Midwest to Mid-Ocean: Making Connections Between Scientists and High School Students

Katie Lodes, St Joseph's Academy Science Teacher October-April 2014

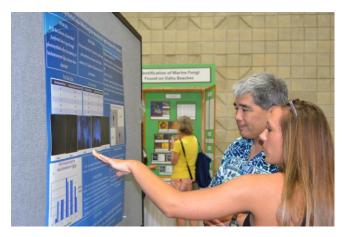
This project was three-pronged. The first part took place between late October and mid-December 2013. Twenty-five juniors and seniors in St. Joseph's Academy elective Marine Science class in suburban St. Louis corresponded with marine scientists and policy makers. During the email and Skype sessions, the students learned what interested their researcher in their career in first place, what she or he does and what advice she or he had for the students. When the students finished with their correspondence, they made 5-10 minute videos to share what they learned with the rest of the class. They also wrote letters of support and thank you notes to mail to their researchers along with a copy of their videos.

There is a video for each of the 15 scientists and the ones below involved ocean microbes: Meghan Powers (UCSC), John Kirkpatrick (URI), Darcy McRose (Princeton), Luke McKay (UNC), Mary Dzaugis (URI) and others that work with coral and their algal symbionts: Anne Rosinski (NOAA Coral Fellow), Maggie Sogin (UH-M), Amanda Shore-Maggio (UH-M) and Maya Walton (UH-M). Junior Kelsey Ponder found the experience beneficial: "Once you got further in your project, your scientist really helped out a lot. We corresponded by e-mail and had to do one Skype session."



Two students from the group of 25, Ponder and fellow junior Maddie Page attended the 2014 Ocean Sciences meeting in Honolulu, Hawaii with me to share their experiences, in a talk entitled, "Midwest to Mid-Ocean: Making Connections Between Scientists and High School Students." All three of us spoke at a Wednesday morning session (pictured, at left) about what they gained from the experience. Page felt that the experience "opened my eyes to all the different options for careers in marine sciences." Besides presenting, the students also used their

time to attend other oral session, the keynote address by Elizabeth Kapu'uwailani Lindsey, toured the Hawai'i Institute of Marine Biology on Coconut Island, toured the Ka Papa Lo'i 'O Kanewai, and snorkeled at Hanauma Bay Nature Preserve to see firsthand the coral they had heard about during their class movies and Ocean Science presentations.



Maddie Page also presented her work with *Pyrocystis fusiformis* at the Youth Science Symposium on Tuesday night (pictured, at left), supported in part by a GEMS award for poster printing. Having scientists talk with her and provide feedback was invaluable throughout the two-hour session. She walked away with confidence and a better understanding of how research science proceeds, much better than reading in a textbook about how the scientific method functions.

Upon returning home, the students, along with two current St. Joe sophomores and alums of Marian Middle School, shared what they learned with a group of students at Marian Middle School, an urban, allfemale middle school in the City of St. Louis, Missouri (pictured to right). They talked and answered questions about what it takes to succeed in high school and how to challenge yourself to move outside your comfort zone.

