USAID conducted studies to see whether methane gas from the Guatemala City landfill could be captured and converted into electricity. It found that the emissions from that dump are about 56 percent methane — higher than in any other Central American country. Working with the U.S. Environmental Protection Agency, the owner of the landfill, multinational companies, and municipal leaders, USAID conducted a test to see just how much electricity the dump could generate. Three test wells were dug and connected through a network of tubing to a pump that extracts the methane, which is then burned by a large torch.

The burning gas will propel a turbine that creates electricity — and makes garbage a valuable commodity. The torch now gives off a flame so clear that only its shadow on the ground is visible. This source of electricity meets a triple standard: it is more economical to produce than other energy sources, it reduces pollution, and it creates a safer, healthier environment for local residents. The Guatemala landfill may set the example for others in the Central America region.