

## **Key Stage 1 and 2**

https://assets.publishing.service.gov.uk/government/uploads/system/uploads/attachment\_data/file/425601/PRIMARY\_national\_curriculum.pdf

**Key Substantive Knowledge Carried Forward (subject knowledge)** 

### Aims of study

#### KS1

- Use the basic principles of a healthy and varied diet to prepare dishes.
- Understand where food comes from

### KS2

- Understand and apply the principles of a healthy and varied diet.
- Prepare and cook a variety of predominantly savoury dishes using a range of cooking techniques.
- Understand seasonality and know where and how a variety of ingredients are grown, reared, caught and processed.

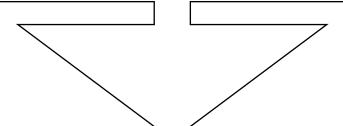
Key Disciplinary Knowledge Carried Forward (methods/framework to establish knowledge)

### KS3

Pupils will be taught how to cook and understand the principles of nutrition, health and the importance of healthy eating. They will learn how to cook a variety of different recipes predominantly savoury, that enable pupils to feed themselves and others affordably now and in later life.

They will become competent in a range of cooking techniques, selecting and preparing ingredients as well as the correct use of utensils and electrical equipment. They will be aware of how heat can be applied in different ways and use an awareness of taste, texture and smell to decide how to season dishes and combine ingredients. This will include adaptations using their own recipes.

They will understand food provenance, seasonality and the characteristics of a broad range of ingredients.



Unit Title	Hygiene and Safety	Basic Kitchen Equipment and procedures for washing up	Eatwell Guide	8 Dietary Guidelines  Don't skip Breakfast	Food Provenance food miles and waste	Seasonality
Composite Knowledge/End Point (big idea that should be answered at the end of a unit)	Identifying risks within a kitchen environment  What is cross contamination with examples?	Identify a variety of kitchen equipment and tools for food preparation and cooking.  Identifying the correct equipment and procedures to follow for the washing and cooking of food.	Identity all five sections of the Eatwell Guide.  Gain an understanding of the five main food groups.  Identifying food sources and nutritional value	Why Breakfast is known as the most important meal of the day.	Explain what food miles are and the impact on the environment.  How food waste and packaging can be reduced to show the overall impact on the environment.	Identify seasonal foods including fruit and vegetables.  Recognise the months in each season.
Examples of Key Substantive Knowledge (specific subject knowledge relied upon for later study or to grasp the composite idea for that unit)	Understanding personal hygiene, cross contamination and bacteria  The 4C's of food safety	An understanding of appropriate tools and equipment to prepare a variety of nutritional predominantly savoury dishes.  Correct identification of basic cleaning equipment and utensils	Identifying food sources and their nutritional value  Functions of nutrients-carbohydrates are for energy.  Protein is for growth and repair of muscles. Fibre is for good digestion.  Calcium is for strong bones and teeth.	Introduction to macro and micronutrients  Starchy carbohydrates are required for energy and contain high amounts of fibre needed for good digestion and to keep you fuller throughout the day.	The impact that food miles and food waste have on the environment.  Food production and cost has an impact on the environment.  The 3R's of food waste and packaging. Recycle, reuse and refuse.	Food is seasonal throughout the year however imported foods can be used all year round.  Seasonal food is more nutritional and benefits the local economy.
Examples of Key Disciplinary Knowledge (methods/framework to establish knowledge)	Prepare dishes using the correct chopping boards, correct knife skills with high regards to personal hygiene	The use of a measuring jug and weighing scales to accurately identify measurements required for cooking.  30 minutes washing up task at home with peers	Menu Planning for pack lunch, school canteen pasta salad and teenagers' pasta bake. Practical based elements	Creation of a leaflet to Identify the key nutrients and their functions needed to start the day.	Identify the food miles of a variety of fruits from around the world.  Suggestions of how consumers can improve their carbon footprint when preparing,	Seasonal menu planning for a local restaurant.  Practical elements

