

Test 10

**Questions 1-10**

In the 1500's when the Spanish moved into what later was to become the southwestern United States, they encountered the ancestors of the modern-day Pueblo, Hopi, and Zuni peoples. These ancestors, known variously as the Basket Makers, the Anasazi, or the Ancient Ones, had lived in the area for at least 2,000 years. They were

(5) an advanced agricultural people who used irrigation to help grow their crops.

The Anasazi lived in houses constructed of adobe and wood. Anasazi houses were originally built in pits and were entered from the roof. But around the year 700 A.D., the Anasazi began to build their homes above ground and join them together into rambling multistoried complexes, which the Spanish called pueblos or villages.

(10) Separate subterranean rooms in these pueblos — known as kivas or chapels — were set aside for religious ceremonials. Each kiva had a fire pit and a hole that was believed to lead to the underworld. The largest pueblos had five stories and more than 800 rooms.

The Anasazi family was matrilinear, that is, descent was traced through the female.

The sacred objects of the family were under the control of the oldest female, but the

(15) actual ceremonies were conducted by her brother or son. Women owned the rooms in

the pueblo and the crops, once they were harvested. While still growing, crops belonged to the men who, in contrast to most other Native American groups, planted them. The women made baskets and pottery; the men wove textiles and crafted turquoise jewelry.

(20) Each village had two chiefs. The village chief dealt with land disputes and religious affairs. The war chief led the men in fighting during occasional conflicts that broke out with neighboring villages and directed the men in community building projects. The cohesive political and social organization of the Anasazi made it almost impossible for other groups to conquer them.

1. What does the passage mainly discuss?

- (a) The culture of the Anasazi people
  - (b) European settlement in what became the southeastern United States
  - (c) The construction of Anasazi houses
  - (d) Political structures of Native American peoples
2. The Anasazi people were considered "agriculturally advanced" because of the way they ---
- (a) stored their crops
  - (b) fertilized their fields
  - (c) watered their crops
  - (d) planted their fields
3. The word "pits" in line 7 is closest in meaning to
- (a) stages
  - (b) scars
  - (c) seeds
  - (d) holes
4. The word "stories" in line 12 is closest in meaning to
- (a) articles
  - (b) tales
  - (c) levels
  - (d) rumors
5. Who would have been most likely to control the sacred objects of an Anasazi family?
- (a) A twenty-year-old man
  - (b) A twenty-year-old woman
  - (c) A forty-year-old man
  - (d) A forty-year-old woman
6. The word "they" in line 16 refers to
- (a) women
  - (b) crops
  - (c) rooms
  - (d) pueblos
7. The word "disputes" in line 20 is closest in meaning to
- (a) discussions
  - (b) arguments
  - (c) developments
  - (d) purchases
8. Which of the following activities was NOT done by Anasazi men?

(a) Making baskets (b) Planting crops(c) building homes (d) Crafting jewelry

9. According to the passage, what made it almost impossible for other groups to conquer the Anasazi?

- (a) The political and social organization of th Anasazi
- (b) The military tactics employed by the Anasazi
- (c) The Anasazi's agricultural technology
- (d) The natural barriers surrounding Anasazi villages

10. The passage supports which of the following generalizations?

- (a) The presence of the Spanish threatened Anasazi society.
- (b) The Anasazi benefited from trading relations with the Spanish.
- (c) Anasazi society exhibited a well-defined division of labor.
- (d) Conflicts between neighboring Anasazi villages were easily resolved.

### Questions 11-20

Barbed wire, first patented in the United States in 1867, played an important part in the development of American farming, as it enabled the settlers to make effective fencing to enclose their land and keep cattle away from their crops. This had a considerable effect on cattle ranching, since the herds no longer had unrestricted use of

(5) the plains for grazing, and the fencing led to conflict between the farmers and the cattle ranchers.

Before barbed wire came into general use, fencing was often made from serrated wire, which was unsatisfactory because it broke easily when under strain, and could snap in cold weather due to contraction.

The first practical machine for producing (10) barbed wire was invented in 1874 by an Illinois farmer, and between then and the end of the century

about 400 types of barbed wire were devised, of which only about a dozen were ever put to practical use.

