Lifting Up – Dr. Debra Schwinn

Dr. Debra Schwinn is a tenured Professor of Anesthesiology, Pharmacology, and Biochemistry, and Dean at the University of Iowa Carver College of Medicine. Debra has been a Christian for forty years, and has managed both family and a successful career. Her husband is a computer programmer and religion instructor, their oldest daughter is a cardiopulmonary nurse at UTSW in Dallas, and their youngest daughter is a business major at Clemson University. Debra is a member of the Institute of Medicine, Christian Medical & Dental Society, as well as member of the American Scientific Affiliation (ASA) for many years. She has long been a supporter of women who are interested in science careers. For more about Debra, see her profile in the ASA membership directory.

Why are you a Christian? I became a Christian in my teens at a music camp that happened to be located at a Christian resort on Lake Erie. It was there, on a dock under the stars, that I understood for the first time that while my parents loved me wonderfully, only God is capable of unconditional love. I have been growing in my faith since that evening 40 years ago.

Why are you a physician scientist? I became fascinated with science during high school chemistry. Science provides simple and practical explanations for everyday occurrences such as how one cools off on a hot, windy day after getting out of a pool (the energy of evaporation is taken from the human body). As a chemistry major in college, I enjoyed organic chemistry as well as biochemical reactions and how they relate to human physiology. While in medical school, my eyes were opened to being a physician scientist while working with the heart transplant group at Stanford. After an anesthesiology residency and cardiac anesthesiology fellowship, I completed 5 years of formal research training in molecular pharmacology and biochemistry with Bob Lefkowitz, MD at Duke University, before starting my own laboratory. Bob went on to win the Nobel Prize in 2012 along with another colleague in the laboratory at the same time I was training.

How do your faith and scientific medicine enhance each other? The human body is wonderfully complex. Every time there is a new discovery, revealing an elegant new mechanism related to human disease, I am in awe of the complexity and wonderful wholeness of God’s creation. I have always seen my faith and science as synergistic, explaining both physiologic mechanisms and the spiritual depth that is being human.

What, or who, have been the three greatest encouragements for you personally in your career?
1) Listen and sift: I grew up in an era where there were very few women in my science classes, so I began early to ask many people for advice. Knowing that some advising me had not walked the same path I intended to walk in my career of being a physician scientist, I sifted the information until I found commonalities and wisdom within these words of advice.
2) Staying connected: I, and later my husband and I, always stayed connected to our local church and were often in weekly home groups. This allowed us to be intimate with other Christians, share our struggles and successes, and challenge each other to walk more deeply
in our faith. This was vital over many decades and has created some very close friendships as well. I firmly believe moving to a new position should be a calling, and being connected to a faith community provides invaluable help in discernment.

3) *Keep learning and loving:* As God has called me to new places and positions over the years, I’ve needed to learn new skills. Examples of these include deciding the best forums in which to present scientific data (which can change over time), how to serve on boards and study sections and still get all of one’s work done at work/home, how to integrate work and family, and perhaps most importantly, how to love others in the process. One of the most surprising things during my career is the discovery that leadership is a lot like being a pastor – caring deeply about those you are given to lead and helping individuals be the very best they each can be. Even correction has to begin with respect of the individual as a person and valuable human being, no matter what the issue at hand.

**What advice would you want to give a student or early career person, on being a Christian woman in medicine or science?** The best advice I can give to a Christian woman in medicine or science is to stay connected with a faith community. There is never enough time during medical/graduate school, residency, fellowship, and as a junior (or senior) faculty member. However, time spent in a small home group, at weekly worship, or meeting with others is paid back multiple times over. It is crucial to stay connected in order to have perspective, and ultimately the integrity and maturity required to deal with difficult situations. In the end, connection to a faith community reinforces true priorities in life.

**What is your vision for Christian Women in Science and/or the American Scientific Affiliation?** I am eager to see more and more women be supported in their faith as they pursue careers in science.