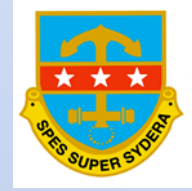




# Year 11 Revision Guide 2016



Dear Student & Parent,

This booklet gives you further information that can be used at home to help support the revision process for the examinations.

Each subject area offers guidance about revision tools and techniques which could be used and suitable revision resources.

Details of additional revision sessions are also included.

Good luck.



## SCIENCE

### Key themes/subjects for revision

- Students who are taking Triple Science will sit exams which will lead to three separate GCSE qualifications: one each in Biology, Chemistry and Physics.
- Students who are **not** taking Triple Science will sit exams which will lead to two qualifications: Core Science and Additional Science.
- The way in which the exams and coursework link together in the qualifications is shown in the table below:

GCSE		EXAM PAPERS (written papers – 1 hour each)									COURSEWORK (ISAs) (to be completed in school)				
		B1	C1	P1	B2	C2	P2	B3	C3	P3	Core	Additional	Biology	Chemistry	Physics
CORE SCIENCE		✓	✓	✓							✓				
ADDITIONAL SCIENCE					✓	✓	✓					✓			
TRIPLE SCIENCE	Biology	✓			✓			✓					✓		
	Chemistry		✓			✓			✓					✓	
	Physics			✓			✓			✓					✓

### Suggestions for revision techniques

- **Use of revision guides – provided by the school for all of the exams:** – reading the guides, making own notes, summarising information into bullet points, creating mind-maps, ‘read-cover-write’, drawing and annotating diagrams, producing tables of comparison, practicing reading information from graphs (remembering the difference between describe and explain)
- **Use of GCSE pod on a regular basis:** (e.g. 30 minutes per evening)
- **Working through topics on BBC Bitesize: GCSE Science:** reading the content, making own notes based on this, carrying out the activities, attempting the mini-tests.
- **Working through past GCSE exam papers:** use the AQA website to look at past papers (from 2011 onwards) for each of the exams that the pupil will be taking (see previous table). Mark schemes are also available on the website. (Google: *AQA past papers*)

### Suggestions for revision resources

- **Revision guides** (provided) – Core, Additional, Biology, Chemistry, Physics – appropriate guides are provided by the Academy, at the start of the course, for all pupils taking GCSE Science.
- **BBC Bitesize:** GCSE Science>AQA
- **GCSEpod** – AQA Science topics (as identified in the revision guides)
- **Classwork book/cards**
- **AQA website** – past papers and mark schemes (Google: *AQA past papers*)

### Planned additional revision sessions

- **Mondays after school** – Chemistry/Physics revision with **LCO**
- **Mondays after school** – Foundation Biology, Chemistry and Physics (for Y11 set 3) with **ABA**
- **Thursdays after school** – Biology/Chemistry 3 revision with **LMA**
- **Easter holidays** – revision sessions will be run. The dates of these sessions have been added to the Easter Revision Timetable.

## MATHS

### Key themes/subjects for revision

There are 3 GCSE exams being taken in Maths. All pupils will take either the Edexcel Higher or Edexcel Foundation (certificate) exam. A small group of pupils are taking AQA Further Maths. All of these exams can test any topic from the whole syllabus.

The details for each exam are:

#### Edexcel HIGHER GCSE

- Paper 1 – Non-Calculator 9am Thursday 26<sup>th</sup> May 2016 50% of marks
- Paper 2 – Calculator 9am Thursday 9<sup>th</sup> June 2016 50% of marks

#### Edexcel FOUNDATION Certificate

- Paper 1 – Calculator 9am Thursday 26<sup>th</sup> May 2016 50% of marks
- Paper 2 – Calculator 9am Thursday 9<sup>th</sup> June 2016 50% of marks

#### AQA Further Maths

- Paper 1 – Non-Calculator 9am Monday 20<sup>th</sup> June 2016 40% of marks
- Paper 2 – Calculator 9am Friday 24<sup>th</sup> June 2016 60% of marks