		Identify key terminology and words for the sequencing of washing up from start to finish			cooking and purchasing food.  Practical elements	
Examples of Reading Opportunity	Work booklet Powerpoints Recipe cards	Work booklet Powerpoints Word search Washing up sequence Recipe cards	Work booklet Powerpoints NHS website Recipe cards Wider reading task	Work booklet Powerpoints Recipe cards	Work booklet Recipe cards	Work booklet Recipe cards Research
Examples of Key Tier 2 Vocabulary	Describe Annotate Food Terminology	Identify Describe Food Terminology Usage	Identify Describe Discuss Explain Design	Describe Discuss Evaluate Create	Research Discuss Evaluate Explain	Research Describe Discuss Evaluate
Examples of Key Tier 3 Vocabulary	Cross contamination Food poisoning Bacteria	Bacteria Cross contamination Hygiene Chemicals	Nutritious Carbohydrates Digestion Fibre Protein Minerals Calcium	Nutritious Starchy carbohydrates Digestion Fibre Protein Minerals Calcium	Environment Carbon footprint Food provenance Sustainability Packaging Biodegradable Conserving Decompose	Organic Pesticides Environmental Origin Nutritional
Examples of Numeracy	Weight, mass and ratio in food practical's	Weighing and measuring in a food practical of liquid and dried ingredients Ratio of chemicals	Proportions and percentages  Weighing and measuring in a food practical of liquid and dried ingredients	Proportions and percentages  Weighing and measuring	Calculation of food miles for a fruit salad  Weighing and measuring in a food practical of liquid and dried ingredients	Weighing and measuring in a food practical of liquid and dried ingredients

Unit Title	Hygiene and Safety and Methods of cooking	Healthy Eating and Macronutrients	Eat less Fat, salt and sugar	Micronutrients	Functions of Ingredients
Composite Knowledge/End Point (big idea that should be answered at the end of a unit)	What would happen if health and safety rules are not followed.  How a variety of conduction, convection and radiation can be applied when cooking	Importance of healthy eating and an understanding of the eight dietary guidelines  Functions and sources of macronutrients	Diet related health issues of a diet high in fat, salt and sugar.  Fibre is needed for the digestive system.  Why Water is vita I in the diet and regulates	Why are Micronutrients required.  Sources of Vitamins and minerals	The functions and commodities required when making bread.  Gluten is a property found in flour
Examples of Key Substantive Knowledge (specific subject knowledge relied upon for later study or to grasp the composite idea for that unit)	Bacteria can be transferred from one source to another. Identify and explaining why food safety and hygiene rules are needed within food technology.  What items of food can be cooked with different methods of heat transfer	What is required for a healthy diet and the function of nutrients and their food sources.	our body  Saturated fat is associated with coronary heart disease. Functions of fat and identifying food sources.  Government guidelines with the reference and intake values of salt and sugar per day.  Prevention of diseases from a diet poor in fibre  How water is regulated for the body	Micronutrients are needed for a healthy immune system.  Recognising food sources and values of Vitamins and minerals	The conditions needed for yeast bacteria to grow.

Examples of Key Disciplinary Knowledge (methods/framework to establish knowledge)	Identifying food safety rules and matching the correct explanation  Identifying wet methods, dry methods and fried method with regards to heat transfer.  Through demonstration in practical lessons	Cook at variety of sweet and savoury dishes based around the eight dietary guidelines.	Cook a variety of sweet and savoury dishes.  Identify key nutrients on food and drinks labels.  Discuss and identify drinks that are high in sugar then analyse them from 1-11.  Understanding how the 8 dietary guidelines have an impact in our day-to-day living.	Identify vitamins, minerals and their food sources.  Nutrient reference in food practical's	By producing a bread-based pizza.  Understanding the importance of kneading the dough.  How the gluten allows the pizza base to stretch.  Application of how ingredients work when bread making through a practical lesson.
Examples of Reading Opportunity	Work booklet PowerPoint Recipe cards Videos	Work booklet PowerPoint Recipe cards NHS website	Visual Aid Booklet Powerpoint Recipe cards Food packaging labels	Powerpoints Booklets Recipe cards Food packaging labels Vitamin Match up cards CGP revision textbook	Powerpoints Booklets Recipe cards
Examples of Key Tier 2 Vocabulary	Identify Explain Describe	Identify Explain Recognise Research Evaluate Suggest	Identify Discuss Evaluate Complete Explore Analyse	Identify Evaluate Discuss Explain Intake	Function Proving Relaxing Bacteria
Examples of Key Tier 3 Vocabulary	Cross contamination Hygiene Bacteria Conduction Convection Radiation	Alternatives improvements Government Nutrition	Macronutrients Atherosclerosis Diverticulitis Haemorrhoids Digestion Arteries Hydration	Deficiency Anaemia Scurvy Osteoporosis Benefits Prevention	Chemical reaction Characteristics Functional Properties Fermentation

