During the summer of my first year of medical school, I was hoping to get a life-changing experience that I could never forget. I knew I wanted to get an international health exposure in a rural area in India that included adventure, cultural immersion, and clinical work with a group of students and doctors. The Himalayan Health Exchange (HHE) program in the Spiti Valley expedition of Himachal Pradesh, India from June 5 – June 21, 2007 was the one that best suited my goals for the summer.

**Travel and Culture:** Our travels were a combination of rail and road through the entire trip of Himachal Pradesh. We traveled by train towards northern India from New Delhi to Chandigarh. It was about a 3-4 hour ride, before we arrived at Chandigarh to load into the 6-seater Tata jeeps to continue the rest of our travels by road further north. We traveled from Chandigarh to Shimla for an overnight stay at hotel on the first day of June 5. We began our journey into the Greater Himalayan Range, along the Indo-Tibetan border, rising to the elevation of 9000 ft at Sangla Valley. We stayed in tents at a two night campsite at Sangla Valley to get acclimated. We then traveled for the next eight days to nearby villages along the Pin Valley of the Trans Himalayan Region to set up two-day clinic stations at the following villages, namely a school at Nako, school at Chango, Tabo Health Center, and at Sagnam Hospital/ Kungri Monastery.

The residents of these villages lead very simple lifestyles and are incredibly resourceful in accommodating to the harsh climate changes and the treacherous terrain of their mountain ranges. The men and women wear a traditional woolen hat, called a “Kinnauri Topi” that has a distinctive green flap, representing Himachal Pradesh, along with a gray or a deep brown color to cover the body of the hat. During the dreadfully long winter months, they wear woolen shawls, socks, gloves, moccasins, and clothing to keep warm. Families have to be self-sufficient, since their region is very sparsely populated. Men usually work in the fields, while women take care of housework, or help with a family business. Children attend a local school and have subjects ranging from English, Tibetan, Hindi, Math, Science, History, Physical Activity, and Recess. The schools integrate the concepts of discipline and respect, along with culture and religion of the Himalayan region from the early ages.

We were immersed throughout the trip in the Hindu and Buddhist religions. We saw many Buddhist nuns and monks throughout our clinic rotations, since we were in close proximity to many local Buddhist monasteries and schools. We took a day trip to Kibber, which is currently the second highest permanent human settlements in the world, at almost 14,800 ft. We visited five famous Buddhist monasteries, namely Chango, Tabo, Kungari, Dunkar, and Key, which are all based on the Buddhist-Tibetan scriptures, but each with its own unique history and cultural experience. Among them, we were invited by the head nun of Chango monastery for Tibetan chai with sugar and butter biscuits, since we had welcomed her entire nun school to our clinic for treatment. We visited Tabo Monastery and were invited to sit in on the morning prayer of the local monks from 6 to 8:30 am. We also had the pleasure of visiting an art studio of a monk, who mixes his own oil paints and teaches his students oil painting on the different incarnations of
Buddhas. In the same monastery, we met the Master Lama (the eldest monk at the monastery), who inspired us by stating that our humanitarian efforts were most welcome and are considered the most valuable deeds for mankind.

Towards the end of our trip, we also visited the famous Key and Dhankar Buddhist monasteries, where we spoke with the lamas, who explained the significance of the idols, ornaments, artwork, and Buddhist traditions and values embodying the Buddhist-Tibetan religion. During our travels, we also passed several Shiva (Destroyer of evil) and Parvati (Goddess of strength and power) temples, displaying large statues and Hindu spiritual phrases as a sacred blessing for the Himalayan region.

We also had a short time at the end of the trip to explore the culture and to enthrall ourselves in the bustling shopping town of Manali before heading back to Delhi. At the Mall of Manali, every nook and corner is studded with various shops, restaurants, bazaars, markets, street vendors doing tricks, stunts, and displaying unusual ornaments, fast food stations, and beggars. While staying in the Mall, we visited the Hidamba Temple; this is the only Hindu temple in a pagoda style for worshipping the forest goddess Hidamba from Hindu Mythology. All in all, the richness of Hindu and Buddhist cultures that we were exposed to on the trip, was a wonderful inspiration to appreciate and to gain interest in learning about the religious and cultural aspects of Himachal Pradesh.