### Suggestions for revision techniques

- **Targeted revision based on past paper feedback** – revision from the materials below can be used on topics that have been highlighted as weaknesses from past papers and in lessons. When the topic for revision is selected, look over the mathswatch clip, or the lesson on mymaths. There are then attached questions to check understanding.
- **Use of revision guides** – these are available for the higher course from the school at only £2 each.
- **Working through topics on BBC Bitesize: GCSE Maths:** reading the content, making own notes based on this, carrying out the activities, attempting the mini-tests.
- **Working through past GCSE exam papers** – some of these have been done in lessons already.
- **HIGHER:** use the Edexcel website to look at past papers (from June 2012 onwards) for each of the exams that the pupil will be taking. For the Maths higher papers, look for 'Mathematics A'. Mark schemes are also available on the website. (Google: *Edexcel past papers*)
- **FOUNDATION CERTIFICATE:** use the Edexcel website to look at past papers (from June 2012 onwards) for each of the exams that the pupil will be taking. For the foundation certificate papers, look for 'Edexcel certificate' not GCSE. Mark schemes are also available on the website. (Google: *Edexcel past papers*)
- **AQA FURTHER MATHS:** use the AQA website to look at past papers (from June 2012 onwards) for each of the exams that the pupil will be taking. Mark schemes are also available on the website. (Google: *AQA past papers 8360*)

### Suggestions for revision resources

- **www.MyMaths.co.uk** – lessons for many different topics and practise questions all online
- **www.MathsWatchVle.com** – large collection of instructional videos/question sheets – same password as mymaths
- **Revision guides** – available to buy from teachers for £2 for higher syllabus only
- **BBC Bitesize:** GCSE Maths (pre 2015)
- **GCSEpod**
- **Classwork book/completed past papers.**
- **Edexcel / AQA website** – past papers and mark schemes (Google: *AQA past papers*)

### Planned additional revision sessions

- **Mondays after school** – MyMaths support – 6<sup>th</sup> floor breakout area
- **Wednesday after school** – revision session – open to all to bring any problem they are struggling with

## ENGLISH

### Key themes/subjects for revision

English Language: Cambridge iGCSE

Course reference 0522 English as a first language (UK)

**Pupils will only take either paper 1 or paper 2 Examined on the 3<sup>rd</sup> of May**

#### **Paper 1: Core Paper (40% of final mark)**

The paper is 1 hour 45 minutes long

Includes 2 reading passages which the texts are based on.

There are 3 questions:

- Question 1: 8 parts, reading analysis questions, 20 marks in total.
- Question 2: Extended writing piece, e.g. diary entry, journal, letter, report, based on reading passage A (10 marks for content, 5 marks for quality of writing).
- Question 3: 2 parts, summary question, 15 marks.

#### **Paper 2: Extended paper (40% of final mark)**

The paper is 2 hours long

Includes 2 reading passages

There are 3 extended questions:

- Question 1: Extended writing piece, e.g. diary entry, article, letter, based on the reading passage A (15 marks for content and 5 for quality of writing). 250-300 words, spend 40 minutes on this.
- Question 2: Language analysis question. 10 marks available. 200 to 300 words, spend 30 minutes on this.
- Question 3: 2 parts, summary question, 15 marks for correct choice of points, 5 marks for quality of writing. 200-250 words for the summary section, spend 40 minutes.

#### **Written coursework: 3 pieces of 800 words length (40% of final mark)**

**This should now be complete.**

#### **Speaking and Listening Exam (20% of final mark)**

**Exams take place 8<sup>th</sup> and 9<sup>th</sup> March 2016 in school – pupils should currently be revising for this. There are no repeats of this. These are done under strict exam conditions.**

This is made up of two parts. Part one is an extended individual task on a chosen topic lasting 3-4 minutes worth 10 marks and a discussion with an examiner lasting 6-7 minutes worth 20 marks.

### Suggestions for revision resources

[www.cie.org.uk](http://www.cie.org.uk)

<http://www.cie.org.uk/images/163028-cambridge-learner-guide-for-igcse-first-language-english.pdf>

This is the Cambridge study guide for all papers and components. It includes revision techniques and hints. If you are doing core you are doing components 1, 4 and 5. If you are doing extended you are doing components 2, 4 and 5.

Course number 0522- English as a first language (UK)

### Planned additional revision sessions

Revision sessions are held on Monday in 505 after school.