Modern barbed wire is made from mild steel, high-tensile steel, or aluminum. Mild steel and aluminum barbed wire have two strands twisted together to form a cable

(15) which is stronger than single-strand wire and less affected by temperature changes. Single-strand wire, round or oval, is made from high-tensile steel with the barbs crimped or welded on. The steel wires used are galvanized — coated with zinc to make them rustproof. The two wires that make up the line wire or cable are fed separately into a machine at one end. They leave it at the other end twisted together and barbed.

(20) The wire to make the barbs is fed into the machine from the sides and cut to length by knives that cut diagonally through the wire to produce a sharp point. This process continues automatically, and the finished barbed wire is wound onto reels, usually made of wire, in lengths of 400 meters or in weights of up to 50 kilograms.

A variation of barbed wire is also used for military purposes. It is formed into long coils or entanglements called concertina wire.

11. What is the main topic of the passage?

- (a) Cattle ranching in the United States      (b) A type of fencing  
(c) Industrial uses of wire      (d) A controversy over land use

12. The word "unrestricted" in line 4 is closest in meaning to

- (a) unsatisfactory    (b) difficult    (c) considerable      (d) unlimited

13. The word "snap" in line 9 could best be replaced by which of the following?

- (a) freeze    (b) click    (c) loosen      (d) break

14. What is the benefit of using two-stranded barbed wire?

- (a) Improved rust-resistance (b) Increased strength  
(c) More rapid attachment of barbs (d) Easier installation

15. According to the author, the steel wires used to make barbed wire are specially processed to

- (a) protect them against rust (b) make them moreflexible  
(c) prevent contraction in cold weather (d) strengthenthem

16. The word "fed" in line 20 is closest in meaning to

- (a) put (b) eaten (c) bitten (d) nourished

17. The knives referred to in line 21 are used to

- (a) separate double-stranded wire  
(b) prevent the reel from advancing too rapidly  
(c) twist the wire  
(d) cut the wire that becomes barbs

18. What is the author's purpose in the third paragraph?

- (a) To explain the importance of the wire (b) To outline the difficulty of making the wire  
(c) To describe how the wire is made (d) To suggest several different uses of the wire

19. According to the passage, concertina wire is used for

- (a) livestock management (b) international communications  
(c) prison enclosures (d) military purposes

20. Which of the following most closely resembles the fencing described in the passage?

### Questions 21-29

Under certain circumstances, the human body must cope with gases at greater-than normal atmospheric pressure. For example, gas pressures increase rapidly during a dive made with scuba gear because the breathing equipment allows divers to stay underwater longer and dive deeper. The pressure exerted on the human body increases

(5) by 1 atmosphere for every 10 meters of depth in seawater, so that at 30 meters in seawater a diver is exposed to a pressure of about 4 atmospheres. The pressure of the gases being breathed must equal the external pressure applied to the body ; otherwise breathing is very difficult. Therefore all of the gases in the air breathed by a scuba diver at 40 meters are present at five times their usual pressure. Nitrogen, which (10) composes 80 percent of the air we breathe, usually causes a balmy feeling of well-being at this pressure. At a depth of 5 atmospheres, nitrogen causes symptoms resembling alcohol intoxication, known as nitrogen narcosis.

Nitrogen narcosis apparently results from a direct effect on the brain of the large amounts of nitrogen dissolved in the blood. Deep dives are less dangerous if helium is substituted for (15) nitrogen, because under these pressures helium does not exert a similar narcotic effect.

As a scuba diver descends, the pressure of nitrogen in the lungs increases. Nitrogen then diffuses from the lungs to the blood, and from the blood to body tissues. The reverse occurs when the diver surfaces ; the nitrogen pressure in the lungs falls and the nitrogen diffuses from the tissues into the blood, and from the blood into the lungs. If

(20) the return to the surface is too rapid, nitrogen in the tissues and blood cannot diffuse out rapidly enough and nitrogen bubbles are formed. They can cause severe pains, particularly around the joints.

Another complication may result if the breath is held during ascent. During ascent from a depth of 10 meters, the volume of air in the lungs will double because the air

(25) pressure at the surface is only half of what it was at 10 meters. This change in volume may cause the lungs to distend and even rupture. This condition is called air embolism.

To avoid this event, a diver must ascend slowly, never at a rate exceeding the rise of the exhaled air bubbles, and must exhale during ascent.

