

MEDICAL MISSION UPDATE: Nicaragua

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Continuing on in the Podiatry Institute's tradition of annual surgical missions, one team journeyed to Nicaragua for the first time during May, 2002. This team was actually scheduled to visit El Salvador three weeks following the September 11 attacks on the World Trade Center, but this trip was postponed.

This team was comprised of 22 members: 5 podiatric surgeons, 2 orthopedic surgeons, 2 anesthesiologists, 2 CRNA, 5 operating room nurses, 3 residents, 1 high school student (observation purposes), and 2 administrative staff from the Healing the Children (HTC) organization. The majority of personnel were from the Podiatry Institute having served on annual missions before. This was the author's 10th annual mission since 1992 and the Podiatry Institute's 4th mission under the leadership of both Dr. Cicchinelli and the author since 1999. The previous missions served Guatemala twice, Venezuela, and Nicaragua.

Nicaragua is the largest Central American country in terms of square mileage (49,998 square miles). It is slightly larger than the state of New York and sits between Honduras to its north and Costa Rica to its south. The capital of Nicaragua is Managua, which is home to 974,000 residents and the overall population of the country is 5,023,818. This population continues to grow at a rate of 2.2% per year (compared to 0.9% in the US). The population density is approximately 100 people per square mile as compared to 58 per square mile in the US. The ethnicity profile finds 69% of the population Mestizo (mixed Amerindian and white), 17% white, 9% black, and 5% Indian. Family incomes average about \$225 per month. Annual inflation rate tops out at approximate 11% versus 6% in the US and unemployment is 20% compared to 8% in the US (1,2).

The concept behind the Podiatry Institute medical missions is in lines with its overall mission statement: "to be a supportive, global network of members, colleagues and friends which enhances the quality of life for patients with foot, ankle, and leg disorders through innovative education, research, and service." Working in conjunction with the HTC organization, the philosophy is to provide, secure, and make available medical and surgical treatment from properly trained personnel to children of impoverished backgrounds. The Institute helps provide necessary financial backing for the missions along with an abundance

of personnel. HTC is responsible for determining which countries are underserved and then establishes the appropriate contacts. HTC is also instrumental in the coordination of air travel and boarding arrangements for its team members. Lastly, HTC is largely responsible for shipping of medical supplies secured by all team members necessary for at least fifty operations. The emphasis of treatment is always directed towards children ages 6 months to 18 years in which surgical services are rendered free of charge. This is a service-oriented program with emphasis on helping as many children and young adults as cost-effectively as possible.

THE MISSION

On May 4–11, 2002, the Podiatry Institute medical mission team trekked to Managua, Nicaragua, traveling approximately one hour each way on a daily basis to Masaya for the coordinated surgeries. On the first day, a large-scale medical screening and triage took place. Approximately 150 children from all over the country, including two from El Salvador commuting by bus for 13 hours, were interviewed and screened. Forty-five with the most severe deformities were selected. The basic notion for the selection process was: nature of the deformity; future prognosis; health status of the child; ability to rehabilitate and allow for normal ambulatory cycle; and age of the patient. Each child selected was then screened by the pediatrician and/or pediatric anesthesiologist for medical clearance. Once the patient selection process was complete, daily operating room schedules were planned in order to properly prepare each patient for their impending surgery.

During the course of the week, additional radio and newspaper reports continued to bring in droves of children for screenings while the operations continued on a daily basis. All children who had urgent or severe deformity were added to the schedule before the end of that day, the remainder either needed no procedure or could wait for the team's return to the country for a less problematic disorder.

Approximately, eleven to twelve surgeries were performed daily over a four-day period and each child was admitted for pain control and observation for forty-eight hours. Each child was sent home with printed discharge

instructions and appropriate donated pain medications. Nicaraguan orthopedic surgeons who had assisted the team throughout the course of the week had volunteered to provide the postoperative care to these fortunate children upon our departure.

The Podiatry Institute medical team completed a successful initial mission and has been invited to return in the fall of 2003. Forty-three children were operated on; thirty-five were unilateral and eight bilateral cases for a total of fifty-one extremities. Of these numbers, eight children were treated for neglected arm fractures and one child for Blount's disease by the orthopedic surgeons involved with our team, the remaining thirty-four children were treated for a variety of congenital and neuromuscular disorders including eighteen children with neglected clubfoot deformity.

The team plans to return to the same location because this will help to evaluate the postoperative cases from the preceding mission, aid in lending experiences and technique to our foreign colleagues, and allow more children an opportunity for a better life.

REFERENCES

1. Infoplease.com: Nicaraguan geography and demographics. p. 1-4, 2002.
2. Culturegrams BYU: David M. Kennedy Center for International Studies, Publication Services, 1984.