## ENGLISH LITERATURE

### Key themes/subjects for revision

English Literature: EDEXCEL

**This comprises of two papers.**

#### **Paper 1: Drama and Prose (23<sup>rd</sup> May)**

Lasts 1 hour 45 minutes

Pupils will answer 2 questions, one on “Romeo and Juliet” and one on “Of Mice and Men”. Both questions are worth 30 marks. There will be two options for each text; one will be thematic and one character based.

#### **Paper 2: Unseen Texts and Poetry Anthology (27<sup>th</sup> May)**

Lasts 1 hour 30 minutes

Pupils will answer 2 questions, one on an unseen poem and one on poems from the anthology. Both questions are worth 20 marks.

In the second question pupils will have two options, each giving a names poem and a free choice of another from the anthology.

### Suggestions for revision resources

- <https://www.gcsepod.com/> This includes revision videos on the language paper and the literature set text and poems.
- [www.youtube.com](http://www.youtube.com) This includes teachers’ analyses of poetry and useful videos on the set texts.
- Pupils should be revising last year’s work for this exam. Homework will be set on “Show My Homework” to help with this.

### Planned additional revision sessions

Revision is held on Wednesday in 502 after school.

## HISTORY

### Key themes/subjects for revision

**Exam Board:** Your son is studying the AQA History B specification.

**Content for Unit 1:** Your son should be prepared to answer the questions on:

- The origins of WW1
- Hitler's Foreign Policy and the causes of WW2
- The Origins of the Cold War

**Content for Unit 2:** Your son should be prepared to answer the questions on:

- The Roaring 20s: USA 1919 – 1929
- Hitler's Germany 1929-1945
- Race Relations in the USA 1945-1968

#### Key Dates:

Unit 1 exam – 6<sup>th</sup> June 2016

Unit 2 exam – 14<sup>th</sup> June 2016

Controlled assessment – all tasks to be submitted by the 23<sup>rd</sup> March (can be emailed to [metcalfeh@hthacademy.org.uk](mailto:metcalfeh@hthacademy.org.uk))

### Suggestions for revision techniques

**Past Papers** – Just reading is not good revision. In an exam, you will be expected to apply knowledge to questions and this should be practised. There are many past papers available on <http://www.aqa.org.uk/> - once you get on the site click:

- Subjects
- History
- GCSE
- History B: Full and short course (9145)
- Look on left hand side of the page for the link which says 'specimen papers'. Here you will find a selection of papers; remember to look for unit 1 and unit 2.

### Suggestions for revision resources

**Resources – you have been provided with the following resources to help:**

- Guide on how to answer questions (in your exercise books)
- A copy of the GCSE Modern World Book by Ben Walsh
- Your son will also be provided with a DVD which contains a copy of the core textbook on. This has all the information in the book but also contains an exam practice section.

**Further resources – additional resource you may wish to buy**

- AQA GCSE Modern World History – Revision Guide by Ferriby, Waugh and Walsh.

You may also wish to purchase an item from the GCSE reading list, such as:

- G Layton, Access To History: From Bismark To Hitler - Germany, 1890-1933
- G Layton, Access to History: Germany: The Third Reich 1933-1945.
- G Darby, Access to History: Hitler, Appeasement and the Road to War.

#### The History Blog

A link to this can be found under the 'useful websites' section of the school website (or by entering the direct URL [http://www.hthacademy.org.uk/History\\_Blog](http://www.hthacademy.org.uk/History_Blog)). There are several blogs here now and your son should choose the GCSE one. This contains advice guidance and resources on the following:

- Past GCSE papers
- Sample answers on previous GCSE questions
- Guidance on how to answer questions
- Useful revision videos
- Useful revision websites
- Full details of what needs to be covered in the specification
- Comprehension questions to answer to help frame your son's revision.

## Planned additional revision sessions

History	Mrs Metcalfe	Tuesday	12:45 – 13:30	605	Paper 1 revision
History	Mrs Metcalfe	Thursday	12:45 – 13:30	605	Paper 2 revision
History	Mrs Metcalfe	Wednesday	15:15 – 14:15	605	Controlled Assessment



## GEOGRAPHY

### Key themes/subjects for revision

**Course details:** AQA A GCSE Geography 9030

**Examination dates:**

- Paper 1 (Physical Geography) – Tuesday 24<sup>th</sup> May 1.30pm
- Paper 2 (Human Geography) – Wednesday 8<sup>th</sup> June 1.30pm

Each of the modules below will be examined either on Paper 1 (Physical Geography) or Paper 2 (Human Geography). Controlled assessment will be marked by the teacher prior to the examinations and submitted to the exam board for moderation.

