

Like Black Smoke: The Black Death's Journey

Magazine Article by Diana Childress

A World Turned Upside Down: How the Black Death Affected Europe

Magazine Article by Mary Morton Cowan

How do we fight DISEASE?

Communities can do a lot to stay healthy and prevent disease. But people didn't always know what we know now. The articles you are about to read tell about a time during the Middle Ages when the bubonic plague affected so many people that it changed a society.

LIST IT What can we do to encourage good health for ourselves and others? List five guidelines that people can follow to prevent diseases from spreading. Be ready to explain why you included each guideline.

Healthy Guidelines

1. Wash hands often with soap and water.

2. _____

3. _____

4. _____

5. _____

Text Analysis: Cause-and-Effect Pattern of Organization

Nonfiction writers often use patterns of organization to help explain particular ideas. One commonly used pattern is **cause-and-effect organization**, which shows the relationship between an event or its cause or effect. Cause-and-effect organization

- can answer the questions “What happened?” and “Why did it happen?”
- uses signal words and phrases, such as *caused*, *because*, *led to*, *for this reason*, *as a result*, and *may be due to*.

Cause:

Earthquakes, floods, and famines devastate Asia.



Effect:

Rodents are driven into villages and towns in search of food.

As you read these two articles, notice how the writers use cause-and-effect patterns to explain key points.

Reading Strategy: Set a Purpose for Reading

In this lesson, your **purpose for reading** is to compare articles that use cause-and-effect organization. As you read, you will use a chart like this one to note which topics are covered by each article.

Topics Covered	“Like Black Smoke”	“A World Turned Upside Down”
Agricultural changes		
How diseases spread		
Loss of life		
Trade routes		
Worker shortages		

Vocabulary in Context

Note: Words are listed in the order in which they appear in the articles.

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

*The plague **bacterium** first infected people in Asia.*

chronicle (krŏn'ĭ-kəl) *n.* a record of historical events in the order in which they took place

*One **chronicle** tells about sailors sickened with the plague.*

rampage (răm'pāj') *n.* a wild or violent outbreak

*The plague's **rampage** through Europe caused many deaths.*

hierarchy (hĭ'ē-răr'kē) *n.* an organization of people according to rank

*Peasants had a low place in the **hierarchy** of the feudal system.*

cope (kōp) *v.* to struggle with and act to overcome

*Landowners could not **cope** with the losses from the plague.*

disarray (dĭs'ē-rā) *n.* a state of disorder; confusion

*Society was in **disarray** after the deaths caused by the plague.*

artisan (ăr'tĭ-zən) *n.* a person who is skilled in a trade

***Artisans** are skilled in leather work, carpentry, and other crafts.*

recurrence (rĭ-kûr'əns) *n.* the act of happening again; return

*People lived in fear of a **recurrence** of the plague.*

SET A PURPOSE FOR READING

Read the following articles to see how the spread of disease affected people during the Middle Ages.

A SET A PURPOSE FOR READING

Read the title and circle all the **subheadings**. What do you expect to learn from this article?

Like Black Smoke
The Black Death's Journey
Diana Childress



BACKGROUND The Middle Ages lasted from about a.d. 500 to a.d. 1500. One of the most significant events of this time period was the spread of the bubonic plague, or the Black Death. Those who caught the disease suffered fever and painful swellings, called buboes, in the lymph glands. The buboes, from which the disease gets its name, were followed by black spots on the skin. Next came a severe, bloody cough, and after that—death. At the time, no one knew what caused the disease.

“We see death coming into our midst like black smoke,” wrote the poet Juan Gethin,¹ when plague invaded Wales in March 1349. This “rootless phantom which has no mercy” was especially frightening for those who witnessed it because they knew it was somehow contagious, but no one could halt or explain its relentless spread across Europe.

Eastern Beginnings

The earliest evidence of the Black Death lies in a
10 cemetery in what was once a prosperous town near

1. **Juan Gethin** (yā’ən gëth’ĭn).

Lake Issyk-Kul² on the fabled Silk Road³ in Central Asia. An unusually large number of graves there are dated 1338 and 1339. Three headstones mentioning the cause of death provide a clue about why so many people died: the plague.

Did the Black Death originate near Issyk-Kul? No one knows for sure. Most medieval writers say that the plague began in the East. They name places like Cathay (China), India, and Turkey. Modern historians
 20 agree that 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
 30 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. . . . **B**

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. . . .

2. **Lake Issyk-Kul** (ÿ'sÿk-kÿl').

3. **Silk Road**: an important trade route on which both goods and ideas were exchanged between China and the countries of western Europe.

