

**SCHOOL OF NATURAL AND BUILT ENVIRONMENTS
FIRE TECHNOLOGY 1 (CIVE 5032) External Examination**

EXAMINATION: External Exam, Semester 1, 2004

DURATION: 2 Hours of Exam time preceded by 10 minutes of reading time i.e. a total of **2Hrs 10 Mins.**

EXAMINER: Graham Brown

REVIEWER: Assoc Professor George Zillante (Tel. 22379)

INSTRUCTIONS TO CANDIDATES:

- You **MUST** answer all questions
 - The value of each question is noted adjacent to the question
 - Open Book Examination i.e. all references permitted
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Question 1.

Discuss the factors that must be present before a fire can start and describe what happens when a piece of wood burns. **(20 marks)**

Question 2.

Explain what is meant by the term “fire resistance level” or FRL and how it is determined. **(20 marks)**

Question 3.

Escape from a building in the event of a fire is very important. Discuss the factors that have an effect on the evacuation process. **(20 marks)**

Question 4

(a) Discuss the benefits of dividing a building into fire compartments. **(10 marks)**

(b) What factors determine the location of fire barriers in buildings? **(10 marks)**

Question 5.

There are many methods of passive fire protection that can be used to control the spread of fire or smoke in a building. Of these, which do you consider to be the most important and why? **(20 marks)**

End of questions

Marks available is 100