Hampshire Services
HIAS SCHOOL IMPROVEMENT

KS4 FPN exam support

Sarah Pook
25/04/2022
Final version

Hampshire County Council

Hampshire Services
HIAS SCHOOL IMPROVEMENT

KS4 FPN Exam Support

[Insert main document]

Reviewing how to support this years cohort to achieve top grades in Food Preparation and Nutrition

Hampshire Services
HIAS SCHOOL IMPROVEMENT

As teachers, do we know what is expected?

Changes to this year's course requirements from JCQ (2022)

Hampshire County Council

ISLE of WIGHT COUNCIL

Changes to the NEA

GCSE FPN: decision for 2022

Y 11: You will NOT need to carry out NEA 1 Food Science assessment task, however, you will still need to teach the food science content for the written paper, and we recommend that you do this is a practical way – this help embed learning and students will perform better in the exam paper. For example, when you are teaching yeast doughs to prepare for NEA2, we recommend that you still carry out the investigation to show the ideal conditions for yeast to ferment and use this as an opportunity to explain the science of the dough rising. For example, when you are teaching how to prepare fresh fruits, we recommend that you still show students how to prevent enzymic browning and explain the science behind this.

Y11: In recognition of the practical time that students have missed they will only need to prepare 2 dishes in the final 3-hour practical exam and mark schemes are adjusted for this. We recommend that you talk to your SLT about scheduling mock and final practical tests , with contingency plans in place in case of continued school closures in the autumn. The NEA2 practical assessment dates should be recognised as a formal exam and be included in the School Exam Diary and information sent to parents.

NEA

- Remember it is better to have a little bit of everything, rather than a lot of one and nothing of everything else
- Always link everything back to the context and the design brief

Hampshire Services
HIAS SCHOOL IMPROVEMENT

JCQ CIC Joint Council for Qualifications CIC

In September 2021, the government announced the intention of returning to examinations this summer, following the disruption experienced over the last two years due to the Covid-19 pandemic.

Hampshire County Council

ISLE of WIGHT COUNCIL

Advance Information for Ofqual Regulated General Qualifications

Each awarding organisation will provide advance information on the focus of the content of summer 2022 exams in the majority of subjects at GCSE, AS and A level1 . The policy intention of providing advance information is that it will support students' revision. It will enable teachers to plan to adapt their teaching in the second half of the spring term if necessary, in the time before the examination, in the context of the coronavirus (Covid-19) pandemic which has disrupted the education of students sitting exams in summer 2022.

Hampshire Services
HIAS SCHOOL IMPROVEMENT

JCQ CIC Joint Council for Qualifications CIC

The materials are intended to communicate, in advance, the focus of the content of the 2022
examination papers.
In line with the Department for Education's policy decision in England, awarding organisations
will make advance information available on their public websites at the same time by
7 February 2022 at the latest. The Department for Education has also decided to retain the
flexibility for advance information to be deployed at other points ahead of 7 February 2022
if circumstances require. At least a week's notice will be given if it is decided that advance
information will be released earlier than 7 February 2022.
The materials may be used at any point from the date of release. The advance information
cannot however be brought into the actual examinations

Hampshire County Council

ISLE of WIGHT COUNCIL

What is advance information and what does it allow?

- Advance information is intended to communicate in advance some of the aspects of the specification that will be assessed in the examination papers.
- The breadth, depth and presentation of the advance information will vary between subjects to reflect their different characteristics.
- The information will detail the focus of particular aspects of the examination; for example, the content, contexts, texts, topics, sub-topics, themes and skills that will be assessed in the 2022 exams.
- This may be different, depending on the nature and design of the subject and each specification's assessment arrangements.
- It will support revision in the time before the examination.

What is advance information and what does it allow?

Advance information does not require any changes to a question paper's usual structure2, which means that the examination assessments will:

– be familiar to teachers and students.

– allow continued relevance of associated assessment and teaching resources, including past papers.

– support student confidence in minimising the unexpected in the layout or structure of question papers.

• Different qualifications require different advance information solutions to maximise the value of the approach. This means that while there will be a common approach across specifications within each subject at a particular level, what that approach looks like for individual specifications might be different as the advance information is tailored to suit those individual assessment approaches. There will also be a variety of approaches across subjects. All awarding organisations are working to the same principles and following the same Ofqual process in creating advance information.

• The advance information will not always detail everything that is in the examination. In some cases this would risk good education, progression, or fair results; in others it would be unhelpful to teachers and students, for example by listing topics that could lead to excessive teaching or revision on areas that are worth few marks

What are the key principles behind advance information?

Awarding organisations are working to the following key principles when developing advance information:

• We have avoided providing so much detail that answers to likely questions could be pre-prepared and memorised.

• We have made sure advance information does not:

– undermine the value of the qualification in supporting student progression.

– directly provide answers to other, potentially low tariff, questions.

– compromise the capability of the examinations to sufficiently differentiate between students' performances

How and when should advance information be used?

- Advance information can be used from the point of release.
- It can be used flexibly by centres to achieve its purpose of supporting revision. It should not, however, be used to narrow teaching and learning.
- It can be used by teachers in supporting their students' revision and referred to by students in their revision and final examination preparation.
- It cannot be brought into the examinations.
- It will not be at a level that allows questions to be predicted or answers prepared.

Preparation should continue to focus on knowledge and understanding that can be applied appropriately in the context of unseen examination questions.

What will advance information look like?

- The varying nature of subjects, including the characteristics of the assessment, means that the information will focus on different aspects for different subjects and be presented in different ways depending on the individual specification's assessment design.
- The advance information could focus on areas of knowledge, skills, contexts, sources, texts and/or themes.
- Presentation will take the most appropriate form for clear communication of the information.
- The advance information will be designed to be as accessible as possible. However, centres will be allowed to make reasonable adjustments as appropriate to ensure the information is accessible to all, including students with particular needs. Awarding organisations will continue to provide their usual support to teachers with advice and guidance on how to modify these notices.
- In some subjects advance information will focus on all or the majority of the examined content in 2022 but in other subjects it will focus on one paper or section due to the nature of the subject or the assessment.

Example A: Mirroring specification layout in a table

Example based on GCE Geography

The following table summarises the subject content targeted in the June 2019 examination papers.

