

Getting to know: Casey Burton

Biography

Casey Burton is a senior Chemistry student from Missouri University of Science and Technology with a minor in Biology. Continuing his research pursuits from high school, he now works under the guidance of Dr. Yinfa Ma where he specializes in bioanalytical chemistry in his search for noninvasive, early cancer detection techniques. His work has resulted in a half dozen papers and over 20 professional presentations at conferences, symposia, and members of Congress. In his spare time, he owns and operates a web development firm, Sapentia Development, LLC, specializing in providing innovative web technologies and infrastructures for an ever-evolving market. Casey will be furthering his cancer detection work at Missouri University of Science and Technology as a graduate student, and plans on remaining in academia and building his company.

Q&A

What sparked your interest in psychology?

There is no spark from psychology in general; rather, it is the spark, that burning curiosity, wherever it may lie, that pulls you, the researcher, ever deeper into the question, and that knowledge you gain and the more questions you create through the research process, that can only serve you better no matter what field you are in.

What led you to this topic?

As a pseudo-possessor of absolute pitch myself, I had always been naturally curious toward the ability, and had presumed that the skill had never been innate in me, but on the contrary, acquired, so I developed a model to see whether the skill was acquirable or not.

Did you have a mentor and how did you get involved with him/her?

I did not have a mentor; most of my psychological studies, being professionally a bioanalytical chemist, are designed on my own accord. After my findings and presentations of those findings, however, I did receive a lot of interest from experts in the field including Dr. Allan Snyder from the Centre from the Mind.

How long have you been working on this paper? What has the process been like for you?

This study was actually conducted my sophomore year in high school. The paper submitted is largely unchanged from six years ago, but at the time, that was my first professional manuscript preparation.

Fast forward six years as a chemistry student with a half dozen publications, that process, although much more mechanical and automated now, is still fundamentally the same. The preparation of a manuscript can often be as exciting as the research study itself.

What was it like to be an undergraduate student completing your own research project?

As an undergraduate who has completed over a half dozen studies, there is always a sense of accomplishment at the end of a project, but there is also a sense that the project is never truly completed - a good scientist will find that answering one question leads to so many more questions.