By Molly V. Strzelecki

A Decade of Change

In the past 10 years, PEPFAR has revolutionized how HIV/AIDS is treated globally

In 2003, President George W. Bush, with bipartisan support from Congress, launched what would become a landmark effort in the fight against HIV/AIDS. The President’s Emergency Plan for AIDS Relief (PEPFAR) embarked on a mission to end the global AIDS crisis with the ultimate hope of creating an AIDS-free generation.

With $15 billion in funding over five years, PEPFAR set out to scale up services for people in resource-limited countries. At that time, 4 million people in sub-Saharan Africa, for example, needed care for HIV/AIDS, while only 50,000 people received it. PEPFAR sought to redress that problem. The program’s initial objectives were to support the treatment of 2 million
people infected with HIV in resource-limited countries; support the care of 10 million people with HIV/AIDS, including children who were vulnerable or orphaned because of the disease; and provide education and counseling for 7 million people with the hope of preventing new infections.¹

Multiple agencies joined the effort to make these priorities a reality, including the U.S. Department of State, the Department of Defense, the Department of Health and Human Services, the U.S. Agency for International Development, and the Peace Corps. Outside groups, from multinational corporations to educational and healthcare organizations, also par-
ticipated. But, most important, PEPFAR garnered the support of many in-country partners in Ghana, Namibia, Cambodia, Nicaragua, Haiti, and Turkmenistan, among others, which helped the efforts take root and change the way HIV/AIDS is tested for and treated in participating countries.

In 2008, PEPFAR was reauthorized in no small part because of its successful first chapter. PEPFAR surpassed its original goals, supporting the treatment of 2.1 million people and the care of 10.1 million people affected by HIV/AIDS. By September 30, 2008, outreach efforts had helped provide prevention counseling to more than 58 million people. Today the Obama administration continues PEPFAR’s commitment, having reauthorized the legislation in 2012. In fiscal year 2012, PEPFAR supported HIV testing for 49 million people, and approximately 750,000 HIV-positive women were given antiretroviral therapies, preventing an estimated 230,000 infant HIV infections.

A Path to the Laboratory

These numbers validate the major accomplishments of the legislation, but the amount of work that went into these achievements cannot be tabulated. Professionals in health care, policy, politics, and education played a part in implementing PEPFAR, and pathology and laboratory professionals were essential to its success.

Even from the earliest days, it was clear that quality pathology and laboratory services would be key in generating positive outcomes. After all, without accurate diagnosis of HIV there would be little hope for treatment or prevention. When PEPFAR first started, however, few of the countries involved had access to laboratory services, let alone quality services. Without establishing and strengthening the laboratory, the goals of PEPFAR would be unattainable.
“Accurate diagnostics are truly a pillar of health care, and a pillar of HIV care and treatment,” says Trevor Peter, PhD, senior director for diagnostics with the Clinton Health Access Initiative and chair of the African Society for Laboratory Medicine. Dr. Peter has worked with several PEPFAR partners in the past 10 years and has seen the program grow through partnerships with outside groups. “Without accurate diagnostics we would simply not be where we are today in terms of scale-up, in terms of what PEPFAR has done. Diagnostics have been pivotal.”

PEPFAR has heavily sought to strengthen laboratories, he continues, from increasing testing capacity, to training personnel, to providing all of the various enabling systems that support the laboratory. PEPFAR helped advance basic day-to-day quality assurance and laboratory data management, and simplified supply chains and procurement. Because of PEPFAR’s investment, developing countries now have testing commodities available to them, Dr. Peter adds, and they also have the support needed to strengthen the capacity and capabilities of the laboratories.

“That not only increases a laboratory’s performance, but enables it to run more tests, and run them more efficiently,” Dr. Peter says. “The investments and support from PEPFAR have been fundamental both in terms of increasing testing and doing so in a quality-assured way. And because of that, these countries have stronger health systems.”

The Road Ahead

In its 2013 Evaluation of PEPFAR, the Institute of Medicine cited the strengthening of laboratory services and quality as a signature achievement of the effort. And in 2012, with the release of the PEPFAR Blueprint—a roadmap for the initiative in the coming years—it is clear that the laboratory’s involvement will be crucial in order for the program to move out of emergency mode and into a sustainable, country-owned effort.

“We need to ensure we sustain the gains we’ve made over the past 10 years in terms of strengthening the laboratory’s services and systems to make sure rapid HIV tests are done with the most accuracy,” says John Nkengasong, PhD, chief of the International Laboratory Branch of the Division of Global HIV/AIDS for the Centers for Disease Control and Prevention. “We need to make sure that we develop systems to support laboratory services including PCR, CD4, and more. We need to continue building those systems, and that’s where we’ve taken a holistic approach to strengthening systems by advocating for countries to move their labs toward accreditation, which is the known international standard for laboratories.”

Implementing quality standards and establishing a sustainable workforce are the next steps in PEPFAR’s continued success. To help accomplish this, PEPFAR has provided support to the Stepwise Laboratory Improvement Process Towards Accreditation (SLIPTA) program, which pushes laboratories toward international accreditation; and the Strengthening Laboratory Management Towards Accreditation (SLMTA) initiative, a laboratory management course.

“PEPFAR has championed these programs, and they in turn have become very successful,” Dr. Peter says. He adds that SLMTA, started in 2008, is now in more than 30 countries, and is one of the most widely used laboratory management training courses in the world.

“Hundreds of laboratories have gone through this course, or have been affected by this course,” Dr. Peter explains. “And those laboratories are in general improved by these laboratory management courses. It doesn’t train laboratory professionals how to do a CD4 test correctly; it trains them how to run a laboratory.”

As more labs in resource-limited countries become accredited, service quality will increase, which should improve accurate treatment and outcomes for people with HIV/AIDS. In turn, PEPFAR is recognizing that as people live longer with HIV/AIDS, they also become susceptible to diseases that previously hadn’t affected them, such as breast cancer, cervical cancer, and tuberculosis, making quality laboratory services even more crucial. Former Ambassador-at-Large and U.S. Global AIDS Coordinator Eric Goosby, MD, acknowledged this in a 2013 PEPFAR blogpost: “Moving forward, PEPFAR will continue to rely on strong lab systems for the deployment of new, appropriate technologies—including point of care technologies—to test for viral load, CD4, HIV, and TB drug resistance, and early infant diagnosis of HIV, among others. This includes assisting countries in their adoption of technologies with proven impact, such as a new, molecular-based TB test that has dramatically reduced the time to diagnosis and treatment for people living with TB and HIV.”

Accurate diagnoses and treatments for people with HIV/AIDS have been substantially improved over the past decade by PEPFAR’s support for quality laboratory testing and treatment. Now, 10 years after its start, PEPFAR draws increasingly closer to its goal of creating an AIDS-free generation. Central to that goal will be pathology and laboratory medicine.

References


Ms. Strzalecki is Senior Editor of Critical Values.