1. How important are water and carbon to life on earth?	
Key Ideas	**Content**
1.b. The carbon and water cycles are systems with inputs, outputs and stores.	The distribution and size of the major stores in the carbon and water systems, including the atmosphere, oceans, water bodies, ice (cryosphere_, soil, vegetation and groundwater.
1.c. The carbon and water cycles have distinctive processes and pathways that operate within them.	The processes of water cycle, including evaporation, transpiration, condensation (including formation of clouds), precipitation (including causes of precipitation), interception, abiation, runoff (including overland flow and saturated overland flow) catchment hydrology (including infiltration, percolation, throughflow, groundwater flow and cryospheric processes.

Example B: Bullet point list indicating the focus of high tariff extended response questions

Example based on GCSE Sociology

For each a paper, the list shows the major focus of the higher tariff extended response questions. Students are expected to be familiar with explanations of this content.

Topics **not** included on the list below **may** appear in questions with a lower tariff.

Paper 1

3.3 Families

3.3.1 Functions of families

- Differing views of the functions of families.

3.3.4 Changing relationships within families

- Changing relationships within families.

3.4 Education

3.4.2 The relationship between education and capitalism

- Different views of the correspondence principle on the relationship between education and capitalism as developed from a Marxist perspective by Bowles and Gintis.

3.4.3 Factors affecting educational achievement

- Factors affecting educational achievement.

Etc.

Example C: Lists of subject content separated from skills

Example based on GCE Economics

The specification will be assessed in the June 2019 question papers as indicated below.

Paper 1

Subject content

4.1.2.3 Aspects of behavioural economic theory

4.1.2.4 Behavioural economics and economic policy

4.1.3.1 The determinants of the demand for goods and services

4.1.3.2 Price income and cross elasticies of demand

4.1.4.5 Economies and diseconomies of scale

Etc

Quantitative skills

- Calculate, use and understood percentages and percentage changes.
- Construct and interpret a range of standard graphical form.
- Calculate and interpret index numbers.

Example D: Content and form of sources outlined

Example based on GCSE Media Studies

The focus of the June 2019 assessment will be as follows:

Paper 1	Area/s of the theoretical framework/content	Media Form/s and/or set products
Section A	Media language Representation Media Contexts	Advertising – *Unseen* Magazines – *Reveal*
Section B	Media industries Audiences	Video games – Pokemon Go Film – not notified
Paper 2	**Area/s of the theoretical framework/content**	**Media Form/s and/or set products**
Section A	Media language Representation Media Contexts	Television – Unseen extract from set product: *Cuffs*
Section B	Media industries Audiences	Newspapers – *The Times and Daily Mirror*

Quick overview of the FPN GCSE exam

- Written paper is weighted at 50% of the whole GCSE and all exam papers are worth 100 marks.
- Students sit one exam paper for all boards and there's only one level of entry.
- There are no pre-release papers for any exam board. (except this year!)
- Students write directly on to the exam papers for all exam boards.

Assessment objective weightings

Assessment Objective	Exam paper	Non Exam Assessment	Overall weighting
Assessment 1 – Food Investigation Task Assesses the scientific principles underlying the preparation and cooking of food. Students will be given a set task in the Autumn term of Year 11. They have 10 hours to plan, research, carry out the investigation, analyse their results and evaluate their work.	0	15%	15%
Assessment 2 – Food Preparation Task Students will be given a set task in the Spring term of Year 11. They will have 20 hours to research, plan and cook, then analyse and evaluate up to 3 practical products related to this task. The practical exam is a 3 hour exam that will enable students to demonstrate their practical skill	0	35%	35%
Written Exam The written exam is worth 50% of the final grade and takes place in the summer term of Y11.	50%	0%	50%

The written exams at a glance

Exam board	Length	Section A	Section B	Total number of marks
AQA	1hr 45 mins	20 marks	80 marks	100
Eduqas	1hr 45 mins	15 marks	85 marks	100
OCR	1hr 30 mins	100 marks	No section B	100

Click on the name of the exam board to visit the FPN GCSE page on their website

AQA Advance information June 2022

3.2.3.1 Making informed choices	**• the current guidelines for a healthy diet • portion size and costing when meal planning • how people's nutritional needs change and how to plan a balanced diet for different life stages • how to plan a balanced meal for specific dietary groups • how to maintain a healthy body weight throughout life**
3.2.3.4 Diet, nutrition and health	• the relationship between diet, nutrition and health • major diet related health risks
3.3.2.2 Carbohydrates	• Gelatinisation • Dextrinisation • Caramelisation
3.4.2.1 Buying and storing food	• the food safety principles when buying and storing food
3.4.2.2 Preparing, cooking and serving	• the food safety principles when preparing, cooking and serving food
3.5.1.1 Factors affecting food choice	• To know and understand factors which may influence food choice.
3.6.1.2 Food and the environment	• environmental issues associated with food
3.6.2.1 Food production	• Primary and Secondary stages of processing and production • how processing affects the sensory and nutritional properties of ingredients

Eduqas Advance information June 2022

1. Food commodities	
For: • bread, cereals, flour, oats, rice, potatoes, pasta • meat, fish, poultry, eggs	learners need to know and understand: • the value of the commodity within the diet • features and characteristics of each commodity with reference to their correct storage to avoid food contamination • the working characteristics of each commodity, with reference to the skill group and techniques table listed in Appendix A, e.g. when subjected to dry/moist methods of cooking • the origins of each commodity
2. Principles of nutrition	
Macronutrients and micronutrients	• the definition of macronutrients and micronutrients in relation to human nutrition • the role of macronutrients and micronutrients in human nutrition Macro-nutrients to include: (i) protein: to include essential amino–acids in relation to nutritional requirements (histidine, isoleucine, lysine, leucine, methionine, phenylalanine, threonine, tryptophan, valine) and non-essential (alanine, asparagine, aspartic acid glutamic acid) For protein, learners must know and understand: • the specific function • the main sources • dietary reference values • the consequences of malnutrition (over and under) • complementary actions of the nutrients

OCR Advance information June 2022

Section A: Nutrition	**A1 The relationship between diet and health** **• A balanced diet to provide the correct combination of food and nutrients for good health** **A4 Energy balance** **A8 Vitamins (Micronutrients)** **A9 Minerals (Micronutrients)** **A11 Nutritional content of the main commodity groups**
Section B: Food (food provenance and food choice)	B3 Food security B4 Technological developments to support better health and food production
Section C: Cooking and food preparation	C1 Food Science • Working characteristics and the functional and chemical properties of ingredient groups ✓ Carbohydrates: gelatinisation, dextrinisation, caramelisation ✓ Fats/oils: shortening, aeration, plasticity, emulsification C3 Food safety

Six top tips for exam success

This section outlines six top tips which might help students develop a successful approach to the written exam. The tips are not listed in any particular order and are guidance rather than a conclusive list.

six top tips for success in written exams

1. Develop a five-year curriculum using distributed practice strategies
2. Identify how the exam board thinks
3. Practice makes perfect
4. Develop higher order thinking skills
5. Develop notetaking and memory prompts
6. Develop self belief

The following slides gives more detail on each tip listed.

