

Since day one as a freshman at the University of Maryland, I had always aspired to participate in some sort of official research on campus. I had since learned how to review scholarly sources and search academic databases by the time I was a freshman, thanks to the preparation I received in high school. However, I had only applied this knowledge to writing high school English papers. The yearning that I was looking to satisfy was to apply that knowledge to an official research project. That vision was not fulfilled until the fall of my junior year.

In order to get my name out there as an undergraduate interested in being a research assistant, I emailed almost every professor within the department to ask what they had available. After the first few days of not receiving feedback from any of the professors, I began to worry. But, just before I lost hope, Dr. Qingbin Cui reached out to me stating that he was looking for assistance on an upcoming project commissioned by the Maryland State Highway Administration (MDSHA). Completely ecstatic with this new task before me, my aspiration of being involved in an official sanctioned research project had finally become true.

The first few months that I worked with Dr. Cui I completed some additional work for him that served to prepare me for the upcoming project and solidify my willingness to effectively participate as an assistant. When we finally made it to the project kickoff meeting, back on January 9th 2015, I was ready to hit the ground running.

Our commissioned project by the MDSHA, officially titled “Effective and Efficient Implementation of Alternative Project Delivery Methods”, essentially has involved our research team investigating the MDSHA’s various divisions in purpose to refine their current methods of delivering transportation projects. The first deliverable within the greater project, the Best Practice White Paper and Best Practice Breakdown Table, served as an initial survey of best practices from various departments of transportation (DOTs), around the country, regarding their efforts in alternative project delivery methods of construction.

In order to begin the collection of the sources which would serve to compose the final deliverable, I had to start from scratch and get associated with all the major library databases related to civil engineering. The first day that I was assigned to gathering primary sources I set off to the engineering library to speak with one of the head librarians, Nevenka Zdravkovska. Before talking to her, I felt I had a relatively informed sense of primary source collection due to previous experience. However, after we finished speaking, I gained a few extra tips that sent me off in a more refined direction.

The first few weeks of research I spent reviewing hard copies of journals and books within the engineering library’s collections. The format of the engineering library, as well as every other library on campus, makes the process of locating a hardcopy from the library database to the bookshelf very straightforward. After entering key words that Ms. Zdravkovska had helped me to refine in the library database using WorldCat, it is only a matter of reviewing the call number and then looking at the library floor plan to locate the proper book stack that contains the source.

I should mention that Maryland’s library database also is one of the most impressive resources of knowledge that I have ever had access to in my life. Another thing that I learned throughout my research was that if any source was unavailable within the University of Maryland, College Park’s system, then it didn’t really matter because it would be almost certainly available within the greater WorldCat database. Although, in my particular project, I did not run into very many instances where I had to order sources from other schools because after the first few weeks of hard copy review, I moved my focus to online sources. The two main

databases that I ended up using were the ASCE Library and the ASTM Compass. With these two databases, it was relatively simple to gather a bounty of primary sources that I could then use to compose both the white paper and the table. The main criteria I used in evaluating the majority of my sources was to check and observe the number of times it was cited in another peer-reviewed source. Generally speaking, I also knew that if the article was located in the two main databases that I used, it could almost certainly serve as a credible source.

Throughout the process of gathering various materials for the final deliverables, I came to a few overlooked conclusions. The first was that I should be much more grateful for the availability of resources that the University provides for its students. The second was that no matter how much I believe that I have learned it all, there are always more fascinating topics right around the corner. Being that I am currently applying to graduate school, my overall research experience has served very well to prepare me for the work that I will likely be completing after I receive my bachelor's degree. Additionally, because of this experience, I will be able to complete my future work in a much faster and more efficient manner than I could ever imagine when I was a freshman.

I wouldn't change much about the current library system at the University of Maryland. It has served me and plenty of others quite well. Of course though, maybe if there was a way I could search through the databases using virtual reality, then I could have ultimate library experience. And as farfetched as that idea may sound, through my research and interaction with other bright students on Maryland's campus, I have come to acknowledge that Maryland produces true societal innovators.