



# CALIFORNIA STATE SCIENCE FAIR 2015 PROJECT SUMMARY

<b>Name(s)</b> <b>Faith A. Miller</b>	<b>Project Number</b> <b>J1119</b>
<b>Project Title</b> <b>How Do Natural Disasters Affect Plant Growth?</b>	
<div><div><b>Objectives/Goals</b> My project is to see how natural disasters such as drought, flood, and temperature change affect plant growth. This project was to see which tested disasters were most damaging, and easiest to solve. Also it was to see if it payed to ignore natural disasters' impact on plants My goals were how natural disasters helped plants in any way, and to find how plants adapt to great changes.</div><div><b>Methods/Materials</b> I used radishes, vitamin soil, tap water, and lamps. I grew all sprouts to the same size first. For drought I watered each row with less water than the row before it. For flood I submerged each row one day more than the row before it. For temperature change I grew plants in hot, cold, and room temperature, then I will move them to different temperatures.</div><div><b>Results</b> Flood was most damaging compared to temperature change and drought. Best to least out of temperature change was room, hot, then cold. For drought, the plants with more water grew bigger and for flood, the plants with less time underwater grew bigger.</div><div><b>Conclusions/Discussion</b> My hypothesis was incorrect because data proved that flood was more damaging rather than drought. I think flood was more damaging because while the plants were underwater, their natural routine paused. I believe that cold temperature slowed growing, hot temperature sped up growing, and room temperature steadied growing. What could've changed hot temperature's outcome was the change of the sunlight variable because of the use of lamps for heat. For drought the decrease of water was a decrease in necessities, causing the plant to grow, but not flourish like it would with water.</div></div>	
<b>Summary Statement</b> How drought, flood, and temperature change affect plants and which is more damaging.	
<b>Help Received</b> Dad helped water and measure plants; Science teacher, Mrs. Englund corrected my research.	