## Reimagining a Medical Exam and the Pharmacist Role on a Medical Mission Trip: Reflections from a Pharmacy Student By Brianna Cobern, Annesha White, and Kendra Manigault



Medical mission trips began in the early 1800s when countries expanded their territories by sending settlers into new lands resulting in interaction with the existing population. Settlers were interested in learning about the culture of these new lands, as well as sharing their knowledge with the indigenous population.1 Dr. Peter Parker was a Protestant American physician who traveled to China to do ophthalmic missionary work. Dr. Parker started the Canton Hospital in China specializing in ophthalmic care. The Medical Missionary Society of China was the first medical missionary society ever established and they started their journey with supporting the Canton Hospital.2

Medical missions have grown steadily over the years, but have recently experienced an exponential increase in participation within the last two decades. At least 1.6 million Americans go on mission trips every year and 543 medical mission organizations send approximately 6,000 medical mission teams abroad annually.<sup>3</sup> These teams help treat a multitude of needs ranging from

general healthcare to dental care and surgeries. Medical mission trips create opportunities for healthcare professionals and students to lend a hand to the people they are serving while also improving their clinical skills.

The University of North Texas Health Science Center's (UNTHSC) Christian Medical Association (CMA) student chapter of the Christian Medical & Dental Associations was formed in 2011 with a goal of serving patients in their community in addition to patients abroad. CMA also provides networking, education, and a public voice for Christian healthcare professionals and students. In the past, Doctor of Osteopathic medicine and physician's assistant students have gone on a mission trip every year to various countries in Central America (e.g., Nicaragua, Belize and Honduras). The UNT College of Pharmacy opened in 2013. As the college started to grow, interest from pharmacy students to participate in a medical mission trip also grew. As a result, the CMA mission trip coordinators and interested pharmacy students worked collaboratively to incorporate pharmacy students into the mission trip work flow for the 2017 medical mission trip to San Pedro Sula, Honduras. This included taking two pharmacy students who had a large role in medication acquisition and formulary development before the trip and pharmacy operations during the trip.

While reflecting on their amazing experience, the pharmacy students considered how spiritual experiences on medical mission trips - as well as the healthcare aspect - directly impact students and their patients. In order to dive further into these questions, data was collected about the type of medications used, what ailments were treated, and the age and gender of the patients. The goal of this data collection was to determine how a pharmacy team can be beneficial during medical mission trips. During the second medical mission trip to San Pedro Sula in 2018, the pharmacy personnel was increased from two to four students. Pharmacy students assumed a larger role than in the previous year by accepting full responsibility for medication acquisition, formulary development, pharmacy operations, counseling and data collection.

One of the most interesting themes found in the data collected was that there was no specific age group that seemed to be substantially more affected than another. This theme was observed more frequently with illnesses that are commonly thought to be preventable





with proper education and hygiene, such as urinary tract infections (UTIs) and constipation. We began to realize that a lack of education or incorrect information was being passed down from generation to generation, perpetuating these preventable ailments.

The first case that triggered our theory was seeing a mom and her daughters who all had UTIs. When questioned further, the students discovered that improper bathroom habits were being used by the mom who had passed on these habits to her daughters. Another example was seeing whole families plagued with chronic constipation. Families were educated about eating affordable foods that would help prevent constipation, such as fruits and vegetables. Multiple families told us that they gave their kids fruit juice to get them to eat fruit. Since fiber intake is such a crucial part of a healthy diet, more fiber would likely be needed than what can be obtained from fruit juice alone. This lack of understanding that fruit juice does not contain the same healthy properties as the actual fruit was eye-opening to these moms who mistakenly thought they were making a healthy choice for their kids.

Being able to educate these families and equip them to help themselves with just a bit of healthcare education was so rewarding. However, the spiritual discussions we had with families about prayer and the love of Jesus were the best education of all. Almost all of our

students prayed with their patients before they left the clinic, and we were consistently amazed by how grateful they were for our help. A few students even helped to facilitate some patients make the decision to give their life to Jesus right there in the clinic. The patients wanted to make Jesus the Lord of their lives because of the love they felt while being treated. This was something we never imagined would happen as a result of a medical exam and fervent prayer. Patients across all age ranges showed us their appreciation and gratitude for simply taking the time and interest to talk to them, on top of doing a complete medical work up.

Medical mission trips are a great opportunity for students to learn and help treat patients who don't have easy access to healthcare. While treating their medical needs, we must remember to also treat their spiritual needs, showing them the love that Jesus would have shown to someone He was healing.

## **REFERENCES:**

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