# 100 Day Plan

## *Class of 2023*

*All subjects week by week from Monday 6th February 2023. The first exam will be on Tuesday 16th May 2023.*

# Note from Gareth

The next 100 days are a crucial stage for you as you prepare for your final exams. This is the time when you consolidate your learning and build on the knowledge and skills you have acquired throughout the past two years. Revision is a systematic and effective way to reinforce understanding and retain information for longer periods.

To make the most of revision, it is important to create a structured revision plan and stick to it. You should identify your strengths and weaknesses, and focus on areas that need improvement. Taking practice tests and past papers is a good way to get a feel for the types of questions that may come up in exams.

In addition to traditional revision methods such as reading textbooks, taking notes and writing essays, you can use modern technologies such as online resources, flashcards, and revision apps. These can be a fun and engaging way to revise and provide an alternative to traditional methods.

It's also essential to take breaks and maintain a healthy lifestyle during revision. A balanced diet, regular exercise, and adequate sleep can help improve focus and memory retention. Making time for leisure activities can help reduce stress and anxiety, which can have a negative impact on revision.

In conclusion, revision is an essential part of preparing for your final exams. By adopting a structured approach, using a combination of revision techniques and taking care of one's well-being, you can increase your chances of success.

We hope that you will find the 100-day plan helpful and motivating. We hope it's your toolkit to success.

# Revision Strategies

This document contains information that you will find useful when revising for your upcoming assessments.

The first section walks you through six revision strategies that research has shown to be more successful than others. There is a video explaining each revision strategy on the UTC website in the **remote learning** section. Some activities are marked with * below and these are specifically identified as being useful revision techniques for students with SEN.

The second section is a week by week guide for each of your subjects identifying what you should be revising each week in the build up to summer exams. If you follow this guide then you will have revised everything you need to over the next few months.

# Revision Top Tips

1. **Get organised** – It is important to get the equipment you need to revise before you start revising. Stock up on cue cards, highlighters, plain and lined paper and different coloured pens.

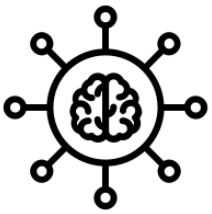
2. **Tidy up** – You'll need somewhere with good lighting, your pens close by, your phone out of sight and your TV unplugged. Try not to revise on your bed, or you'll be dreaming of pink igloos and elephants before you know it.

3. **Know your stuff** – Make sure you have all of your revision resources to hand. Download your knowledge organisers form the UTC website and find out what exam boards you are using.

4. **Take a break** - Don't totally stop yourself from having fun. This'll help you stay motivated, relax, and allow you to keep up with your favourite hobbies.

5. **Sleep and eat well** - Sleep is more important than you'd imagine - it helps your brain store all the juicy information you've learned throughout the day. Drinking plenty of water and eating healthy foods will also boost your concentration throughout the day.

# Reducing Your Notes



| Aim | Tips | How to start |
|---|---|---|
| The aim of these activities is to reduce the amount of notes you are revising from. This will save you precious time in the days just before exams. | This needs to be started early. It will not work if it is done only days before an exam. | Pick a subject and topic to begin and using your class notes select one of the methods below. |

## Cue Cards

Note or cue cards are always handy for when you're out and about. List definitions and rules, you need to know. Or write key words from which you can fill in the gaps to tell the whole story. *Use different coloured pens or paper to help with word association and grouping of key words.
These are also handy for learning language vocabulary. Once filled in, these cards will allow you to reclaim time that would otherwise be wasted -on the bus, in the queue at the supermarket -there's no limit.

## Mind Maps/Spider Diagrams

Take a topic, and list the main topics/themes. For each theme list the main points, definitions, key words and examples. The aim is to have a single piece of paper (A3 or A4) for each topic. You will not be able to write down everything, so prioritise the key information. Images and symbols can also be used alongside/instead of words to help visualise key information.

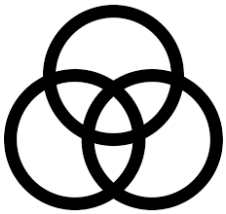
## Diagrams, Tables and Timelines

Some subjects allow you to display key information in a different format, especially useful when you are trying to make sense of a series of events (if displayed chronologically). You can also try this for a specific character in a story/plot, you can show their involvement, impact and influence throughout the play/text. For pictures it is said “A picture paints a thousand words” ...enough said. Tables are very useful for displaying the key information and showing possible relationships between the information.

## *Recording of Notes

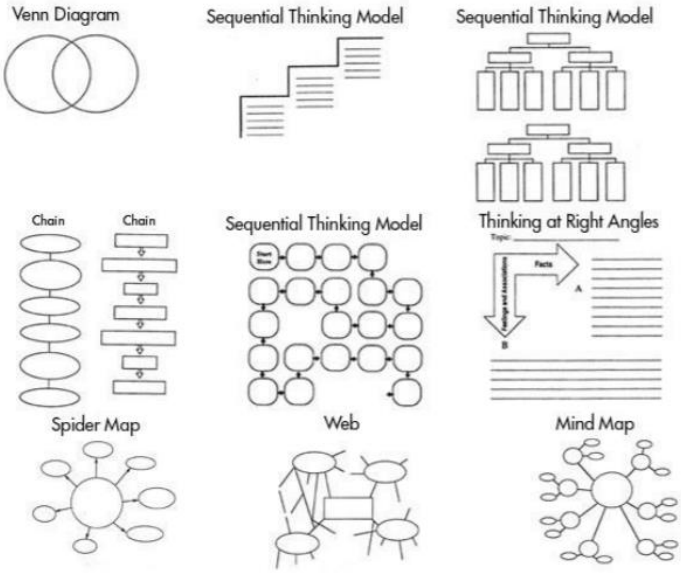
Once you have reduced your notes, record yourself or someone else reading your notes through. You can then listen back as often as you want to.

# Visual Organisers



| Aim | Tips | How to start |
|---|---|---|
| The aim of this is to get away from reading notes or highlighting, and start some active revision. | Stick to subjects where there are obvious links (Science, English, Sport) | Pick one of the diagrams shown below and add the details of a plot, or topic from one of your lessons. |

## Visual or Graphic Organisers




A picture paints a thousand words...well this is kind of similar. For subjects where there are processes or key events in chronological order or obvious links and relationships a graphic organiser can be a welcome break from lots of written text.
You need to reconstruct your revised topics and make the links or connections as you go. Below are a few examples, I'm sure your familiar with one or two of them already
We remember information better when we have a taken an active part in producing it, rather than it being given to us –can you do the same using one of these models?

## *Watch videos

Use videos and appropriate YouTube links explaining and demonstrating what it is you are revising

## *Literacy Doughnut

Using three circles, prioritise the important information or words in the inner circle and then, in descending priority, the middle and the outer. Concentrate initially on remembering the inner circle, then expand out once confident.

## *Role-play

Either in class or with peers/family, role play the topic or situation that you are revising. Visualising 'real life' conversations and actions help with memory recall.

## *Post it party

Place key words/phrases onto post it notes and place them around your house, in rooms and on objects that you may associate with the word. Eg. An energy equation in science may be pleased by the kettle, key words to do with the human body may be placed around the bedroom, plant reproduction key words could be placed on house plants, etc. This will help with visual association.

# Quick Retrieval

| Aim | Tips | How to start |
|---|---|---|
| The aim of this is to test your knowledge of the basic information. You need to master these facts to be able to fully explain them. | Stick to simple facts such as dates, character features, timelines, definitions and equations. Use knowledge organisers. | Pick a subject and particular topic, and use your knowledge organisers to give yourself 10 simple questions |

## Self-Quizzing

This is one of the most effective quick revision activities out there –it only takes a matter of minutes and can be done anywhere and anytime. Simply pick a subject, pick a topic and write down 10 quick retrieval (basic facts) questions. Aim to retrieve the key facts and information; such as dates, names, places, quotes, definitions, formulas and equations. On the reverse answer the questions.

## Flash Cards

Not to be confused with a cue cards, these have either a single word (topic/part of a topic) or diagram or Mnemonic on one side, and the information on the other side. These cards can be used both directions and are great when revising with a friend or family member. Once presented with the one side, you repeat from memory as much as possible from the other side.

*You could also use them as a mix and match activity, through writing key words on one card and the meaning on the other, shuffle them and match them back together. This can be done individually or as a game with a friend/family member.

## Teach Somebody

A great way to learn, is to teach somebody else. You simply need either a small whiteboard and pen, or a notepad and pen. Then select at random a topic or aspect of a subject to "teach" to someone else. Limit yourself to 3 minutes (set a timer) –want to assess how effective you were as a teacher –either set the "student" a simple Retrieval task (Low Stakes Quiz) or ask them to repeat it back –can you find the mistakes?

## *Making connections

"See" the question and think around the topic. Make a story around the topic. Use key words in random sentences in conversation.

# Past Papers

| Aim | Tips | How to start |
|---|---|---|
| The aim of this is to process and refine your revision to meet the demands of an exam. | Learn the meaning of command words (describe, explain, evaluate…). Use the mark scheme to mark your answers. | Search on the internet for 'past exam papers' for your subject and exam board. Your teachers will also have a stash of them ready to use. |

## Past Papers

This is the single-handedly the best revision tool you can use, as long as you complete the process fully.

### *Part 1*

Sit the paper under exam conditions. Make sure you have the correct exam board/subject/tier. Stick to the time given to you on the paper.
This will allow you to become familiar with what will happen in the summer, practice your timings and understand what the paper will look like. The more relaxed you are in the summer the better you will perform.

### *Part 2*

Mark the paper using the official mark scheme. As you go through correct any mistakes that you have made using a different colour pen. These mistakes should then form your next self-quizzing activity. You will learn as much by marking your paper as you will be completing it.

### *Part 3*

It they are available then read the examiner's report for the paper you have completed. This will give you an idea of the main errors and misconceptions made by other students who have completed this exam.

# Practice Essay Writing

| Aim | Tips | How to start |
|---|---|---|
| The aim of this is to perfect your extended writing skills by focussing on both the knowledge needed and the structure required. | Make sure you know what extended writing answers will be included for each subject. Practice this for all subjects, not just English. | Look at the past papers and rewrite any of the extended writing questions. These may be marked with a * or may be worth 6 or more marks. |

## Essay Writing/Extended Writing

Let's aim to perfect your extended writing technique –remembering that good spelling and grammar help too.

The main thing to remember is always answer the question, this seems obvious, but to do so, we must understand the command word and what it means for your response. For example, what's the difference between a Describe and an Explain question. Search "exam command words" on the internet for a definite list and their meanings.

Secondly, don't waffle or give your personal opinion (unless required) –try and avoid telling a story –"I" or "I think" are not useful outside of subjects that require a personal opinion, like RE.

Structure your writing, use an interesting introduction, 4-5 paragraphs (normal essay) and a clever conclusion –as a minimum. Try and link your paragraphs to create a flow which will ensure your response is better received by the marker.

Finally, if you have time, read the original question as you start each new paragraph, this will encourage you to stay on track and answer the question –to help this, always try and either start or finish each paragraph with a topic/question relevant sentence.

## *Decoding exam questions

Differentiate between the command words of a question and the subject-specific words. Have two separate colours and highlight which is which. The words that we left over are additional language that can be ignored. This will help in processing what exactly it is you are being asked to write/answer.

## *Sentence starters

Create a bank of sentence starters that you can use in your essay writing. Practice using these in the practice writing, until you become familiar with the phrases.

## *Organising your page

When practising essay writing, it may be useful to separate your page into sections, using boxes or flow charts. You can then visually link the sections together.

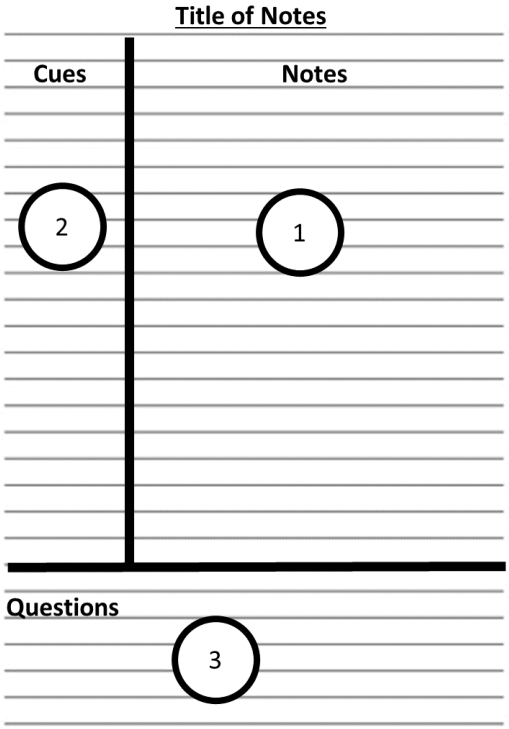
# Rewriting your notes

| Aim | Tips | How to start |
|---|---|---|
| The aim is to provide a robust system for making notes. This method will both condense and organises your notes. | Use the cues section to act as a mini test, can you answer the questions, or recite the key definitions –if not uncover the notes section and go through them again. | Pick a subject and select a particular topic. Divide a piece of paper up as shown and rewrite the main notes using the format shown –be disciplined only write the key information. |

## Connell Note Taking

This technique takes more time, but is incredibly valuable for subjects that have lots of content to learn. Divide a piece of A4 paper as shown in the diagram below.

