Interdisciplinary Medical Relief

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Our Mission:
The World Health Student Organization at Wayne State University School of Medicine is comprised of students whose mission is to gain rich medical and cultural experiences outside their immediate communities. It is our organization’s goal to provide free medical care to under-served populations around the world, to volunteer at community outreach projects that serve the citizens of Detroit, and to teach our fellow students about global health through various speakers and seminars.
Trips

One of the biggest endeavors undertaken every year is to send students on medical relief trips over winter/spring recesses. This is their chance to acquire a better understanding of health care needs of developing nations and to get exposure to clinical settings not routinely found in the United States. For the 2013-2014 school year, we will be sending students to Ecuador, Haiti, Panama, and Peru.
Interdisciplinary Work

A key element of our organization is the interdisciplinary team that we form by having medical students and pharmacy students work together to make these trips a success. This starts by having our faculty advisors and executive boards work together in the planning and organization of our local and international endeavors.

Not all of the trips are able to have interdisciplinary teams, and we have noted that those trips that have both medical and pharmacy students are not only more successful but offer a richer experience for those involved.
Interdisciplinary Team

Forming the Team

- At the beginning WHSO was only a team of medical students, with time it was decided to expand into an interdisciplinary team to improve the quality of healthcare work that could be delivered.
- There have been several challenges forming an interdisciplinary team.
  - Coordination of class schedules to allow large group meetings for both executive boards and the trip teams.
  - Coordination with school recesses that do not always align between the schools.
  - Recruitment of other health professional students such as Physician Assistants, Dental Students, Nursing Students, as well as Occupational and Physical Therapists.
  - There has been interest in involving these disciplines, however they have been hesitant to become involved in interdisciplinary trips. Some of the reasons have been that they prefer individual trips, they are afraid their students’ needs will not be met, and that the logistics and challenges of coordinating the trips negate any potential benefits.
Pre-trip Preparations

- Key was selecting the team for the medical relief trip to each country. Specific roles were assigned within the team.
  - These roles were Team Leaders, as well as organizers of the medications, fundraising, and travel.
  - Traditionally all roles were held by medical students. The addition of pharmacy students to trip planning served as an invaluable asset to the medication purchasing and packing process.
  - Medication representatives from both School of Medicine and Eugene Applebaum College of Pharmacy and Health Sciences collaborated to develop a drug formulary that best suited patient needs within the given budget and targeted to the country specific population.
  - Pharmacy students identified key classes of medications that would be needed based on common disease states seen, which were identified by medical students.
  - Pre-trip discussion between pharmacy and medical students, allowed for better coordination and optimal care in country.
During the trip: Triaging and Interviewing Stations

- The clinic setup generally followed a multi-station format beginning with triage, followed by physician consultation and treatment, in some cases dental consultation, and finally pharmacy with medication dispensing and counseling.
  - At triaging stations, students worked together to collect patient vitals including blood pressure, height, weight, and temperature.
  - At the interviewing stations, pharmacy students assisted with blood glucose and cholesterol screenings.
During the trip: Practice in the Pharmacy

- The flow of the clinic integrated the pharmacy into the patient experience.
- This allowed for interdisciplinary practice, as medical students and physicians were able to approach the pharmacy team with any medication related questions.
- The pharmacy team was able to provide information about therapeutic equivalents, pharmacokinetic information about medications, pediatric and adult dosing, as well as patient counseling.
- Medical students were also given the opportunity to practice in the pharmacy to provide exposure to clinical pharmacotherapeutic decision making.
SURVEY

- A survey was given to medical students to evaluate the presence of pharmacy students on mission trips versus those without.

- The consensus:
  - Medical students that attended trips without pharmacy agreed that they had a difficult time organizing and acquiring the necessary medications, understanding medication therapeutic uses, determining dosing and therapeutic recommendations, and patient counseling.
  - Students that did not have the proper medication knowledge base consented it was difficult for them to counsel patients.
  - At times, up to 5 medical students would be running the pharmacy which reduced their time in clinic interviewing patients and providing medical care.
Medical students that had the chance to go on a trip with pharmacy students agreed that:

- Pharmacy students helped with the flow of the clinic, in terms of medication organization, answering pharmacology based questions, and conducting patient counseling. This allowed the medical students to focus on patient interviewing and exam skills.
- Assistance with medication acquisition and packing was essential as it saved an immense amount of time in filling and dispensing medications.
- Medical students that have experienced both a trip with pharmacy and those that have not, have agreed that interdisciplinary work is essential to maximizing patient care.
PHYSICIAN EXPERIENCE

- Dr. Chih J. Chuang:
- “I started my involvement with this organization from it’s infancy in 2002. What started as an upstart of well intentioned medical students has grown and matured into a purposeful and mindful organization. With the addition of interdisciplinary involvement of pharmacy staff and students, we are now able to offer a more diverse learning environment as well as improved care for the underserved. This movement reflects not only what our organization can offer but the movement of healthcare toward a patient centered, team based approach.”
FUTURE ENDEAVORS

Local Events

- WHSO chapters hope to initiate collaborative efforts to provide a positive impact in our local community of Detroit.
- The mission, similar to our international trips, is to provide healthcare to underserved populations who do not have access to these resources otherwise.
- The School of Medicine chapter currently volunteers with World Medical Relief by collecting and distributing medicines and medical supplies to medically underserved populations, and with Freedom House Detroit by providing presentations on health topics to patients seeking legal asylum from various countries.
- The Eugene Applebaum College of Pharmacy chapter is currently working with the interdisciplinary Diabetes Education Wellness clinic which provides essential diabetes related healthcare services to medically uninsured patients as well as Project IMPACT which is a healthy living program that educates patients with the aim of reducing the incidence of diabetes and hypertension in the Conner Creek and Osborn communities.
- Through our volunteering with these established organizations, we hope to engage in a shared initiative to provide essential healthcare services to patients in need.
FUTURE ENDEAVORS

Sustainability

- In an effort to improve the sustainability of our projects we are currently revising our trips to increase the number of visits to the same community in a given year and to attempt to increase the amount of interdisciplinary teams.
- We are currently working on integrating not only other disciplines into our teams but increasing local cooperation and integration to further improve our care and improve our processes.
- To improve our care and the assessment of the quality of care we are planning needs assessments in Haiti and Ecuador.
- Our plan is to work with local as well as governmental stakeholders to develop long term plans, and assess our outcomes in order to better manage and improve our care of these populations.
References