Unit	Modules	Assessment	% of GCSE
1 Physical Geography	<p><b>The Restless Earth</b> Tectonic plates, Fold Mountains, Volcanoes, Supervolcanoes, Earthquakes and Tsunamis. Case studies include: Fold Mountains, a volcanic eruption, an earthquake and a tsunami.</p> <p><b>Water on the land</b> The river valley. Erosion, transportation and deposition. River landforms, Rivers on maps. River discharge. Flooding. Hard versus soft engineering. Managing the UK's water. Case studies include: Flooding and a UK reservoir.</p> <p><b>The coastal zone:</b> Coastal weathering and erosion. Coastal landforms caused by erosion and deposition. Coastal landforms on maps. Rising sea levels and coastal flooding. Coastal management strategies. Case studies include: Coastal erosion, coastal flooding, coastal management and coastal habitats.</p>	Exam 1hr 30 mins	37.5 %
2 Human Geography	<p><b>Population change:</b> Population growth. Population structures. Managing rapid population growth. Managing ageing populations. Population movements. Migration within and to the EU. Case studies include: managing population growth and ageing populations.</p> <p><b>Globalisation:</b> Globalisation basics. Transnational corporations. Changes in manufacturing location. Globalisation and energy demand. Globalisation and food supply. Reducing the impacts of globalisation. Case studies include: Changes in manufacturing location.</p> <p><b>Tourism:</b> Growth in tourism. UK tourism. Mass tourism. Tourism in extreme environments. Ecotourism. Case studies include: UK tourism, mass tourism and extreme tourism.</p>	Exam 1hr 30 mins	37.5 %
3 Local Fieldwork	<p><b>Controlled assessment:</b> Coursework carried out in Hull City Centre studying the decline of the Old Town. Worked submitted February 2016.</p>	Controlled Assessment (2000 words)	25%

## Suggestions for revision techniques

Everyone learns in different ways, and we all revise in different ways too. There is no single way that works for everyone, so don't feel that you have to use all the ways suggested here. Just pick the ones that work for you, and feel free to add your own ideas as well.

- Check your revision plan and identify the topic you are going to revise.
- Re-read your class notes. This will help to refresh your mind and re-awaken memories of what you've covered. Don't rely too heavily on your class notes though, because there are other more effective ways to revise as well. Highlight important facts with a bright coloured highlighter pen.
- Consult your revision guide if you've been given one by your teacher. This should tell you which topics and key facts you need to understand and remember.
- Don't just read the notes and guides. Write new notes that cut your original notes down to the essential basics. Writing lots of words usually means you don't fully understand what you are writing about. Keep it short, tight and concise.
- Use plenty of diagrams. Try not to copy other people's diagrams because you will learn far more by drawing your own. Use factual diagrams such as sketches of mountains with features labelled on them, and mental diagrams such as spider diagrams to link ideas and facts together.
- Silly stories, acronyms and mnemonics help you to remember facts. Acronyms are things like 'Naughty Elephants Squirt Water' for remembering North, South, East and West, or 'Run Over Your Gerbil Before It Vanishes' to remember the colours of the rainbow.
- Research has shown that creating stories that contain all the things you need to recall is an effective way to learn. Creating the story requires you to learn all the facts, and reading it back will remind you of them. Don't be shy and don't just ignore it because it sounds stupid. For many people it will really help.
- Buy one or two revision books. These are usually designed to present all the key information for your course in simple terms. Don't rely entirely on a revision book, but when used together with your lesson notes and text books they are very useful.
- Take key facts and put them on sticky notes or small sheets of paper - stick them all over the house in places you will visit. The plus side of this is that your mum or dad will come out of the bathroom armed with a key fact to test you with!
- Produce a big poster and stick it to the ceiling above your bed - fill it with short facts and read it every night before you fall asleep. Once you know everything on it, replace it with a new one.
- Give your family permission to test you randomly. At first, this can feel horrible because you won't know all the answers, but you may soon discover that you learn quickly this way, and, if you have younger brothers or sisters, it might help them too.
- Make flash cards. Take every fact you need to know and turn it into a question and an answer. Put the question on one side of a card, and the answer on the other side.
- Revise with friends - they will learn from you, and you will learn from them.
- Once you are confident, and particularly when the exams are close, practise with old exam questions.