1. Under the notes section; rewrite the main notes from your class books but be careful to only extract the key information (thus reducing the amount of information you are trying to process).
2. Under the cues section, add quick and simple memory joggers, such as key terms, formulas, examples and dates/places/people.
3. Finally, in the summary section add 5 questions to use for self-quizzing on this topic.




*When re-writing your notes, it may be helpful to sub vocalise at the same time so that you are writing them down and talking them through simultaneously.

## Revision Strategies for Students with Dyslexia

- Visual (spatial): make large colourful posters of important information, or highlight key passages in a different colours. Stick post-its where you will see them e.g. by the sink so you read them whilst brushing your teeth.
- Aural (auditory-musical): record lessons, or record and listen to your revision notes.
- Verbal (linguistic): explain your essay structure, or key concepts to someone else. The act of having to mentally structure and then verbalise a concept to someone else can help with your own understanding and ability to remember.

## Organisation Strategies

- Deal with printed materials as soon as you receive them, check the contents list to make sure everything is there.
- Colour-coding: keep all class notes, essays and materials on a particular subject colour coded and filed together.
- Identify what's important: use highlighters, post-its or annotations so you can find information easily.
- Use a planner: use your phone, computer or a handwritten planner to keep track of projects and deadlines on a daily basis. Work back from the deadline and set yourself realistic goals to complete the assignment on time.
- Reminders: set yourself reminders on your phone for classes, tutor meetings and course deadlines.
- Minimise distractions: set yourself time for a task and switch off your phone, tv and radio. It can also help to keep your study sessions short, but regular.

# English Language – EdExcel GCSE in English Language (please also check your individualised 6 week revision planner shared via SMHW)

| | **Knowledge focus: Define. Identify. Use.** | **Writing** | |
|---|---|---|---|
| **w/c 06/02/2023**<br>14 weeks to go… | Adjectives<br>Adverbs<br>Verbs<br>Features of a letter. | Paper 1 Writing to argue/persuade<br>Due to funding cuts, your headteacher has proposed shortening the school week to 4 days. Write a letter to your headteacher giving your views on this idea. | |
| **w/c 13/02/2023**<br>13 weeks to go… | Metaphor.<br>Simile.<br>Personification.<br>Non-linear narrative. | Paper 2<br>Write about a time when you were afraid.<br>Practise applying your creative writing (pre planned) to this question. | |
| **w/c 20/02/2023**<br>12 weeks to go… | Rule of three.<br>Rhetorical questions.<br>Facts and statistics. | Paper 1<br>Write a speech to encourage your peers to reject 'fast fashion'. | |
| **w/c 27/03/2023**<br>11 weeks to go… | Symbolism.<br>Pathetic fallacy. | Paper 2<br>Write about a time you went on an unexpected journey.<br>Practise applying your creative writing (pre planned) to this question. | |
| **w/c 06/03/2023**<br>10 weeks to go… | Hyperbole.<br>Expert opinion.<br>Satire/humour | Paper 1<br>Write a newspaper article giving your opinions on the growing trend for people to become vegans. | |
| **w/c 13/03/2023**<br>9 weeks to go… | Motif.<br>1st person narrative.<br>Linear narrative. | Paper 2<br>Write about a treasured possession. | |
| **w/c 20/03/2023**<br>8 weeks to go… | Repetition.<br>Imperative verbs.<br>Emotive language. | Paper 1<br>Write a letter to the editor of your local newspaper explaining your views on a plan to open a McDonalds in the local area. | |
| **w/c 27/03/2023**<br>7 weeks to go… | Allegory.<br>Sibilance.<br>Contrast | Paper 1<br>Write about a time you did something you should not have done. Practise applying your creative writing (pre planned) to this question. | |
| **w/c 03/04/2023**<br>6 weeks to go… | Features of a guide.<br>Listing. | Paper 1 | |

| | | | |
|---|---|---|---|
| | Anecdote. | Your school or college is writing an information guide for students who are new to<br>the school/college. Write the section for the guide with the title 'Stress-free Settling In' | |
| **w/c 10/04/2023**<br>5 weeks to go… | Spotlight.<br>Shift. | Paper 2<br>Write about a time you had the courage to fight for something you believed in. | |
| **w/c 17/04/2023**<br>4 weeks to go… | Juxtaposition.<br>Direct address.<br>Types of articles: feature, report, editorial. | Paper 1<br>Your local newspaper has published a report with the title 'Discrimination still exists<br>today; nothing can be done about it'.<br>Write a letter to the newspaper giving your views. | |
| **w/c 24/04/2023**<br>3 weeks to go… | Alliteration.<br>Dialogue.<br>3rd person narrative. | Paper 2<br>Write about a time you were part of a crowd.<br>Practise applying your creative writing (pre planned) to this question. | |
| **w/c 01/05/2023**<br>2 weeks to go… | Euphemism.<br>Oxymoron.<br>Hyperbole<br>Mataphor | Paper 1<br>Write an article for a magazine with the title 'Ups and Downs of Relationships' | |
| **w/c 08/05/2023**<br>1 weeks to go… | Tension.<br>Foreshadowing.<br>Zoomorphism. | Paper 2<br>Write about a time you felt trapped.<br>Practise applying your creative writing (pre planned) to this question. | |

# English Literature – EdExcel GCSE in English Literature (please also check your individualised 6 week revision planner shared via SMHW)

| | **Plot, Character, Poem** | **Essay Question** | |
|---|---|---|---|
| **w/c 06/02/2023**<br>14 weeks to go… | Journey's End: Raleigh | To what extent is Raleigh significant in Journey's End? | |
| **w/c 13/02/2023**<br>13 weeks to go… | Jekyll and Hyde: Lanyon, Jekyll, Utterson | Explain how characters try to help others elsewhere in the novel. | |
| **w/c 20/02/2023**<br>12 weeks to go… | Macbeth: The weird Sisters | Explore how Shakespeare uses the theme of the supernatural in Macbeth. | |
| **w/c 27/03/2023**<br>11 weeks to go… | Macbeth: Power and control | Explore how Shakespeare presents control in Macbeth. | |
| **w/c 06/03/2023**<br>10 weeks to go… | Journey's End: Trotter | Explore the significance of Trotter in Journey's End. | |
| **w/c 13/03/2023**<br>9 weeks to go… | Jekyll and Hyde: Victorian Society – crime in the cities | Explain how terror is presented in Jekyll and Hyde. | |
| **w/c 20/03/2023**<br>8 weeks to go… | Macbeth: Guilt | How does Shakespeare present the theme of guilt in Macbeth? | |
| **w/c 27/03/2023**<br>7 weeks to go… | Poems: Cousin Kate/ Catrin | Compare how the experience of conflict is presented in Cousin Kate and Catrin. | |
| **w/c 03/04/2023**<br>6 weeks to go… | Journey's End: Courage | Explore how courage (bravery/heroism) is presented in Journey's End. | |
| **w/c 10/04/2023**<br>5 weeks to go… | Jekyll and Hyde: Poole, Mr Guest, Enfield | Explain how characters try to help others in Jekyll and Hyde. | |
| **w/c 17/04/2023**<br>4 weeks to go… | Macbeth: Violence | Explain the significance of violence in Macbeth. | |
| **w/c 24/04/2023**<br>3 weeks to go… | Poems: The Man He Killed/ The Poison Tree | Compare how anger is presented in The Poison Tree and The Man He Killed. | |
| **w/c 01/05/2023**<br>2 weeks to go… | Journey's End: Stanhope, Mason | Explore how life in the trenches is presented in Journey's End. | |
| **w/c 08/05/2023** | Jekyll and Hyde: Jekyll, duality | Explore how duality is presented in Jekyll and Hyde. | |

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|---|---|---|---|
| 1 weeks to go… | | | |

| | Revision topics | Textbook Chapters Under Files on Teams | Workbook Pages | Hegarty | Optional Extra |
|---|---|---|---|---|---|
| **w/c 06/02/2023** 14 weeks to go… | Integers and place value.<br>Decimals. Indices, powers and roots.<br>Factors, multiples and primes<br>Ratio<br>proportion | 1,12,13 and 22 | 1-5<br>6,7,10<br>8,9<br>11,12<br>59,60<br>67 | 15-17,37<br>99-101<br>27-36<br>328—334<br>339-343,346,348 | 2.5 Hrs of Hegarty per week<br>Work through your specific clips from the assessments<br>Deadline set as 19th May for all. |
| **w/c 13/02/2023** 13 weeks to go… | Algebra: the basics,<br>Expanding and factorising single brackets,<br>Expressions and substitution into formulae | Ch 2 and 6 | 22-23<br>25,28,29<br>26-27 | 151-159<br>173-175,222<br>160-161,167-171 | OnMaths.com<br>Topic tests |
| **w/c 20/02/2023** 12 weeks to go… | Angles, lines and symmetry<br>Polygons and parallel lines<br>Interior and exterior angles of polygons<br>Perimeter and area<br>3D forms and volume | Ch 3,7 and 15 | 71,73-75<br>72,76<br>76<br>79-81<br>82-84 | 455-461,827-828,488-491<br>822-826,477-491,812-815<br>560-565<br>568-559,584-591,705-706,691-694<br>568-582,829-844,702-704 | Mathsgenie.com<br>Topic papers |
| **w/c 27/03/2023** 11 weeks to go… | Fractions,<br>Fraction, decimals, percentages percentages | Ch 5 | 13-15<br>55<br>58 | 60,61,63,64,77-79 | Corbettmaths.com<br>5 a day |
| **w/c 06/03/2023** 10 weeks to go… | Real-life graphs<br>Straight line graphs | Ch 14 | 40<br>37-39 | 199,205-207,874-880,897-902<br>217,201-214 | Savemyexams.com |
| **w/c 13/03/2023** 9 weeks to go… | Tables<br>Charts and graphs<br>Pie charts | Ch 4 and 16 | 115<br>116-117,123<br>118 | 392-404,450-452,422-424,414-415<br>425-426,430-433 | Maths4 everyone.com |

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|---|---|---|---|---|---|
| | Scatter graphs<br>Statistics and questionnaires<br>Averages | | 119<br>125-127<br>120-122,124 | 427-429<br>453-454<br>392-395,399-401<br>404-410,413-414,416,419-420 | |
| **w/c 20/03/2023**<br>8 weeks to go… | Equations,<br><br>Inequalities,<br>Sequences | Ch 10 and 21 | 30-31<br><br>32-33<br>34-35 | 151-155,280-284,780-781,160-161,175-186,188-189,217<br>265-272<br>196-198,261,263-264,247 | Senecalearning.com |
| **w/c 27/03/2023**<br>7 weeks to go… | Right-angled triangles: Pythagoras and triognometry.<br>Circles, cylinders, cones and spheres. | Ch 11, 15 and 19 | 90-94<br><br>103-108 | 497-502,508-515,306,845<br><br>592,534-536,539-547,584-586,570-577,579-582,17,56,130 | bbc.com/bitesize |
| **w/c 03/04/2023**<br>6 weeks to go… | Rearranging equations, graphs of cubic and reciprocal functions and simultaneous equations | Ch 10 and 18 | | | Mrbartonmaths.com |
| **w/c 10/04/2023**<br>5 weeks to go… | Transformations: rotations, translations,<br>reflections & enlargements<br>Similarity and congruence in 2D.<br>Vectors. | Ch 7 | 86,88<br><br>87,89<br>109-111<br>112 | 680-683,637-638,648-654<br><br>639-645,650-654,608-614<br>680-682,608-612,642,488-491,870-871<br>622-626 | Mathedup.co.uk |
| **w/c 17/04/2023**<br>4 weeks to go… | Fractions & reciprocals.<br>Indices and standard form.<br>Rearranging equations, graphs of cubic and reciprocal functions and simultaneous equations | Ch 9 and 17 | 13-15<br>9,17-18<br>48-50 | 173-174,102-107,121-128<br>154,280-287,325,348,213,298-301,201,190-193,195,218-219,265,268,272 | |
| **w/c 24/04/2023**<br>3 weeks to go… | Probability | Ch 8 and 20 | 128-129,132-133 | 349-357,670, 356-384 | |
| **w/c 01/05/2023** | Quadratic equations: expanding, factorising and<br>Quadratic graphs. | Ch 10 | 46-47<br><br>44-45 | 160-165,221-224,230,234,253 | |

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| 2 weeks to go… | Multiplicative reasoning. | | 62-66,68,75 | 251-255,257<br>692-697,339-348,705-711,716-729,731,734-738,84-98,763-769,771-772 | |
| **w/c 08/05/2023**<br>1 weeks to go… | Plans, elevations and nets.<br>Constructions, loci and bearings. | Ch 11 and 15 | 97<br>99-102 | 592,455-461,829-844<br>680-683,660-669,674-679,492-496,864-871 | |

