A LEVEL

MATHEMATICS A H240



Support highlights

We've collated links to some of our core resources into this one-stop guide. These highlighted resources will enable you to get up to speed quickly in the classroom and support your students in preparing for assessment. They include materials that will focus your teaching on individual abilities of students, help determine their capabilities and above all save you time. Many more resources are available from OCR Website.

Delivery guides

Download a zip folder with all delivery guide content.

Our delivery guides provide some insight into general teaching approaches, common student misconceptions and contextual links across the specification for each topic. Each guide has a collection of links to free OCR and third-party resources suggested by teachers.

Section Check in tests

Download these resources

Our Section Check In tests are short sets of questions on a section of the specification. You can use them to aid diagnostics, as in-class assessments, homework tasks or revision. Questions cover AO1 (routine), AO2 (reasoning) and AO3 (problem solving and modelling). Each test has 10 questions, plus an extension activity, and worked solutions.

Notes on the Large Data Set

Download the notes on the large data set.

This guide provides a general outline of the large data set requirements and includes some notes on some interesting features of the large data set to be used on H240/02.

You may also like

<u>Bridge the gap between GCSE and AS/A Level Mathematics - Student guide</u>. Useful recap of the fundamental algebra skills needed for A Level Mathematics.

Command Words Poster. Guidance on the wording used in the examination.

<u>Calculator Poster</u>. Useful guidance for using the calculator in the examination.

Assessment materials

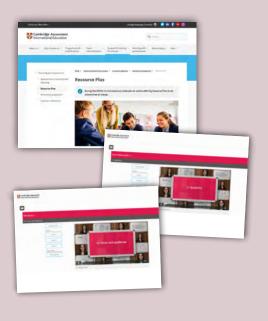
Access past papers, mark schemes and examiners' reports from the OCR website.



A Level Mathematics H240 Support highlights









Additional resources to support you

Curriculum Planner

A <u>condensed 1-year scheme of work</u>, with notes on key concepts, to support teachers with their planning for the 2021/22 academic year.

Progress Tests

A <u>set of tests</u> compiled from ExamBuilder, using questions from the legacy OCR Maths (3890-7893) and MEI Maths (3895 - 7896) qualifications which have been adapted to reflect the new assessment criteria. An <u>instruction guide</u> to help teachers use ExamBuilder to create practice materials to assess the gaps in students' knowledge has also be published.

Please note Interchange access is required to access the progress tests.

Student Guide

A guide to common misconceptions and errors to support exam readiness.

Student revision checklist

<u>RAG rating of the specification content for students</u> to self-evaluate with. This can be useful to inform themselves and teachers of gaps and where to focus revision.

Professional Development

Find an event

See our range of professional development courses using the '<u>Find an event</u>' search tool.

We are continuing to run all our cpd training online at this time. Courses will be in the form of a webinar, offering the same high-quality training as our face-to-face training. If you have any questions, please email professionaldevelopment@ocr.org.uk

Cambridge Assessment resources

Resource Plus from Cambridge International

These <u>digital resources</u> are now available to all OCR teachers free of charge. Resource Plus gives you access to high quality videos, ready-made lesson plans and teaching materials that you can use to help your students learn and prepare for their exams. We also offer Resource Plus materials that are designed for you to share with your students. Here are a couple of links you may find particularly useful.

<u>1.1 Quadratics</u>. Good recap of this fundamental set of skills needed for problem solving across the specification.

4.1 Forces and Equilibrium. Useful support for this key concept in Mechanics.

For full mapping of Resource Plus to our qualification please download this additional support.

University of Cambridge resources

Underground Maths

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provides a <u>range of rich resources</u> for teaching and learning A Level Mathematics. Makes use of past paper questions and other learning activities to enable all students to explore the connections that underpin pure mathematics. <u>Negatively triangular</u> is a set of activities looking at equations of straight lines and the properties of the polygons enclosed by those lines.

Nrich

has a <u>range of puzzles</u>, lesson activities and interesting further reading articles to challenge and motivate students. <u>Dicey Dice</u> is an example puzzle investigating conditional probability.

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University of Cambridge resources (cont.)

Cambridge Mathematics

is a joint project of four departments of the University of Cambridge which is working internationally with maths education specialists. The <u>article on proof-reading</u> challenges the reader to identify the theorem to be proved from the geometric design given.

The STEP Support Programme

is offered by the University of Cambridge to help university applicants develop their <u>advanced mathematical problem-solving</u> skills. The problems set are designed to challenge and extend your knowledge. The early STEP 1 foundation modules build primarily on GCSE and AS knowledge. <u>Assignment 1</u> focuses on algebra and quadratic equations

Publisher materials

Cambridge University Press

Cambridge University Press have a <u>wide range of student textbooks</u> to support this specification, include Cambridge Elevate textbooks. Prices for these textbooks ranch from £16.75 (plus VAT), through to £40.75 (plus VAT). School site licences are also available for Cambridge Elevate textbooks and are available in the region of £300 (plus VAT).

Cambridge Elevate

This <u>digital learning experience</u> provides a range of digital resources/textbooks that would suit this qualification. This is a paid for service, but a 30 day trial is available. Our partners at Cambridge University Press have made the following revision sheets, which are particularly helpful for A Level students, freely available to OCR customers: B: Factorising Quadratics, E: Types of numbers, F: Functions, G: Rules of Indices, H: Surds, K: Direct and indirect proportions, L: using coordinates, M: Straight lines graphs, N: Angles and bearings, O: Circle theorems, P: Pythagoras and trigonometry, Q: Vectors, W: Tree diagrams. These sheets will be available soon from the 'Planning & Teaching' section of the OCR qualification page.

Hodder Education

Hodder Education has produced <u>Student Books</u>, <u>eTextbooks and Whiteboard eTextbooks</u> for OCR A Level Mathematics A. Also available are Student Revision Notes. Prices vary for these Textbooks, more details can be found by following the link.

Other resources

For additional support material see the list of <u>useful links</u> to mathematics sites.













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A Level Mathematics H240 Support highlights



Keep connected

Total Maths

Sign up to receive our <u>monthly newsletter</u> to keep up-to-date with the latest OCR Maths news and updates including CPD events, Teacher Networks and resources.

Blog Posts

Articles written by OCR Subject Advisors and by guest authors on aspects of A Level Mathematics to support teaching and learning.

Studying A Level Mathematics at home

A guide to a range of resources that could be used for independent study of A Level Maths.

Using graphs to investigate quadratic functions

A short discussion on activities to tackle misconceptions and common errors seen on questions related to quadratic functions.

<u>Trigonometry</u>, not just for triangles

A discussion, in two parts, of misconceptions and common errors seen on questions involving these trigonometric ratios.

Get in touch



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