

Hooray for Science at Hilldale!

By Sasha Clayton

As the Science Fair rapidly approaches, I am reminded of how grateful I am that Hilldale places such an importance on the study of Science. Although Hilldale considers it an academic staple, it has become disturbingly rare in public and private elementary schools.

Science teaches us about our world and ourselves--living and non-living things, the environment, health, energy, and on and on. But Science goes beyond factual knowledge to open up new kinds of thinking. It teaches us to ask questions, to take appropriate risks, to make educated guesses, to prepare, to analyze, to reassess the situation when we find out we were wrong, and to try again. The students use the Socratic method of questioning and they build critical thinking skills that go far beyond the Science classroom in their current year. These skills reach into careers, relationships, and creative endeavors.

So, why is it that many schools are dropping the Science curriculum, just as they dropped the music, drama, and art curricula? In public schools, teachers and administrators are so focused on raising test scores in Language Arts and Math to fulfill the *No Child Left Behind* legislation and funding requirements that other vital subjects are becoming devastatingly neglected. Furthermore, many private elementary schools cannot find the time or do not see the importance of teaching Science from an early age.

A 2007, U.C. Berkeley, Lawrence Hall of Science study found that 80% of Bay Area elementary school teachers are spending 60 minutes or less per week teaching Science, and 16% do not spend any time teaching the subject at all. The same teachers report feeling the least prepared to teach Science than any other core subject. The study further suggests that schools can begin to overcome this deficit by increasing access to laboratories for students and professional development for teachers.

Here at Hilldale, we begin teaching Science in Pre-Kindergarten. Every grade conducts laboratories and by the time students enter the fourth grade, they have Science every day and are interacting with a Science lab at least once per week. Lower school students have Science between 2-3 days per week. During our last teacher in-service day, Mr. Hankin observed a high school bio-tech classroom to further his knowledge and passion for the subject. He then brought back ideas to the whole staff and has begun to adjust his curriculum based on his new ideas.

Finally, all students, beginning in Kindergarten, participate in the Science Fair. What a wonderful way to welcome students fully into the great mysteries and facts of Science! As students use their creativity to choose their topic, they are also beginning to develop their critical thinking skills. "What will happen if I do this?" and "Why" or "Now, what? Why didn't it work?" Asking these questions is a vital aspect of the process and I encourage you to guide your child to do so. Thank you for helping your children as they walk down the Road of Science. There are exciting mysteries and rewards scattered along the path.