Jordan: Wastewater Management Addresses Mosquito Control

Operating Unit: USAID/Jordan

Source: USAID/Jordan Results, Review, and Resource Request (R4), FY 2002.

Date: March, 2000

Keywords: health; Jordan; mosquitoes; pest management; wastewater treatment;

waterborne disease.

Related Strategic Objective:

SO 2: Improved Water Resources Management

In 1997, USAID/Jordan learned that communities in the Hashimiyya area north of Amman, with a population of 50,000, were complaining about a range of pest problems. These problems were associated with the neighboring As-Samra wastewater treatment plant serving Jordan's capital city of Amman.

Working with the global Environmental Health Project (EHP), USAID/Jordan helped to identify a solution. First, investigators found that mosquitoes and other pests were breeding in the effluent from the treatment plant collecting in stagnant pools along Wadi Dhuleil. Next, a sustainable pest control program was developed to address the problem. A committee involving community members and national and local officials was organized to help guide and eventually manage the process.

During the summer of 1998, community members for the first time worked with government officials to clear the wadi and apply biological (rather than chemical) larvicides. As a result, larval breeding in the wadi was reduced by 90 percent. Afterwards, a general public awareness campaign to control larval breeding in household cesspools was implemented. Leaflets in Arabic showing how to properly seal household cesspools were widely distributed.

In November 1998, a community assessment indicated that many people had noticed a substantial reduction in the number of mosquitoes. Many people commented that they could finally enjoy sitting outdoors without being bitten by mosquitoes. Other stated that they slept well for the first time in years. Results also indicated that households were spending less on household insecticides than in the past.

Direct USAID assistance to communities in the Hashimiyya area ended in the summer of 1999. However, community workers continued to apply the biological larvicides. The Water Authority also awarded a contract to further clear and improve the wadi.