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

5. ***Yersinia pestis*** (ÿer-sÿn'ÿ-ÿ pÿst'ÿs).

bacterium (băk-tÿr'ÿ-ÿm) *n.*
 the singular form of *bacteria*,
 microscopically small living
 things that may cause disease

B CAUSE AND EFFECT

Underline the question in lines 27–28. It introduces a cause-and-effect chain of events. What explanation does the author give for the plague's spread to villages and towns?

C SET A PURPOSE FOR READING

What topics have been covered so far? Check them off in the chart.

Agricultural changes
How diseases spread
Loss of life
Trade routes
Worker shortages

D CAUSE AND EFFECT

Use the illustration and the information in lines 27–47 to understand how people spread the disease. Once people have the plague bacterium, what happens when they cough or sneeze?

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
 40 air, spreading pneumonic plague⁶ directly to others. C

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
 50 warehouses soon became delayed-action “plague bombs” waiting to go off. An account tells how four soldiers learned the hard way about contaminated goods. Looting houses in a deserted town, they stole a fleece off a bed and later slept under it. They were dead by morning.

Commercial caravans, Mongol armies, and other wayfarers⁷ “carried” the Black Death in their baggage
 60 as they crisscrossed Asia. By 1345, it had traveled from Issyk-Kul to



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

7. **commercial caravans** . . . **wayfarers**: Commercial caravans are bands of merchants or traders traveling together for safety. Mongols had a large empire covering most of Asia and eastern Europe. Wayfarers are generally people who travel on foot.

Sarai and Astrakhan,⁸ the major cities of the Golden Horde⁹ (a part of the Mongol Empire that is today south-western Russia). **PAUSE & REFLECT**

From Asia to the Mediterranean

At the time, Italian merchants from Genoa and Venice had established trading posts at Kaffa, a city on the Crimean Peninsula that juts out into the Black Sea.

70 Since the mid-1200s, their galleys had transported Asian horses, furs, and slaves to Syria and Egypt and silks and spices to Italy. When plague began to spread to the Crimea, many of the Europeans tried to escape by sea, but the Black Death sailed with them.

The following summer, plague broke out in Constantinople. From there, it crossed the Mediterranean region. That fall, ships brought the plague to Alexandria, Egypt, one arriving with only 45 of its original crew of 332 men still alive. Another

80 fleet came to Messina, Sicily, its crew so ill that a **chronicle** reports that the men had “sickness clinging to their very bones.”

The epidemic reached Genoa on New Year’s Eve 1347 aboard three galleys laden with spices from the East. On discovering that many seamen were sick, the Genoese chased the ships from the port with “burning arrows and engines of war.” Plague-ridden rats, however, had already jumped ship. The galleys

PAUSE & REFLECT

What role did trade play in the spread of the plague?

chronicle (krŏn'ĭ-kəl) *n.* a record of historical events in the order in which they took place

Why do you think that information about the plague was recorded in a **chronicle**?

8. **Sarai** (sä-rī') . . . **Astrakhan** (äs'trə-kän').

9. **Golden Horde**: a name for the Mongol army.

sailed off along the coast of France, still hoping to find
 90 a place to sell their deadly merchandise.

Following the Trade Routes

Following 14th-century trade routes, the Black Death swept across Europe, North Africa, and the Middle East. After it assaulted the seaports, smaller boats carried it to neighboring towns and to river ports far inland. It could not be stopped. Although some towns refused entry to travelers from infected areas, and people learned to mistrust “plague goods,” few noticed the dead rats, and no one thought of the fleas. **E**

100 Reports of plague in 1348 show how the circles of infection widened. In the east, it hit Cyprus, Aleppo, Damascus, Jerusalem, and even pilgrims visiting

E CAUSE AND EFFECT

Reread lines 92–99. Underline words and phrases that describe the spread of the plague. Why did the plague spread around the globe?

F CAUSE AND EFFECT

Circle the names of the continents that were affected by the Black Death. According to the map, in what direction did the Black Death first travel?



Mecca. From Genoa and Venice it crept down the Italian boot toward Florence and Rome. Going west, it struck Marseilles, Tunis, and Barcelona. By June, the epidemic was storming Paris, causing the French royal family to flee to Rouen,¹⁰ where it soon followed. That summer, it overran Germany, Poland, and Hungary and crossed the channel to southern England.

- 110 Winter did not slow its progress. The weather was unusually mild and wet, perhaps warm enough for fleas living on house rats to remain active. Huddled indoors, people were also exposed to air contaminated both by those suffering from pneumonic plague and by the dust from rodent droppings. **G**

As the disease moved northward through England, citizens of Lincoln wrote wills at 30 times the normal

G CAUSE AND EFFECT

Reread lines 110–115. Underline the conditions that might have caused the plague to spread in winter.



10. **Rouen** (rōō-än'): a city in France, about 84 miles northwest of Paris.

annual rate. At first, the Scots avoided the plague, but when they assembled troops to invade England, 120 pestilence¹¹ struck, perhaps imported by soldiers from France.