Unit Title	Hygiene and Safety	Bacteria Pathogens	Food Commodities Macro Nutrients	Food Commodities Micro Nutrients	Factors influencing food choices	Food commodities
Composite Knowledge/End Point (big idea that should be answered at the end of a unit)	Importance of following hygiene and safety rules to prevent food poisoning.	Conditions for Bacterial growth  How bacteria multiply	Nutrients in the diet and why we require them for a healthy lifestyle	Minerals and trace elements required in the body	How the diversity of multicultural foods has influenced the UK with food choice.  Factors that affect food choice  Dietary needs of different life stages Factors  What needs to be displayed on a food label by law.	Primary processing and structure of wheat
Examples of Key Substantive Knowledge (specific subject knowledge relied upon for later study or to grasp the composite idea for that unit)	Understanding the four "C's" of food safety to prevent food poisoning. Cleaning Cooking Chilling Cross contamination	Conditions for growth of bacteria - Food temperature zones Causes of food poisoning.  Personal hygiene rules Symptoms of food poisoning  High risk and low risk food sources  Rules for food hygiene and fridge storage	Function of Fat Saturated and unsaturated fats. Food sources of saturated fats Unsaturated Fats Monounsaturated fats- Essential fatty acids Reducing fat in diet  Key functions of flour whilst preparing a variety of savoury and sweet products eg bread making.	The function of micronutrients vitamins needed in smaller amounts.  Food sources in the diet Recognising minerals and uses within the diet and deficiencies.	Factors affecting food choices. Personal, social and economic factors.  Religious and cultural beliefs  Different nutritional needs throughout life stages.	Wheat is the primary process to flour  Wheat grains have different parts extracted to form different flour types  Conditions needed for fermentation of bread and what can effect this

			How carbohydrates (flour) works within the structure of a dish.  Understanding the functional characteristics of a variety of flours and how they are used.  To be able to analyse using sensory analysis the taste, texture, appearance and aroma of variety of biscuits using different flour types.			
Examples of Key Disciplinary Knowledge (methods/framework to establish knowledge)	Explaining the rules and sources of food safety	Explaining how bacteria multiply every 20 minutes through a diagram.  Discussing with examples after matching up physical, chemical and bacterial sources of bacteria  Identifying key temperatures on a thermometer of bacterial growth.	Produce a variety of dishes using flour-based commodities to understand their functional properties.  Conduct a biscuit investigation using a variety of different flour types to see how it effects the outcome of the final dish.  The use of sensory analysis to evaluate the final outcomes using a star profile.	Discussing, explaining and completing a nutrient table.  Matching up cards of nutrients, functions and food sources.	Identify a variety of food labels to see if they are following government guidelines to display all information required.  How the nutritional content and origin of a food label can contribute to a healthy lifestyle and energy balance.  Recognise how multicultural foods play a vital part when	Identifying multicultural bread types and their origin  Annotating the structure of a wheat grain  Explanation of conditions needed for bread making through practical  Sequencing pictures and illustrations of the

		Annotating the correct shelf storage for food sources	Extended writing of what happens if we have an excess of these nutrients and why its important to get nutrients from starchy food sources.		purchasing, making and producing dishes within our daily lives.  Analysing and identifying branded vs non branded foods through taste testing	different stages to bread making
			Completing a pie chart of the daily percentages of each macro nutrient		Researching foods from around the world and create a newspaper article discussing cultural influences, cooking methods and flavours. Researching a country of choice and producing a food dish based on this research	
Examples of Reading Opportunity		Wider reading task Powerpoint Booklets Bacteria match up cards	Powerpoints Booklets Recipe cards CGP text books	Powerpoints Booklets Recipe cards CGP text books Minion match up cards	Powerpoints Recipe cards Booklets Internet research Wider reading task Food labels	Recipe cards Powerpoint Booklets
Examples of Key Tier 2 Vocabulary	Describe Explain Discuss Temperature hygiene	Describe Annotate Sources Discuss Temperatures	Discuss Describe Annotate Explain Function	Discuss Sources Explain Evaluate Function	Discuss Describe Evaluate Research Analyse	Discuss Identify Describe Explain Annotate
Examples of Key Tier 3 Vocabulary	Salmonella listeria E coli Contaminants	Binary Fission Danger zone Ambient Optimum Poultry E coli Contaminants	Commodities Amino acids Protein complementation Monounsaturated Polyunsaturated Deficiencies Aroma	Deficiencies Prevention Anaemia Rickets Osteoporosis	Ethical Moral Social Coeliac Lactose	Fermentation Extraction Dextrinisation Origin

