Summary report of the 2021 ATAR course examination report: Mathematics Applications

| Year | Number who sat | Number of absentees |
| :---: | :---: | :---: |
| 2021 | 7581 | 190 |
| 2020 | 7611 | 192 |
| 2019 | 8047 | 163 |
| 2018 | 8451 | 178 |

The number of candidates sitting and the number attempting each section of the examination can differ as a result of non-attempts across sections of the examination.

## Examination score distribution-Written



## Summary

The examination consisted of two sections: a Calculator-free section and a Calculatorassumed section.

Attempted by 7575 candidates
Section means were:
Section One: Calculator-free
Attempted by 7574 candidates
Section Two: Calculator-assumed
Attempted by 7555 candidates

Mean 62.66\%
Max 97.96\% Min 0.00\%

## General comments

There were sufficient complex questions to ensure a good spread of scores and sufficient simple questions to ensure candidates could demonstrate their understanding of concepts. The length of the paper seemed appropriate with $97 \%$ of the candidates attempting Question 15 and $97 \%$ of the candidates attempting Question 16. Responses indicated that basic arithmetic skills are still very poor with many candidates.

## Advice for candidates

- Focus on key words/phrases in questions, such as 'in context'.
- Practise doing calculations without a calculator, particularly multiplying fractions/decimals and converting fractions to percentages.
- Show working, even for two-mark questions.
- Practise plotting points on a Cartesian plane.


## Advice for teachers

- Stress the importance of setting out responses in a logical and methodical way.
- Stress the importance of using brackets.
- Continue to emphasise the importance of using correct terminology. Refer students to the Glossary of terms at the end of the Year 12 syllabus.
- Remind students to read questions carefully.


## Comments on specific sections and questions

Section One: Calculator-free ( 52 Marks)
Candidates performed very well in this section, as shown by a mean of $71.44 \%$. However, basic arithmetic skills were lacking among many candidates. These included converting fractions into percentages and reducing a fraction to its lowest terms.

## Section Two: Calculator-assumed (94 Marks)

This section appeared to be more difficult than Section One for candidates, with a mean of $57.94 \%$. Questions 12 and 14 proved to be the discriminating questions. Candidates performed well on the routine questions but experienced difficulty with questions that required interpretation of solutions.

