# Mathematics Courses 2022/2023

**Chatswood High School** 

#### **Year 11 Mathematics 2022**

There are four Mathematics courses in Year 11.

#### They are:

- Mathematics Extension 1 (1unit)
- Mathematics Advanced (2 unit)
- Mathematics Standard (2 unit)
- Numeracy (NEW) (2 unit)

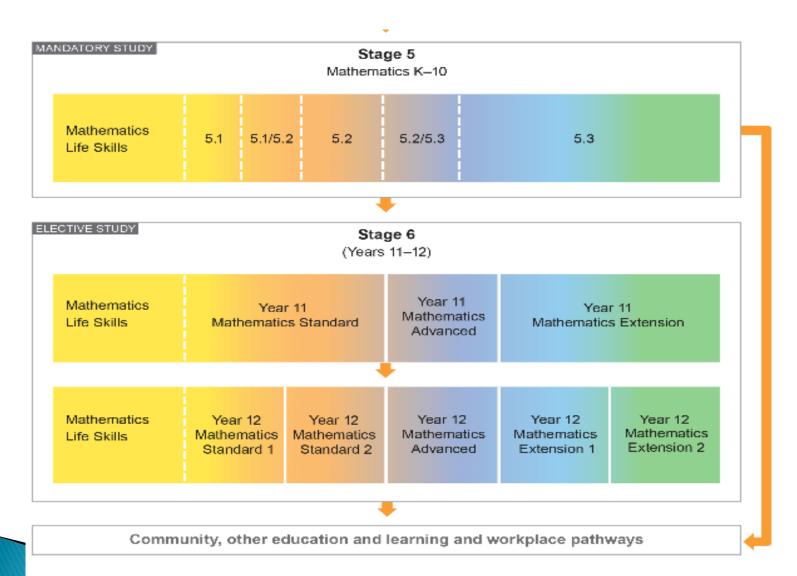
Note: Mathematics Advanced and Mathematics Extension 1 are studied concurrently (Mathematics Extension 1 cannot be studied on its own).

#### **Year 12 Mathematics 2023**

There are six Mathematics courses in Year 12.

- Mathematics Extension 2
- Mathematics Extension 1
- Mathematics Advanced
- Mathematics Standard 2
- Mathematics Standard 1
- Numeracy (Content Endorsed Course)

#### What course best suits?



## Year 11 Mathematics Standard / Year 12 Mathematics Standard 2

- This course revises and builds upon content taught in Year 10.
- Mathematics Standard is aimed at students who wish to continue with their study of Mathematics in Years 11 and 12 to gain a better understanding and application of mathematics in real world situations.
- All students studying Mathematics Standard 2 will sit for the HSC examination.
- The examination mark may be used for the calculation of an ATAR.

### Year 11 Mathematics Standard / Year 12 Mathematics Standard 2

- This course provides an appropriate mathematical background for students entering the workforce or undertaking further tertiary training.
- It provides opportunities for students to develop an understanding of and skills in further aspects of mathematics for concurrent HSC studies.
- To undertake this course, students should have a sound understanding of the Year 10 - 5.1 course (or above). Students currently in the Year 10 - 5.2 course who wish to study Mathematics in Year 11 are recommended to select this course.

## Year 11 Mathematics Standard / Year 12 Mathematics Standard 1

- The Mathematics Standard 1 course offered in Year 12 has similar but slightly reduced content compared to the Standard 2 course.
- It provides an appropriate mathematical background for students entering the workforce and/or undertaking further community and workplace training.
- Students studying Mathematics Standard 1 in Year 12 may elect to undertake an optional HSC examination.
- The examination mark may be used for the calculation of an ATAR.

#### **Mathematics Advanced**

- This is not a harder version of the Mathematics Standard course but a different course entirely.
- This course relies on students having very good algebraic skills as it is a Calculus based course.
- Mathematics Advanced treats content in the Year 10 Mathematics 5.3 course as assumed knowledge and students should have a sound understanding of the 5.3 course.
- Suitable candidates for this course should aim for a minimum of 85% in Mathematics Stage 5.2 or 75% in Mathematics Stage 5.3

#### **Mathematics Extension 1**

- Mathematics Extension 1 includes and expands upon the Mathematics Advanced course, looking at more complicated and abstract concepts in greater depth.
- To undertake this course, students should have developed mastery of the Year 10 Mathematics Stage
  5.3 course.
- Students need to meet the benchmark criteria of 80% and be ranked in the top 50 students in Mathematics Stage 5.3.

- ▶ To be eligible to study Mathematics Extension 1 students will be considered on their performance in the Year 10 5.3 course.
- Students will need to have demonstrated the ability, necessary skills and application to cope with the demands of this course through their exam results, classwork and rank.
- This is a very challenging course and student *performance* will be reviewed regularly.

#### **Mathematics Extension 2**

- ▶ **Mathematics Extension 2** may be available in Year 12 to students who studied Mathematics Extension 1 in Year 11.
- This is an extremely rigorous course that introduces formal mathematical proof and requires a high level of dedication and deep mathematical thinking.
- To be eligible to study the Mathematics Extension 2 course, students will be considered on their *performance in the Year 11 Mathematics Extension 1* course.

#### **Numeracy (Content Endorsed Course)**

- ▶ This is a **new** Mathematics course to begin in 2022.
- The Numeracy course supports students to develop the functional numeracy skills required to become active and successful participants in society.
- Students have the opportunity to develop these skills and apply them to situations in personal and community, workplace and employment, and education and training contexts.
- This course offers students the opportunity to prepare for postschool options of employment or further training.

**Note:** This is a non-ATAR course.

#### Can students try out a course and change later?

- Students perform best when they pick an appropriate course from the beginning of Year 11 and remain in it until the end of Year 12.
- Changing to a different course is possible, but students must catch up all the content and skills that they have missed while they were in the other course.
- Therefore, it is best to start in the course students believe they will finish at the end of Year 12.

#### Consideration.....

- Most universities have introduced prerequisites for enrolment in some of their degrees.
- Students will need to score a Band 4, 5 or 6 in Mathematics Advanced in order to enter first year subjects in a wide range of science and engineering (and other STEM-related) degrees.

### **Nesa Mathematics**

For further information on all Stage 6
Mathematics Courses please click on the link below

Mathematics Stage 6 Courses