## Suggestions for revision resources

GCSE Geography AQA A specification ISBN: 9781847623782

Revise AQA A Geography ISBN: 9781447940852

[www.Coolgeography.co.uk](http://www.Coolgeography.co.uk)

[www.bbcbitessize.co.uk](http://www.bbcbitessize.co.uk)

## Planned additional revision sessions

Tuesday evenings      3.15 – 4.15      Room 401

## PE

### Key themes/subjects for revision

All units of work can and will be questioned during the exam paper.

### Suggestions for revision techniques

1. Mind-map everything you know on the unit without the aid of your revision guide, your workbook or your revision cards.
2. Once this has been complete use your revision cards to add more detail to your map. The bullet points from the cards should prompt you to add much more than just the bullet point.
3. After this, challenge yourself to the questions in the workbook on the topic you have just spent 20 minutes revising.
4. Finally, use your complete revision guide to check whether your answer has covered the correct content. Hopefully, you will have also applied your knowledge to gain any additional marks in the longer style questions.
5. Repeat for the next unit. *(Each unit is different in length however 20 mins per unit should be enough time for all)*

### Suggestions for revision resources

- Printed revision guide
- Printed revision workbook
- Revision cards
- Mypeexam
- GCSE POD 2.0 (if new, click new user: enter NAME DATE OF BIRTH and search for HULL TRINITY HOUSE)
- Teach pe.com
- GCSE PE Bitesize

### Planned additional revision sessions

Every Monday night after school a topic will be covered each week. Additional exam technique will also be covered throughout these sessions as well as 6 mark answers.

## FRENCH

### Key themes/subjects for revision

Year 11 are now working on their Listening and Reading skills for the two examinations that they will sit on the **17<sup>th</sup> May**.

### Suggestions for revision techniques

In order to achieve the best possible grade, it is essential for students to do independent work at home, revising key words and structures. **They should be doing at least 1 hour of revision per week and increase this in the last months before the exam.**

### Suggestions for revision resources

#### - Vocab Express: [www.vocabexpress.com](http://www.vocabexpress.com)

This website is the best way for pupils to revise key words and expressions as it is targeted as all the key expressions that pupils will need to know for the exam. They should work through the different topics and revisit difficult topic areas several times before their exam.

#### - Revision Guide

All Year 11 pupils have been provided a free Revision Workbook with Reading and Listening practice. Pupils are expected to regularly complete exercises from it in preparation for their examination.

#### - Reading and Listening Practice Booklets

These packs will be issued to pupils as holiday homework.

#### - Past Papers

Past papers are regularly put on the school shared area for pupils to download and practise either at school or at home.

### Planned additional revision sessions

To help pupils with their revision, the French department is offering some **booster sessions on Tuesday after school** focused on reading and listening skills. Attendance is **highly** recommended. The dates are as follows:

- **Tuesday 8<sup>th</sup> March**
- **Tuesday 15<sup>th</sup> March**
- **Tuesday 19<sup>th</sup> March**
- **Tuesday 26<sup>th</sup> April**
- **Tuesday 3<sup>rd</sup> May**
- **Tuesday 10<sup>th</sup> May**

## COMPUTING

### Key themes/subjects for revision

- 1.1 Fundamentals of computer systems
- 1.2 Computer hardware (CPU, binary logic, memory, input/output/storage devices)
- 1.3 Software
- 1.4 Representation of data in computer systems (Units, number, character, images, sound, instructions)
- 1.5 Databases (Database concept, DBMS, relational databases)
- 1.6 Computer communications and networks (Networks, the internet)
- 1.7 Programming (Algorithms, programming languages, control flow, handling data, testing)

### Suggestions for revision resources

The students have access to a website that covers all the material they need to know for the exam.

[www.gcsecomputing.org.uk](http://www.gcsecomputing.org.uk)

Username: trinitypupil

Password: pupil999

They are also able to create their own username and password for the exam website that covers the entire course:

[www.cambridgegcsecomputing.org/](http://www.cambridgegcsecomputing.org/)

They will also be able to use GCSEPod from the Academy website, as they have usernames and passwords for this.

