

Chapter 5.5 Exam Q

Question 1

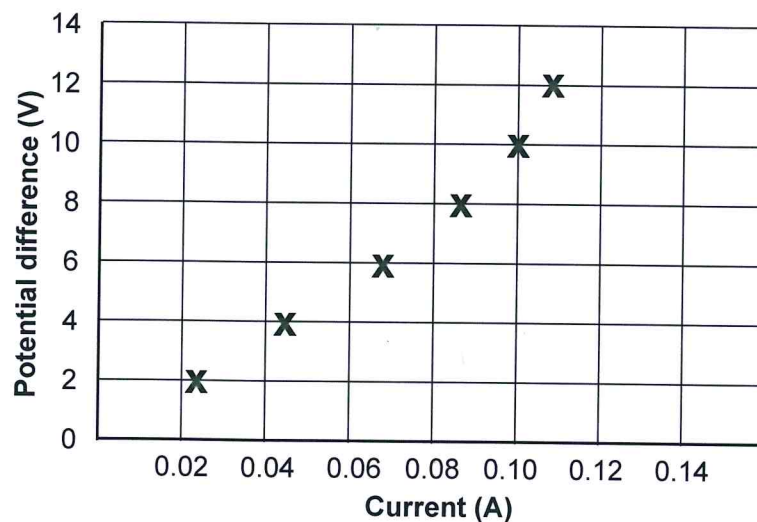
Year 11

(3 marks)

A student was carrying out an experiment on an electrical component by measuring the current and the potential difference. The student graphed the results as shown below.

On the graph, circle the section that shows the component acting as a non-ohmic resistor. Justify your answer.

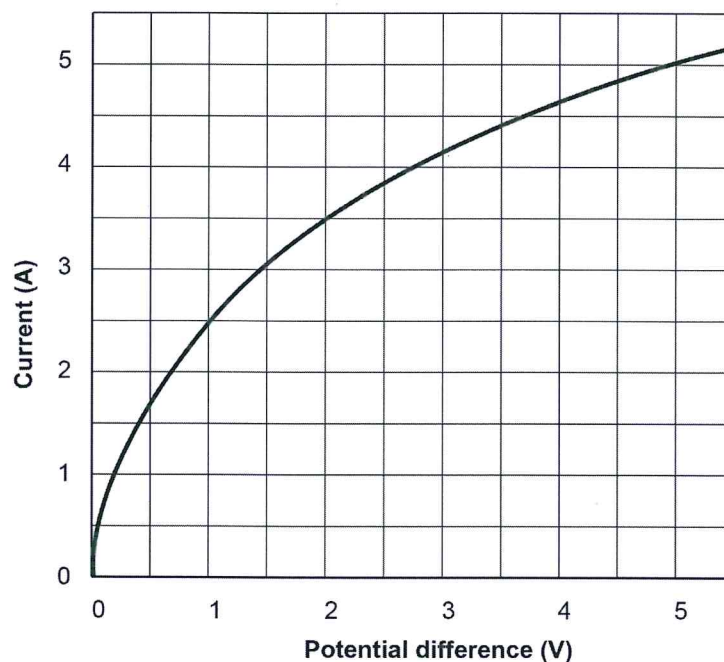
Potential difference versus current for a component



Question 2

(4 marks)

Chris is measuring the current flowing through a non-ohmic conductor as she varies the potential difference of the power source. The results are graphed below.



- (a) Explain what is meant by the term 'non-ohmic'. (2 marks)
- (b) Calculate the resistance when the potential difference is 1.0 V. (2 marks)