# Maths

| | Revision topics | Textbook Chapters Under Files on Teams | Workbook Pages | Hegarty | Optional Extra |
|---|---|---|---|---|---|
| **w/c 06/02/2023** 14 weeks to go… | Calculations, checking and rounding.<br>Indices, roots, reciprocals and hierarchy of operations.<br>Factors, multiples and primes.<br>Standard form and surds. | Ch 1, 13 and 17 | 7<br>2-4<br><br>1<br>8,12,49 | 129-134,17,56,47-50<br>99-110,120,150,24,44<br><br>27-36<br>121-128,111-119 | 2.5 Hrs of Hegarty per week<br>Work through your specific clips from the assessments<br>Deadline set as 19th May for all. |
| **w/c 13/02/2023** 13 weeks to go… | Algebra:the basics<br>Setting up rearranging and solving equations<br>Sequences | Ch 2,6 and 21 | 16-18,21<br>19-20,<br>22-24 | 223-228,782-787,166,154,160-161<br>175-189,278-284,325-327,151-153 | OnMaths.com<br>Topic tests |
| **w/c 20/02/2023** 12 weeks to go… | Averages and range<br>Representing and interpreting data<br>Scatter graphs<br>Collecting data<br>Cumulative Frequency, box plots and histograms | Ch 4 and 16 | 110-112<br>113,121-122<br>114<br>115-117<br>118-120 | 399-424,430-433<br>425-429,450-452<br>453-454<br>392-400<br>437-439,411-414,418-421,401,434-440,442-449 | Mathsgenie.com<br>Topic papers |
| **w/c 27/03/2023** 11 weeks to go… | Fractions,<br>Percentages,<br>Ratio & Proportion | Ch 5, 12 and 22 | 5,6,9<br>59,62-64<br>60-71 | 53-54,59-64,77-80<br>75-76,149,55,82-98<br>328-342,865,868,346,739-742 | Corbettmaths.com<br>5 a day |
| **w/c 06/03/2023** 10 weeks to go… | Polygons, angles and parallel lines.<br>Pythagoras' Theorem and trigonometry. | Ch 3 and 19 | 73-75<br>76-79 | 560-565,481-484,488-491<br>845-853,513-4,497-504 | Savemyexams.com |
| **w/c 13/03/2023** 9 weeks to go… | Graphs: the basics and real-life graphs. Linear graphs and coordinate geometry. Quadratic, cubic and other graphs<br>Reciprocal and exponential graphs | Ch 14 and 18 | 30,55<br>25-27<br>28-28,42<br>53-56 | 874-886,894-902,200<br>201-217<br>298-299,251-258,777-778,300-301<br>300-302,800-811,307-303,887-897 | Maths4 everyone.com |

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| **w/c 20/03/2023**<br>8 weeks to go… | Perimeter, area and 3D forms<br>Circles, cylinders, cones and spheres<br>Accuracy and bounds | Ch 7,11 and 15 | 80-82,87<br>83-86,<br>10-11 | 570-578,549-559,833-844,691,699<br>534-541,584-591,572-575<br>137-139 | Senecalearning.com |
| **w/c 27/03/2023**<br>7 weeks to go… | Transformations,<br>Constructions, loci and bearings | Ch 7 and 11 | 88-90<br>91-95 | 637-658,680-690<br>660-669,674-679,496,531 | bbc.com/bitesize |
| **w/c 03/04/2023**<br>6 weeks to go… | Solving quadratic and simultaneous equations.<br>Inequalities.<br>Changing the subject of the formulae, algebraic fractions, solving complex equations, surds, proof | Ch 6 and 10 | 31-35, 42<br><br>37<br>46-52 | 223-226,228-246,190,195,218-220<br>265-277,370-371<br>118-119,229,172,187,205-207,325-327,288-297 | Mrbartonmaths.com |
| **w/c 10/04/2023**<br>5 weeks to go… | Probability | Ch 8 and 20 | 123-128 | 361-391 | Mathedup.co.uk |
| **w/c 17/04/2023**<br>4 weeks to go… | Multiplicative reasoning<br>Direct and inverse proportion | Ch 22 | 61,65-67,71,72<br>68-70 | 763-772,716-738,<br>344-348 | |
| **w/c 24/04/2023**<br>3 weeks to go… | Similarity and congruence in 2D & 3D. Graphs of trigonometric functions.<br>Further trigonometry. | Ch 7 and 18 | 39<br>99-103<br>110-112 | 682-690,612-621,578<br>303-313,845-853<br>854-863,517-533,505-507 | |
| **w/c 01/05/2023**<br>2 weeks to go… | Quadratics, expanding more than two brackets, sketching graphs, graphs of circles, cubes and quadratics | Ch 10 and 18 | 28-29,41-45 | 252-260,243,246,166,218-220,318,265-277,322-323 | |
| **w/c 08/05/2023**<br>1 weeks to go… | Circle theorems,<br>Circle geometry<br>Vectors and proof | Ch 11 | 105<br>36<br>106-107 | 593-606,816-820<br>778-779,314-320,669<br>622-636 | |

# Science – AQA GCSE Combined Science: Trilogy

*Remember this qualification is two GCSEs, you will need to spend more time revising to cover content. Remember to cover paper 2 topics in this time as well as time diminishes once the exams start.*

| | ***Biology– 1.5 hours*** | ***Chemistry – 1.5 hours*** | ***Physics 1.5 hours*** |
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| **w/c 06/02/2023** 14 weeks to go… | Cells (paper 1)<br>Eukaryotic, Prokaryotic, organelles and their function, *size and scale*, magnification equation, how to use a microscope, specialised cells, stem cells and ethics of using these in therapy. Osmosis (+osmosis practical), active transport and diffusion<br>PK WB (on teams) Pages- 25-29<br>https://www.youtube.com/watch?v=sdpmVQooYS4&feature=youtu.be | Atomic structure and Periodic table (paper 1)<br>Properties of elements, compounds, mixtures, separation techniques, history of the periodic table, atomic structure, electron configuration, history of the atom<br>PK workbook (on teams) pages- 89-95<br>https://www.youtube.com/watch?v=bgyuXU97jaI | Energy (paper 1)- energy types, sources and energy demands. Look at calculations needed, SHC practicals, conduction, convection and radiation.<br>PK workbook (on teams) pages 153- 158<br>https://www.youtube.com/watch?v=tDkBhy-Y1Z8 |
| **w/c 13/02/2023** 13 weeks to go… | Organisation (paper 1)<br>Hierachy (cells-tissues-organ size), digestive system, enzymes, digestive enzymes, *food tests*, the heart and lungs, exchange surfaces, transport in plants (xylem and phloem)<br>PK Workbook- 30-36<br>https://www.youtube.com/watch?v=DJ0lZGkDx6A&feature=youtu.be | Bonding types & quantitative chemistry (paper 1)<br>Electron configuration, metallic, covalent and ionic bonding, properties of each bonding type, giant structures and their properties. Relative atomic and molecular mass. Moles and Avogadro's number. Reacting masses<br>PK Workbook- 96-105<br>https://www.youtube.com/watch?v=YpEQ-NWxKBc | Electricity (paper 1)- circuit diagrams and rules, rules of series and parallel, components and component graphs and uses, power, plugs, AC/DC, national grid<br>PK WB pgs- 159-164<br>https://www.youtube.com/watch?v=jSA4WaLSVEA |
| **w/c 20/02/2023** 12 weeks to go… | Diseases (paper 1)<br>Communicable and non communicable diseases, our defence system, human diseases and treatment, developing drugs (timeline), risk factors for non- comm drugs, cancer, smoking and drug misuse<br>PK WB- 37-41<br><br>https://www.youtube.com/watch?v=m7pxdTJ9NPI&feature=youtu.be | Chemical and energy changes (paper 1)<br>Reactivity series, displacement, pH scales, electrolysis, testing for gases. Endo and exothermic reactions reaction profiles, bond enthalpies.<br>PK WB pages- 106-114<br>https://www.youtube.com/watch?v=KTmXEIiU_Go | Particles (paper 1) - density, changes of state, particle theory, irregular density experiment, pressure, radiation types, half lives, radiation equations<br>PK WB pgs- 165-172<br>https://www.youtube.com/watch?v=cZz9oGgJOL0&t=2s<br><br>https://www.youtube.com/watch?v=YFVYUSvUBoo |

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| **w/c 27/03/2023**<br>11 weeks to go… | Bioenergetics (paper 1)<br>Photosynthesis, limiting factors, required practicals, equation, uses of glucose, aerobic and anaerobic respiration, effects of exercise<br>PK WB- 42-45<br>https://www.youtube.com/watch?v=1KIAWiHQ4sM&feature=youtu.be | Rate of Chemical reactions (paper 2)<br>Measuring rates of reaction using graphs. Investigating rates of reaction by experiment. Factors affecting rate and the collision theory. Reversible reactions. Equilibrium and Le Chatelier's principle. Effects of changing concentration, pressure and temperature.<br>PK WB 116-119<br>https://www.youtube.com/watch?v=7i90fiz9SmY | Forces (paper 2)- vector and scalar differences, parallelograms of forces, weight and mass, speed-time, distance time graphs, work done, velocity, acceleration<br>PK WB pgs- 174-181<br>https://www.youtube.com/watch?v=Rz4XBSKNGXg |
| **w/c 06/03/2023**<br>10 weeks to go… | Homeostasis (paper 2)<br>Nervous system, reflexes, hormones and endocrine system, *menstrual cycle*, contraception, *IVF<br>PK Workbook- 47-54<br>https://www.youtube.com/watch?v=xOfqw7MbU8k&feature=youtu.be | Organic Chemistry (paper 2)<br>Fractional distillation of crude oil including viscosity, flammability and boiling point changes. Complete and incomplete combustion. Cracking using steam or a catalyst. Testing for alkenes using bromine water.<br>PK WB 120-126<br><br>Chemical analysis (paper 2)<br>Pure substances and mixtures. Formulations. Separating mixtures using chromatography. Tests for gases.<br>PK Workbook pages- 127-130<br>https://www.youtube.com/watch?v=YyUQiUddBA4 | Waves (paper 2) - types, ripple tank and string wave practicals, electromagnetic spectrum types of waves and uses, reflection and refraction, refraction index<br>PK workbook pages 182-188<br>https://www.youtube.com/watch?v=9JPNVJ_LC3E |
| **w/c 13/03/2023**<br>9 weeks to go… | Reproduction (paper 2)<br>Punnett squares, chromosomes, genes, alleles, inherited disorders, genetic screening<br>PK WB- 55-62<br>https://www.youtube.com/watch?v=npl10a6p8jQ&feature=youtu.be | Chemistry of the atmosphere (paper 2)<br>Gases in the atmosphere, how they have changed over time, greenhouse gases, global warming, atmospheric pollution and the carbon footprint.<br>PK WB pages- 131-134<br>https://www.youtube.com/watch?v=gxCRsqXZzeU&feature=youtu.be | Energy (paper 1)<br>Recap your notes and questions, answer quick fire questions on PK workbook 156<br>https://www.youtube.com/watch?v=q5CwATii6OA |

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| **w/c 20/03/2023**<br>8 weeks to go… | Evolution (paper 2)<br>Classification, Darwin's theories, fossils, extinction<br>PK workbook 55-62<br>https://www.youtube.com/watch?v=npl10a6p8jQ&feature=youtu.be | Using resources (paper 2)<br>Finite and renewable resources, potable water, purifying water, waste water treatment, extracting metals using bioleaching and phytomining. Life cycle assessments. Reduce, reuse and recycle.<br>PK WB- 135-138<br>https://www.youtube.com/watch?v=KyVf2bVLl08&feature=youtu.be | Electricity (paper 1)<br>Recap your notes and questions, answer quick fire questions on PK workbook 162<br>https://www.youtube.com/watch?v=62RyyfKZoYg |
| **w/c 27/03/2023**<br>7 weeks to go… | Ecology (paper 2)<br>Uses of natural resources, deforestation, decay, biomass, sustainable farming<br>PK Workbook- 63-69<br>https://www.youtube.com/watch?v=SKDn90HK98Q&feature=youtu.be | Atomic structure, periodic table and bonding types recap (paper 1)<br>Recap your notes and questions, answer quick fire questions on PK workbook 92, 99<br>https://www.youtube.com/watch?v=mjlIPJ_c018&feature=youtu.be<br>https://www.youtube.com/watch?v=9bbCFUyluWg&feature=youtu.be | Particles (paper 1)<br>Recap your notes and questions, answer quick fire questions on PK workbook 171<br>https://www.youtube.com/watch?v=bRzRjfvoU-E |
| **w/c 03/04/2023**<br>6 weeks to go… | Full paper 1 practise (either on Microsoft teams or from AQA website below)<br>https://www.aqa.org.uk/subjects/science/gcse/combined-science-trilogy-8464/assessment-resources?f.Resource+type%7C6=Mark+schemes&f.Resource+type%7C6=Question+papers&sort=date&num_ranks=20 | Bonding & quantitative Chemistry (paper 1)<br>Recap your notes and questions, answer quick fire questions on PK workbook 99,100 & 104<br>https://www.youtube.com/watch?v=9bbCFUyluWg&feature=youtu.be | Full paper 1 practise (either on Microsoft teams or from AQA website below)<br>https://www.aqa.org.uk/subjects/science/gcse/combined-science-trilogy-8464/assessment-resources?f.Resource+type%7C6=Mark+schemes&f.Resource+type%7C6=Question+papers&sort=date&num_ranks=20 |
| **w/c 10/04/2023**<br>5 weeks to go… | Cells (paper 1)<br>Recap your notes and questions, answer quick fire questions on PK workbook 27<br>https://www.youtube.com/watch?v=E9ZiTAaRC-E&feature=youtu.be | Chemical and energy changes (paper 1)<br>Recap your notes and questions, answer quick fire questions on PK workbook 109, 113<br><br>https://www.youtube.com/watch?v=L7829UGifpM | Forces (paper 2)<br>Recap your notes and questions, answer quick fire questions on PK workbook 179<br>https://www.youtube.com/watch?v=jfjb1pnH8zw |
| **w/c 17/04/2023** | Organisation (paper 1)<br>Recap your notes and questions, answer quick fire questions on PK workbook 33 | Rates of reaction and Organic Chemistry (paper 2) | Waves (paper 2)<br>Recap your notes and questions, answer quick fire questions on PK workbook 186 |