The Black Death landed in Scandinavia on a ship carrying wool from London to Norway. The ship had run aground near Bergen because all the crew had died. From there, plague spread across Norway, into Sweden, and across the Baltic Sea to Russia.

The Journey Ends

In 1350, plague peaked in Scotland and Scandinavia, while in southern Spain, it killed King Alfonso XI of 130 Castile. The following year, it stretched to Greenland, where it helped wipe out the Norwegian colony, and to Yemen, at the tip of the Arabian peninsula. In 1353, it closed in on Moscow, killing both the patriarch of the Russian church and the grand duke of Muscovy.

Finally, the Black Death petered out somewhere in Kiev, having come almost full circle back to Kaffa. During its long **rampage**, between one-third and one-half of the population of Europe, North Africa, and the Middle East died. No natural disaster before 140 or since has caused such devastation of human life over such a large area. It was one of the greatest catastrophes in human history. **PAUSE & REFLECT**

rampage (rām'pāj') *n.* a wild or violent outbreak

PAUSE & REFLECT

Reread lines 135–142. Circle the statistic that tells you how many people died in Europe, North Africa, and the Middle East. Why was the plague such a catastrophe?

11. **pestilence** (pēs'tē-lens): any disease that spreads rapidly and causes many deaths.

A WORLD TURNED UPSIDE DOWN: HOW THE BLACK DEATH AFFECTED EUROPE

Mary Morton Cowan



BACKGROUND The Black Death was so widespread that it affected not just those who became ill. It changed many aspects of European society. In the following magazine article, Mary Morton Cowan describes these changes.

Substantial changes in population often have dramatic effects on society. The bubonic plague, which in just four years killed up to one-third of the people in Europe, almost literally turned Europe's social structure upside down. **H**

Life in the Middle Ages centered around a **hierarchy** called the feudal system. Noble lords lived in castles or manors, which were surrounded by acres of land. The nobles depended on peasants to farm their
 10 land. In turn, peasants received protection, shelter, and a small plot of land to plant their own crops. According to the Christian church, the feudal system was God's plan, and no one questioned the authority of the church.

H SET A PURPOSE FOR READING

Reread lines 1–5. **Paraphrase**, or restate in your own words, the main idea that this article will explore.

hierarchy (hī'ə-rār'kē) *n.* an organization of people according to rank

In the 300 years before the Black Death, the European population tripled. Additional land was cultivated, but food was still scarce. Some peasants left for a better life in the city, where merchants and craftsmen were beginning to thrive. The now-crowded
20 cities, however, could not handle the overflow of unskilled laborers.

After gunpowder was invented, the lords had found it harder to defend their castles. They also experienced some bad harvests, and many had to **cope** with the consequences of a war between France and England. Yet, they remained in control.

cope (kōp) v. to struggle with and act to overcome



Then, without warning, the Black Death swept through Western Europe, killing 25 million people. Some families were wiped out. Large estates were left
 30 without heirs. Survivors moved in and claimed any property they could find. Cities and towns lost people by the thousands. Monasteries,¹ which previously had as many as 150 monks, now had only seven or eight. In all, thousands of villages were abandoned. ❶

Agriculture was also in **disarray**. The tools and land were there, but suddenly the workers were missing. Food prices dropped, and there was even a surplus of food where once many had barely had enough to stay alive.

40 Because workers were scarce, peasants who survived the plague now had bargaining power for the first time. Resentment among the working class led to violence and revolt in the centuries that followed, as Europe teetered between the old feudal system and a new economic system.

The shortage of skilled craftsmen caused an industrial crisis. Unlike agricultural workers, craftsmen require long apprenticeships, and now there were few replacements when any skilled **artisan** died. Reduced
 50 production forced prices of saddles, farm tools, and other goods to soar. ❶

This depopulation crisis, however, encouraged technological developments. The most notable labor-saving invention was the printing press, developed

❶ CAUSE AND EFFECT

Place a star next to this important paragraph (lines 22–34). Underline the effects of the Black Death that the author describes.

disarray (dĭs'ə-rā') *n.* a state of disorder; confusion

artisan (är'tĭ-zən) *n.* a person who is skilled in a trade

❶ CAUSE AND EFFECT

Circle the clue words that help you recognize the cause-and-effect pattern of organization.

1. **monasteries:** buildings where religious men called monks live, work, and pray together.