21. What does the passage mainly discuss?

- (a) The equipment divers use
- (b) The effects of pressure on gases in the human body
- (c) How to prepare for a deep dive
- (d) The symptoms of nitrogen bubbles in the bloodstream

22. The words "exposed to" in line 6 are closest in meaning to

- (a) leaving behind
- (b) prepared for
- (c) propelled by
- (d) subjected to

23. The word "exert" in line 15 is closest in meaning to

- (a) cause
- (b) permit
- (c) need
- (d) change

24. The word "diffuses" in line 19 is closest in meaning to

- (a) yields
- (b) starts
- (c) surfaces
- (d) travels

25. What happens to nitrogen in body tissues if a diver ascends too quickly?

- (a) it forms bubbles.
- (b) It goes directly to the brain
- (c) It is reabsorbed by the lungs
- (d) It has a narcotic effect

26. The word "they" in line 21 refers to

- (a) joints
- (b) pains
- (c) bubbles
- (d) tissues

27. The word "rupture" in line 26 is closest in meaning to

- (a) hurt (b) shrink (c) burst (d) stop

28. It can be inferred from the passage that which of the following presents the greatest danger to a diver?

- (a) pressurized helium (b) Nitrogen diffusion  
(c) Nitrogen bubbles (d) An air embolism

29. What should a diver do when ascending?

- (a) Rise slowly (b) Breathe faster (c) Relax completely (d) Breathe helium

### Questions 30-39

Each advance in microscopic technique has provided scientists with new perspectives on the function of living organisms and the nature of matter itself. The invention of the visible-light microscope late in the sixteenth century introduced a previously unknown realm of single-celled plants and animals. In the twentieth century, electron microscopes (5) have provided direct views of viruses and minuscule surface structures. Now another type of microscope, one that utilizes x-rays rather than light or electrons, offers a different way of examining tiny details; it should extend human perception still farther into the natural world.

The dream of building an x-ray microscope dates to 1895 ; its development, however,

(10) was virtually halted in the 1940's because the development of the electron microscope was progressing rapidly. During the 1940's, electron microscopes routinely achieved resolution better than that possible with a visible-light microscope, while the performance of x-ray microscopes resisted improvement. In recent years, however, interest in x-ray microscopes has revived, largely because of advances such as the

(15) development of new sources of x-ray illumination. As a result, the brightness available today is millions of times that of x-ray tubes, which, for most of the century, were the only available sources of soft x-rays. The new x-ray microscopes

considerably improve on the resolution provided by optical microscopes. They can also be used to map the distribution of certain chemical elements.

(20) Some can form pictures in extremely short times ; others hold the promise of special capabilities such as three-dimensional imaging. Unlike conventional electron microscopy, x-ray microscopy enables specimens to be kept in air and in water, which means that biological samples can be studied under conditions similar to their natural state. The illumination used, so-called soft x-rays in the wavelength range of twenty to forty

(25) angstroms(an angstrom is one ten-billionth of a meter), is also sufficiently penetrating

to image intact biological cells in many cases. Because of the wavelength of the x-rays used, soft x-ray microscopes will never match the highest resolution possible with electron microscopes. Rather, their special properties will make possible investigations that will complement those performed with light- and electronbased instruments.

30. What does the passage mainly discuss?

- (a) The detail seen through a microscope (b) Sources of illumination for microscopes  
(c) A new kind of microscope (d) Outdated microscopic techniques

31. According to the passage, the invention of the visible-light microscope allowed scientists to

- (a) see viruses directly (b) develop the electron microscope late on  
(c) understand more about the distribution of the chemical elements  
(d) discover single-celled plants and animals they had never seen before

32. The word "minuscule" in line 5 s closest in meaning to

- (a) circular (b) dangerous (c) complex (d) tiny

33. The word "it" in line 7 refers to

- (a) a type of microscope (b) human perception (c) the natural world  
(d) light

34. Why does the author mention the visible-light microscope in the first paragraph?

- (a) To begin a discussion of sixteenth-century discoveries  
(b) To put the x-ray microscope in a historical perspective  
(c) To show how limited its uses are  
(d) To explain how it functioned

35. Why did it take so long to develop the x-ray microscope?

- (a) Funds for research were insufficient.  
(b) The source of illumination was not bright enough until recently.  
(c) Materials used to manufacture x-ray tubes were difficult to obtain  
(d) X-ray microscopes were too complicated to operate.