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| 4 weeks to go… | https://www.youtube.com/watch?v=QnsRz0Xhup8&feature=youtu.be | Recap your notes and questions, answer quick fire questions on PK workbook 118,124-125<br>https://www.youtube.com/watch?v=OyXq2HYCKL0&t=423s | https://www.youtube.com/watch?v=AEFwEDC6DkQ |
| **w/c 24/04/2023**<br>3 weeks to go… | Disease & Bioenergetics (paper 1)<br>Recap your notes and questions, answer quick fire questions on PK workbook<br>Bioenergetics- 44<br>https://www.youtube.com/watch?v=1nuYpKaQ3jA&feature=youtu.be<br><br>Disease- 40<br>https://www.youtube.com/watch?v=pq3B_sozPKo&feature=youtu.be | Chemical Analysis, Chemistry of the atmosphere and Using Resources (paper 2)<br>Recap your notes and questions, answer quick fire questions on PK workbook 129 &133 & 137<br><br>https://www.youtube.com/watch?v=DznhhA2QHUg<br><br>https://www.youtube.com/watch?v=vMKAHdoc-g0<br>https://www.youtube.com/watch?v=xBUXqfa2gHo | Electromagnetism (paper 2)<br>Magnetic fields, motor effect,<br>PK WB pgs- 189-194<br>Quick fire questions page 192<br>https://www.youtube.com/watch?v=mnigg3MGslY<br>https://www.youtube.com/watch?v=AEFwEDC6DkQ |
| **w/c 01/05/2023**<br>2 weeks to go… | Full paper 2 practise (either on Microsoft teams or from AQA website below)<br>https://www.aqa.org.uk/subjects/science/gcse/combined-science-trilogy-8464/assessment-resources?f.Resource+type%7C6=Mark+schemes&f.Resource+type%7C6=Question+papers&sort=date&num_ranks=20 | Full paper 2 practise (either on Microsoft teams or from AQA website below)<br>https://www.aqa.org.uk/subjects/science/gcse/combined-science-trilogy-8464/assessment-resources?f.Resource+type%7C6=Mark+schemes&f.Resource+type%7C6=Question+papers&sort=date&num_ranks=20 | Full paper 2 practise (either on Microsoft teams or from AQA website below)<br>https://www.aqa.org.uk/subjects/science/gcse/combined-science-trilogy-8464/assessment-resources?f.Resource+type%7C6=Mark+schemes&f.Resource+type%7C6=Question+papers&sort=date&num_ranks=20 |
| **w/c 08/05/2023**<br>1 weeks to go… | Full paper 1 practise (either on Microsoft teams or from AQA website below)<br>https://www.aqa.org.uk/subjects/science/gcse/combined-science-trilogy-8464/assessment-resources?f.Resource+type%7C6=Mark+schemes&f.Resource+type%7C6=Question+papers&sort=date&num_ranks=20<br>**Paper 1 whole video-** | Full paper 1 practise (either on Microsoft teams or from AQA website below)<br>https://www.aqa.org.uk/subjects/science/gcse/combined-science-trilogy-8464/assessment-resources?f.Resource+type%7C6=Mark+schemes&f.Resource+type%7C6=Question+papers&sort=date&num_ranks=20<br>Chemistry paper 1 (whole) | Full paper 1 practise (either on Microsoft teams or from AQA website below)<br>https://www.aqa.org.uk/subjects/science/gcse/combined-science-trilogy-8464/assessment-resources?f.Resource+type%7C6=Mark+schemes&f.Resource+type%7C6=Question+papers&sort=date&num_ranks=20 |

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| | https://www.youtube.com/watch?v=mKYQ-K23Mr4<br>**Quick fire questions paper 1-**<br>https://www.youtube.com/watch?v=Oq-79mTaHHw<br>**Paper 2 whole video-**<br>https://www.youtube.com/watch?v=Uqti-xPnT-8<br>**Quick fire questions paper 2-**<br>https://www.youtube.com/watch?v=pPqVf5N2dT0 | https://www.youtube.com/watch?v=MpQ-3YAwNhI<br>Quick fire Questions<br>https://www.youtube.com/watch?v=jrxM1Jdv2LM<br>Chemistry paper 2 (whole)<br>https://www.youtube.com/watch?v=_HJu8WTtZJU<br>Quick fire Questions<br>https://www.youtube.com/watch?v=RgeaVWnZ4fo | **Paper 1 whole video**<br>https://www.youtube.com/watch?v=xtw-Z0nllA4<br>**Paper 1 quick fire questions**<br>https://www.youtube.com/watch?v=FosCAjZTlWs<br>**Paper 2 whole video**<br>https://www.youtube.com/watch?v=X1aMXCr75Kw<br>**Paper 2 quick fire questions**<br>https://www.youtube.com/watch?v=8aZPIgnX-2w |

# Triple Science – AQA GCSE Biology

*Exampro questions for each topic are loaded into your Teams page under 'Exampro countdown to exams' in the 'Revision Resources' file.*

| | *Paper 1 – 1 hour* | *Paper 2 – 1 hour* | *Optional Extra* |
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| **w/c 06/02/2023**<br>14 weeks to go… | Cells- prokaryotic and eukaryotic, organelles, specialisation, stem cells and their uses (+ethics), mitosis. Req prac microscopy, size and scale (micrometres etc)<br>PK WB pg-25-29<br>https://www.youtube.com/watch?v=sdpmVQooYS4 | Homeostasis- nervous system<br>Basic homeostasis, reflexes, nervous system structure, the brain, the eye, problems with the eye<br>PK WB pg- 47-54<br>https://www.youtube.com/watch?v=xOfqw7MbU8k | Exampro questions on teams |
| **w/c 13/02/2023**<br>13 weeks to go… | Cells 2- Transport- active transport, diffusion, osmosis, osmosis required practical.<br>PK WB pg- 25-29<br>https://www.youtube.com/watch?v=sdpmVQooYS4 | Homeostasis- body temperature control, removing waste (liver and urea), kidney, dialysis and transplants<br>PK WB pg- 47-54<br>https://www.youtube.com/watch?v=xOfqw7MbU8k | Exampro questions on teams |
| **w/c 20/02/2023**<br>12 weeks to go… | Organisation-<br>Enzymes, hierarchy (difference between cell, tissue, organ, organism), chemistry of food, digestive enzymes (location, product, function), bile, factors affecting enzyme action, making digestion efficient, **food tests**<br>PK WB pg-30-36<br>https://www.youtube.com/watch?v=DJ0lZGkDx6A | Homeostasis- hormones<br>Hormonal control, glucose levels & diabetes, negative feedback, reproduction, menstrual cycle, contraception and fertility, plant hormones<br>PK WB pg- 47-54<br>https://www.youtube.com/watch?v=xOfqw7MbU8k | Exampro questions on teams |
| **w/c 27/03/2023**<br>11 weeks to go… | Organisation-<br>Blood, vessels, heart, lungs, breathing, gaseous exchange, tissues in plants (xylem and phloem), transpiration and factors affecting transpiration<br>PK WB pg-30-36<br>https://www.youtube.com/watch?v=DJ0lZGkDx6A | Ecology- competition in organisms, distribution (Quadrat req. prac), adaptations in organisms, the carbon cycle, nutrient/ nitrogen cycle, decomposition<br>PK WB pg-55-62<br>https://www.youtube.com/watch?v=SKDn90HK98Q | Exampro questions on teams |
| **w/c 06/03/2023**<br>10 weeks to go… | Communicable diseases- | Reproduction- alleles and chromosomes, punnett squares, inherited disorders, genetic screening | Exampro questions on teams |

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| | Health, req prac culturing microbes, preventing diseases, viral, bacterial, fungal and protest diseases, plant diseases<br>PK WB pg-37-41<br>https://www.youtube.com/watch?v=m7pxdTJ9NPI | PK WB pg-55-62<br>https://www.youtube.com/watch?v=npl10a6p8jQ | |
| **w/c 13/03/2023**<br>9 weeks to go… | Diseases-<br>Vaccinations, testing drugs, **monoclonal antibodies**,antibiotics<br>PK WB pg-37-41<br>https://www.youtube.com/watch?v=m7pxdTJ9NPI | Variation- Natural selection, genetic engineering, selective breeding, cloning, adult cell cloning, ethics<br>PK WB pg-55-62<br>https://www.youtube.com/watch?v=npl10a6p8jQ | Exampro questions on teams |
| **w/c 20/03/2023**<br>8 weeks to go… | Non communicable diseases-<br>Cancer, diet, exercise and risk factors, smoking, carcinogens<br>PK WB pg-37-41<br>https://www.youtube.com/watch?v=m7pxdTJ9NPI | | Educake test (paper 1) |
| **w/c 27/03/2023**<br>7 weeks to go… | Bioenergetics<br>Photosynthesis and respiration (whole chapter)+ metabolism<br>PK WB pg- 42-45<br>https://www.youtube.com/watch?v=1KIAWiHQ4sM | Evolution- History of genetics, Darwinism, fossils and extinction, antibiotic resistance, **classification and new classification**<br>PK WB pg-55-62<br>https://www.youtube.com/watch?v=npl10a6p8jQ | Mock paper 1 (complete and mark) select from either teams or the website below<br>https://www.aqa.org.uk/subjects/science/gcse/biology-8461/assessment-resources?f.Resource+type%7C6=Mark+schemes&f.Resource+type%7C6=Question+papers&sort=date&num_ranks=20 |
| **w/c 03/04/2023**<br>6 weeks to go… | Cells quick fire questions<br>PK WB pg-27<br>https://www.youtube.com/watch?v=E9ZiTAaRC-E | Ecology- pollution, global warming, biodiversity, biomass transfers and feeding relationships, making sustainable food, secure food<br>PK WB pg-63-69<br>https://www.youtube.com/watch?v=SKDn90HK98Q | Mock paper 2 (complete and mark) select from either teams or the website below<br>https://www.aqa.org.uk/subjects/science/gcs |

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| | | | e/biology-8461/assessment-resources?f.Resource+type%7C6=Mark+schemes&f.Resource+type%7C6=Question+papers&sort=date&num_ranks=20 |
| **w/c 10/04/2023**<br>5 weeks to go… | Organisation quick fire questions<br>PK WB pg-33<br>https://www.youtube.com/watch?v=QnsRz0Xhup8 | Homeostasis<br>Checklists and add to notes/ revise subjects you are unsure of and complete quick fire questions<br>PK WB pg-51<br>https://www.youtube.com/watch?v=EMf0FbJI9BU | Exampro questions on teams |
| **w/c 17/04/2023**<br>4 weeks to go… | Disease quick fire questions<br>PK WB pg-40<br>https://www.youtube.com/watch?v=pq3B_sozPKo | Reproduction<br>Checklists and add to notes/ revise subjects you are unsure of and complete quick fire questions<br>PK WB pg-60<br>https://www.youtube.com/watch?v=IL-dUnKmksY&feature=youtu.be | Educake test (paper 2) |
| **w/c 24/04/2023**<br>3 weeks to go… | Bioenergetics quick fire questions<br>PK WB pg- 44<br>https://www.youtube.com/watch?v=1nuYpKaQ3jA | Ecology<br>Checklists and add to notes/ revise subjects you are unsure of and complete quick fire questions<br>PK WB pg- 67<br>https://www.youtube.com/watch?v=NorHSgd7Yyc | Exampro questions on teams |
| **w/c 01/05/2023**<br>2 weeks to go… | Mock paper 1 (selected from website or use predicted paper from teams revision file) and self mark<br>https://www.aqa.org.uk/subjects/science/gcse/biology-8461/assessment-resources?f.Resource+type%7C6=Mark+schemes&f.Resource+type%7C6=Question+papers&sort=date&num_ranks=20<br>Video on the whole of Biology-<br>https://www.youtube.com/watch?v=mKYQ-K23Mr4 | Mock paper 2 (selected from website or use predicted paper from teams revision file) and self mark<br>https://www.aqa.org.uk/subjects/science/gcse/biology-8461/assessment-resources?f.Resource+type%7C6=Mark+schemes&f.Resource+type%7C6=Question+papers&sort=date&num_ranks=20<br>**Video on whole of Bio paper 2-** | Exampro questions on teams |

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| | | https://www.youtube.com/watch?v=Uqti-xPnT-8 | |
| **w/c 08/05/2023**<br>1 weeks to go… | Another mock paper 1 (selected from website or use predicted paper from teams revision file) and self mark<br>https://www.aqa.org.uk/subjects/science/gcse/biology-8461/assessment-resources?f.Resource+type%7C6=Mark+schemes&f.Resource+type%7C6=Question+papers&sort=date&num_ranks=20<br>**Quick fire questions paper 1-**<br>https://www.youtube.com/watch?v=Oq-79mTaHHw | Another mock paper 2 (selected from website or use predicted paper from teams revision file) and self mark<br>https://www.aqa.org.uk/subjects/science/gcse/biology-8461/assessment-resources?f.Resource+type%7C6=Mark+schemes&f.Resource+type%7C6=Question+papers&sort=date&num_ranks=20<br>**Quick fire questions paper 2-**<br>https://www.youtube.com/watch?v=pPqVf5N2dT0 | Exampro questions on teams |

