

the epidemic started in Asia—more specifically, somewhere on the central steppes⁴ or in the Himalayan lowlands on the border of India and China. In both regions, the plague **bacterium**, *Yersinia pestis*,⁵ has long thrived among wild marmots, ground squirrels, and gerbils.

On the Move

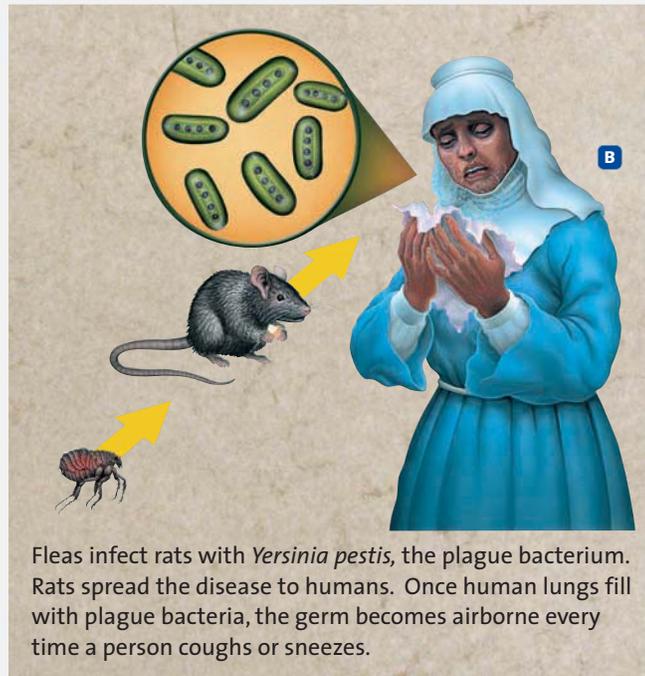
How did the disease travel from wild rodents to humans? According to early accounts, before the Black Death broke out, earthquakes, floods, and famines devastated Asia. One theory is that these disasters drove wild animals into villages and towns in search of food. Fleas then spread plague germs to rats. . . .

When rats died of the plague, their fleas hunted for new hosts. Since rats nested in the adobe (sun-dried brick) walls and thatched roofs of medieval houses, the next meal for these fleas often came from people. . . .

The disease spread more easily if an infected person's lungs started filling up with plague bacteria. Then, every cough and sneeze spewed germs into the air, spreading pneumonic plague⁶ directly to others.

If they are not among the lucky few who recover, people and rats soon die of the plague, but infected fleas can lurk in a rat's nest, barnyard manure, or bedding and clothing for many months without eating. A medieval writer was not far wrong when he wrote that "even the houses or clothes of the victims could kill."

. . . Cloth, grain, furs, and hides kept in rat-infested warehouses soon became delayed-action "plague bombs" waiting to go off. An account tells



Fleas infect rats with *Yersinia pestis*, the plague bacterium. Rats spread the disease to humans. Once human lungs fill with plague bacteria, the germ becomes airborne every time a person coughs or sneezes.

bacterium (băk-tîr'ē-əm)
n. the singular form of *bacteria*, microscopically small living things that may cause disease

B INTERPRET GRAPHIC AIDS

How does this illustration **clarify** your understanding of how people caught the disease?

4. **steppes:** treeless plains in southeastern Europe and in Asia.

5. ***Yersinia pestis*** (yər-sīn'ē-ə pĕst'ĭs).

6. **pneumonic** (nōō-mōn'ĭk) **plague:** the most contagious and deadly form of the Black Death.