



BRIGHAM AND
WOMEN'S HOSPITAL

CASES IN GLOBAL HEALTH DELIVERY

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Two Years in Hinche

This case is the sequel to "HIV Voluntary Counseling and Testing in Hinche, Haiti."

In January 2004 Zanmi Lasante (ZL) expanded its HIV Equity Initiative to Hinche, the capital city of Haiti's Central Department. Throughout 2003, 306 people had been tested at Hinche's HIV voluntary counseling and testing (VCT) clinic, and the wards in the Hôpital Sainte Thérèse de Hinche, the public hospital to which the VCT clinic was attached, were operating at only 25% capacity. By July 2006, after major infrastructure, supply chain, and workforce improvements, 11,974 people had been tested in the VCT clinic, and 350 patients were being followed on antiretroviral therapy for HIV (up from zero in 2003). Sainte Thérèse's outpatient clinics and inpatient wards buzzed with activity. Hinche's citizens viewed the hospital as a place of healing, rather than a place to die. ZL and its partners accomplished this transformation amid dramatic social unrest and despite myriad political and logistical challenges.

Arriving at Sainte Thérèse

Both ZL's and Dr. Jonas Rigadon's reputations had preceded them in Hinche. Many people from Hinche who knew about ZL's work had been walking several hours to Thomonde to seek care because no antiretroviral medications were available in Sainte Thérèse. Word spread quickly that ZL was going to expand in Hinche, exciting people in the community. They knew that ZL patients got well and the organization had medicines, a laboratory, and provided free care.

Before Rigadon and his team could get set up in the hospital, people went to their rented house – a significant distance from the hospital – throughout the day and night for medical care. Some patients sought primary care services, while others were desperately ill with tuberculosis (TB) or HIV/AIDS. Patients were assessed, offered HIV testing, and then followed with appropriate clinical treatment, according to their clinical status and HIV test results. Those in less critical condition were asked to wait until ZL was set up in the hospital. ZL had neither the space nor the resources to operate a full clinic.

Erika Pabo, Andrew Ellner, Joseph Rhatigan, and Evan Lyon prepared this case with assistance from Sachin Jain for the purposes of classroom discussion rather than to illustrate either effective or ineffective health care delivery practice.

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Adapting the Model

Taking care of the first 15 HIV/AIDS patients from the house was not as easy for staff as it had been in Thomonde. While Thomonde was a small community, Hinche was a big town with more movement to and from Port-au-Prince, other areas of the Central Plateau, and the Dominican Republic. The ZL team had to convince its patients to stay in Hinche so that a ZL employee could visit them daily or twice daily to administer directly observed therapy (DOT).

The scale of operations at Hinche required a large staff. By May 1, 2004, when ZL began working at the hospital (and after receiving additional funding from PEPFAR), it hired 28 full- and part-time employees. These employees included one doctor, two nurses, one nurse-midwife, five auxiliary nurses, two pharmacy assistants, two support staff (one messenger and one housekeeper), one data clerk, one accountant, one social worker, six archivists, two microscopists, one lab technician, and one electrician.¹

Infrastructure and Equipment

ZL and the MOH agreed that the MOH would continue to operate the 66-bed main hospital and that ZL would take over the existing TB sanatorium behind the hospital. The TB sanatorium, however, was in disrepair. As Dr. Joia Mukherjee, PIH's medical director, described, "When I went into the hospital, it was filthy and broken down. The TB sanatorium was filled with skinny, hungry, dying people. ... They didn't have any money to feed the patients. They didn't have an x-ray machine."

One of ZL's first tasks was refurbishing the facilities, rehabilitating the TB sanatorium, and converting unused space into outpatient rooms. Patrice Nevil, ZL's head engineer, oversaw the rebuilding process in Hinche. Admitting rooms, exam rooms, the inpatient ward, x-ray room, laboratory, pharmacy, drug warehouse, information technology room, VCT room, and administrative offices all had to be rebuilt at an estimated cost of USD 100,000. New equipment would cost them USD 40,000. PIH and ZL assumed they would receive 90% of the necessary rebuilding supplies via donations.

The renovated sanatorium became the infectious disease pavilion for the entire hospital. Half was dedicated to HIV care and half to TB care. Rigadon and the head nurse saw patients in two small outpatient rooms. ZL's women's health services, including prenatal care and midwifery services, were not located in the ZL building. No repairs to the hospital's dilapidated outpatient clinic were planned.

Pharmacy and Drug Supply Chain

PIH and ZL established a permanent pharmaceutical supply chain for Hinche because the MOH's drug supply chain was inadequate and unreliable. As Dr. Maxo Lumo, a MOH pharmacist at Hinche who became a ZL physician, recalled, "There were times when all [the hospital pharmacy] had was iron, folate pills, and condoms." In the year that Lumo worked in the pharmacy, he remembered only two successful requisitions of pharmacy stock. The MOH drug formulary was also much more limited than ZL's formulary.

The ZL pharmacy in Cange functioned as the central pharmacy. All supplies were first brought there and then distributed to the other sites. ZL offered for free medicines, which previously would have been available to patients for a fee.

PIH purchased 85% to 90% of its pharmaceuticals from the International Dispensary Association Foundation (IDA), a non-profit organization based in the Netherlands that specialized in supplying generic essential medicines and medical supplies, with which PIH had worked since 1999. PIH placed drug orders every six to nine months, as it took between eight weeks and six months for IDA to fill them. IDA shipped medicines directly to Port-au-Prince, where a ZL staff member shepherded the products through customs

and brought them to a locked warehouse. ZL drivers then transported the supplies the three-hour route to the pharmaceutical warehouse in Cange. PIH staff in Boston managed the flow of supplies to Haiti, while the ZL team coordinated the flow of supplies and equipment between sites.