# Triple Science – AQA GCSE Chemistry

*Exampro questions for each topic are loaded into your Teams page under 'Exampro countdown to exams' in the 'Revision Resources' file.*

| | ***Revision topic 1 – 1 hour*** | ***Revision topic 2 – 1 hour*** | ***Optional Extra*** |
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| **w/c 06/02/2023**<br>14 weeks to go… | Atomic structure and Periodic table (paper 1) Properties of elements, compounds, mixtures. Separation techniques. History of the atom, atomic structure, electron configuration. The periodic table. Noble gases, group 1, group 7 and transition metals.<br>PK workbook (on teams) pages 89 - 95<br>https://www.youtube.com/watch?v=bgyuXU97jaI | Measuring rates of reaction using graphs. Investigating rates of reaction by experiment. Factors affecting rate and the collision theory. Reversible reactions. Equilibrium and Le Chatelier's principle. Effects of changing concentration, pressure and temperature.<br>PK WB 116-119<br>https://www.youtube.com/watch?v=7i90fiz9SmY | Exampro questions (on teams) |
| **w/c 13/02/2023**<br>13 weeks to go… | States of matter. Ions and ionic bonding, properties of ionic compounds. Covalent bonding in simple molecules and giant covalent structures. Metallic bonding and properties of metals including alloys. Fullerenes and graphene. Nanoparticles.<br>PK WB 96-101<br>https://www.youtube.com/watch?v=9bbCFUyluWg&feature=youtu.be | Hydrocarbons and the alkane family. Fractional distillation of crude oil including viscosity, flammability and boiling point changes. Complete and incomplete combustion. Cracking using steam or a catalyst. Testing for alkenes using bromine water.<br>PK WB 120-126<br>https://www.youtube.com/watch?v=ZeUNWY7YDAo | Exampro |
| **w/c 20/02/2023**<br>12 weeks to go… | Conservation of mass. Relative atomic and molecular mass. Moles and Avogadro's number. Balancing equations. Reacting masses and calculation of percentage yield. Atom economy. Calculating concentration. Titrations, including the calculation. Volumes of Gases.<br>PK WB 102-105<br><br>https://www.youtube.com/watch?v=WqhZBnR743I | Structure, combustion and reactions of alkenes. Structure, uses and reactions of alcohols. Making alcohol by fermentation or hydration of ethene. Structure and reactions of carboxylic acids. Names and structure of esters.<br>PK WB 120-126<br>https://www.youtube.com/watch?v=ZeUNWY7YDAo | Exampro |
| **w/c 27/03/2023**<br>11 weeks to go… | The reactivity series and displacement reactions. Extraction of metals using reduction and electrolysis. Ionic half equations and reduction and | Addition polymerisation using alkenes as monomers.eg. ethene to polyethene. Condensation polymerisation using 2 functional groups eg making polyesters from diols and | Exampro |

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| | oxidation. Making salts. The pH scale and hydrogen ions. Neutralisation. Strong and weak acids.<br>PK WB 106-110<br>https://www.youtube.com/watch?v=KTmXEIiU_Go | dicarboxylic acids. Structure of DNA. Structure of amino acids and formation of proteins.<br>PK WB 120-126<br>https://www.youtube.com/watch?v=ZeUNWY7YDAo | |
| **w/c 06/03/2023**<br>10 weeks to go… | Electrolysis and the movement of ions in a molten ionic compound. Balanced half equations. Extraction of aluminium. Electrolysing solutions – which ion is discharged. Testing for gases.<br>PK WB 106-110<br>https://www.youtube.com/watch?v=KTmXEIiU_Go | Pure substances and mixtures. Formulations. Separating mixtures using chromatography. Tests for gases. Using flame tests or NaOH to test for positive ions including equations. Testing for negative ions. Use of instrumental methods such as flame emission spectroscopy.<br>PK WB 127-130<br>https://www.youtube.com/watch?v=YyUQiUddBA4 | Mock paper 1 practice from website:<br>https://www.aqa.org.uk/subjects/science/gcse/chemistry-8462/assessment-resources?f.Resource+type%7C6=Mark+schemes&f.Resource+type%7C6=Question+papers&sort=date&num_ranks=20 |
| **w/c 13/03/2023**<br>9 weeks to go… | Energy changes in exothermic and endothermic reactions and reaction profiles for each. Calculating bond enthalpies and the overall energy change. Simple cells, rechargeable and non-rechargeable batteries. Hydrogen fuel cells and their half equations.<br>PK WB 111-114<br>https://www.youtube.com/watch?v=L7829UGifpM&t=2s | Gases in the atmosphere, how they have changed over time, greenhouse gases, global warming, atmospheric pollution and the carbon footprint.<br>PK WB 131-134<br>https://www.youtube.com/watch?v=gxCRsqXZzeU&feature=youtu.be | Mock paper 2 practice from website<br>https://www.aqa.org.uk/subjects/science/gcse/chemistry-8462/assessment-resources?f.Resource+type%7C6=Mark+schemes&f.Resource+type%7C6=Question+papers&sort=date&num_ranks=20 |
| **w/c 20/03/2023**<br>8 weeks to go… | Full paper 1 practise (either on Microsoft teams or from AQA website below)<br>https://www.aqa.org.uk/subjects/science/gcse/combined-science-trilogy-8464/assessment-resources?f.Resource+type%7C6=Mark+schemes&f.Resource+type%7C6=Question+papers&sort=date&num_ranks=20 | Finite and renewable resources, potable water, purifying water, waste water treatment, extracting metals using bioleaching and phytomining. Life cycle assessments. Reduce, reuse and recycle.<br>PK WB 135 -138<br>https://www.youtube.com/watch?v=KyVf2bVLl08&feature=youtu.be | Exampro |
| **w/c 27/03/2023**<br>7 weeks to go… | Atomic structure<br>Recap your notes and questions, answer quick fire questions on PK workbook 92-93 | Preventing corrosion. Properties of alloys. Composition of glass, ceramics and composites. Properties of polymers | Exampro |

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| | https://www.youtube.com/watch?v=mjlIPJ_c018&feature=youtu.be | The Haber process and the equilibrium conditions required. Making and using NPK fertilisers.<br>PK WB 135 –138<br>https://www.youtube.com/watch?v=KyVf2bVLl08&feature=youtu.be | |
| **w/c 03/04/2023**<br>6 weeks to go… | Bonding<br>Recap your notes and questions, answer quick fire questions on PK workbook 99-100<br>https://www.youtube.com/watch?v=9bbCFUyIuWg&feature=youtu.be | Full paper 2 practise (either on Microsoft teams or from AQA website below)<br>https://www.aqa.org.uk/subjects/science/gcse/combined-science-trilogy-8464/assessment-resources?f.Resource+type%7C6=Mark+schemes&f.Resource+type%7C6=Question+papers&sort=date&num_ranks=20 | Exampro |
| **w/c 10/04/2023**<br>5 weeks to go… | Quantitative Chemistry<br>Recap your notes and questions, answer quick fire questions on PK workbook 104<br>https://www.youtube.com/watch?v=8uqWdmIKd7c&feature=youtu.be | Rates of reaction<br>Recap your notes and questions, answer quick fire questions on PK workbook 118<br>https://www.youtube.com/watch?v=C-tHYZwisNs&feature=youtu.be | Exampro |
| **w/c 17/04/2023**<br>4 weeks to go… | Chemical changes<br>Recap your notes and questions, answer quick fire questions on PK workbook 109<br>https://www.youtube.com/watch?v=7Nrma6v0A8I&feature=youtu.be | Organic Chemistry and Polymers<br>Recap your notes and questions, answer quick fire questions on PK workbook 124-125<br>https://www.youtube.com/watch?v=sE2DP0x48kE&feature=youtu.be | Retry your mock paper 1 (from 10 weeks to go) |
| **w/c 24/04/2023**<br>3 weeks to go… | Energy changes<br>Recap your notes and questions, answer quick fire questions on PK workbook 113<br><br>https://www.youtube.com/watch?v=PQtjfRolMAE&feature=youtu.be | Chemical Analysis and Chemistry of the atmosphere<br>Recap your notes and questions, answer quick fire questions on PK workbook 129 &133<br>https://www.youtube.com/watch?v=vMKAHdoc-g0&feature=youtu.be<br>https://www.youtube.com/watch?v=DznhhA2QHUg&feature=youtu.be | Retry mock paper 2 (from 9 weeks to go) |
| **w/c 01/05/2023**<br>2 weeks to go… | Chemistry paper 1 (whole)<br>https://www.youtube.com/watch?v=MpQ-3YAwNhI | Using resources<br>Recap your notes and questions, answer quick fire questions on PK workbook 137 | Exampro long answer questions |

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| | Quick fire Questions<br>https://www.youtube.com/watch?v=jrxM1Jdv2LM<br><br>Full paper 1 practise (either on Microsoft teams or from AQA website below)<br>https://www.aqa.org.uk/subjects/science/gcse/combined-science-trilogy-8464/assessment-resources?f.Resource+type%7C6=Mark+schemes&f.Resource+type%7C6=Question+papers&sort=date&num_ranks=20 | https://www.youtube.com/watch?v=xBUXqfa2gHo&feature=youtu.be<br><br>Chemistry paper 2 (whole)<br>https://www.youtube.com/watch?v=_HJu8WTtZJU<br>Quick fire Questions<br>https://www.youtube.com/watch?v=RgeaVWnZ4fo | |
| **w/c 08/05/2023**<br>1 weeks to go… | Full paper 1 practise (either on Microsoft teams or from AQA website below)<br>https://www.aqa.org.uk/subjects/science/gcse/combined-science-trilogy-8464/assessment-resources?f.Resource+type%7C6=Mark+schemes&f.Resource+type%7C6=Question+papers&sort=date&num_ranks=20 | Full paper 2 practise (either on Microsoft teams or from AQA website below)<br>https://www.aqa.org.uk/subjects/science/gcse/combined-science-trilogy-8464/assessment-resources?f.Resource+type%7C6=Mark+schemes&f.Resource+type%7C6=Question+papers&sort=date&num_ranks=20 | Exampro required practical questions |

# Triple Science – AQA GCSE Physics

*Exampro questions for each topic are loaded into your Teams page under 'Exampro countdown to exams' in the 'Revision Resources' file.*

| | *Paper 1 – 1 hour* | *Paper 2 – 1 hour* | *Optional Extra* |
|---|---|---|---|
| **w/c 06/02/2023** 14 weeks to go… | Energy topic- energy types, equations, dissipation, efficiency, energy and power<br>Primrose kitten workbook (in revision folder on Teams) pages- 151-158<br>https://www.youtube.com/watch?v=tDkBhy-Y1Z8 | Forces- scalar and vector, resultant, moments, levers, equilibrium, parallelogram of forces, resolution of forces<br>PK WB pgs 173-181<br>https://www.youtube.com/watch?v=Rz4XBSKNGXg&t=2s<br>https://www.youtube.com/watch?v=8RI2_gJy0L0<br>https://www.youtube.com/watch?v=P1lSWWUkMdQ<br>https://www.youtube.com/watch?v=uwzhXL0vp1w<br>https://www.youtube.com/watch?v=5kJBi2_BAPs | Exampro questions on teams |
| **w/c 13/02/2023** 13 weeks to go… | Electricity (cricuits, components, rules of series and parallel, static electricity, electric fields), resistance<br>PK workbook Pgs- 159-164<br>https://www.youtube.com/watch?v=jSA4WaLSVEA | Wave properties-types, refraction, reflection, seismic waves, sound waves, ultrasound, light- reflection, refraction, colour<br>PK WB- 182-188<br>https://www.youtube.com/watch?v=9JPNVJ_LC3E&t=3s<br>https://www.youtube.com/watch?v=ITe6snlZBp8<br>https://www.youtube.com/watch?v=3qCmEHRFRH8<br>https://www.youtube.com/watch?v=0JzscbSaabM | Exampro questions on teams |
| **w/c 20/02/2023** 12 weeks to go… | Molecules and matter (particles, density SLH, pressure)<br>PK workbook pages- 164-168<br>https://www.youtube.com/watch?v=cZz9oGgJOL0 | Wave properties- Lenses, uses lenses, EM spectrum, communications, uses of the waves<br>PK WB 182-188<br>https://www.youtube.com/watch?v=9JPNVJ_LC3E&t=3s<br>https://www.youtube.com/watch?v=L0iivb-acqU<br>https://www.youtube.com/watch?v=xmE54tohTsc<br>https://www.youtube.com/watch?v=KNUcS4NaqDw | Exampro questions on teams |
| **w/c 27/03/2023** 11 weeks to go… | Molecules- radioactivity types, the nucleus, half life, equations for radiation, using radiation, fission, fusion<br>PK workbook pgs-168-171<br><br>https://www.youtube.com/watch?v=cZz9oGgJOL0 | Forces- Speed and distance graph, velocity, acceleration, velocity time graphs, acceleration.<br>PK WB- 173-178<br>https://www.youtube.com/watch?v=Rz4XBSKNGXg&t=2s<br>https://www.youtube.com/watch?v=09aDQcci_tQ<br>https://www.youtube.com/watch?v=r5iXzDCRMsE | Mock paper 1 exam (select from the website)<br>https://www.aqa.org.uk/subjects/science/gcse/physics-8463/assessment-resources?f.Resource+type%7C6=Mark+schemes&f.Resource+type%7C6=Question+papers&sort=date&num_ranks=20 |

