



**CALIFORNIA STATE SCIENCE FAIR  
2015 PROJECT SUMMARY**

<b>Name(s)</b> <b>Madison A. Elliott</b>	<b>Project Number</b> <b>J1810</b>
<b>Project Title</b> <b>Calling the Right Shots</b>	
<b>Objectives/Goals</b> The purpose of my project was to find out if there was a difference in vitamin C levels when growing wheatgrass in aquaponics compared with a soil medium.	
<b>Abstract</b>	
<b>Methods/Materials</b> To complete this project, I used an aquaponics system, soil, wheat berries (to grow the wheatgrass), and starch and iodine to complete the various titration tests. I began my project by growing the wheatgrass in both systems for about two weeks. Then, by using titration, I tested the wheatgrass' vitamin C concentration once a week for a total of four weeks to obtain my final results.	
<b>Results</b> By averaging the number of iodine drops it took to react to the vitamin C in the wheatgrass solution, I found that there is a fifty-seven percent increase in vitamin C levels when growing wheatgrass in soil.	
<b>Conclusions/Discussion</b> Even though the wheatgrass grown in aquaponics may have a faster growth rate, and a healthier and greener appearance, the wheatgrass grown in soil had a substantial increase in vitamin C levels. While many people in areas lacking soil turn to aquaponics to grow their fresh fruits and vegetables, they should rethink their choices, and consider sticking with soil to get a more vitamin rich plant.	
<b>Summary Statement</b> Is there a difference in vitamin C levels when growing wheatgrass in aquaponics compared with a soil medium?	
<b>Help Received</b> Dad helped me understand titration and guided me through the first test; English teacher helped explain how to write research paper; Science teacher helped me understand the scientific method	