In the Shared Area on the computer network, there is a set of videos that they can copy onto their computers, laptops, phones, tablets, MP3 players, etc. They can then watch them any time they have. I would recommend they watch them at least once, similar to the GCSEPod videos.

In class, we will cover every past paper, so there is no need to do these at home. The past paper work should identify any weaknesses a student has, to give focus to revision they might need to do. If it identifies any weaknesses in the majority of students, I will re-teach that topic.

I will also issue a set of worksheets with notes that we can work through, to make sure everything has been covered.

## ICT

### Key themes/subjects for revision

#### Controlled Assessment (60%)

The students have had the opportunity to come and work on the controlled assessment in the half term for one day. The students will be invited to come in over the Easter holidays as they are running out of time.

Students are allowed to complete the following tasks outside of supervision (i.e. at home), research (Activity 1 & 2), gathering assets for products (Activity 3) and initial designs for Activity 3. They have been given no homework since the start of the controlled assessment as they were expected to be doing this research at home.

#### Revision for Exam (40%)

The exam is not only about identifying the hardware and software components, it is also necessary for students to apply their knowledge of the device or product features in a real life scenario. After the Easter break, we shall be learning techniques in preparation for their exam. Therefore, students need to revise the theory as much as possible for them to be successful in their GCSE.

### Suggestions for revision resources

We have purchased an exam board revision guide and workbook for each student to use over the Easter Holidays. The students should work through this and aim to complete as much as possible.

Students can find further theory to revise from on the links below:

- <http://www.bbc.co.uk/education/subjects/zqmtsbk> (GCSE ICT)
- <http://revisionworld.com/gcse-revision/ict>
- [http://www.teach-ict.com/gcse\\_new/gcse\\_ict\\_quizzes.htm](http://www.teach-ict.com/gcse_new/gcse_ict_quizzes.htm) (Quizzes/games on different topics)
- [http://www.teach-ict.com/gcse\\_new/computer%20systems/hardware\\_software/home\\_hw\\_sw.htm](http://www.teach-ict.com/gcse_new/computer%20systems/hardware_software/home_hw_sw.htm)
- [http://www.teach-ict.com/gcse\\_new/computer%20systems/input\\_devices/home\\_input\\_devices.htm](http://www.teach-ict.com/gcse_new/computer%20systems/input_devices/home_input_devices.htm)
- [http://www.teach-ict.com/gcse\\_new/computer%20systems/output\\_devices/home\\_output\\_devices.htm](http://www.teach-ict.com/gcse_new/computer%20systems/output_devices/home_output_devices.htm)
- [http://www.teach-ict.com/gcse\\_new/computer%20systems/storage\\_devices/home\\_storage\\_devices.htm](http://www.teach-ict.com/gcse_new/computer%20systems/storage_devices/home_storage_devices.htm)
- [http://www.teach-ict.com/gcse\\_new/networks/computer\\_networks/home\\_computer\\_networks.htm](http://www.teach-ict.com/gcse_new/networks/computer_networks/home_computer_networks.htm)
- [http://www.teach-ict.com/gcse\\_new/health\\_safety/home\\_health\\_safety.htm](http://www.teach-ict.com/gcse_new/health_safety/home_health_safety.htm)

## RELIGIOUS STUDIES

### Key themes/subjects for revision

#### Examination Dates:

Unit 2 (40552): **18<sup>th</sup> May** (pm exam)

Unit 3 (40553): **23<sup>rd</sup> May** (pm exam)

**Each unit accounts for 50%** of the total Full Course marks.

Written papers - **2 x 1 hour 30 minutes**

Answer **four topics** from the choice of six given.

Each topic is worth 18 marks.

There are **4 additional marks on the paper for SPaG**.

The question paper is worth 76 marks in total.

