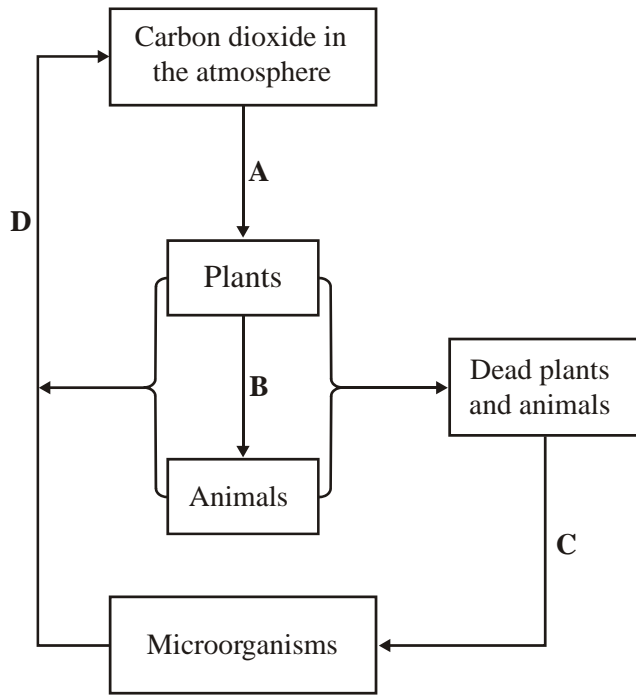


**B1.6.1 and B1.6.2 Decay processes and the carbon cycle**

1. The diagram shows part of the carbon cycle.



(a) Which letter, **A**, **B**, **C** or **D**, represents:

(i) respiration .....

(1)

(ii) photosynthesis? .....

(1)

(b) Local authorities are encouraging people to recycle vegetable waste by converting it into compost.

Compost is made by mixing the vegetable waste with soil in a large container.

(i) Decay occurs more quickly if the container has holes in the sides.

Explain why.

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(2)

- (ii) Spreading compost on the soil between plants leads to better growth of the plants.

Explain why.

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(1)  
(Total 5 marks)

- 2. Each autumn, many trees lose their leaves.

- (a) Describe how carbon compounds in the leaves can be recycled so that they can be used again by the trees.

*To gain full marks in this question you should write your ideas in good English. Put them into a sensible order and use the correct scientific words.*

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(4)

- (b) Give **two** environmental conditions which speed up the processes that you have described in part (a).

1 .....

2 .....

(2)  
(Total 6 marks)