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| **w/c 06/03/2023**<br>10 weeks to go… | Energy- Specific heat capacity, IR radiation, insulating buildings, conduction, convection<br>PK WB- 153-158<br>https://www.youtube.com/watch?v=tDkBhy-Y1Z8 | Forces- conservation of momentum, safety feature, pressure and surfaces, pressure and liquids<br>PK WB- 173-178<br>https://www.youtube.com/watch?v=Rz4XBSKNGXg&t=2s<br>https://www.youtube.com/watch?v=YEHcQD6Hij8<br><br>https://www.youtube.com/watch?v=SVB6CjbTIAI | Exampro questions on teams |
| **w/c 13/03/2023**<br>9 weeks to go… | Electricity (AC/DC current, cables and plugs, the national grid- why do we send at high voltage not high current?, power)<br>PK WB Pgs- 159-164<br>https://www.youtube.com/watch?v=jSA4WaLSVEA | Electromagnetism-<br>Magnetic fields, currents, motor effects, generator, AC generator, transformers<br>PK WB- 189-194<br>https://www.youtube.com/watch?v=mnigg3MGslY<br>https://www.youtube.com/watch?v=0yYGXgkOC7w<br>https://www.youtube.com/watch?v=GNLhSKZh-jM<br>https://www.youtube.com/watch?v=NjgqJahwsG0<br>https://www.youtube.com/watch?v=M9ytpIMB5d8 | Exampro questions on teams |
| **w/c 20/03/2023**<br>8 weeks to go… | Energy- demands, sustainable, non sustainable<br>Notes, mindmaps, quick fire questions<br><br>https://www.youtube.com/watch?v=tDkBhy-Y1Z8 | Electromagnetism-<br>Magnetic fields, currents, motor effects, generator, AC generator, transformers<br>(make more notes on the topics and finish questions and exampro!)<br>https://www.youtube.com/watch?v=mnigg3MGslY<br>https://www.youtube.com/watch?v=k1IivkRjd1U | Mock paper 2 exam (select from the website)<br><br>https://www.aqa.org.uk/subjects/science/gcse/physics-8463/assessment-resources?f.Resource+type%7C6=Mark+schemes&f.Resource+type%7C6=Question+papers&sort=date&num_ranks=20 |
| **w/c 27/03/2023**<br>7 weeks to go… | Required practicals in physics (skip to physics paper 1 pracs)<br>Notes<br>https://www.youtube.com/watch?v=_g7jpMW6jBw&list=PL7O6CcKg0HaGP3xojKg1d4wA6WY1Hr-49 | Required practicals in physics (skip to physics paper 2 pracs)<br>Notes<br>https://www.youtube.com/watch?v=_g7jpMW6jBw&list=PL7O6CcKg0HaGP3xojKg1d4wA6WY1Hr-49 | Educake test |
| **w/c 03/04/2023**<br>6 weeks to go… | Energy quick fire questions PK WB pgs 153<br>https://www.youtube.com/watch?v=q5CwATii6OA | Space and quick fire qs on space<br>PK WB- 194-197<br>Quick fire- 195<br>https://www.youtube.com/watch?v=Mdi0i24tNT0<br>https://www.youtube.com/watch?v=f3Rf1aVStIk | Exampro questions on teams |

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| **w/c 10/04/2023**<br>5 weeks to go… | Electricity quick fire questions PK WB pgs 162<br>https://www.youtube.com/watch?v=62RyyfKZoYg | Quick fire qs on forces179<br>https://www.youtube.com/watch?v=jfjb1pnH8zw | Exampro questions on teams |
| **w/c 17/04/2023**<br>4 weeks to go… | Particles and atomic structure quick fire questions PK WB pgs 167<br>https://www.youtube.com/watch?v=z9L6zfMVk3U<br>https://www.youtube.com/watch?v=bRzRjfvoU-E | Quick fire qs on waves 186<br>https://www.youtube.com/watch?v=AEFwEDC6DkQ | Mock paper 1 (retry your last paper) |
| **w/c 24/04/2023**<br>3 weeks to go… | Test on educake, go over exampro questions for paper 1. Predicted paper on revision files in teams | Quick fire qs on Electromagenetism 192<br>https://www.youtube.com/watch?v=LyflUYL4FvM | Mock paper 2 (retry your last paper) |
| **w/c 01/05/2023**<br>2 weeks to go… | Spend time on exampro doing long answer questions and self marking<br>Complete all physics checklists in the physics paper 1 part of PK workbook. Consolidate notes on topics you are unsure of.<br>Video on whole of paper 1<br><br>https://www.youtube.com/watch?v=xtw-Z0nllA4<br><br>Paper 1 quick fire questions<br>https://www.youtube.com/watch?v=FosCAjZTlWs | Spend time on exampro doing long answer questions and self marking<br>Complete all physics checklists in the physics paper 2 part of PK workbook. Consolidate notes on topics you are unsure of.<br>Video on whole of paper 2<br><br>https://www.youtube.com/watch?v=X1aMXCr75Kw<br><br>Paper 2 quick fire questions<br>https://www.youtube.com/watch?v=8aZPIgnX-2w | Mock paper 2 (new paper from website)<br>https://www.aqa.org.uk/subjects/science/gcse/physics-8463/assessment-resources?f.Resource+type%7C6=Mark+schemes&f.Resource+type%7C6=Question+papers&sort=date&num_ranks=20 |
| **w/c 08/05/2023**<br>1 weeks to go… | Spend time on exampro doing long answer questions and self marking | Spend time on exampro doing long answer questions and self marking | Mock paper 1 (new paper from website)<br><br>https://www.aqa.org.uk/subjects/science/gcse/physics-8463/assessment-resources?f.Resource+type%7C6=Mark+schemes&f.Resource+type%7C6=Question+papers&sort=date&num_ranks=20 |

# Computer Science – OCR GCSE Computer Science

| | *Revision topic 1 – 1 hour* | *Revision topic 2 – 1 hour* | *Optional Extra* |
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| **w/c 06/02/2023**<br>14 weeks to go… | **Systems Architecture** – The CPU, including registers and the FDE cycle | **Programming** – Data types, casting, operators, variables | https://student.craigndave.org/videos/slr1-1-systems-architecture<br><br>https://student.craigndave.org/videos/slr2-2-programming-fundementals |
| **w/c 13/02/2023**<br>13 weeks to go… | **Systems Architecture** – Embedded systems | **Programming** – Pseudocode challenges | https://student.craigndave.org/videos/slr1-1-systems-architecture<br><br>https://student.craigndave.org/videos/slr2-1-algorithms<br><br>https://student.craigndave.org/videos/slr2-2-programming-fundementals |
| **w/c 20/02/2023**<br>12 weeks to go… | **Memory and Storage** – RAM, ROM and Cache | **Programming** – Integrated development environments + Translators | https://student.craigndave.org/videos/slr1-2-memory-and-storage<br><br>https://student.craigndave.org/videos/slr2-5-programming-languages-and-ides |
| **w/c 27/03/2023**<br>11 weeks to go… | **Memory and Storage** – Secondary storage and its characteristics | **Programming** – Pseudocode challenges | https://student.craigndave.org/videos/slr1-2-memory-and-storage<br><br>https://student.craigndave.org/videos/slr2-1-algorithms<br><br>https://student.craigndave.org/videos/slr2-2-programming-fundementals |
| **w/c 06/03/2023**<br>10 weeks to go… | **Networks and the Internet** – LANs, WANs, client-server, peer-to-peer, topologies | **Programming** – Defensive design, testing | https://student.craigndave.org/videos/slr1-3-computer-networks-connections-and-protocols<br><br>https://student.craigndave.org/videos/slr2-3-producing-robust-programs |

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| **w/c 13/03/2023**<br>9 weeks to go… | **Networks and the Internet** – Network protocols, TCP/IP stack, the internet (inc. DNS), network threats | **Programming** – Pseudocode challenges | https://student.craigndave.org/videos/slr1-3-computer-networks-connections-and-protocols<br><br>https://student.craigndave.org/videos/slr2-2-programming-fundementals |
| **w/c 20/03/2023**<br>8 weeks to go… | **Network Threats –** Types of threat and preventative measures | **Programming** – String methods | https://student.craigndave.org/videos/slr1-4-network-security |
| **w/c 27/03/2023**<br>7 weeks to go… | **Software** – Utilities, open source and proprietary | **Programming** – Pseudocode challenges | https://student.craigndave.org/videos/slr1-5-systems-software<br><br>https://student.craigndave.org/videos/slr2-1-algorithms<br><br>https://student.craigndave.org/videos/slr2-2-programming-fundementals |
| **w/c 03/04/2023**<br>6 weeks to go… | **Issues** – Ethical and cultural | **Programming** – Functions | https://student.craigndave.org/videos/slr1-6-ethical-legal-cultural-and-environmental-concerns |
| **w/c 10/04/2023**<br>5 weeks to go… | **Issues** - Environmental and computer legislation | **Programming** – Pseudocode challenges | https://student.craigndave.org/videos/slr1-6-ethical-legal-cultural-and-environmental-concerns<br><br>https://student.craigndave.org/videos/slr2-1-algorithms<br><br>https://student.craigndave.org/videos/slr2-2-programming-fundementals |
| **w/c 17/04/2023**<br>4 weeks to go… | **Data Representation** – Units, Binary and Hex | **Programming** – Arrays | https://student.craigndave.org/videos/slr1-2-memory-and-storage |
| **w/c 24/04/2023** | **Data Representation** – Character sets, storing sounds and images | **Programming** – Pseudocode challenges | https://student.craigndave.org/videos/slr1-2-memory-and-storage |

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| 3 weeks to go… | | | https://student.craigndave.org/videos/slr2-1-algorithms<br><br>https://student.craigndave.org/videos/slr2-2-programming-fundementals |
| **w/c 01/05/2023**<br>2 weeks to go… | **Data Representation** – Compression | **Programming** – Searching and sorting algorithms | https://student.craigndave.org/videos/slr1-2-memory-and-storage<br><br>https://student.craigndave.org/videos/slr2-1-algorithms |
| **w/c 08/05/2023**<br>1 weeks to go… | **Data Representation** – Databases and logic | **Programming** – Pseudocode challenges | https://student.craigndave.org/videos/slr2-4-boolean-logic<br><br>https://student.craigndave.org/videos/slr2-1-algorithms<br><br>https://student.craigndave.org/videos/slr2-2-programming-fundementals |

# Geography – AQA GCSE Geography

| | *Revision topic 1 – 1 hour* | *Revision topic 2 – 1 hour* | *Optional Extra* |
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| **w/c 06/02/2023**<br>14 weeks to go… | Rivers- processes of erosion, deposition and transportation. (HASA, TSSS)<br>River landforms- waterfall formation and Ox Bow Lake formation.<br><br>Pages 114-123 in the textbook<br><br>**CASE STUDY: RIVER TEES**<br><br>https://www.bbc.co.uk/bitesize/guides/ztpkqty/revision/4<br><br>https://www.youtube.com/watch?v=CGTplOSkhfc&t=7s<br>https://www.youtube.com/watch?v=1gyIRVgptBM<br>https://www.youtube.com/watch?v=HbGWcXxa7rc<br>https://www.youtube.com/watch?v=KviqtG2LyGY | Create a case study revision sheet on your **NEE CASE STUDY: NIGERIA**<br>Focus this week on 'Exploring Nigeria'. Look at it's location and the political, social, cultural and environmental background.<br><br>Pages 218- 221 in the textbook. | Write up a diary account of what you did on your fieldtrip to BLACKPOOL BROOK. |

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| | http://www.heanorgate.org.uk/images/Educational_Evening_2018/Geog/AQA_Geography_2018_case_studies_booklet.pdf | https://www.youtube.com/watch?v=xOlThdjzhs4 | |
| **w/c 13/02/2023**<br>13 weeks to go… | River management- hard and soft engineering.<br><br>**CASE STUDY: BOSCASTLE FLOODING**<br><br>https://www.youtube.com/watch?v=ghFNNllgqrE<br><br>https://www.bbc.co.uk/bitesize/guides/zg4tfrd/revision/5<br><br>https://www.youtube.com/watch?v=scULGJGa9oQ | **NEE CASE STUDY: NIGERIA**<br><br>Nigeria's changing relationships with the wider world. Nigeria's local and global importance (Importance in Africa and the world).<br><br>Pages 222-223<br><br>https://www.youtube.com/watch?v=G963T69-VYU | Write up a diary account of what you did on your fieldtrip to Bristol Temple Quarter. |
| **w/c 20/02/2023**<br>12 weeks to go… | Coasts- processes of erosion, deposition and transportation<br><br>(HASA, TSSS, longshore drift, types of waves and weathering and mass movement)<br><br>Pages 92-97 in the textbook.<br><br>https://www.youtube.com/watch?v=HeWZxg9WnjE<br>https://www.youtube.com/watch?v=0PufvhlneX0 | **NEE CASE STUDY: NIGERIA**<br><br>Nigeria's changing economy- Looking at industrial/employment structure.<br><br>Pages 224-225<br><br>https://www.youtube.com/watch?v=lUmpdeNd-2E | Collect a SLC MAP SKILLS checklist- complete this. What skills do you need to practice!? |
| **w/c 27/03/2023**<br>11 weeks to go… | Coastal landforms- landforms created by deposition and erosion.<br><br>-Headlands and Bays<br>-Caves, arches, stacks and stumps<br>-Beaches and sand dunes<br>-Spits, bars and tombolos | **NEE CASE STUDY: NIGERIA**<br><br>TNC's in Nigeria- Shell Oil. | Collect a longitude and latitude sheet from the desk in 213. |