Partnering to Improve Clinical Services

After ZL began working in Hinche full-time in May 2004, the hospital filled with patients. Seemingly overnight, the social service residents were seeing 100 patients per day.

Patient Fees

One point of debate in ZL's engagement at Sainte Thérèse was patient fees. In Haiti, all care at MOH hospitals was provided on a fee-for-service basis. Patients were charged USD 0.71 to see a doctor. They then paid for all additional services and supplies required for their care. ZL believed these charges created a barrier to health and that care should be free. At ZL's other sites, they reached an agreement with the government that ZL would charge patients who could afford it, the USD 0.71 user fee but all subsequent care would be free. Sainte Thérèse's hospital director worried that while ZL's presence might bring in more patients, the increased volume still might not cover the additional costs. After much negotiation, Rigadon and the director agreed that ZL would charge the USD 0.71 flat fee in Hinche, but that ZL would pay the fee for patients who could not afford it.

Integrating Staffs

For both patients and staff, the flow of care between the MOH and ZL facilities needed to be seamless. Sainte Thérèse had four distinct groups of staff: 1) MOH staff, including the hospital director, nurses, and auxiliary nurses, many of whom had been working there for 15 years or more; 2) six social service residents; 3) six Cuban physicians (three general medicine doctors, one pediatrician, one orthopedist, and one general surgeon); and 4) the newly arrived ZL staff. Each staff had different experiences, expectations, and mandates.

The MOH staff and social service residents ran the emergency room and the outpatient clinic, and they helped with the inpatient hospital. Soon after ZL began working in Sainte Thérèse full time, the patient load increased nearly seven-fold. For the MOH staff, work hours increased from several hours a day to full days and an expectation of overnight care on the inpatient units. Consistent with its policies at other sites, ZL began topping off the MOH staff salaries so that – with the exception of benefits, such as room and board, which were provided for full-time ZL staff only – the MOH and ZL staffs' salaries were equal.

Still, it took time for the MOH staff to adjust to the higher standard of care and increased resources that ZL brought. A physician from the Brigham and Women's Hospital in Boston who worked part time for ZL in Hinche described an admitted patient who required intravenous antibiotics for a potentially septic hip joint. The patient did not receive antibiotics for three days because the nurse said she didn't have the necessary syringes even though they were available in the central pharmacy next door. According to the physician, "The nurse had been working without these things for so long that I guess she assumed they wouldn't be available; so she didn't ask and didn't give the antibiotics."

The Cuban staff operated the inpatient wards in the main hospital. Their surgeon ran the operating room. The Cubans were assigned to work in Haiti for two years at a time, and most made an attempt to learn Haitian Kreyol. Having done their training in Cuba, they had little previous exposure to HIV/AIDS and TB. They always alerted the ZL staff to patients suspected of having HIV or TB.

Building Community Awareness and Trust

ZL worked to change the Hinche community's perceptions about the hospital in order to improve health care utilization. As Mukherjee described, "People went to the hospital to die, so why would you go to the hospital?" She felt that ZL had to fulfill a "test of presence ... that you were really there, that you don't abandon." This meant that every day, from early in the morning until the last patient in line was seen at night, the clinic was open, and the staff was working.

ZL's central strategy for changing the hospital's reputation was direct outreach and community mobilization. Staff conducted mobile clinics and home visits. ZL hosted community events, sponsored a soccer team, and gave out T-shirts for World AIDS Day. At each event, ZL fed 1,000 people. ZL turned these events into educational opportunities. Every time the ZL soccer team played, for example, ZL staff attended the game to talk about sexually transmitted infections and HIV/AIDS and distribute condoms. They also went to local schools, churches, and community events to provide health education.

Rigadon hosted a radio show called *Sante Plis* (Health Plus). His first show, on TB, was meant to be a one-time event. After a short presentation, he asked the audience questions. Listeners who called in with correct answers received a prize, such as a book. People who heard the show called Rigadon and asked him to do it again. The show became a weekly event.

The Partnership in 2006

Patient volume at Sainte Thérèse increased dramatically over the first two years ZL worked in Hinche. The clinics went from seeing 10 to 20 patients per day to several hundred. The number of HIV tests increased from 306 in 2003 to 3,107 tests in 2004 and 11,974 in 2005.² The infectious disease clinic went from treating zero people with AIDS in 2003, to placing 125 people on ARVs by August 2004. By July 2006, ZL managed 350 people on ARVs, including one patient on second-line therapy.

The partnership between ZL and Hinche positively transformed the reputation of the hospital. Patients no longer waited until they were deathly ill to seek care and sought preventative primary care services. Even the landscape changed. Dr. Pierre Paul, who took over for Rigadon in August 2005 recalled, "The hospital was busy. There were trees starting to grow. We started to build new buildings. Even the distribution of the bushes changed because people were actually coming to the clinics and creating worn footpaths."

References

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2. Ivers, L.C., R. Cruff, G. Jerome, P. Paul, et al. *Increase in uptake of voluntary HIV testing in the setting of comprehensive free healthcare in rural Haiti*. in *XVI International AIDS Conference*. 2006. Toronto, Canada.