#### Topics within each exam you will answer:

##### Unit 2 - Religion and Life Issues

- Religion and Animal Rights
- Religion and Planet Earth
- Religion and Prejudice
- Religion and Early Life

##### Unit 3 – Religion and Morality

- Religious Attitudes to Elderly and Death
- Religious Attitudes to Drug Abuse
- Religious Attitudes to Crime and Punishment

### Suggestions for revision techniques

- Using a mind-map to summarise each topic within a unit
- Past paper questions, particularly 6 mark questions
- Revision cards / flash cards
- Glossary of key terms
- Test yourself

### Suggestions for revision resources

- Class Revision Folder
- RS Revision (<http://www.rsrevision.com/GCSE/>)
- Revision Guides: Religion and Life Issues (Hodder Education)
- Religion and Morality (Philip Allan)

### Planned additional revision sessions

Every Monday 3:15 – 4:15

## RESISTANT MATERIALS

### Key themes/subjects for revision

#### AQA GCSE Resistant Materials

**Unit 1** – Pre –Release material is issued before the written exam

- 2 hours written exam worth 120 marks and 40% of overall GCSE grade

**Unit 2** – Design and Making Practice – 90 marks worth 60% of the overall GCSE grade

**Written exam – Thursday 16<sup>th</sup> June (am)**

#### Key themes/topics in the written exam

- Metals/timber/plastics/composites/alloys/smart materials/Nanomaterials
- Components/adhesives and applied finishes
- Design and market influences/market pull + technology push
- Sustainability
- Development and evaluation of ideas
- Planning for manufacture
- Ways of manufacturing/techniques/preparation/marketing out/cutting/shaping/jigs/forming and bending/casting and moulding/joining/cleaning and finishing/CAD CAM
- Scales of production
- Social/moral/cultural/sustainability/economics of design
- Consumer choice
- Consumer rights legislation/product maintenance/codes of practice
- Moral and ethical issues in regard to design and materials
- Health and safety/ working environment and the consumer
- Systems and control/mechanical systems/electrical systems/quality control systems
- Information and communication technology/computing and communication techniques, CAD for Graphics, Industrial use of CAD/CAM
- Industrial Practices / manufacturing systems/ Industrial and market awareness
- Industrial systems for batch and volume production

#### Written exam – key questions marks allocations (These are approximations)

Designing – 33 marks

Sustainability- 13 marks

Manufacturing - 16 marks

Product analysis- 15 marks

Modern and smart materials - 12 marks

Adhesives - 9 marks

Clients/consumers -12 marks

CAD/CAM – 10 marks

### Suggestions for revision resources

Your son has been issued with a Resistant Materials workbook and revision guide at the start of the course. Your son has been asked to work through this filling in the answers weekly. It is expected that he does this as homework every week.

- Nelson Thornes AQA Design and Technology: Resistant Materials 978-1-4085-0273-0
- Nelson Thornes AQA Design and Technology: AS/A2 Product Design 978-0-7487-8257-4
- Heinemann Design and Technology for AQA: Resistant Materials 0-435-41347-3
- Heinemann Design and Technology for AQA: Resistant Materials: Teachers resource file 0-435-41348-1
- Collins Design and Technology: Resistant Materials 0-00-323523-8
- Collins CDT: Design and Realisation 0-00-322060-5
- Collins CDT: Technology 0-00-327434-9
- CPG GCSE Design and Technology: Resistant Materials 1-84146-792-8
- Stanley Thornes Design & make it! Resistant Materials Technology 0-7487-2470-2
- Letts Design and Technology: Resistant Materials Questions and answers 1-84315-236-3
- Letts Design and Technology: Resistant Materials 1-84315-020-4



- Oxford Design and Realization 0-19-832732-3
- [www.technologystudent.com](http://www.technologystudent.com)
- [www.bbc.co.uk/schools/gcsebitesize/design/resistantmaterials](http://www.bbc.co.uk/schools/gcsebitesize/design/resistantmaterials)
- [www.designandtech.com/resistantmaterials](http://www.designandtech.com/resistantmaterials)
- [www.jamesdysonfoundation.com/](http://www.jamesdysonfoundation.com/)
- [www.tep.org.uk](http://www.tep.org.uk)
- [www.design-technology.org](http://www.design-technology.org)
- [www.nanotechproject.org](http://www.nanotechproject.org)
- [www.helenhudspith.com](http://www.helenhudspith.com)
- [www.sda-uk.org](http://www.sda-uk.org)
- [www.howstuffworks.com](http://www.howstuffworks.com)
- [www.ergonomics4schools.com](http://www.ergonomics4schools.com)