36. The word "enables" in line 22 is closest in meaning to

- (a) constitutes (b) specifies (c) expands (d) allows

37. The word "Rather" on line 28 is closest in meaning to

- (a) Significantly (b) Preferably (c) Somewhat (d) Instead

38. The word "those" in line 29 refers to

- (a) properties (b) investigations (c) microscopes (d) x-rays

39. Based on the information in the passage, what can be inferred about x-ray microscopes in the future?

- (a) They will probably replace electron microscopes altogether.  
(b) They will eventually be much cheaper to produce than they are now.  
(c) They will provide information not available from other kinds of microscopes.  
(d) They will eventually change the illumination range that they now use.

### Questions 40-50

Perhaps the most striking quality of satiric literature is its freshness, its originality of perspective. Satire rarely offers original ideas. Instead, it presents the familiar in a new form. Satirists do not offer the world new philosophies. What they do is look at familiar conditions from a perspective that makes these conditions seem foolish,

(5) harmful, or affected. Satire jars us out of complacency into a pleasantly shocked realization that many of the values we unquestioningly accept are false. *Don Quixote* makes chivalry seem absurd ; *Brave New World* ridicules the pretensions of science ; *A Modest Proposal* dramatizes starvation by advocating cannibalism. None of these ideas is original. Chivalry was suspect before Cervantes, humanists objected to the claims of (10) pure science before Aldous Huxley, and people were aware of famine before Swift. It was not the originality of the idea that made these satires popular. It was the manner of expression, the satiric method, that made them interesting and entertaining. Satires are read because they are aesthetically satisfying works of art, not because they are morally wholesome or ethically instructive. They are stimulating and refreshing because with

(15) commonsense briskness they brush away illusions and secondhand opinions. With

spontaneous irreverence, satire rearranges perspectives, scrambles familiar objects into incongruous juxtaposition, and speaks in a personal idiom instead of abstract platitude.

Satire exists because there is need for it. It has lived because readers appreciate a refreshing stimulus, an irreverent reminder that they live in a world of platitudinous

(20) thinking, cheap moralizing, and foolish philosophy. Satire serves to prod people into an awareness of truth, though rarely to any action on behalf of truth. Satire tends to remind people that much of what they see, hear, and read in popular media is sanctimonious, sentimental, and only partially true. Life resembles in only a slight degree the popular image of it. Soldiers rarely hold the ideals that movies attribute to

(25) them, nor do ordinary citizens devote their lives to unselfish service of humanity. Intelligent people know these things but tend to forget them when they do not hear them expressed.

40. What does the passage mainly discuss?

- (a) Difficulties of writing satiric literature
- (b) Popular topics of satire
- (c) New philosophies emerging from satiric literature
- (d) Reasons for the popularity of satire

41. The word "realization" in line 6 is closest in meaning to

- (a) certainty
- (b) awareness
- (c) surprise
- (d) confusion

42. Why does the author mention *Don Quixote*, *Brave New World*, and *A Modest Proposal* in lines 6-8?

- (a) They are famous examples of satiric literature.
- (b) They present commonsense solutions to problems.
- (c) They are appropriate for readers of all ages.
- (d) They are books with similar stories.

43. The word "aesthetically" in line 13 is closest in meaning to

- (a) artistically
- (b) exceptionally
- (c) realistically
- (d) dependably

44. Which of the following can be found in satiric literature?

- (a) Newly emerging philosophies
- (b) Odd combinations of objects and ideas
- (c) Abstract discussion of morals and ethics

(d) Wholesome characters who are unselfish

45. According to the passage, there is a need for satire because people need to b

- (a) informed about new scientific developments
- (b) exposed to original philosophies when they are formulated
- (c) reminded that popular ideas are often inaccurate
- (d) told how they can be of service to their communities

46. The word "refreshing" in line 19 is closest in meaning to

- (a) popular
- (b) ridiculous
- (c) meaningful
- (d) unusual

47. The word "they" in line 22 refers to

- (a) people
- (b) media
- (c) ideals
- (d) movies

48. The word "devote" in line 25 is closest in meaning to

- (a) distinguish
- (b) feel affection
- (c) prefer
- (d) dedicate

49. As a result of reading satiric literature, readers will be most likely to

- (a) teach themselves to write fiction
- (b) accept conventional points of view
- (c) become better informed about current affairs
- (d) reexamine their opinions and values

50. The various purposes of satire include all of the following EXCEPT

- (a) introducing readers to unfamiliar situations
- (b) brushing away illusions
- (c) reminding readers of the truth

(d) exposing false values