Top Tip 1

Develop a five-year curriculum using distributed practice strategies

Develop a five-year curriculum

- The GCSE specifications have been designed to follow on from KS3 and much of the learning for the core is tested at KS3 level and might be included in KS3 teaching.
- A five-year curriculum across Years 7-11 facilitates a ‘distributed practice’ approach which is an evidence based strategy where cramming for an exam is discouraged. Instead students develop effective learning habits that reduce stress, increase retention and improve performance. In particular this strategy helps student develop independent learning skills and the ability to apply knowledge in different contexts.
- For a short summary on distributed practice read this article from the TES. For more detailed information read the book by Daisy Christodoulou called Making Good Progress.
- The Learning Scientists website has some excellent free downloads on distributed practice.

A quick guide to distributed practice

The Learning Scientists website identifies the following six strategies for learning and exam preparation:

1. Spaced practice – study of a topic spaced out over time with regular learning reviews and going back to key elements in order to embed the knowledge and to identify links to other learning.
2. Retrieval practice – practising retrieving learning through regular targeted activities e.g. making cue card summaries, quick tests.
3. Elaboration – asking questions and make links and connections.
4. Interleaving – moving between ideas when studying, going back to idea done before and thereby making new links and connections.
5. Concrete examples – collecting real examples and sharing ideas with others.
6. Dual coding – Recording ideas in different ways, taking notes previously written and transferring them into a different format.

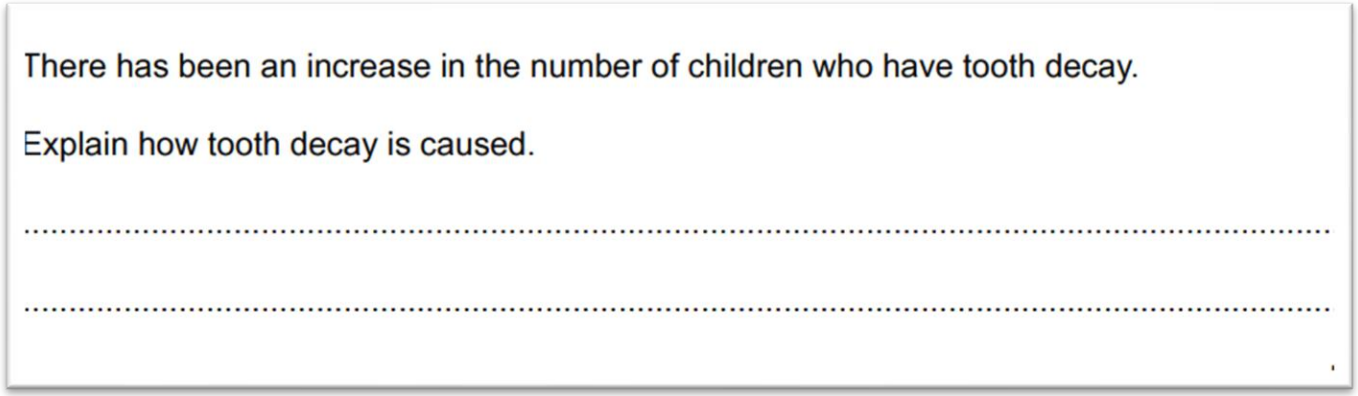
Distributed practice

Things to think about when planning a curriculum

- How can the KS3 and GCSE curriculum be mapped against each other so that learning progresses across the key stages?
- What are the key elements of learning in a module that need revisiting? How and when will these key elements be revisited both in the module and after the module is complete (including across all key stages)? Does a log need to be kept?
- What strategies and targeted activities will be used to develop retrieval skills?
- How can teacher questioning be used to develop elaboration skills? How can students develop their own questioning skills to help them make connections between learning?
- How can learning be planned so that interleaving takes place both across a module as well as across a range of modules?
- What concrete examples can the teacher give to help bring learning alive? How can students collect and log their own examples?
- How will students record learning? How can learning review time be built into modules of work?

KS3: Creating a basis for GCSE

- Do exam questions, especially in the core content, require in-depth knowledge?
- What learning might be built into KS3 and revised at GCSE?
- How might exam questions be added to KS3 schemes of learning e.g. through product analysis activities? (Don't forget it isn't necessarily just about students answering the question but about them gaining the subskills of exam technique – see more on this later.)



There has been an increase in the number of children who have tooth decay.

Explain how tooth decay is caused.

.....

.....

Top Tip 2

Hampshire Services
HIAS SCHOOL IMPROVEMENT

Identify how the exam board thinks

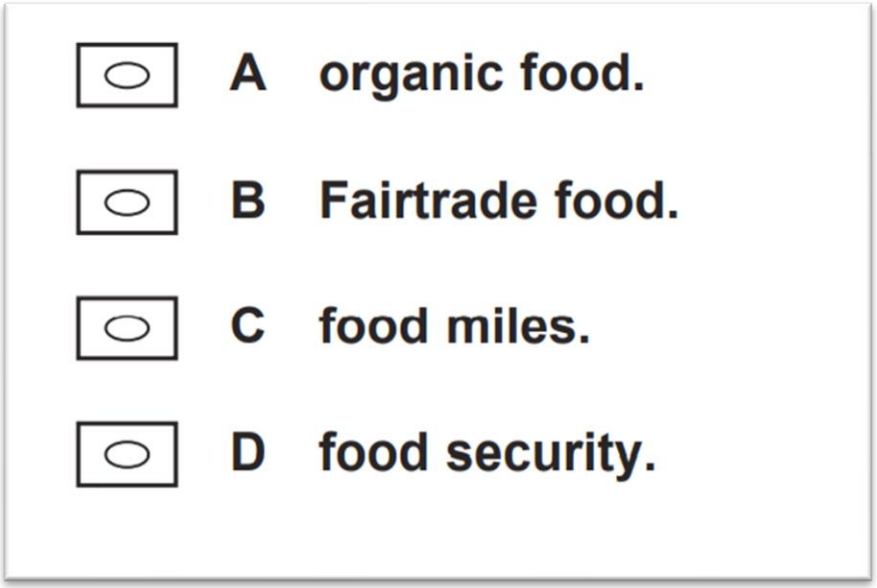
Hampshire County Council

ISLE of WIGHT COUNCIL

How the exam board thinks

- Use exam board past papers to get an overview of patterns of questions e.g. in question styles, popular images used, the layout and wording of questions, the use of language, the number of marks
- Read the examiners' reports and mark schemes to get an overview of the styles of answers and the type of content required along with tips on what the exam board is looking for.
- Develop self-marking skills in students – if they were the examiner where would they allocate marks in a student answer?