### Planned additional revision sessions

Every night, straight after school 3.15 to 4.30pm in G03

Every lunchtime (except Thursdays) in G03

## ELECTRONIC PRODUCTS

### Key themes/subjects for revision

1. Circuit Symbols
2. Electronic Components; batteries, resistors, capacitors, diodes, LED's, 7 seg display etc.
3. Drivers and Devices; Transistors, thyristors, relays, motors, sounders, etc.
4. Integrated Circuits; Monostables and Astables, op-amps, logic gates, decade counters, etc.
5. Programmable Interface Controllers; flowcharts, input and output control, etc.
6. Products to improve hand / eye co-ordination
7. Calculations for series resistance, ohm's law ( $V=IR$ ), potential dividers, time constants, astable frequency, mark/space ratios, time high/low, inverting op-amp gain

### Suggestions for revision resources

Students have been issued with a revision guide and workbook published by Collins. The title is GCSE D&T Electronic Products Essentials. All sections of the revision guide and workbook must be completed out of lessons to ensure good preparation for the examination on 24<sup>th</sup> May 2016.

Students have also taken notes in their books which should be used to revise from. These notes will be added to over the coming weeks as revision lessons continue. Students will be provided with past paper questions and mark schemes to enable them to practise exam style questions on the topics they have revised.

### Revision Schedule (with revision guide page numbers)

<b>February</b>			15 <sup>th</sup>	Operational Amplifiers	p54-57
25 <sup>th</sup>	Resistors	p21-27	21 <sup>st</sup>	Time delays, RC circuits	p28
26 <sup>th</sup>	Potential dividers, resistor calcs		22 <sup>nd</sup>	Astables / Monostables – cct design	p48-49, 53
<b>March</b>			28 <sup>th</sup>	Astables / Monostables - calcs	p50-53
3 <sup>rd</sup>	Capacitors	p28-29	29 <sup>th</sup>	4017 counters	p62
4 <sup>th</sup>	Diodes / LED's	p30-32	<b>May</b>		
10 <sup>th</sup>	Power Supplies	p20, p70	5 <sup>th</sup>	4026 counters & 7 seg display	p63, p32-33
11 <sup>th</sup>	Bi-polar Transistors	p36-37	6 <sup>th</sup>	PIC Circuits – flowchart control	p68-74
17 <sup>th</sup>	Field Effect Transistors	p39	12 <sup>th</sup>	PIC Circuits – analogue inputs	p75-81
18 <sup>th</sup>	Thyristors / Relays / Opto Isolators	p40-42,65	13 <sup>th</sup>	PIC Circuits - interfacing	p38-43
24 <sup>th</sup>	Logic Gates	p58-61	19 <sup>th</sup>	Darlington drivers / pairs	p44
<b>April</b>			20 <sup>th</sup>	Switch de-bouncing	p64
14 <sup>th</sup>	Operational Amplifiers	p54-57	24 <sup>th</sup>	<b>AM EXAMINATION</b>	

## ART AND DESIGN

### Key themes/subjects for revision

#### Coursework

This is 60% of the final mark, students have worked on large canvases and also boards for each assessment objective. The main theme of their coursework is portraiture. Students are encouraged to return to the Art department as much as possible to complete/refine their work. All work must be submitted by the 31<sup>st</sup> May.

#### Exam

This is worth 40% of the final mark.

The students are following individual themes for the exam and are working on boards whilst in school. The final exam is on the 20<sup>th</sup> and 21<sup>st</sup> of April, this is over 2 days and totals 10 hours, in total they have 8 weeks to prepare.

For both coursework and exam the assessment objectives are broken up into four different sections: research, experiments with media, recording and final piece.

### Suggestions for revision techniques

Students have a list of work to complete for each assessment objective which can be copied and sent home. At home, they could develop their drawing skills for their coursework by experimenting with a range of techniques to add to their boards.

### Suggestions for revision resources

To complete work at home, students need access to good quality paper for drawing, pencils and some form of colour either in pencil, paint or pastel form.

### Planned additional revision sessions

Students are expected to attend the Easter sessions to help prepare for the exam on the 30<sup>th</sup> and 31<sup>st</sup> of March.

Additional preparation sessions take place at the following times:

- Monday Lunchtime
- Tuesday Lunchtime
- Tuesday 3.15 – 4.15
- Wednesday Lunchtime
- Wednesday 3.15 – 4.15
- Thursday Lunchtime
- Thursday 3.15 – 4.15
- Friday Lunchtime