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Grade 8

The Effect of Soil on Plant Growth

Abstract

Have you ever been curious if the type of soil you use affects how your plant grows? Well I have, so I decided to find out. For my science fair project, I tested which soil would work better to grow a soybean seed, potting soil or farming soil. I planted five soybean seeds, 2.5 cm deep, in separate pots of each type of soil. After I planted the seeds, I placed all 10 plants by a long window in my house so that each received equal light. Next, to keep the plants organized, I labeled each pot a number from one through five for each type of soil. Every Monday, Wednesday, and Saturday, I measured one cup of lukewarm water, watered each plant, and recorded it in my logbook. Everyday I observed my plants and their progress, however I did not measure them everyday. Every five days, for thirty days, I observed, measured, and recorded the growth for each plant in my logbook. On some days, the plants were watered and observed/measured on the same day, so I always made sure that the plants were watered well before I measured them. Prior to the experiment, I hypothesized that the soybeans would grow better in the farming soil than in the potting soil. After thirty days of my experiment, I found that the soybeans grew an average height of 49.53 cm in the farming soil and 16.26 cm in the potting soil. In conclusion, my hypothesis was proven correct.