Multiple choice questions



- Multiple choice questions only appear on AQA's exam paper.
- Although multiple choice questions may seem easy, care must be taken as answer choices usually include common misconceptions and nearly correct answers and students often answer without thinking about the question in detail.

Short answer questions

- These types of questions are often worth 1-3 marks, with 2 being a popular mark range.
- Although they require a short answer it's important that students check they have secured all marks e.g. by giving additional detail and examples. Many students miss out on the second mark as they don't think about how the marks will be allocated. Developing self-marking skills will help with this.

Explain scientifically what happens when the butter and sugar are creamed together.

.....

.....

..... **[2]**

Synoptic and extended answer questions

Synoptic and extended answer questions are the most challenging ones on the exam paper. They require a more detailed answer and can be worth up to 10 marks.

Questions often cover broader issues requiring students to bring together learning from a number of different areas. An essay type response with a coherent and logical argument is required with detailed analysis and examples. Students may find it useful to do a mini plan before answering the question.

Bradley, a 25-year-old active male tries to make healthy choices using the Eatwell guide when planning meals.

Information about two meals is given on pages 22 and 23. Using this information and your knowledge of healthy eating, nutrition and energy balance:

- **assess the suitability of each meal for Bradley**
- **evaluate which is the healthier choice, justifying your reasons. [12 marks]**

TABLE 1: Ingredients and percentages of recommended intake of nutrients for Bradley

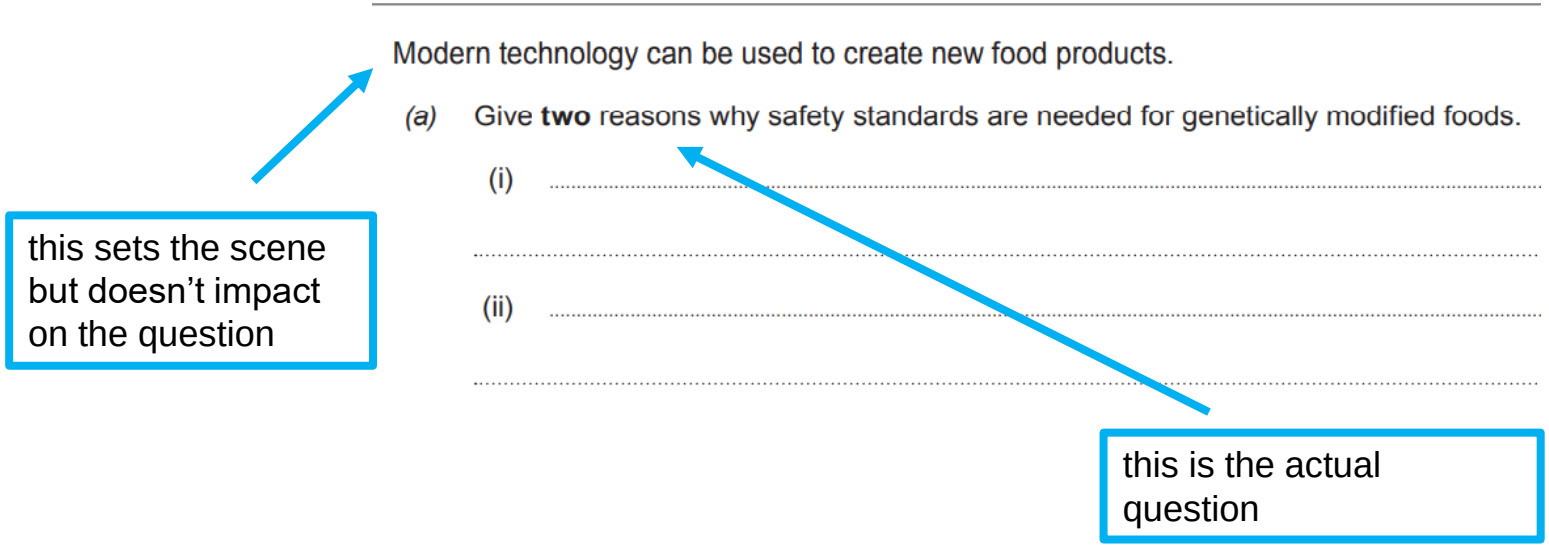
	CHOICE A: Spaghetti bolognese	CHOICE B: Cheese and onion pasty and chips with tomato ketchup
Ingredients	Wholewheat pasta, lean minced beef, tomatoes, onions, green peppers, mushrooms, parmesan cheese, celery, vegetable oil, basil, salt, pepper	Potato, wheat flour, lard, vegetable oil, Cheddar cheese, tomato ketchup, onion, salt, pepper
Nutrients	% Recommended Intake	% Recommended Intake
Energy (kcal)	33	52
Fibre (g)	54	22
Vitamin B1 (mg)	89	116
Vitamin C (mg)	80	48
Calcium (mg)	61	72
Salt (g)	32	161

TABLE 2: Percentage of energy provided by each nutrient

	Spaghetti bolognese	Cheese and onion pasty and chips with tomato ketchup
Nutrients (g)	% Energy Breakdown	% Energy Breakdown
Total carbohydrate (of which sugar)	51 (6)	38 (11)
Total fat (of which saturated)	29 (9)	55 (20)
Protein	20	7

Think about the wording of the question

Many exam questions start with a sentence that 'sets the scene', as well as sometimes referring to an image. Students must take care to read the question carefully as often these sentences are not particularly related to the question. Students can fall into the trap of latching onto the content of the sentence, focusing on irrelevant words rather than answering the actual question.



