



**CALIFORNIA STATE SCIENCE FAIR  
2014 PROJECT SUMMARY**

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<b>Project Title</b> How Are Humans Affecting Sea Anemones' Population Distributions?	
<p style="text-align: center;"><b>Abstract</b></p> <p><b>Objectives/Goals</b> The purpose of this project was to bring awareness to water pollution and the importance of sea anemones in the environment.</p> <p><b>Methods/Materials</b> Water samples were collected and test for ammonia, pH, and carbon dioxide were conducted. The numbers of sea anemones were counted per measure quadrant.</p> <p><b>Results</b> It was determined two of the nine sites had higher numbers of sea anemones. These sites had lower measurements of ammonia, as well as high amounts of carbon dioxide.</p> <p><b>Conclusions/Discussion</b> It is therefore concluded that there is a correlation between the number of sea anemones and the the chemical composition of the water. Specifically, the presence of ammonia and carbon dioxide result in a more neutral pH which is more favorable to the sea anemones.</p>	
<b>Summary Statement</b> The study of water chemical contaminants and their effects on sea anemones' population.	
<b>Help Received</b> Cabrillo Marine Aquarium provided chemical test kits, field equipments, reverse osmosis water, and a vacuum pump.	