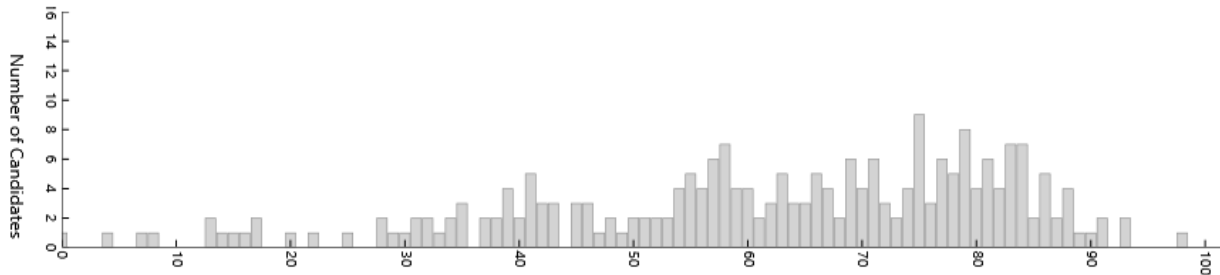




Summary report of the 2016 ATAR course examination: Engineering Studies

Year	Number who sat	Number of absentees
2016	232	4

Examination score distribution



Summary

This was the first year of the ATAR course examination in Engineering Studies. There were two electives only, Mechanical and Mechatronics. The mean for the Core section was 67.05%, the Mechanical section 59.55% and the Mechatronics section 59.30%; giving an overall mean for the course of 61.87%. The two highest scores were 97.50% and 94.25%. The closeness of the means for the two specialised sections and the scores obtained by the top candidates indicated that it was a fair paper regardless of the specialist area studied.

Section means were:

Core content Part A: Multiple-choice	Mean 7.75(/10)	Max 10.00	Min 0.00
Core content Part B: Extended answer	Mean 19.07(/30)	Max 30.00	Min 1.00
Mechanical Part A: Multiple-choice	Mean 6.28(/10)	Max 10.00	Min 1.00
Mechanical Part B: Extended answer	Mean 29.45(/50)	Max 47.75	Min 0.50
Mechatronics Part A: Multiple-choice	Mean 6.60(/10)	Max 10.00	Min 2.00
Mechatronics Part B: Extended answer	Mean 28.98(/50)	Max 48.50	Min 2.75

General comments

The majority of candidates performed well in the Core section of the examination. Similar means in the two specialised sections indicated that their comparability was sound.

Advice for candidates

- For multiple-choice questions, read all the choices carefully and use the space next to the question for working if necessary.
- Read all questions carefully and thoroughly before attempting them.
- Show all working in calculation questions as this allows you to gain some marks even if the final answer is incorrect.
- Be familiar with the Data Booklet so that you can find information quickly.

Advice for teachers

- Advise students to read all questions carefully before attempting them.
- Encourage students to show all working in their answers to questions requiring calculations and to set the working out in a way that it can be easily followed.
- Encourage students to write neatly in all written response answers.

Comments on specific sections and questions

Core content Part A: Multiple-choice

Attempted by 232 candidates Mean 7.75(/10) Max 10.00 Min 0.00

All candidates attempted all questions in this section and most questions were answered well.

Core content Part B: Extended answer

Attempted by 231 candidates Mean 19.07(/30) Max 30.00 Min 1.00

Candidates were required to answer all four questions in this section. Their performance was relatively even in questions 11, 12 and 13; however, many had difficulty with question 14.

Mechanical Part A: Multiple-choice

Attempted by 140 candidates Mean 6.28(/10) Max 10.00 Min 1.00

All candidates attempted all questions in this section and, apart from questions 15, 18 and 23, they were answered well. Only 29% of students gave the correct answer for question 15.

Mechanical Part B: Extended answer

Attempted by 138 candidates Mean 29.45(/50) Max 47.75 Min 0.50

Some candidates did not attempt several questions in this section of the examination. Most candidates performed well in Questions 28 and 29 but many found Question 31 challenging.

Mechatronics Part A: Multiple-choice

Attempted by 91 candidates Mean 6.60(/10) Max 10.00 Min 2.00

All candidates attempted all questions in this section, with Question 32 scoring the lowest mean of 46%.

Mechatronics Part B: Extended answer

Attempted by 90 candidates Mean 28.98(/50) Max 48.50 Min 2.75

The questions in this section of the examination were attempted well except for Questions 44 and 47, with candidates finding Question 44 the most challenging. Questions 43 and 46 elicited the best candidate performances.