When Hospitals Become Killers

A drug-resistant germ has struck even the National Institutes of Health Medical Center.

By BETSY MCC AUGHEY

In 2011, the lethal germ known as CRK—short for carbapenem-resistant Klebsiella—raced through the National Institutes of Health Medical Center in Bethesda, Md. Antibiotics couldn't stop it. Infection-control precautions recommended by the Centers for Disease Control and Prevention could not contain it. Six patients died because of it, including a 16-year-old boy.

Last week, public-health researchers released alarming data in the journal Infection Control and Hospital Epidemiology showing that the same germ that swept through the NIH is invading hospitals across the country. Researchers writing this month in another medical journal, Emerging Infectious Diseases, warn that CRK poses "a major threat to public health."

Since the discovery of CRK in 2000, it has been found predominantly in New York City and the mid-Atlantic region. But Los Angeles County, one of the few places where CRK is being tracked, detected 356 cases in the second half of 2012. "Upwards of fifty percent" of patients who contract CRK die, according to NIH researchers.

Klebsiella infections generally are treated with powerful antibiotics called carbapenems, but the Jan. 25 data reveal that increasingly this medical weapon of last resort is not working. Drug resistance in Klebsiella infections is up 4,500% since 2002—from 0.1% to 4.5%, and that's just among known cases. Medical institutions are clearly moving closer to a post-antibiotic era.

Current measures recommended by the Centers for Disease Control will not control the spread of this germ, even when hospital personnel follow the measures meticulously. That was the stunning conclusion reached by NIH researchers.

The NIH outbreak began in June 2011 when a 43-year-old woman with lung disease was admitted to the medical center from a New York hospital. Her chart alerted NIH that she was carrying CRK, so medical staff immediately isolated her and wore gowns, gloves and masks when treating her. All CDC contact and isolation precautions were followed, researchers later confirmed.

The woman recovered and left the hospital. But after three weeks, a male cancer patient in the same hospital who had no contact with the woman came down with CRK. Ten days later, a female patient with an immune disease fell victim. Both died. Week after week, more patients
were hit with CRK. Researchers traced every infection back to the germ introduced into the hospital by the 43-year-old woman. "The outbreak was finally contained by implementing tougher standards," said the NIH researchers—standards tougher than CDC guidelines.

First, to halt the outbreak, the NIH screened all patients for CRK. Patients unknowingly pick up the germ and carry it in their gastrointestinal tract for weeks without symptoms. Nurses who treat these unidentified carriers inadvertently transport the germ from bedside to bedside. The NIH used a relatively new rapid-test technology, then isolated every carrier.

Since 1991, the CDC has recommended testing all hospital patients for the AIDS virus but not for bacteria that cause hospital infections. Hospital infections kill five times as many Americans as the AIDS virus. Moreover, becoming infected with AIDS is difficult, but picking up a drug-resistant hospital germ is as easy as touching a bed rail or nurse's glove.

The second step that the NIH implemented was more rigorous cleaning than the CDC calls for. Rooms were double-cleaned with bleach and then misted with a hydrogen peroxide sprayer—another relatively new technology. Bacteria can live on equipment for days and then contaminate the hands of unsuspecting caregivers. When cleaning is inadequate, a patient assigned to a room previously occupied by the carrier of a superbug is put in danger.

In the 1980s, the CDC, the American Hospital Association and state health departments responded quickly to the AIDS threat, revamping hospital protocols on needles, sharp equipment and bodily fluids to prevent AIDS from becoming a hospital-acquired epidemic.

Where is that determination now? The National Institutes of Health researchers urged the CDC to make CRK a reportable disease like AIDS. How can the CDC and public-health agencies control this new threat when they don't even know how many cases are occurring and where?

We have the technology to contain these drug-resistant germs. What is needed is the will to do it. Otherwise patients with cancer, organ transplants and other immune-compromised conditions may find themselves worrying: Is it safe to go to the hospital?

Ms. McCaughey, a former lieutenant governor of New York, is founder and chairman of the Committee to Reduce Infection Deaths.