Top Tip 3

Hampshire Services
HIAS SCHOOL IMPROVEMENT

Practice makes perfect

Hampshire County Council

ISLE of WIGHT COUNCIL

Practice makes perfect

- Use the exam board past papers to practice answering questions. Some of these can be marked by the teacher but it's also important that students experience marking their own answers, as well as doing peer marking exercises, using the exam board mark schemes and examiner's reports. This helps students get a better understanding and ownership of their weaknesses, along with helping them pick up tips on what the exam board is looking for.
- Remember that as part of the distributed practice model, low and high stakes practice testing should be spaced out over time, rather than only being crammed in just before an exam. Low stakes testing should be quick and have an element of fun to it whereas high stakes testing will be more like the real exam. Both types of testing should be used in a diagnostic way.

Practice makes perfect

- Get past papers back from the exam board for key students e.g. ones who did particularly well, as well as ones who got average and low grades. Use these to review how the exam board actually marks in practice.
- Consider becoming an examiner for at least a year as this is the best way to learn what the exam board is looking for when marking.
- Use data on the exam board secure areas to analyse areas where your students do better or worse than other students nationally as this will help you identify areas you could teach more effectively.

Developing subskills

- Although doing practice papers and questions is important it's just as important to focus on the subskills required to be successful in an exam.
- Subskills are what you get when you break down success in an exam paper, or a particular type of question, into all of its component parts.
- Practising individual subskills in isolation means the teacher can focus on each skill until the student has perfected it. It's also easier to control the learning and assessment of these subskills and it can feel less overwhelming for students with more low stakes testing.
- Once students are more skilled at the subskills of sitting an exam, and of answering particular types of individual questions, they are less likely to feel overwhelmed when approaching the full exam paper.

Subskills: Technical vocabulary

- This is an important subskill as students must be able to use technical vocabulary, particularly in order to access higher grades.
- Keeping a glossary of key words and definitions can be a useful way of doing this. A key word keyring is also a way of pulling together key words and definitions.
- Activities where students have to regularly use notes and diagrams to describe and explain concepts are another good way of developing technical vocabulary.

Examples of subskills

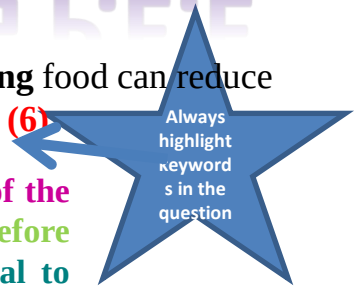
- Getting used to seeing exam questions and having strategies to stay calm.
- Writing in a short time frame in a legible way with good grammar and spelling.
- Linking the writing timescale to the number of marks (approximately a mark per minute which leaves spare time for checking, reading, planning etc.)
- Identifying exactly what the question is asking.
- Avoiding just repeating the question in the answer (which can fill up space and make students think they have finished answering the question).
- Developing self marking skills.
- Reading the whole paper before starting to write to get an overview.
- Reading questions and picking out key words, command words and qualifiers (this will be dealt with in more detail later).

More examples of subskills

- Using the number of marks to guide how detailed an answer should be e.g. 1 mark per point made.
- Skills in planning an answer e.g. as a mind-map.
- Using strategies such as PEE (point, explanation, example) to structure more detailed answers.
- Activities identifying images as well as sketching images relating to keywords.
- Avoiding ‘stock answers’ which give vague information without detail and justification e.g. quicker, neater, quality, cheap, better, value for money. This type of wording is often flagged up in the mark scheme so build a list based on the specific exam board.
- Being able to ask questions as well as answer them (more on this later).

MODEL ANSWER USING P.E.E

1. **Describe** how **good hygienic practices** when **preparing** and **cooking** food can reduce the risk of an outbreak of **food poisoning** in a residential home. **(6)**



Preparing – **When preparing food in a kitchen good personal hygiene of the staff is very important. For example staff should wash their hands before handling food, after using the toilet or touching the bins. This is vital to prevent bacteria spreading such as Staphylococcus which is found on the skin. Additionally staff who work in a kitchen should wear protective clothing such as chefs whites, a hat to cover hair and an apron. These clothes should be clean and are generally white so they show up any dirt. Finally when preparing high risk foods such as meat and fish, separate chopping boards should be used to prevent cross contamination.**

Cooking – When cooking food it should be cooked thoroughly to a core temperature of 75°C for at least two minutes to kill any traces of bacteria. Food should not be prepared too far in advance especially high risk foods that include eggs or stocks in soup to prevent the risk of bacteria building up in the food. Lastly food should be defrosted correctly prior to use, by placing on a plate, covered with clingfilm in the fridge for 24 hours. This will help to prevent a break out of food poisoning in the residential home which could be very dangerous to elderly people who are classed as a high risk group similar to those that are ill or pregnant.

POINT
EXAMPLE
EXPLAIN

The question is worth 6 marks so it requires 2 or 3 points for each section of the question

Don’t just answer questions…

Practising questions doesn’t have to mean just answering them and getting them marked. These activities will also help to develop subskills in answering questions:

- Collect similar questions.
- Highlight the keywords in the question.
- Collect images relevant to the question.
- Mind-map ideas and thoughts around the question.
- Discuss the question with others and pool ideas.
- Start with the exam board answer e.g. what could the question be? Mind-map the exam board answer around the question to understand their thinking.
- Review an example answer by a student e.g. what could the question be? Mind-map the answer around the question then compare the answer to the mark scheme.

Top Tip 4

Hampshire Services
HIAS SCHOOL IMPROVEMENT

Develop higher order thinking skills

Hampshire County Council

ISLE of WIGHT COUNCIL

Higher order thinking skills

- Learning works best when students understand a little bit about how metacognition and higher order thinking works and how they can best maximise their potential. This links to the distributed practice model in that if students understand strategies like spaced and retrieval practice it helps make learning both more manageable and more successful and and students are more likely to engage with it.
- It's important that students feel in control of the learning and revision process rather than seeing it as something that is 'done' to them and understanding metacognition and thinking skills can do this.
- It can also help students if they understand the purpose of exams and that to some extent they need to learn 'how to play the game' rather than them just needing to be super intelligent.

Using taxonomies

- There are a number of taxonomies that can be used to help students ‘structure’ their thinking. These help students ‘decode’ the process of learning enabling them to move away from a fixed mindset approach to a growth mindset where they recognise they can develop the skills necessary to be successful.
- Taxonomies also help students ask questions. This is an important part of the distributed practice process and in particular helps students develop retrieval and elaboration skills.
- Taxonomies that might be used include Bloom’s Taxonomy, De Bono’s Thinking Hats, Socratic Thinking and Solo Taxonomy. Information on all of these taxonomies can be found through internet searches but here we will focus on the use of Bloom’s Taxonomy as this is regularly used to structure exam questions.