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| | **CASE STUDY- OLD HARRY ROCKS, SWANAGE BAY**<br><br>Pages- 98-105 in the textbook.<br><br>https://www.youtube.com/watch?v=zDm8Ve3-KAo<br>https://www.youtube.com/watch?v=MX5yeQLg1OY<br>https://www.youtube.com/watch?v=eI8fO_B20tA | Pages- 226-227<br><br>https://www.youtube.com/watch?v=gKxq3-g6i_w | |
| **w/c 06/03/2023**<br>10 weeks to go… | Coastal management- hard and soft engineering.<br><br>**CASE STUDY: HOLDERNESS COASTLINE**<br><br>Pages 106-111<br><br>https://www.youtube.com/watch?v=BjnvkArg_60<br>https://www.youtube.com/watch?v=roQcQihx8E8<br><br>https://www.bbc.co.uk/bitesize/guides/z2234j6/revision/4 | **NEE CASE STUDY: NIGERIA**<br><br>Impacts of international aid on Nigeria.<br><br>Pages 228-229<br><br>https://www.youtube.com/watch?v=EE7FQ12OmAQ | Collect a 4 or 6 figure grid reference sheet from the desk in 213. |
| **w/c 13/03/2023**<br>9 weeks to go… | Ecosystems- small scale ecosystem **(POND)** and global ecosystems- characteristics.<br><br>Pages 52-53 and 56-57.<br><br>https://www.youtube.com/watch?v=WbNoS_e_8m0<br>https://www.youtube.com/watch?v=I_RhR694LLw | **NEE CASE STUDY: NIGERIA**<br><br>Environmental impacts of economic growth- farming and deforestation, mining and oil extraction. Oil Spills.<br>Quality of life in Nigeria.<br><br>Pages- 230- 233.<br><br>https://www.youtube.com/watch?v=Ul5N4WyGlqM | Use pages 120-121 in the revision guide to check your understanding of OS maps. |

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| **w/c 20/03/2023**<br>8 weeks to go… | Tropical rainforests- location, climate, soil and adaption of plants and animals.<br><br>Pages 58-59.<br><br>https://www.youtube.com/watch?v=oCEvEwx_pdg | Define types of natural hazards and factors affecting hazard risk.<br><br>Distribution of earthquakes and volcanoes.<br><br>Plate Margins<br><br>Pages 8-13.<br><br>https://www.youtube.com/watch?v=1CQogw_09_U&t=22s | Use page 122-124 in the revision guide to check your understanding of charts and graphs. |
| **w/c 27/03/2023**<br>7 weeks to go… | Tropical rainforests- Causes, impacts and management.<br><br>**CASE STUDY: AMAZON RAINFOREST.**<br><br>https://www.youtube.com/watch?v=5lO2sKYtwmw<br><br>https://www.youtube.com/watch?v=lwbNCAcRCSI | **CASE STUDY HIC EARTHQUAKE: CHRISTCHURCH, 2011**<br><br>**CASE STUDY LIC EARTHQUAKE: HAITI, 2010**<br><br>https://www.youtube.com/watch?v=fwiPg0LpUBw<br>https://www.youtube.com/watch?v=3l9B1dvfT-o<br>https://www.youtube.com/watch?v=cdaGIUU7_j0&t=1s | Maths check…<br><br>Do you know the difference between mean, median and mode? |
| **w/c 03/04/2023**<br>6 weeks to go… | Hot Deserts<br><br>-Characteristics<br>-Development opportunities and challenges<br><br>**CASE STUDY: SAHARA DESERT.** | Tropical Storms- location, formation and features.<br><br>**CASE STUDY: TYPHOON HAIYAN**<br><br>Pages 24-29 | Maths check…<br><br>Are you able to calculate percentage and percentage change? |

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| | Pages 68-69<br><br>https://www.youtube.com/watch?v=LMDjE-i3PbY<br>https://www.youtube.com/watch?v=ynLwTn5jw8k<br><br>https://www.internetgeography.net/topics/opportunities-and-challenges-in-the-sahara-desert/ | https://www.youtube.com/watch?v=9Qn6jdK5loE<br>https://www.youtube.com/watch?v=2DxYbnWmM-0 | |
| **w/c 10/04/2023**<br>5 weeks to go… | Desertification<br>-Causes<br>-Deducing desertification<br><br>Pages 74-77<br><br>https://www.youtube.com/watch?v=meYBvs73aXY | Global atmospheric circulation model (system)<br>- How it affects weather.<br><br>Pages 22-23<br><br>https://www.youtube.com/watch?v=GZVMUOqzP50 | Maths check…<br><br>Can you draw a pie chart and bar graph? |
| **w/c 17/04/2023**<br>4 weeks to go… | Urban issues-<br>- Global pattern of Urban change<br>- Factors leading to urban change<br>- Mega cities<br><br>Pages 148-151<br><br>https://www.youtube.com/watch?v=M1drmu72QiU<br>https://www.youtube.com/watch?v=5bGdv1joUkw | UK Weather Hazards.<br><br>**CASE STUDY: SOMERSET LEVELS FLOODING**<br><br>Pages 34-39<br><br>https://www.youtube.com/watch?v=YwjogWGGtpY<br>https://www.youtube.com/watch?v=K21rpRPsn8M | Define the following words:<br><br>**Evaluate**<br>**Method**<br>**Conclusion**<br>**Validity**<br>**Enquiry**<br>**Data collection**<br>**Data Presentation.** |
| **w/c 24/04/2023**<br>3 weeks to go… | NEE City | Climate change | Collect a paper 3 past paper from |

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| | **CASE STUDY: RIO DE JANEIRO**<br>- Land use and growth<br>- Social challenges and improvements<br>- Economic challenges and improvements<br>- Environmental challenges and improvements<br><br>Pages 152-159<br><br>https://www.youtube.com/watch?v=XfMI0grZUw8<br>https://www.youtube.com/watch?v=-_FMyRXHtyc | - evidence of past climate change<br>- causes- natural and human<br>- mitigation- managing climate change<br>- adaptation- managing climate change<br><br>Pages 40-49<br><br>https://www.youtube.com/watch?v=aynyO_rXN4Q&t=1574s<br>https://www.youtube.com/watch?v=_wI8ADF1ruQ | 213 or use link below<br><br>https://filestore.aqa.org.uk/sample-papers-and-mark-schemes/2018/june/AQA-80353-QP-JUN18.PDF |
| **w/c 01/05/2023**<br>2 weeks to go… | NEE City<br><br>**CASE STUDY: RIO DE JANEIRO**<br>- Shanty towns problem and solutions<br><br>Pages 160-163<br><br>https://www.youtube.com/watch?v=IG1FKq6XQ-E | Hazard Risk<br>- Why people live in hazardous areas<br>- 3 P's (Prepare, protect, predict)<br>- Mitigating the risk<br>- Mitigating the risk of tropical storms.<br><br>Pages 18-21 and 30-31<br>https://www.youtube.com/watch?v=M1j-7XwZ_ew<br>https://www.youtube.com/watch?v=_bOrkn3eYSI | Continue with paper 3 past paper<br><br>https://filestore.aqa.org.uk/sample-papers-and-mark-schemes/2018/june/AQA-80353-QP-JUN18.PDF<br><br>**HAND INTO JG FOR MARKING TUESDAY 5th MAY** |

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| **w/c 08/05/2023**<br>1 weeks to go… | Urban Change in the UK- Population distribution.<br><br>https://www.youtube.com/watch?v=hQWOndusrj8<br><br>**CASE STUDY HIC CITY: BRISTOL UK CITY**<br>- Importance of Bristol and its growth<br>- Cause of growth- including impact of migration.<br><br>Pages 166-167<br><br>https://www.bbc.co.uk/bitesize/guides/z2dmn39/revision/5<br><br>http://www.heanorgate.org.uk/images/Educational_Evening_2018/Geog/AQA_Geography_2018_case_studies_booklet_paper_2.pdf | Paper 1 practice paper<br><br>- Collect from 213 or use link below.<br>- **Complete by 11th May- hand in to JG for marking.**<br><br>https://filestore.aqa.org.uk/sample-papers-and-mark-schemes/2018/june/AQA-80351-QP-JUN18.PDF | DIRT TASK:<br><br>Paper 3 improvement/ feedback.<br><br>**PLUS….**<br><br>UK in the wider world<br><br>Pages 250-253<br><br>https://www.youtube.com/watch?v=itH1m8lxLdc |
| **w/c 15/05/2023** | **CASE STUDY HIC CITY: BRISTOL UK CITY**<br>- Economic opportunities and challenges<br>- Social opportunities and challenges<br>- Environmental opportunities and challenges<br><br>**CASE STUDY: TEMPLE QUARTER URBAN REGENERATION PROJECT**<br><br>Pages 168-185<br><br>https://www.youtube.com/channel/UCw7TyUbG__NGdOozPnpwshQ/videos<br><br>https://www.cram.com/flashcards/temple-quarter-case-study-6485343 | **Review case studies and examples:**<br><br>- **LIC/HIC earthquake**<br>- **Storm Haiyan**<br>- **UK Extreme weather**<br>- **Coastal Management- Holderness**<br>- **River Tees Boscastle** | DIRT TASK:<br><br>Paper 1 improvement/ feedback,<br><br>**<u>1 hour revision link Link to human fieldwork.</u> What did you investigate in Bristol? When did you go?**<br>**What conclusions can you draw from it?**<br>**How could we have improved your study?** |
| **w/c 22/06/2023** | UK Economy- causes of economic change | Sustainable Urban Living | Paper 2 practice paper-collect from |

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| | - Deindustrialisation.<br>- Globalisation<br>- Government policy<br><br>https://www.youtube.com/watch?v=UYKTX-qQc-4<br><br>Pages 234-237 | Pages 186-191<br><br>**CASE STUDY: FREIBURG SUSTAINABLE URBAN LIVING**<br><br>https://quizlet.com/349971710/gcse-geography-freiburg-case-study-flash-cards/<br><br>https://studywise.co.uk/wp-content/uploads/GCSE-Geography-Case-Study-Collection.pdf | 213 or use the link below.<br><br>https://filestore.aqa.org.uk/sample-papers-and-mark-schemes/2018/june/AQA-80352-QP-JUN18.PDF<br><br>**Hand into JG on 26th May for marking** |
| **w/c 29/05/2023** | Resource Management<br>- Distribution<br>- Provision for food in the UK<br>- Provision of water in the UK<br>- Provision of energy in the UK<br><br>https://www.youtube.com/watch?v=dlD_iMaidL0<br>https://www.youtube.com/watch?v=HuL2PhKdjsw<br>https://www.youtube.com/watch?v=HM2j5g9KbIo<br>https://www.youtube.com/watch?v=kpRgAr5f3NE<br><br>Pages 256-263 | UK Economy<br>- improvements in road, rail and infrastructure<br><br>https://www.youtube.com/watch?v=nVi9J4KkT3U<br><br>Pages 244-247 | UK Science and Business parks-<br><br>https://www.youtube.com/watch?v=4yEsngz9YzE<br><br>**CASE STUDY: SOUTHAMPTON**<br><br>Pages 238-239 |
| **w/c 05/06/2023** | Energy Management<br>- Supply vs Demand<br>- Energy insecurity<br>- Increasing energy<br><br>**CASE STUDY: EXTRACTING NATURAL GAS- NON RENEWABLE RESOURCE.**<br><br>Pages 288-295 | Sustainable energy use<br><br>**CASE STUDY: CHAMBAMONTERA MICRO-HYDRO SCHEME**<br><br>Pages 298-299 | North/ South Divide<br><br>https://www.youtube.com/watch?v=gOpNd-khY1E<br><br>Pages 248-249 |

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| | https://www.bbc.co.uk/bitesize/guides/zxc2sg8/revision/1<br><br>https://getrevising.co.uk/diagrams/natural-gas | https://teamgeographygcse.weebly.com/the-chambamontera-micro-hydro-scheme.html#<br><br>https://quizlet.com/298617197/gcse-geography-chambamontera-case-study-updated-flash-cards/ | |

# Maths – EdExcel GCSE in Mathematics Further

| | *Revision topics in class worksheets* | *Textbook Pages* | *Corbettmaths.com More Further Maths* | *Textbook pages* |
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| **w/c 06/02/2023**<br>14 weeks to go… | Algebra/ratio | 1-4 | Product Rule for Counting<br>Surds(addition/subtraction)<br>Surds(rationalising denominators)<br>Expanding 3 Brackets<br>Expanding Brackets (Pascal's triangle)<br>Factorisation<br>Factorising Quadratics | 22-28<br>18-22<br><br>12-14<br>14-17<br>28-32 |
| **w/c 13/02/2023**<br>13 weeks to go… | Functions | 42-76 | Function Notation<br>Composite Functions<br>Inverse Functions<br>Domains and Ranges<br>Drawing Functions | 42-44<br>47-49<br>64-68<br>44-47<br>49-60 |
| **w/c 20/02/2023**<br>12 weeks to go… | Factor Theorem | 90-96 | Factor Theorem<br>Algebraic Long Division<br>Factorising Cubics<br>Solving Cubics<br>Completing the Square ($x^2$)<br>Completing the Square ($ax^2$) | 90-96<br>92<br>90-95<br><br>78-83 |
| **w/c 27/03/2023**<br>11 weeks to go… | Sequences | 108-113 | Exponential Graphs<br>Sketching Quadratics<br>Solving Quadratics by Factorisation<br>Solving Quadratics (Completing the Square)<br>Solving Quadratics (Quadratic Formula)<br>Simultaneous Equations (both linear)<br>Simultaneous Equations (non-linear)<br>Simultaneous Equations (3 unknowns) | 68-71<br>60-64<br>77-83<br>77-83<br>77-83<br>84-90<br>84-90<br>115-121 |
| **w/c 06/03/2023**<br>10 weeks to go… | Proof | 106-108 | Algebraic Proof<br>nth Terms<br>Limiting Values<br>Linear Sequences<br>Quadratic Sequences | 106-108<br>108-113<br>113-115<br>108-113<br>108-113 |
| **w/c 13/03/2023**<br>9 weeks to go… | Inequalities | 96-101 | Linear Inequalities<br>Quadratic Inequalities | 96-98<br>98-101 |