	Diabetes Plasticity		

Unit Title	Fruit and Vegetables	Dairy and Eggs	Cereals	Meat and Fish	Food Science and Revision	
Composite Knowledge/End Point (big idea that should be answered at the end of a unit)	Identify a wide variety of fruit and vegetables.  Describe their nutritional value Vitamins and Minerals  Methods of cookery for fruit and vegetables.	Identifying how Protein based foods play a part in the topic eggs and dairy products.  Bacteria can be harmful but good bacteria can be used in food production.	Identifying how cereal products contain Carbohydrates and NSP Understanding the 6 main cereals used in cookery. Impact of food packaging and labelling	Identifying different meat and fish classifications  The different methods of cookery applied to cooking meat and fish.  Nutritional value and meat substitutes.  How cultural and moral issues impact meat consumption	Identifying and understanding Science keywords.  How to complete an investigation looking at functional and chemical properties.	
Examples of Key Substantive Knowledge (specific subject knowledge relied upon for later study or to grasp the composite idea for that unit)	Fruit and vegetables Provenance - How the commodity is grown and processed including classifications.  Nutritional values (include sources, functions, deficiencies, excess, daily requirements) - Dietary considerations - Food science (enzymic browning)  Food miles and carbon footprint - Packaging and the environment	Protein commodities and production processes of milk, cheese and eggs.  Nutritional content of the commodity.  Safe food storage to prevent harmful bacteria growth.  Good bacteria can be used in food production.  Methods of heat transfer	Cereal commodities Nutritional values of carbohydrates (include sources, functions, deficiencies, excess, daily requirements and energy) Provenance - How the commodity is grown and processed.  Classification Dietary considerations - Food science (simple and complex)  Spoilage –(preventing bacterial growth)  Packaging and the effect on the environment	Meat and fish commodity-Food Provenance - How commodity is reared and caught.  The processes the commodity goes through.  Classification and Nutritional values  Dietary, moral and cultural considerations  Food science (Maillard reaction)  Meat is high in saturated fat which leads to increased levels of cholesterol in the body.	The science behind Food  The cooking of food and heat transfer methods  Effects of using a variety of cooking methods.  Protein structure and starch properties used within cooking.  Use of raising agents in food production.	

Evamples of Vev	Students will cook every	Students will cook	Students will cook	Students will cook	Students will complete	
Examples of Key	other week whilst using	every other week whilst	every other week. All	every other week. All	a food investigation	
Disciplinary Knowledge	different cooking	using different cooking	dishes link to their	dishes link to their	looking at the chemical,	
(methods/framework to	techniques and	techniques and	theory practice and will	theory practice and will	functional and working	
establish knowledge)	equipment.	equipment.	be applied where all	be applied where all	characterises.	
201011011111111111111111111111111111111	equipe		dishes focus on a	dishes focus on a		
	All dishes link to their	All dishes link to their	specific area, relevant	specific area, relevant	Conclusions and	
	theory practice and will	theory practice and will	to the topic cereals	to the topic of meat,	evaluations drawn from	
	be applied where all	be applied where all	'	fish, and alternative	the results.	
	dishes focus on a specific	dishes focus on a	Understand primary	proteins.	the results.	
	area, relevant to the	specific area, relevant	production processes.		Examples and	
	topic of fruit and	to the topic milk, eggs	production production	Understand the	discussions of the key	
	vegetables.	and cheese proteins.	Understand diet, health	environmental, ethical,	science behind foods	
	ŭ	·	choices and diet related	and social cultural	changing properties.	
	Understand the	Taste testing of a	illnesses.	influences of the	changing properties.	
	environmental	variety of milk and		production of meat.		
	influences on food	cheese using sensory	Develop knowledge and			
	availability, production	analysis.	understanding of the	Understand the impact		
	processes, diet and	,	impact of packaging on	of a diet high in		
	health choices.	Understand the	the environment.	saturated fats and the		
		economic,		nutritional needs		
		environmental, ethical	How microorganisms	required at different		
		and social cultural	can affect food	stages throughout life.		
		influences on food	including yeast and			
		production processes.	mould.	Develop knowledge and		
				understanding of the		
		Develop knowledge and	Conduct an	functional properties		
		understanding of the	investigation looking at	and chemical		
		functional properties	the gluten content of a	characteristics of the		
		and characteristics of	range of different flour	food		
		the food commodity.	types.			
		Able to demonstrate				
		and explain the				
		methods of heat				
		transfer when cooking				
		eggs on toast				

