CALIFORNIA STATE SCIENCE FAIR
2016 PROJECT SUMMARY

Name(s)
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Project Number
J0614

Project Title
The Effect of Sodium Carbonate on Pacific Ocean Water Samples

Abstract

Objectives/Goals
The objective of this study was to compare the pH and ALK levels and determine how Sodium Carbonate affects them for four different Pacific Ocean water samples.

Methods/Materials
Collected ocean water samples. Tested the pH and ALK using test strips. Added Sodium Carbonate and tested the pH and ALK again.

Results
After measuring the pH and ALK before and after adding Sodium Carbonate, I compared the data. The pH levels varied in the original samples and after adding the sodium carbonate the pH levels increased significantly.

Conclusions/Discussion
Samples from bigger cities had lower pH, so pollution may increase ocean acidification. Sodium Carbonate can be used to reduce acidification but further testing is needed to determine its effect on marine life.

Summary Statement
I tested what effect Sodium Carbonate has on ocean water, and found that it increases the pH level.

Help Received
I did the experiment myself, however my mom helped me find some of my research, and my dad helped with cutting and pasting things on my board.