Y11 Exam Information

GCSE Computer Science



KEY DATES

Paper 1 Mock exam

Thursday 6th November

Paper 2 Mock exam

Tuesday 11th November

Paper 1 – Computer Systems

Wednesday 13th May PM

Paper 2 – Computational thinking, algorithms and programming **Tuesday 19th May PM**



Examination content

Paper 1

- 1.1 Systems architecture
- 1.2 Memory and storage
- 1.3 Networks
- 1.4 Network security
- 1.5 Systems software
- 1.6 Ethical, legal, cultural and environmental concerns

Paper 2

- 2.1 Algorithms
- 2.2 Programming fundamentals
- 2.3 Producing robust programs
- 2.4 Boolean logic
- 2.5 Translators and IDEs



FORMAT OF PAPER 1

Typically 7 main questions, with subquestions

80 Marks

Paper 1
1.5 hours

Written exam paper

Covers all content from 1.1-1.6



FORMAT OF PAPER 2

Section A – 50 mins
Section B – 40 mins
Some parts of Section B involve writing
programs either in Python or OCR Exam
Reference Language

80 Marks

Paper 2
1.5 hours

Written exam paper

Covers all content from 2.1-2.5



Exam command words

Command word	Definition
Add	Join something to something else so as to increase the size, number, or amount.
Analyse	Break down in order to bring out the essential elements or structure. Identify parts and relationships, and interpret information to reach conclusions.
Annotate	Add brief notes to a diagram or graph.
Calculate	Obtain a numerical answer showing the relevant stages in the working.
Compare	Give an account of the similarities and differences between two (or more) items or situations, referring to both (all) of them throughout.
Complete	Provide all the necessary or appropriate parts.
Convert	Change the form, character, or function of something.
Define	Give the precise meaning of a word, phrase, concept or physical quantity.
Describe	Give a detailed account or picture of a situation, event, pattern or process.
Design	Produce a plan, simulation or model.
Discuss	Offer a considered and balanced review that includes a range of arguments, factors or hypotheses. Opinions or conclusions should be presented clearly and supported by appropriate evidence.
Draw	Produce (a picture or diagram) by making lines and marks on paper with a pencil, pen, etc.
Evaluate	Assess the implications and limitations. Make judgements about the ideas, works, solutions or methods in relation to selected criteria.
Explain	Give a detailed account including reasons or causes.
Give	Present information which determines the importance of an event or issue, or to show causation.
How	In what way or manner; by what means.
Identify	Provide an answer from a number of possibilities. Recognise and state briefly a distinguishing factor or feature.
Justify	Give valid reasons or evidence to support an answer or conclusion.
Label	Add title, labels or brief explanation(s) to a diagram or graph.
List	Give a sequence of brief answers with no explanation.
Order	Put the responses into a logical sequence.
Outline	Give a brief account or summary.
Refine	Make more efficient, improve, modify or edit.

Command word	Definition
Show	Give steps in a derivation or calculation.
Solve	Obtain the answer(s) using algebraic and/or numerical and/or graphical methods.
State	Give a specific name, value or other brief answer without explanation or calculation.
Tick	Mark (an item) with a tick or select (a box) on a form, questionnaire, etc. to indicate that something has been chosen.
What	Asking for information specifying something.
Write/Rewrite	Mark (letters, words, or other symbols) on a surface, typically paper, with a pen, pencil, or similar implement/write (something) again so as to alter or improve it.



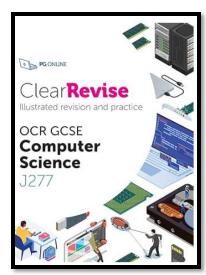
Location of revision resources

- senecalearning.com
 - Online platform used frequently for revision and homework tasks
- adacomputerscience.org
 - Online platform that covers all of the theory content for GCSE Computer Science as well as bite-sized study tasks
- Craig 'n' Dave YouTube channel
 - https://www.youtube.com/playlist?list=PLCiOXwirraUAEhj4TUjMxYm4593B2dUPF
 - Clear videos that explain every aspect of the course. Presented in specification order
- Smart Revise (coming soon)
 - https://smartrevise.online/
 - Learning platform that creates individualised testing for students based on their previous answers to questions
- Raspberry Pi coding platform
 - https://rpf.io/editor-student
 - Online Python programming environment, which will contain programming challenges for students to complete
- BBC Bitesize
 - Superb resource that covers all theory from the specification



HOW CAN PARENTS HELP?

- 1. Ensure students *complete the revision tasks* prior to sitting internal assessments in school
- 2. Encourage students to complete Python programming tasks from the OCR Challenges booklet
- 3. Ensure students are using the knowledge organisers to understand the key vocabulary for the course
- 4. Ensure students complete Python programming tasks set on the Raspberry Pi Platform, and encourage them to persevere if they get stuck. An example approach to take:
 - 1. "How can I solve a simpler version of the problem?"
 - 2. What inputs, outputs and variables will the program need?
 - 3. What processing or calculations does the program need to do?
 - 4. In what order to the instructions need to be presented?
 - 5. Will I need to use iteration/looping?
 - 6. Read the question carefully!



https://www.amazon.co.uk/ClearRevise-GCSE-Computer-Science-J277/dp/1910523232/



POST-16 OPPORTUNITIES

Home > Subjects > Computer Science > A-level Computer Science

A-level Computer Science 7517