Bloom's Taxonomy

Bloom identified six levels of learning and these were later adapted.

Knowledge based questions are said to be the easiest with evaluation based questions being the hardest.

The taxonomy can be used to to ensure differentiated levels of challenge are used.

Bloom's Original Model	Anderson & Krathwohl Adapted Model
Knowledge	Remembering
Comprehension	Understanding
Application	Applying
Analysis	Analysing
Synthesis	Evaluating
Evaluation	Creating

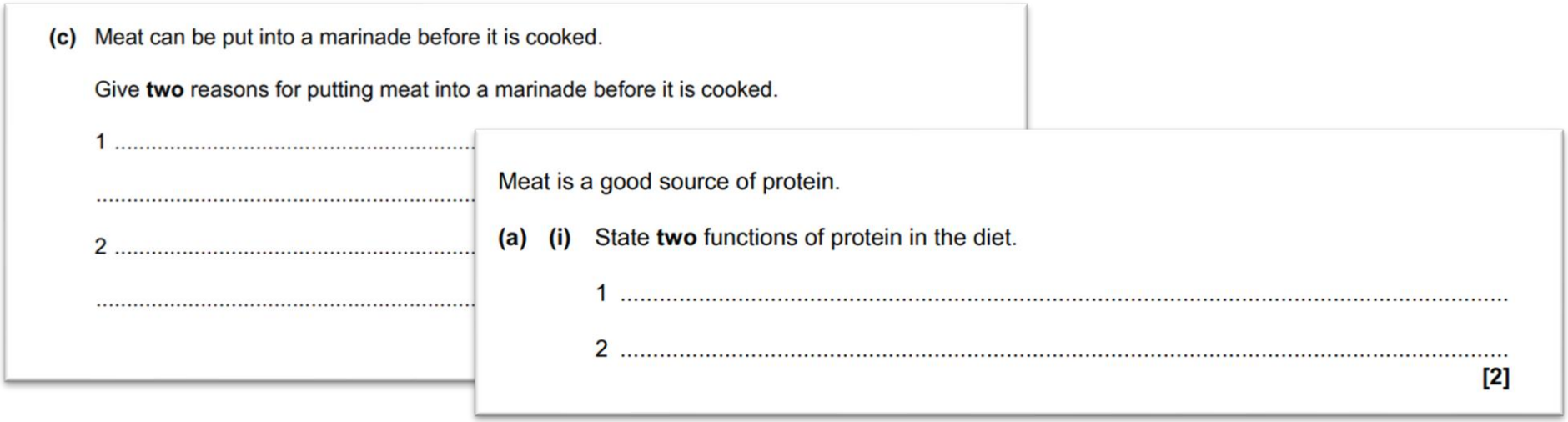
For a detailed explanation of the original Bloom's Taxonomy along with examples visit https://mikegershon.com/?p=7

Bloom's Taxonomy and command words

- Exam boards use Bloom's Taxonomy when creating questions. They often call these 'command words'.
- Being able to read a question and pick out key command words is essential to success in an exam. Introducing students to Bloom's Taxonomy helps them understand why certain command words have been chosen when writing questions. It can help also indicate to students what type of answer is expected.
- Students can also use Bloom's Taxonomy to create their own questions as practising creating questions helps students read and understand questions better.
- As well as the ones listed in the previous slide most of the exam boards list other command words in their specifications and textbooks.
- A useful and quick subskill activity is for students to regularly identify command words in a question, explaining what they mean, along with students writing their own questions for each other using command words.

Examples of Bloom's Taxonomy in an exam

Knowledge based questions – these types of questions often require short one or two word factual answers. They are usually worth 1 or 2 marks.



(c) Meat can be put into a marinade before it is cooked.

Give **two** reasons for putting meat into a marinade before it is cooked.

1 .....

.....

2 .....

.....

Meat is a good source of protein.

(a) **(i)** State **two** functions of protein in the diet.

1 .....

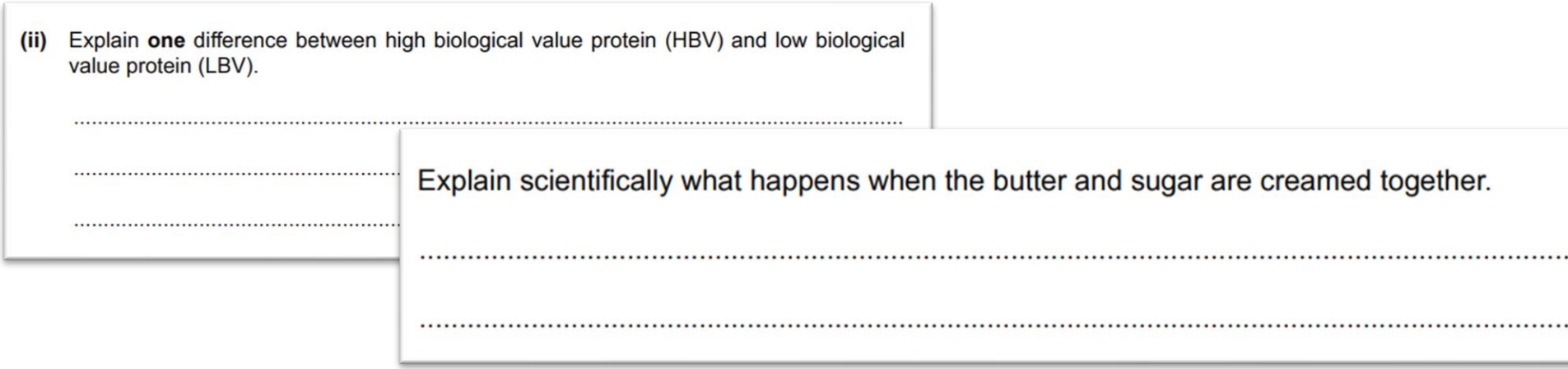
2 .....

[2]

These examples use the original Bloom's Taxonomy model but the more recent Anderson and Krathwohl model could also be used.

