

# Plant Growth With At-Home Soil Treatments Planted in Riverside Soil

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The central idea behind the experiment and research was to discover which soil treatment that can be made or easily obtained from home will help with plant growth, both mass and height when they are planted in riverside soil. There were 30 days in total worth of research, and this was obtained by measuring the plant growth each day with a ruler, in centimeters. The plants were arranged into groups of 10, and there were 4 sections (Used Coffee Grounds, Eggshells, Pine Wood Shaving, and No Soil Treatment), so there were 40 pots present. The experiment was conducted and held in the Nacogdoches High School greenhouse, where we had access to water and a heat lamp, where it maintained a temperature of ~70 degrees during the day and ~60 degrees during the morning. Each Tuesday and Friday, the plants were watered. After 30 days the experiment was complete. Averaging the heights for each section as well as the mass after the plants are dry. Data was analyzed and it was concluded that in terms of mass, eggshells were the at-home soil treatment that worked the best at plant growth. On the other hand in terms of height, used coffee grounds were the at-home soil treatment that was most effective.