Clinical Experience: Our HHE team provided medical care and medications for free to over 1400 patients throughout our eight-day clinic tour. We set up about eight tent stations: Adults 1-3 with Ob-Gyn, Peds 1 and 2, Pharmacy, and Triage. All the first year medical students rotated each day between all the tent stations. There was a separate tent for local lab technicians who did basic procedures, such as blood draws and urine analysis. Most of our patients there do not have access to routine medical care due to the remoteness of the region and the challenging climate and terrain. Therefore, our team brought large amounts of mainly generic medications, such as ibuprofen, naproxen, acetaminophen, metronidazole, prednisone, albuterol, amoxicillin, penicillin, dexamethosone, among many others. In addition, we found that patients in the local areas have a poor concept of health literacy and sanitary conditions to be able to promote prevention and maintenance of health and wellness. So our team gave out several pairs of sunglasses, reading glasses, multivitamins, iron tablets (with discretion), and duct tape to help heal skin infections and superficial open wounds.

Many of our patients came in with signs of dehydration, so we encouraged them to drink at least 2 liters of water a day. Many patients also came in with conditions of fatigue, eye pain, tearing eyes, heat cramps, and headache due to sun exposure, so we educated them about proper sun protection by wearing sun glasses, wearing a broad-rimmed hat, drinking lots of fluids, and staying inside during mid-afternoon times. We saw many children with intestinal worms, vitamin deficiencies, bacterial infections, and a few with jaundice; while we saw many women with PID and iron-deficiency anemia. On the happier note, we did many well-child checks for children from the local monastic school and some pregnancy tests for women, whom we suspected were pregnant. On the other hand, many of our adult patients had chronic conditions, such as arthritis, hypertension, GERD, cataracts, tuberculosis, scabies, and much more. We managed some of these conditions with medications and arranged for follow-up care with the local physician for
close monitoring, or higher level of care at the nearest hospital. We saw one interesting case of a 20-year old girl who came to us in a critical condition of septic shock. A few of the trained nurses got to her case immediately. She was placed on IV fluids and antibiotics, because of her history of being inadequately treated for pyelonephritis. Members donated money to send her by taxi to the nearest hospital for further care and treatment. After seeing her case in clinic, we were very distrustful of the health care system in Himachal in adequately providing emergency aid to patients who are unable to have proper access to care. We saw many shortfalls in health care support and services at clinics: x-ray room without a technician, a pharmacist without any space to dispense medications, vacant clinic rooms, and lack of doctors providing follow-up care to their patients. However after visiting our patient three days later at the hospital in a stabilized condition, we regained some faith in the Himachal health system and the HHE’s ability to provide assistance for improving access of care to our patients.

As a first-year student, I worked on a team with a preceptor (attending physician, resident, or fourth-year student) and fellow students in different tent stations throughout my eight clinic days. Using our drivers as interpreters, first years took histories, did physical exams, tried to make an initial diagnosis and a plan, and then presented each patient to the preceptor. We had several teaching sessions after clinic days where we discussed topics like altitude sickness, tuberculosis, and shock, and shared interesting cases we saw in clinic. My biggest challenge was to present a focused, coherent story to the preceptor within a short period of time, relying on our medical senses and our stethoscopes as our primary diagnostic tool set. Language and culture were additional factors that we had to deal with in the clinic. History-taking took twice as long as would normally take, because of the language and cultural barriers and limited space. In addition, many of us were unaware of the cultural traditions and any holistic approaches that our patients used for sickness and illnesses. But the most challenging factor in our clinics was the limited medical equipment (without X-ray machines, CT scanners), lab tests (limited blood testing capabilities), and facilities. However, we were able to make the most of our basic medical knowledge and treatment abilities to fulfill the needs of all our patients as completely as possible, given our short stay and limited resources.

Despite all these challenges, clinic was quiet a learning experience. One aspect that I missed about our clinic was not being able to provide the continuity of care to any of our patients. However, the entire experience truly made me realize how valuable our clinics are to the local villagers and how much we can make a difference in such a short period of time in a small region of Himachal Pradesh.

**Adventure:** The entire trip was a fascinating adventure ever since I stepped out of the airplane in Delhi. For me, there was a lot of self-reflection and personal growth, in part because elements of this trip were physically and mentally very challenging, and we had to be flexible and adaptable. I did things I never thought I could do, which was extremely exciting and rewarding. We took several day treks in the mountains; the biggest one was a 7 mile trek to the last village called Chitkul of the Sangla Valley camp site; another was down to a suspension bridge over the Spiti River where we watched the sun rise over the mountains at 13,000 ft above sea level. Throughout the trip, our road trips from one village to the next were treacherous and were on very rugged terrain through serpentine paths, creeks, bridges, small cliffs, and narrow roads with two-way traffic. Another influential factor was the fact that the weather and the temperature were
fluctuating very quickly from the cool winds as we were approaching higher elevation to the intense, dry heat from the sun as we were descending down to the banks of a river in the Himalayan range. However, the beautiful scenery that is home to many yaks, ibex, wild mountain dogs, sheep, and a lot of cows, was just indescribable and made our arduous road trips much more pleasurable. My experience in the Himalayas definitely heightened my sense of adventure!

