



The function of root zones



Necessary tools and materials:

a beaker,
water,
cooking oil,
some beans.

Experiment:

a) Germinate beans in humid, wet surroundings.

In this case, a lot of root hairs will appear on the radicle.

b) Pour water into the beaker and apply an approximately 5 cm thick layer of oil on it.

c) Set the plants in the beaker with their roots facing different directions. (see the figure).

Observation:

Seedlings with their root zones in the oil layer, or in the air died.

Only those with their roots in the water will survive.

Explanation:

The suction zone of the root, a.k.a. the root hair zone is the most important part considering the suction of water.