | --- |
| 1–2 | **Laws and regulatory codes*** workplace regulations for safety and health
	+ protective clothing and footwear
	+ personal hygiene
	+ emergency procedures
* safe food handling practices
	+ safe storage of raw and processed foods
	+ prevention of cross contamination
	+ clean equipment

**Food products and processing systems*** produce food products using raw and processed foods
	+ select and safely use appropriate equipment, such as knives and hot surfaces
	+ demonstrate mise-en-place and precision cutting skills
	+ demonstrate safe food handling practices
 |
| 3–4 | **Food as a commodity*** classification of food
	+ animal
	+ plant
	+ raw
	+ processed

**Food products and processing systems*** investigate a raw and a processed food product
	+ use
	+ nutrition
	+ cost
	+ shelf life
* devise food products using raw and processed foods
	+ cost recipes

**Task 1: Test – Preparation practices**  |
| 5–6 | **Properties of food*** sensory properties that influence selection and use of raw and processed food
	+ appearance
	+ texture
	+ aroma
	+ flavour
	+ sound
* physical properties that influence selection and use of raw and processed food
	+ size
	+ shape
	+ colour
	+ volume
	+ viscosity
 |

| **Week** | **Syllabus content** |
| --- | --- |
|  | * effects of processing techniques on sensory and physical properties of food
	+ change in appearance
	+ change in texture
	+ change in flavour

**Food products and processing systems*** evaluate food products developed from raw and processed foods
	+ sensory properties
 |
| 7–8 | **Food as a commodity*** economic and environmental considerations when purchasing locally produced commodities
	+ food availability
	+ cost
	+ ‘food miles’
	+ packaging
	+ waste

**Food issues*** environmental issues that arise from food and lifestyle choices
	+ food availability
	+ ‘food miles’
	+ packaging
	+ recycling and waste

**Food products and processing systems*** devise food products using raw and processed foods
	+ organise food orders and production plans
* produce food products using raw and processed foods
	+ demonstrate teamwork skills, such as communication and collaboration
	+ present safe, quality, palatable food
* evaluate food products developed from raw and processed foods
	+ the effectiveness of skills, practices or processes
	+ use of relevant terminology

**Task 2: Celebrate local foods** |
| 9–10 | **Nutrition*** food sources and functions of nutrients and water in the body
	+ protein
	+ carbohydrates
	+ vitamins
	+ minerals
	+ lipids
* importance of a balanced diet and the consumption of a wide variety of foods for health

**Food products and processing systems*** devise food products using raw and processed foods
	+ adapt recipes to suit a purpose
 |
| 11–12 | **Food issues*** factors that influence food choices
	+ cost
	+ food availability
	+ family characteristics
	+ peer group
	+ nutritional value

**Nutrition*** use of food selection models and guides to evaluate diets
	+ *Healthy Eating Pyramid (Nutrition Australia May 2015)*
	+ *The Australian Guide to Healthy Eating*
	+ *Australian Dietary Guidelines*

**Food products and processing systems*** devise food products using raw and processed foods
	+ interpret recipes

**Task 3: Food choices** |
| 13–14 | **Nutrition*** nutritional requirements of adolescents
	+ protein
	+ calcium
	+ iron

**Food products and processing systems*** devise food products using raw and processed foods
	+ adapt recipes to suit a purpose
* produce food products using raw and processed foods
	+ measure ingredients using Australian Standard metric measurement
	+ demonstrate various methods of cooking

**Laws and regulatory codes*** Australian food labelling requirements
	+ nutrition information panel
	+ percentage labelling
	+ name and/or description of the food
	+ food recall information
	+ information for allergy sufferers
	+ date marking
	+ ingredients list
	+ country of origin
	+ barcode
	+ weights and measures
 |
| 15–16 | **Food issues*** influences on adolescent food choices
	+ use of celebrities, media practices, including music, body image, colour, fonts and graphics, and food styling techniques to market food products
	+ advertising
	+ marketing

**Task 4: A food advertisement** |

#### Semester 2

| **Week** | **Syllabus content** |
| --- | --- |
| 1 | **Food as a commodity*** staple food commodities readily available in Australia
* factors that affect the supply of staple food
	+ food availability
	+ cost
	+ climate or seasons
	+ natural disasters

