

Lifting Up – Dr. Pat Fitzgerald-Bocarsly



Dr. Patricia (Pat) Fitzgerald-Bocarsly is a tenured professor of immunology at the New Jersey Medical School at Rutgers University. Pat and husband Andrew Bocarsly, also a scientist, have raised two daughters and a son, and at the time of this interview, were looking forward to the birth of their first grandchild. Of their children, one daughter is a post-doc in neuroscience, another daughter is a social worker, and her son is an undergrad studying chemistry. Pat has long been a supporter of women who want to go into science, and recently discovered the [American Scientific Affiliation](#) (ASA). See more about Pat at her profile in the ASA membership directory.

Why are you a Christian? While I was raised nominally Christian, I didn't really get it until high school youth group. Being a Christian is not an intellectual solution for me, it's a real solution -- God reached out to me and has been incredibly faithful to me and my family. My husband and I met as undergrads; he came from a Jewish background and became a believer as we talked about Jesus.

Why are you a scientist? I've always been fascinated with science; one early vivid memory is from a first grade salt crystal experiment. In my first research lab as an undergrad, discovering things was my passion. I loved getting the data and discovering something brand new. I still have those "aha!" moments with my grad students. Biomedical science was the most fascinating to me, and I was on the fence between becoming a physician or a scientist. I fell in love with immunology as an undergrad, and it seems I've always been interested in viruses. So I decided to do viral immunology.

How do your faith and your science enhance each other? Rather than causing me to be anti-Christian, the more I learn about the intricacies of science-- how everything works together – the more I learn about the Creator. All areas of science are fascinating; I also enjoy the history of science. The ASA posts on Facebook are great; they take me off to read about something new and exotic that is going on in other areas of science than my own. I did struggle for a while with the "Are science and faith compatible?" question. Even in an intellectual area like Princeton, some Christians espouse literal creation and young earth. For long years I never mentioned evolution in lectures to my students. But now I bring it up with my grad and medical students. I don't think that the scientific understanding of evolution takes God out of the picture. I believe the infinite God set up the universe to work this way.

What, or who, have been the three greatest encouragements for you personally in your career? Without a doubt, number one is my husband. We met when we were undergrads, and he encouraged me to excel in everything I did in science. I could not have accomplished the goal of becoming a full professor with tenure at a major medical school without his partnership. I always tell young women – choose your spouse carefully! Number two would have to be my mentors in grad school and as a post doc. By their example, they taught me how to invest in other people. A couple of these were men; getting my PhD in 1980, there weren't many women



mentors or role models! Number three would be my peer group of women friends in science. They have been really helpful to helping me to promote my science, get funded, get invitations to speak, and so on. But I've had no Christian women in science friends until I found ASA, and I'm looking for this in CWIS.

What advice do you wish you had received as a student or earlier in your career, or would you like to offer others? I mentioned one above – choose your spouse carefully. Second, you don't have to feel guilty for wanting to do science and be a Christian and be a mom. The attitudes young women find in church, even in a church with a highly educated population such as Princeton, can still be discouraging. People still assume that since you're having a baby, you're going to stay home. When I got pregnant, a Christian woman friend thought the pregnancy was a mistake, because I was really into my career. While I was on maternity leave, another person told me that God had laid it on her heart to tell me that I should stay home, clean house, and be there for my husband. These comments made me feel shocked and hurt and filled with guilt. I felt judged by people that, somehow, a choice to continue my career meant that I must not care about my family. That attitude is still out there. But, now there are more women in church who have careers, and more acceptance that there are many paths one can take. So don't feel guilty! Third, seek out other believers who are scientists, especially at your church. My church in Princeton has a lot of professors in physical sciences; no biologists yet and no other women, but I keep looking! And, I counsel with a lot of women who are thinking about medicine or science.

What is your vision for Christian Women in Science and/or the American Scientific Affiliation? First, I would like to see more of what Christian Women in Science is starting to do – enabling women to come and be alongside each other and encourage relationships where people understand what it is like to be both scientist and Christian and a mom. I'm finally at the point where my kids are out of the house, so I'm getting much more involved in extra work at the university. And I will always try to be available to women in science who need advice or encouragement, especially Christian women. Second, there are other areas we could work on. As we learned during a recent lawsuit at my university, there is still a bias against women in science who are doing the same or more work than men and getting paid less. That was a gender issue, not a faith issue. But one faith issue we continue to need to work on is helping Christians figure out how to promote ourselves, as any scientific career requires, while still being true to Jesus's teachings about personal humility.