

Necessary tools and materials:

Oat, paper box, flowerpot, water, soil

Description of experiment:

Germinate oat seeds in a box with a window.

Result:

When the box is closed and the window is also closed, the seedling grows upwards.

If we germinate the seeds at open window, the seedlings grows towards the window. This is called positive phototropism.

Explanation:

Phototropism: growth towards the light (Movement which responds to external stimuli.)

Reason: Auxin (the plant growth hormone) plays a part in phototropism. Auxin increases growth with the extension of permanent cells and the division of undifferentiated cells. The molecules move down on the dark side of the plant, auxin is degraded by light.