**Food products and processing systems*** investigate staple food products
	+ use
	+ nutrition
	+ cost
	+ shelf life
 |
| 2–3 | **Food as a commodity*** primary and secondary processes used to convert raw commodities into safe, quality food products

**Properties of food*** sensory properties that influence selection and use of staple food
	+ appearance
	+ texture
	+ aroma
	+ flavour
	+ sound
* physical properties that influence selection and use of staple food
	+ size
	+ shape
	+ colour
	+ volume
	+ viscosity

**Task 5: Staple food commodities** |
| 4–5 | **Properties of food*** the effect of processing techniques on the sensory and physical properties of food
	+ dry processing techniques

**Food products and processing systems*** produce food products using staple foods
	+ measure ingredients using Australian Standard metric measurement
	+ demonstrate safe food handling practices
	+ demonstrate dry processing techniques
* evaluate food products developed from staple foods
	+ product’s sensory properties

**Task 6: The big bake-off** |
| 6–7 | **Properties of food*** the effect of processing techniques on the sensory and physical properties of food
	+ wet processing techniques

**Food products and processing systems*** produce food products using staple foods
	+ select and safely use appropriate equipment
	+ demonstrate mise-en-place and precision cutting skills
	+ demonstrate wet processing techniques
* evaluate food products developed from staple foods
	+ effective use of skills, practices or processes
 |
| 8 | **Nutrition*** food sources and role of macronutrients and water for health
	+ protein: complete and incomplete
	+ carbohydrates: starches, sugars, and fibre or cellulose
	+ lipids: saturated fats and oils, and unsaturated fats and oils
* macronutrient requirements depending on age and lifestyle
	+ protein
	+ carbohydrates
	+ lipids
 |
| 9–10 | **Food issues*** health issues that arise from food choices
	+ malnutrition
	+ underweight
	+ overweight
	+ allergies
	+ intolerances

**Nutrition*** nutrition-related health conditions and the need for specialised diets
	+ coeliac
	+ lactose intolerance
* use of the *Australian Dietary Guidelines* to evaluate food choices

**Food products and processing systems*** devise food products using staple foods
	+ adapt recipes to suit a purpose

**Task 7: Test – Health issues** |
| 11 | **Properties of food*** the effect of processing techniques on the sensory and physical properties of food
	+ microwave cooking

**Food products and processing systems*** produce food products using staple foods
	+ demonstrate microwave cooking
* evaluate food products developed from staple foods
	+ product’s sensory properties
 |
| 12–13 | **Food products and processing systems*** devise food products using staple foods
	+ cost recipes
* produce food products using staple foods
	+ present safe, quality, palatable food
* evaluate food products developed from staple foods
	+ use of relevant terminology

**Laws and regulatory codes*** labelling requirements for food and beverage products available in Australia
	+ nutrition information panel
	+ percentage labelling
	+ name and/or description of the food
	+ food recall information
	+ information for allergy sufferers
	+ date marking
	+ ingredients list
	+ country of origin
	+ barcode
	+ weights and measures

**Task 8: A healthy food product** |
| 14 | **Food issues*** ethical influences on food choices, such as animal welfare, fair trade, resource use and country of origin

**Nutrition*** reasons for vegetarian or vegan diets
	+ health
	+ ethical values
	+ cultural
	+ economic cost
 |
| 15–16 | **Laws and regulatory codes*** workplace regulations for safety and health
	+ protective clothing and footwear
	+ signage for procedures and hazards
	+ safe posture, including lifting, bending and standing
	+ emergency procedures
* safe food handling practices
	+ safe storage and thawing of raw and processed foods
	+ prevention of cross contamination
	+ clean equipment and work surfaces

**Food products and processing systems*** devise food products using staple foods
	+ interpret recipes
	+ organise food orders and production plans
* produce food products using staple foods
	+ demonstrate teamwork skills, such as planning and problem solving
	+ present safe, quality, palatable food
* evaluate food products developed from staple foods
	+ effective use of skills, practices or processes
	+ use of relevant terminology
 |