**Evening Retreats:** On our clinic days we worked long hard hours, but also found time and creative ways to relax. We sat with a group of Buddhist monks during one early morning meditation chant sessions, and it was a very peaceful way to begin the day. One afternoon we watched the monks play cricket and welcomed some friendly competition with the HHE members. After long clinic days we would sit around a fire or in front of our camp tents to talk about different career paths, clinical experiences, travel expeditions, personal interests, and our thoughts on improving the HHE trip for the future.

**People:** All the people were incredible. Our team was made up of 30 members total. The first year medical students were among one medical graduate, four residents and three doctors in Family Practice and Pediatrics, one nursing student, two nurses, four lab technicians, and two pharmacists. Members came from different states from the U.S., namely Illinois, Texas, New Jersey, Georgia, and Missouri, and Kingston, Canada. Our team was culturally diverse and each of us had our own style and approach to community medicine. However, we all shared the love of traveling, adventure, cross-cultural experience, and medicine. It was amazing how much I learned from all the members as far as their interests, their hobbies, and their past medical expeditions abroad, within a short period of time. I was able to make some good connections with people, whom I hope to keep in touch with on a long-term basis after this trip. And even though I only spent a few minutes with each patient, many of them I will always remember for their humility, graciousness, kindness, and most of all for their patience in giving us an opportunity to learn from them about medicine, culture and their lifestyle.

The HHE staff of drivers, cooks, and guides was exceptional. The cooks especially were so hospitable and really tried to cater to our tastes as much as possible. The drivers and guides had a lot of experience with the roads and with interpretation in the clinics; they really were a valuable resource to get familiar with the culture and the language of the Himachal region.

**Impact:** Overall, this trip was a breath-taking adventure from start to finish and it was truly an eye-opener socially, culturally, and mentally. The trip was physically and emotionally very challenging, and really allowed me to get out of my comfort zone and into the reality of being in the Great Outdoors. It was also very exciting to be part of the trip as a medical student and being able to share the adventure and the cultural and clinical experiences with fellow students, residents, doctors, and local health care workers. At times our road trips were risky and nauseating due to the rugged, narrow, and winding terrain, and had unexpected delays due to road blocks, bridge repairs, vehicle accidents, construction work, and animal herd crossings. Many of us got sick due to altitude sickness, GI symptoms, such as Traveler’s Diarrhea, constipation, cold, and feverish conditions, but this was all part of the excitement, the spontaneity, and the fun of traveling!
After coming home from the trip, I could not believe how clean our environment was in the States, in comparison. Basic necessities such as clean air to breathe, clean water to drink and to wash my hands, and clean toilets seemed like a luxury to have in the States. I really learned to appreciate everything I have and the quality of life at home after this trip. However, I can never forget the simplicity and the resourcefulness of the villagers and the beauty of living amidst nature and the mountains of the Himalayan Range.

This trip was on the expensive side, but the cost was more manageable thanks to the generosity of the RWJMS Family and Friends Scholarship and the AAPI International Health Scholarship. On after thought, the experience was worth every cent and I am strongly considering going back again as either a fourth-year medical student or as a resident for a different kind of experience.

I consider it a privilege to have had the chance to be part of this trip, because I strongly believe that it has contributed to my personal growth physically, mentally, socially, and culturally. I highly recommend this trip to people who want a hands-on clinical experience, who are open-minded and adaptable, and who are looking for an adventure they will never forget!
Some Pictures from the HHE Trip

Traveling through the Greater Himalayan Range, along the Sutlej River

Trekking to Chitkul village, near a Tibetan monastic school, with some HHE members
Preparing for the first day of clinic at Nako village

One of our group discussions in the Pediatrics clinic with our preceptor in a hospital at Sagnam Village.
We had patients who were very friendly and patient in the clinics, while we were trying to address their health problems.

An unforgettable view of the Himalayan Ranges
This is our second clinic site on one of our busy days at Chango Village.

Some of the members here are wearing the “Kinnauri Topi”, which represents a tradition of the Himachal Pradesh region.
We were invited to the homes of some local Himalayan villagers, who were very hospitable and kind, in allowing us to learn about their culture and lifestyle.

This picture includes all the incredible members and staff of the HHE team and the students and teachers of the local nunnery. We were really immersed in the richness of the culture and Buddhist religion of the Himalayan Ranges throughout our expedition.