CEC 5 year Learning Journey: Mathematics

Courses — GCSE Mathematics is an entry requirement for a majority of Post-16 courses

Careers — Agriculture, Education, Engineering, Retail, Construction, Finance, Medicine, Research

Skills — Problem solving, analyzing data, communication, logical thinking and attention to detail

Real World — Asking/answering questions about your world and making decisions based on evidence

Revision and GCSE Exams

Cycle 2
- Revision
- Super Teaching
- Exam preparation

Year 11

Cycle 1
- Ratio, Proportion & Rates of change
- Number
- Algebra

Cycle 3
- Circles, Cylinders, Cones & Spheres
- Averages & Statistical Diagrams
- Constructions & Loci (F)
- Right-Angles triangles (F)
- Geometry (H)

Cycle 2
- Measures & Real-life graphs
- Ratio, Proportion & Rates of change (H)
- Vectors, Transformations & Congruence
- Algebra (H)
- Quadratic & Simultaneous equations

Year 10

Cycle 2
- Fractions
- Decimals & Percentages
- Theoretical & Experimental Probability
- Sequences
- Straight-Line Graphs

Cycle 3
- Angle & Shape Properties
- Right-Angle Triangles
- Collecting & Representing data
- Indices, Surds & Prime Factors

Cycle 1
- Number & Algebra
- Geometry (H)
- Equations, Inequalities & Formulae
- Ratio, Proportion & Scale
- Venn & Tree Diagrams

Year 9

Cycle 1
- Rounding & Estimating
- Roots, Indices & Standard Form (H)
- Operations
- Algebraic Expressions
- 2D & 3D Shapes

Cycle 3
- Number
- Ratio, Proportion, Rates of change x 3
- Geometry x 2
- Algebra

Cycle 2
- Number
- Data Handling
- Algebra
- Geometry

Year 8

Cycle 2
- Number x2
- Geometry
- Data Handling
- Algebra

Cycle 3
- Geometry x 3
- Number
- Ratio, Proportion & rates of change
- Data Handling x 2
- Algebra

Cycle 1
- Number
- Ratio, Proportion, Rates of change
- Geometry
- Algebra
- Data Handling

Year 7

Cycle 1
- Number x2
- Geometry
- Data Handling
- Algebra
- Ratio & Proportion

Year 6

Summer Term
- Geometry - properties of shapes
- Problem solving
- Statistics

AO1

Use and apply standard techniques
- accurately recall facts, terminology and definitions
- use and interpret notation correctly

AO2

Reason, interpret and communicate mathematically
- make deductions, inferences and draw conclusions from mathematical information

AO3

Solve problems within mathematics and in other contexts
- interpret results in the context of the given problem
- evaluate methods used and results obtained