Oxford Cambridge and RSA

GCSE Biology B (Twenty First Century Science)

J257/03 Breadth in Biology (Higher)

Question Set 13

1 John has cut his leg.

(a) What role will platelets play in the healing of the cut?

[2]

(b) **(i)** The cut gets infected. John's doctor decides to take a sample from the wound and culture the microorganisms.

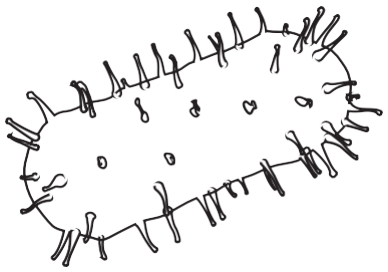
The doctor must use aseptic techniques to do this.

Describe **three** aseptic techniques the doctor may use when culturing the microorganisms.

[3]

(ii) The doctor looks at some bacteria from the culture using a microscope.

Look at the image of one bacterium.



The actual length of this bacterium is3.5 μm.1 μm = 0.001 mm

Calculate the magnification of the image of the bacteria.

Use the equation: magnification = measured size ÷ actual size

Give your answer to **3** significant figures.

Magnification = × ……..

[3]

Total Marks for Question Set 13: 8