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| | | | Laws of Indices Fractional Indices Negative Indices<br>Equations with indices/roots | 101-106 |
| **w/c 20/03/2023**<br>8 weeks to go… | Geometry | 155-159 | Geometric Proof<br>Sine Rule (sides) (angles) (ambiguous case)<br>Cosine Rule (sides) Cosine Rule (angles)<br>Area of a Triangle | 155-159<br>184-188<br>188-191<br>180-184 |
| **w/c 27/03/2023**<br>7 weeks to go… | Circles | 137-148 | Equation of a Circle (centre is the origin)<br>Equation of a Circle (centre not the origin)<br>Circle Theorems<br>Equation of a Tangent to a Circle | 137-148<br>137-148<br>150-159 |
| **w/c 03/04/2023**<br>6 weeks to go… | Matrices 1 | 238-241 | Multiplying Matrices (by a scalar)<br>Multiplying Matrices (2×2 by 2×1)<br>Multiplying Matrices (2×2 by 2×2) | 238-241 |
| **w/c 10/04/2023**<br>5 weeks to go… | Matrices 2 | 241-248 | Identity Matrix<br>Transforming the Unit Square<br>Matrix Transformations | 243<br>244<br>241-252 |
| **w/c 17/04/2023**<br>4 weeks to go… | Calculus | 208-226 | Introduction Differentiation<br>Differentiation after Rearranging<br>Gradient of a Curve<br>Equation of a Tangent Equation of a Normal<br>Increasing/Decreasing Function<br>d2y/dx2 Stationary Points<br>Application of Differentiation<br>Sketch curve knowing maxima/minima | 208-212<br>216-217<br>212-217<br>217-221<br>222-223<br>223-227<br>231-236 |
| **w/c 24/04/2023**<br>3 weeks to go… | Misc | All | Gradient Parallel Lines Perpendicular Lines<br>Distance between two points<br>Midpoint of a Lines Ratio (Lines)<br>Equation of a Line<br>3D Pythagoras 3D Trigonometry<br>Exact Trig Values Trig Identities<br>Trig Graphs Finding other Trig ratios<br>Solving Trigonometric Equations | 121-122<br>122<br>123<br>127<br>194<br>164-176<br>168-174<br>170-171 |

# History – EdExcel GCSE in History

| | Knowledge focus | Exam Question(s) |
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| **w/c 06/02/2023**<br>14 weeks to go… | Medieval and Renaissance medicine | Describe two features of the theory of the four humours (1 sentence for the feature, one sentence to explain). (4 marks) and Explain why there were improvements in medical knowledge in the period (12 marks) |
| **w/c 13/02/2023**<br>13 weeks to go… | Weimar Republic | Find a source and analyse its utility (don't forget provenance!) (8 marks) |
| **w/c 20/02/2023**<br>12 weeks to go… | Origins of the Cold War | Explain two consequences of the US development of the bomb. (8 marks) |
| **w/c 27/03/2023**<br>11 weeks to go… | Anglo-Saxon England and the Norman invasion | Explain why there were so many rebellions in the period 1067-1071. (12 marks). |
| **w/c 06/03/2023**<br>10 weeks to go… | Hitler's rise 1919-33 | Explain why the Nazis were able to gain so much political support 1929-33. (12 marks) |
| **w/c 13/03/2023**<br>9 weeks to go… | Cold War Crises | Write a narrative account of the Cuban Missile Crisis (8 marks) |
| **w/c 20/03/2023**<br>8 weeks to go… | Enlightenment & Industrial Medicine and Modern Medicine | Explain one way in which ideas about the causes of illness in the years 1750-1950 differed from those in the years 1500-1750. (4 marks) and 'Providing access to care and treatment has been the most important development in the role of the government in medicine in the years 1800-present.' How far do you agree? Explain your answer. (No fence sitting!) (16 marks + 4 SPaG) |
| **w/c 27/03/2023**<br>7 weeks to go… | Nazi Dictatorship 1933-39 | How far do you agree that the SS, SD and Gestapo were the most important element in maintaining Hitler's dictatorship? (16 marks +4 SPaG) |
| **w/c 03/04/2023**<br>6 weeks to go… | End of the Cold War | Explain the importance of Reagan Doctrine. (16 marks) |
| **w/c 10/04/2023**<br>5 weeks to go… | Life in Norman England 1066-1085 | 'The building of castles was the main cause of Anglo-Saxon resistance to Norman rule.' How far do you agree? Explain your answer. (16 marks +4 SPaG) |
| **w/c 17/04/2023**<br>4 weeks to go… | Life in Nazi Germany 1933-39 | Explain why there was little criticism for policies such as the Nuremberg Laws. (12 marks) |
| **w/c 24/04/2023**<br>3 weeks to go… | Western Front | Describe two features of the trench system. (4 marks) |
| **w/c 01/05/2023** | Key Figures from all units | 'The main reason for the development (or lack thereof) of medicine between 1250-present is due to the particular advances made by |

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| 2 weeks to go… | | individuals, without whom medicine would be much the worse. How far do you agree? Explain your answer. (16 marks + 4SPaG) |
| **w/c 08/05/2023**<br>1 weeks to go… | Key Events/dates from all units | Write a narrative account of the collapse of the Soviet Union 1979-1991. (8 marks). |

# Digital – BTEC Level 2 Tech Award in Digital Information Technology

| | **Revision topic 1 – 1 hour** | **Revision topic 2 – 1 hour** | **Optional Extra** |
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| **w/c 06/02/2023**<br>14 weeks to go… | **Learning Aim A** - Communication Technologies | **Learning Aim A**– Shared Data | Word books are in shared folder (x)for each section and Knowledge organiser for each section |
| **w/c 13/02/2023**<br>13 weeks to go… | **Learning Aim A** – Cloud storage | **Learning Aim C**– Environmental issues | |
| **w/c 20/02/2023**<br>12 weeks to go… | **Learning Aim A** – Cloud computing | **Learning Aim C** – Equal access | |
| **w/c 27/03/2023**<br>11 weeks to go… | **Learning Aim A** – Using cloud technologies | **Learning Aim C** – Acceptable use policies | |
| **w/c 06/03/2023**<br>10 weeks to go… | **Learning Aim A** – Modern teams and modern technologies | **Learning Aim C** – Data protection | |
| **w/c 13/03/2023**<br>9 weeks to go… | **Learning Aim A** – Inclusivity and accessibility | **Learning Aim C** – Criminal use of computer systems | |
| **w/c 20/03/2023**<br>8 weeks to go… | **Learning Aim A** – Impacts of modern technologies | **Learning Aim D** – Data and information flow diagrams | |
| **w/c 27/03/2023**<br>7 weeks to go… | **Learning Aim B** – System attacks and external threats | **Learning Aim D** – Flowcharts | |

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| **w/c 03/04/2023**<br><br>6 weeks to go… | **Learning Aim B** – Internal threats | **Learning Aim D** – System diagrams | |
| **w/c 10/04/2023**<br><br>5 weeks to go… | **Learning Aim B** – Impact of breaches | **Learning Aim D** – Tables and written information | |
| **w/c 17/04/2023**<br><br>4 weeks to go… | **Learning Aim B** – User restrictions and finding weaknesses | Student choice based on RAG rating of all other topics | |
| **w/c 24/04/2023**<br><br>3 weeks to go… | **Learning Aim B** – Data level protection | Student choice based on RAG rating of all other topics | |
| **w/c 01/05/2023**<br><br>2 weeks to go… | **Learning Aim B** – Policy, backups and data recovery | Student choice based on RAG rating of all other topics | |
| **w/c 08/05/2023**<br><br>1 weeks to go… | Student choice based on RAG rating of all other topics | Student choice based on RAG rating of all other topics | |

# Year 11 Engineering: 100 day plan

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| 6th February - 14 weeks to go | Revise **Areas and volumes** of compound shapes. Create a set of flash cards for these with the formulas and some examples. |
| 13th February - 13 weeks to go | Revise **workshop safety** including:<br>• **PPE**<br>• **Safety measures** when using machines<br>• **Safety devices** on machines and around the workshop<br>Again, make some flash cards for these. |
| 20th February - 12 weeks to go | Revise CAD & CAM, including Additive Manufacture (3D printing)<br>What are the features and benefits of each of these, compared with more traditional methods of design and manufacture. Again, make flash cards for these. |
| 27th February - 11 weeks to go | Create a resource about Metal Treatments and finishes, including types of heat treatment and applied finishes such as anodising, galvanising, powder coating and painting. |
| 6th March - 10 weeks to go | Create flash cards for key material properties E.g. toughness, hardness, ductility etc. for each one, include an example of where it applies to a product or material. |

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| 13th March - 9 weeks to go | Revise Permanent and temporary methods for joining metals and plastics, including MIG welding. Add these to your flash card collection. |
| 20th March - 8 weeks to go | Practice converting isometric drawings into orthographic 3rd angle projection and vice versa. Use Youtube to help and see Ben if you would like some isometric grid paper. Also revise technical drawings and the information displayed in them (see the pressure plate exercise you did in class |
| 27th March - 7 weeks to go | Create a set of flash-cards related to 'Scales of Production' (one off, batch-production and mass-production) |
| 3rd April - 6 weeks to go | Revise environmental issues associated with engineering:<br>• Sourcing and processing materials<br>• Product manufacture<br>• Product use (energy efficiency etc)<br>• Disposal / Recycling<br>• Transport<br>Add these to your flash card collection |
| 10th April - 5 weeks to go | Revise properties and uses of:<br>• Thermoplastics<br>• Thermosetting Plastics<br>Create flash cards |
| 17th April - 4 weeks to go | Revise properties, uses, production methods, advantages and disadvantages of Composite Materials (CFRP/GFRP)<br>Create flash cards |
| 24th April - 3 weeks to go | Revise properties and uses of:<br>• Ferrous metals (Iron and steels)<br>• Non ferrous metals (Aluminium, Copper, Zinc)<br>• Alloys<br>Create flash cards |
| 1st May - 2 weeks to go | Complete one of the past papers for Engineering. Research the answers to any questions you are unsure of the answer to. See Ben if you need any answers checking or clarifying. |
| 8th May - 1 week to go | Complete another of the past papers for Engineering. Research the answers to any questions you are unsure of the answer to. See Ben if you need any answers checking or clarifying. |

# Year 11 Design and Technology: 100 day plan

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| 6th February - 14 weeks to go | Revise the following topics:<br>• Formative and Summative evaluating.<br>• Laser cutting process & 3D printing process.<br>• **Modern materials** such as Smart materials and graphene. |
| 13th February - 13 weeks to go | Revise the following topics: |

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| | • Making material flat and square.<br>• How to measure from a datum.<br>• Four types of motion. (Linear, e.t.c)<br>• Applications for Conductive textiles and Microencapsulation textiles. |
| 20th February - 12 weeks to go | Revise the following topics:<br>• Know what exploded diagrams are and how to construct an Isometric drawing.<br>• How plastics are made. Injection moulding, Blow moulding and vacuum forming. |
| 27th February - 11 weeks to go | Revise the following topics:<br>• Available metals, woods and plastics.<br>• Surface finishes. Life Cycle assessments, causes of poor carbon footprint. What makes a product a negative impact one. |
| 6th March - 10 weeks to go | Create flash cards:<br>Automation, Computer Aided Testing, Patents, Crowdfunding, Cooperatives, sustainable materials. |
| 13th March - 9 weeks to go | Create flash cards:<br>Life Cycle Analysis', what makes a product negative or positive impact, planned obsolescence, Kaizen. |
| 20th March - 8 weeks to go | Create flash cards:<br>Technology push, market pull, JIT, Renewable energy sources, KPSS, Biomass, Kinetic and potential energy. |
| 27th March - 7 weeks to go | Create flash cards:<br>Flywheel, Biodegradable plastics, batteries, conductors and insulators, inputs and outputs. |
| 3rd April - 6 weeks to go | Create flash cards:<br>Composite materials, Flowsheets, 3 classes of lever, Monostable and Astable circuits. |
| 10th April - 5 weeks to go | Create flash cards:<br>Cams, gears, pulleys, block & tackle mechanisms. |
| 17th April - 4 weeks to go | Create flash cards:<br>Characteristics of materials: Hardness, malleability, toughness, ductility, elasticity. Tension, compression and torsional forces. What anthropometrics and ergonomics are and how they are used. |
| 24th April - 3 weeks to go | Create flash cards:<br>Isometric, oblique, orthographic and 2 point perspective drawing. Know of the work of Vivienne Westwood and Philipe Starck. |
| 1st May - 2 weeks to go | Study your mock paper. Do a past paper and check the answers. Read through your yellow exercise book and glossary well. Read your 'Do Now's'. |
| 8th May - 1 week to go | Create flash cards:<br>How to shape various materials. Wood laminating, metal sheet metal bending machine, strip heater for plastics.<br>Read through your book again and revise the glossary in the back of it. |