Examples of Bloom's Taxonomy in an exam

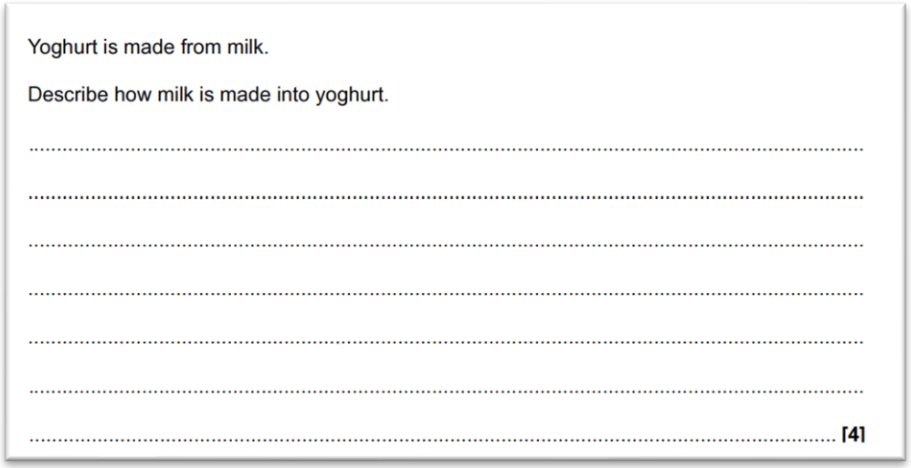
Comprehension based questions – these types of questions usually require slightly longer answers with more detail or examples. They are usually worth 2 or 3 marks (with the 3rd mark usually for an additional point or reason).



These examples use the original Bloom's Taxonomy model but the more recent Anderson and Krathwohl model could also be used.

Examples of Bloom's Taxonomy in an exam

Application based questions – these types of questions are often ones that require a description of a process using notes and/or diagrams.



Yoghurt is made from milk.

Describe how milk is made into yoghurt.

.....

.....

.....

.....

.....

.....

..... [4]

These examples use the original Bloom's Taxonomy model but the more recent Anderson and Krathwohl model could also be used.

Examples of Bloom's Taxonomy in an exam

Analysis based questions – these types of questions usually require students to consider something, often by comparing it with something else or by having to justify something.

Type 2 diabetes is associated with lifestyle factors and is on the increase.

Analyse and evaluate the reasons for this increase and the impact on health.
[8 marks]

These examples use the original Bloom's Taxonomy model but the more recent Anderson and Krathwohl model could also be used.

Examples of Bloom's Taxonomy in an exam

Synthesis based questions – these types of questions are very challenging and usually require students to think in different ways e.g. creating or modifying a design or writing a plan. They are often worth many marks.

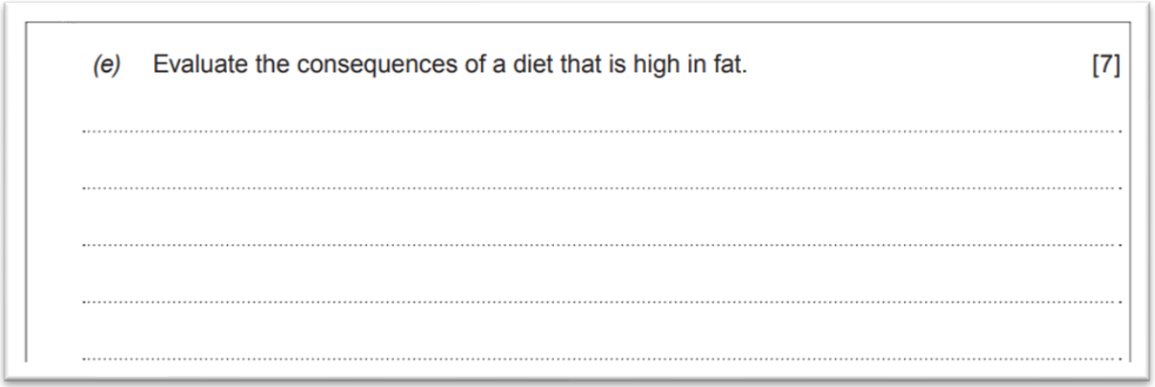
Many consumers choose to buy Fairtrade® food products.

Explain how the production of Fairtrade products benefits the food producers and their workers, the local community and the environment.

These examples use the original Bloom's Taxonomy model but the more recent Anderson and Krathwohl model could also be used.

Examples of Bloom's Taxonomy in an exam

Evaluation based questions – these types of questions are usually extended response open-ended questions that are challenging. They require detailed justified answers with examples, as well as strong arguments and conclusions. Good organisation of the answer is also usually important to success.



(e) Evaluate the consequences of a diet that is high in fat. [7]

These examples use the original Bloom's Taxonomy model but the more recent Anderson and Krathwohl model could also be used.

Qualifying words

- As well as command words students need to understand any qualifying words in a question e.g. a specific number being referred to, such as ‘two examples’ or words such as ‘only’ or ‘exactly’.
- This is a useful subskill to practice with low stakes testing as it is a common mistake that students only give one example of something when more are asked for in the question.
- Where numbers are stated they are often in bold and the space for the answer is sometimes broken down into ‘a, b’ or ‘i, ii’ etc.

State **two** properties of steel that make it suitable for kitchen equipment (2)

Using connectives

Many of the command words and qualifiers require more depth, detail and examples in an answer. It can be useful for students to know a range of connectives to use in sentences and with regular practice these will help students automatically add additional depth to their answers.

And	For example	But	Because
Consequently	Therefore	Despite this	Next
As shown by	As a result	On the other hand	Afterwards
By contrast	However	In addition	Most importantly

Banded marking

- Exam boards use banding when marking higher mark questions that require a more extended answer. The banding helps distinguish between the different levels of answer.
- Students should do self marking exercises using the banded information in the mark schemes. In particular this helps students understand that it isn't always more information that is needed to get a higher mark but more analysis and examples related to what they have already written.

3	**Award 6-7 marks** Excellent evaluation of the impact on health of having a diet high in fat. Within the response the candidate has demonstrated in depth nutritional knowledge and 3-4 points have been evaluated in depth and accurately interpreted in order to make judgements which address the indicative content. Examples have been included and the response accurately identifies the difference between saturated and unsaturated fats. There is excellent use of correct terminology.
2	**Award 3-5 marks** A good attempted to evaluate of the impact on health of having a diet high in fat. Nutritional knowledge is good and 2-3 of the reasons highlighted within the indicative content have been addressed within the response. The selected facts have been adequately analysed and evaluated in order to make judgements. The candidate has used examples within the response. There is good use of correct terminology.
1	**Award 1-2 marks** A limited evaluation which discusses some of the benefits of having a diet high in fat. The response has made basic reference to 1-2 of the consequences within the indicative content. There is some attempt to analyse and interpret reasons and some basic judgements have been made. There is limited use of technical terminology.
0	**Award 0 marks** Not credit worthy or not attempted.

