

FOCUS on Students: When Time Begins

By Robert W. Vallin

The beginning of the fall semester is always an exciting time for students. There are new classes to take, new people to meet, and new things to learn. Perhaps you are about to fall for the charms of complex integration, or begin an independent study which culminates in your first-ever talk at a meeting, or, best yet, you are about to finish your last year of school and are excited to get on with your life. Whatever the reason, this is the start of something.

As for myself, I am returning to academic life after a year in Washington, DC working at MAA Headquarters. Now I am juggling two jobs: Professor in the Department of Mathematics at Slippery Rock University and MAA Associate Director for Student Programs. I am more than happy to continue my role with the MAA. I enjoy writing this column, administering grants, helping out with events at the Joint Meetings and MathFest, and (there's a hint here) speaking at Section meetings. But during my year away I missed my colleagues back in PA and I am excited to get back to my new office, do some research, and, most importantly, return to the classroom.

In honor of returning to the classroom, I am going to write this column about the students. I want to do this now, at the beginning of the year, when all is new and good. Soon enough there will be the other stories to tell; the ones that begin, "You will not believe what happened in class today." No, this is the time to look at the positives.

Let's start with the energy throughout the university on the first day of classes. Yes, it is a nervous energy, but it is still something to be enjoyed. People who have not seen each other for four long summer months get a chance to catch up. Freshman, needing to find a building on campus, pull out their maps while trying to look like they are not pulling out their maps. Inside the classroom students arrive early to get a good seat and look around thinking, "Please let there be someone I know." Pockets of low

conversation erupt with the same topics: What do you know about this professor? Will this class be difficult? I can't believe how much this book costs, we better use it. Then the professor walks into the room and silence falls over everyone. This is the only time that will happen. After that first class they'll know she's not an ogre and will continue chatting after she walks into the room.

When I first walk into a classroom I get a strange, intriguing, exhilarating vibe. After all, here is a room full of people that I will get to know really well. There are the over-achievers, the Hermione Granger types, whose hands shoot up before I'm finished asking the question. There are the nervous ones, afraid to be wrong, but really very good in the subject. There are the slackers (okay, they're not that hard to locate — back row, looking out the window for 50 minutes). And there are the delights. These are the students who one day have "de light" in their heads go on. I get to watch them develop confidence and strength that comes from mastering a topic. They become eager to learn. Who would not love helping them find that light switch?

I once had a student in a Calculus III class (and by his own admission not paying attention) who figured out how to do a problem shown on the board in his own way. He came to me after class and asked if his method would always work. It worked on every example, so I asked him to figure out a proof. He found one, showing his intuition was right on target. He ended up presenting his results at the Section Meeting. What's my point? A new year means new projects. Not just for me, in my own research, but also with students.

Student research is the new, hot topic, but it's really been around for a long time. As the new academic year dawns, now is the time to talk, talk, talk with students about starting projects. It's important to let them know that it requires hard work and time, not genius, and that research for them will not be about discovering new worlds, but

expanding their own. I'll entice them with stories about the Joint Meetings, MathFest, and the Section Meetings. Posters and papers will give them the chance to participate. There are even more places for students to speak and the MAA website has a nice list of them (www.maa.org/students). Some of these meetings have money available to help defray the students' expenses. In addition, there are several online brochures the MAA puts out (*Giving a Good Presentation*, *A Student's Guide to Large Meetings*, *A Guide to Writing an Abstract*) available to help students do their best and get the most out of going to a meeting.

What does all this amount to? I'm letting loose with something that too many people keep secret. I really like students. Sure, I can whine about students with the best of them, but all in all, this is a totally cool gig. I like the bright student who you can talk to after class and say, "Have you ever seen something like this?" and watch her become intrigued and ask to learn more. I like the hard-working student who struggles to make the lesson something he owns and is so proud when he succeeds. I like watching people move from disengaged student in the classroom to leaders in the Math Club, encouraging their peers. Finally, I like the students who learn that they are having a grand adventure in college and make the most of it. So to all those students who see themselves or their future in this paragraph and to all those I forgot to mention, I say thank you. You're the reason I come to work excited every day. Thomas Boswell of the *Washington Post* wrote a book on baseball many years ago entitled: *Why Time Begins on Opening Day*. I say time begins again when the new semester starts, when all is new and the possibilities are endless.

It's why time begins on the first day of classes.

Robert W. Vallin is the MAA's Associate Director for Student Programs.