Examples of Reading Opportunity	Booklet Recipe cards Powerpoint Wider reading opportunities Collins revision guides CGP revision guides	Booklet Recipe cards Powerpoint Wider reading opportunities Collins revision guides CGP revision guides	Booklet Recipe cards Powerpoint Wider reading opportunities Collins revision guides CGP revision guides	Booklet Recipe cards Powerpoint Wider reading opportunities Collins revision guides CGP revision guides	Booklet Powerpoint Collins revision guides CGP revision guides
Examples of Key Tier 2 Vocabulary	Discuss Evaluate Describe Annotate Analysis Discuss Identify	Explain Discuss Evaluate Annotate Describe Identify	Explain Discuss Evaluate Annotate Describe Identify State	Explain Discuss Evaluate Annotate Describe Identify Research	Explain Discuss Evaluate Describe Research Predict
Examples of Key Tier 3 Vocabulary	Carbon emissions Water soluble Fat soluble Sustainability Traceability Antioxidants Enzymes Emulsification Stabiliser Gelatinisation	Amino acids Coagulation Denaturation Fermentation Pasteurisation Lactose Conduction Convection Radiation Staphylococcus Aureus Campylobacter	Polysaccharides Disaccharides Monosaccharides Diverticulitis Dextrinisation Caramelisation Glycaemic Index Gelatinisation Metabolic Biodegradable Enzymes Hypothesis	Maillard Reaction Non enzymic browning Denaturation Tenderising Coagulation Offal Sustainability Cholesterol Lipoprotein Saturated Amino acids Fortification	Properties Working characteristics Hypothesis Chemical function Emulsification Denaturation Dextrinization Coagulation Caramelization Fermentation Glycerol Shortening Plasticity

Unit Title	NEA 1	NEA 2	Exam revision		
Composite Knowledge/End Point (big idea that should be answered at the end of a unit)	NEA Assessment 1: Brief released September 1st	NEA Assessment 2: Brief released November 1st	Understand core exam board topics		
Examples of Key Substantive Knowledge (specific subject knowledge relied upon for later study or to grasp the composite idea for that unit)	Writing a hypothesis Carrying out research and an experiment  Analysing results  Understanding the functional properties / science of ingredients Theory work will link to NEA 1.	Research into brief Comparing existing products on the market. Carrying out a questionnaire then analysing findings Exploring a variety of dishes and understanding how they relate to the brief Special dietary needs. Writing a time plan. Deciding on chosen dishes for exam and explaining reasons behind choices for their 3-hour practical exam in exam conditions.  Evaluate practical exam and complete NEA 2.	Science of food Food provenance Food commodities Environmental issues and packaging Food spoilage Food Choice Food safety		
Examples of Key Disciplinary Knowledge (methods/framework to establish knowledge)	Students will carry out a food investigation in relation to NEA, which will enable to test their hypothesis and put their research into action.  Develop knowledge and understanding of the	Students will trial dishes every other week. All dishes must link to the NEA2 brief.  Students will learn how to use a variety of technical equipment and carry out different	Students will review previous papers and work through the answers.  Sit a mock exam.		

	functional properties and chemical characteristics of food.	cooking methods and learn new techniques, which will prepare them for their three hour practical exam - 45 marks.  Demonstrate knowledge and understanding of functional and nutritional properties, sensory qualities of their dishes.  Research will be completed online to help them complete their electronic based assignment.	Work through revision guides and complete PRP tasks		
Examples of Reading Opportunity	Research online Revision Guides Recipe books Assignment brief	Research online Revision Guides Recipe Books Assignment brief	Previous exam papers Revision guides Powerpoints PRP tasks		
Examples of Key Tier 2 Vocabulary	Discuss Explain Evaluate Describe Conduct	Explain Describe Evaluate Conclude	Explain Discuss Evaluate Describe Identify		
Examples of Key Tier 3 Vocabulary	Investigation Hypothesis Chemical Properties Working characteristics Sensory Analysis	Nutritional Sensory Provenance	Nutritional Cholesterol Carbon emissions Water soluble Fat soluble Sustainability Traceability Antioxidants Enzymes Gelatinisation		