Eduqas sample paper Q6c

Top Tip 5

Hampshire Services
HIAS SCHOOL IMPROVEMENT

Develop notetaking and memory prompts

Hampshire County Council

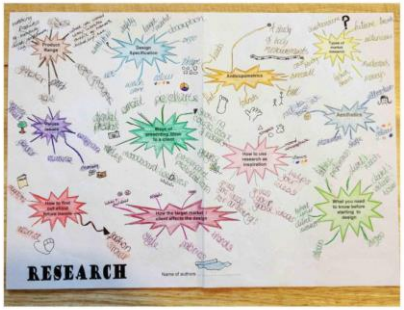
ISLE of WIGHT COUNCIL

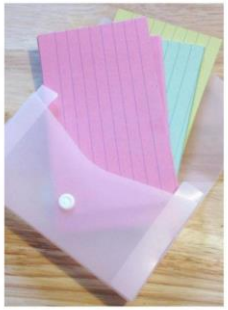
Notetaking and memory prompts

- It's useful to get students to identify memory prompts they can attach learning to. This could be an image, notes or an activity that helps them recall the learning. This can help them develop their retrieval skills.
- Students can also attach memory prompts linked to things in the exam room they will be in on the day. If they are able to sit in the room before hand they can identify prompts especially linked to learning they find difficult e.g. when I look at the clock I will think of…
- Displays in the classroom can also act as useful memory prompts that students can visualise when they are in the exam room so consider what you display and how you get students to interact with them.

Notetaking

- Students should revisit their notes regularly and review them (not just at revision time). This is part of spaced practice in the distributed learning model and time for this should be planned into the curriculum.
- Dual coding activities are useful when doing reviewing activities e.g. picking out key words and adding them to a key word keyring, creating a summary chart of key points. This act of transferring learning from one format to another is a useful way to embed learning and to develop retrieval skills.





Active learning

Develop memory prompts through active learning e.g.

- Putting sticky notes on foreheads with key words and students have to guess the word from the clues given
- Hands-on making activities related to key learning e.g. batch production
- Pass the parcel with questions in each layer
- Writing songs and poems summarising key learning
- Quizzes
- Games, e.g. Find the Fib

Find the Fib
Cotton is a synthetic fibre
Cotton grows on plants
Cotton is often blended with polyester

Mnemonics

- A mnemonic is like a code you use to help you remember a number of facts or key words. It can be a word, sentence or song where key elements remind you of things you want to remember. Often a word is used and each letter stands for something that needs to be remembered.
- Richard of York Gave Battle In Vain is a famous mnemonic for remembering the colours of the rainbow (ROY G BIV is another one).

Hampshire Services
HIAS SCHOOL IMPROVEMENT

Custard for longer questions

- **C**ircle the command word
  Underline other key words
  Scribble down points to cover
  Think it through
  Account for all of the question
  Read through your answer
  Don't rush or give up

Hampshire County Council

ISLE of WIGHT COUNCIL

Custard for longer questions
Circle the command word
Underline other key words
Scribble down points to cover
Think it through
Account for all of the question
Read through your answer
Don't rush or give up

EHO what they might do on a routine visit .

Food hygiene practises
Staff training
Check if premises are suitable
Correct use of equipment

(b) Explain the role of an EHO when carrying out a routine visit to a school canteen. [4]

.....

.....

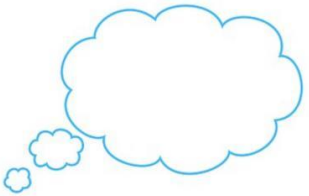
.....

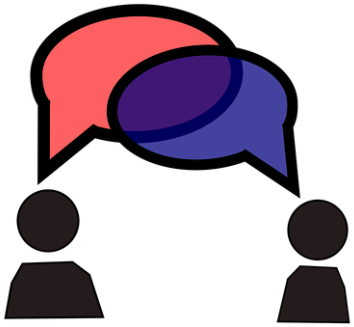
.....

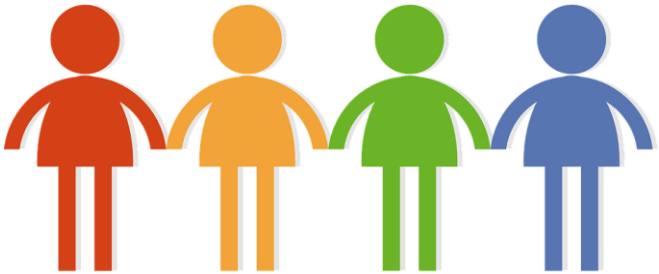
.....

Think, Pair, Share

- Think, Pair, Share is an active way of working both on your own and with a group to think about something. It develops individual thinking skills as well as supporting students to learn from others.
- When posed with a problem students initially get time to think on their own. They then pair up and share ideas. They then get together as a group of four to pool ideas together.







Top Tip 6

Hampshire Services
HIAS SCHOOL IMPROVEMENT

Develop self belief

Hampshire County Council

ISLE of WIGHT COUNCIL

Develop self belief

- Although doesn't require learning and revision it's just as important as all the others. It's important students believe they can be successful as otherwise they will have no incentive to work hard.
- Help students visualise success and develop a growth mindset.
- Encourage them to see time spent learning as an 'investment' in their future – a bit like saving money in a piggy bank.
- Demonstrate strategies that reduce stress and anxiety.

Further advice and support from exam boards

AQA

https://www.aqa.org.uk/contact-us

OCR

https://www.ocr.org.uk/

Pearson

https://qualifications.pearson.com/en/contact-us.html

WJEC Eduqas

info@eduqas.co.uk

Advance information is not applicable to CCEA

Please refer to https://ccea.org.uk/ for CCEA arrangements

Hampshire Services
HIAS SCHOOL IMPROVEMENT

Design and Technology

sarah.pook2@hants.gov.uk

For further details on the full range of services available please contact us using the following email:

htlcdev@hants.gov.uk

Hampshire County Council

Hampshire Services
HIAS SCHOOL IMPROVEMENT

Upcoming courses

Keep up-to-date with our learning opportunities for each subject through our Upcoming Course pages linked below. To browse the full catalogue of learning offers, visit our new Learning Zone. Full details of how to access the site to make a booking are provided here.

- English
- Maths
- Science
- Geography
- RE
- History
- Leadership
- Computing
- Art
- D&T
- Assessment
- Support Staff
- SEN