## **OPEN ENDED SCIENCE QUESTIONS:**

Requires student to apply and explain a science concept.

Has more than one aspect to a correct answer, or more than one correct answer.

Requires higher order thinking, and relevant prior knowledge to answer completely.

# **EXPLANATION OF SCORING FOR SCIENCE OPEN ENDED ITEMS (for short answer exam questions)**

Each score category contains a range of student responses which reflect the descriptions given below:

### **SCORE 3**

This response is an excellent answer to the question. It is correct, complete, and appropriate and contains elaboration, extension, and/or evidence of higher-order thinking and relevant prior knowledge. There is no evidence of misconceptions. Minor errors will not necessarily lower the score.

### **SCORE 2**

This response is a proficient answer to the question. It is generally correct, complete, and appropriate although minor inaccuracies may appear. There may be limited evidence of elaboration, extension, higher-order thinking, and relevant prior knowledge, or there may be significant evidence of these traits but other flaws (e.g., inaccuracies, omissions, and inappropriateness) may be more than minor.

### **SCORE 1**

This response is a marginal answer to the question. While it may contain some elements of a proficient response, it is inaccurate, incomplete, and/or inappropriate. There is little if any evidence of elaboration, extension, higher-order thinking or relevant prior knowledge. There may be evidence of significant misconceptions.

#### SCORE 0

The response, although may be on topic, is an unsatisfactory answer to the question. It may fail to address the question, or it may address the question in a very limited way. There may be no evidence of elaboration, extension, higher-order thinking, or relevant prior knowledge. There may be evidence of serious misconceptions