K CAUSE AND EFFECT

The Bubonic Plague caused the population of Western Europe to decline steeply. What was the population of western Europe in the early 1300s? Circle the part of the diagram that tells you.

recurrence (rĭ-kŭr'əns) *n.* the act of happening again; return

L SET A PURPOSE FOR READING

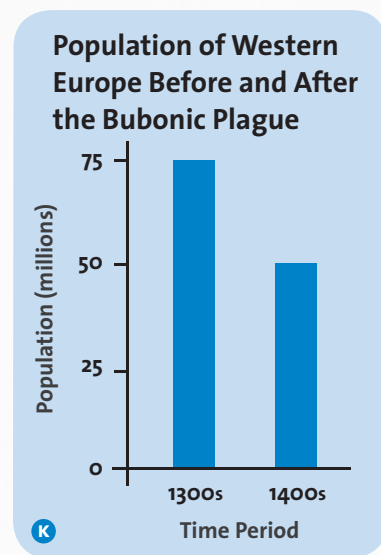
What topics were covered in this article? Check them off in the chart.

Agricultural changes
How diseases spread
Loss of life
Trade routes
Worker shortages

around 1450. One such press replaced hand-copying by hundreds of scribes.²

60 The Black Death affected the entire medieval social structure. When the pestilence returned a few years later, people were even more terrified. Its unpredictable **recurrence**

in the following decades was enough to keep Europeans in constant fear. A mood of gloom swept across Europe, and many began to question the authority of the church. In fact, they began to have doubts about their entire
70 world view. Yet, it was this questioning that led to far-reaching reforms in religion, art, medicine, and science. Without a doubt, the Black Death forever changed Europe's economic and social structure. **L**



2. **scribes:** people whose job was to copy manuscripts.

Text Analysis: Cause-and-Effect Pattern of Organization

The writers of both articles use cause-and-effect organization to explain key points. To explore the relationship between causes and effects, complete the chart below.

“Like Black Smoke: The Black Death’s Journey”	
Cause: <i>An infected person coughs.</i>	→ Effect:
Cause:	→ Effect: <i>Soldiers were dead by morning.</i>
Cause: <i>Trade ships with infected sailors and goods visited many ports.</i>	→ Effect:

“A World Turned Upside Down: How the Black Death Affected Europe”	
Cause: <i>The Black Death swept through Europe.</i>	→ Effect:
Cause:	→ Effect: <i>Food prices dropped and there was a surplus of food.</i>
Cause: <i>There was a shortage of skilled craftsmen.</i>	→ Effect:

Reading Strategy: Set a Purpose for Reading

Your purpose for reading was to compare articles that use cause-and-effect organization. Review the charts you filled out as you read in which you noted which topics were covered in each selection. Which article provided the most effective discussion of the spread of the Black Death? Cite examples from your chart and the selections to support your opinion.

How do we fight DISEASE?

Have we improved the way we fight disease since the days of the Black Death? Support your answer with evidence from the text.

Vocabulary Practice

In each item, circle the letter of the word that differs most in meaning from the other words. Refer to a dictionary if you need help.

1. (a) record, (b) listing, (c) chronicle, (d) clock
2. (a) artisan, (b) police officer, (c) firefighter, (d) sanitation worker
3. (a) turmoil, (b) commotion, (c) caretaker, (d) disarray
4. (a) hierarchy, (b) anarchy, (c) chaos, (d) disorganization
5. (a) class, (b) frenzy, (c) rampage, (d) uproar
6. (a) bacterium, (b) germ, (c) pandemonium, (d) microorganism
7. (a) reappearance, (b) renounce, (c) repetition, (d) recurrence
8. (a) instruct, (b) teach, (c) cope, (d) educate

Academic Vocabulary in Writing

area

domain

hypothesis

objective

resolve

Pretend that you are a survivor of the Black Death and write about what has changed in your life. How do you hope to **resolve** the problems you face? Use at least two Academic Vocabulary words in your response. Definitions of these words are on page 359.

Assessment Practice

DIRECTIONS Use “Like Black Smoke” and “A World Turned Upside Down” to answer questions 1–6.

- Where do most historians think the Black Death started?
 - Asia
 - Africa
 - Europe
 - South America
- How did boats spread the Black Death?
 - Those who had died were sent off on boats.
 - Boats transported the plague from city to city.
 - Monks traveling by boat carried fleas in their robes.
 - Infected doctors traveled by boats to visit the sick in many countries.
- Which of the following is not a cause-and-effect signal word or phrase?
 - later
 - because
 - as a result
 - for this reason
- What likely caused the Scots to catch the plague?
 - Merchants visited from Italy.
 - Soldiers were imported from France.
 - Animals entered Scotland in search of food.
 - Commercial caravans carried the plague to Scotland.
- Why did food prices drop after the Black Death swept through western Europe?
 - Farmers wanted to help the survivors.
 - Food was of a lower quality.
 - With fewer people there was too much food and lower prices made people buy more.
 - Landowners demanded lower prices to help the peasants.
- What was one positive effect of the plague?
 - People became more committed to their faith.
 - Wealthy estates were passed on to heirs.
 - The feudal system was strengthened.
 - New technologies were developed.