Test 1

Question 1-8

With Robert Laurent and William Zorach, direct carving enters into the story of modern sculpture in the United States. Direct carving — in which the sculptors themselves carve stone or wood with mallet and chisel — must be recognized as something more than just a technique. Implicit in it is an aesthetic principle as well: *(5)* That the medium has certain qualities of beauty and expressiveness with which sculptors must bring their own aesthetic sensibilities into harmony. For example, sometimes the shape or veining in a piece of stone or wood suggests, perhaps even dictates, not only the ultimate form, but even the subject matter. The technique of direct carving was a break with the nineteenth century tradition in
(10) Which the making of a clay model was considered the creative act and the work was then turned over to studio assistants to be cast in plaster or bronze or carved in marble. Neoclassical sculptors seldom held a mallet or chisel in their own hands, readily conceding that the assistants they employed were far better than they were at carving the finished marble.
(15) With the turn-of-the-century Crafts movement and the discovery of nontraditional sources of inspiration, such as wooden African figures and masks, there arose a new urge for hands-on, personal execution of art and an interaction with the medium. Even as early as the 1880's and 1890's, nonconformist European artists were attempting direct carving. By the second decade of the twentieth century, Americans — Laurent *(20)* and Zorach most notably — had adopted it as their primary means of working. Born in France, Robert Laurent(1890-1970)was a prodigy who received his education in the United States. In 1905 he was sent to Paris as an apprentice to an art dealer, and in the years that followed he witnessed the birth of Cubism, discovered primitive art, and learned the techniques of woodcarving from a frame maker.
(25) Back in New York City by 1910, Laurent began carving pieces such as *The Priestess*, which reveals his fascination with African, pre-Columbian, and South Pacific art. Taking a walnut plank, the sculptor carved the expressive, stylized design. It is one of the earliest examples of direct carving in American sculpture. The plank's form dictated the rigidly frontal view and the low relief. Even its irregular shape must
(30) have appealed to Laurent as a break with a long-standing tradition that required a sculptor to work within a perfect rectangle or square.

1. The word “medium” in line 5 could be used to refer to
(A) stone or wood (B) mallet and chisel

(C) technique (D) principle

2. What is one of the fundamental principles of direct carving? (A) A sculptor must work with talented assistants.

(B) The subject of a sculpture should be derived from classical stories.

(C) The material is an important element in a sculpture.

(D) Designing a sculpture is a more creative activity than carving it.

3. The word "dictates" in line 8 is closest in meaning to

(A) reads aloud

(B) determines

(C) includes

(D) records

4. How does direct carving differ from the nineteenth-century tradition of sculpture?

(A) Sculptors are personally involved in the carving of a piece.

(B) Sculptors find their inspiration in neoclassical sources.

(C) Sculptors have replaced the mallet and chisel with other tools.

(D) Sculptors receive more formal training.

5.The word "witnessed" in line 23 is closest in meaning to

(A) influenced (B) studied

(C) validated (D) observed

6. Where did Robert Laurent learn to carve?

(A) New York (B) Africa

(C) The South Pacific (D) Paris

7. The phrase "a break with "in line 30 is closest in meaning to

(A) a destruction of (B) a departure from

(C) a collapse of (D) a solution to

8. The piece titled *The Priestess* has all of the following characteristics EXCEPT

(A) The design is stylized.

(B) It is made of marble.

(C) The carving is not deep.

(D) It depicts the front of a person.

Question 9 - 19

Birds that feed in flocks commonly retire together into roosts. The reasons for roosting communally are not always obvious, but there are some likely benefits. In winter especially, it is important for birds to keep warm at night and conserve precious food reserves. One way to do this is to find a sheltered roost. Solitary roosters shelter in

(5) dense vegetation or enter a cavity - horned larks dig holes in the ground and ptarmigan burrow into snow banks - but the effect of sheltering is magnified by several birds huddling together in the roosts, as wrens, swifts, brown creepers, bluebirds, and anis do. Body contact reduces the surface area exposed to the cold air, so the birds keep each other warm. Two kinglets huddling together were found to

(10) reduce their heat losses by a quarter and three together saved a third of their heat.

The second possible benefit of communal roosts is that they act as "information centers." During the day, parties of birds will have spread out to forage over a very large area. When they return in the evening some will have fed well, but others may have found little to eat. Some investigators have observed that when the birds set out

(15) again next morning, those birds that did not feed well on the previous day appear to follow those that did. The behavior of common and lesser kestrels may illustrate different feeding behaviors of similar birds with different roosting habits. The common kestrel hunts vertebrate animals in a small, familiar hunting ground, whereas the very similar lesser kestrel feeds on insects over a large area. The common kestrel roosts and

(20) hunts alone, but the lesser kestrel roosts and hunts in flocks, possibly so one bird can learn from others where to find insect swarms. Finally, there is safety in numbers at communal roosts since there will always be a few birds awake at any given moment to give the alarm. But this increased protection is partially counteracted by the fact that mass roosts attract predators and are especially

(25) vulnerable if they are on the ground. Even those in trees can be attacked by birds of prey. The birds on the edge are at greatest risk since predators find it easier to catch small birds perching at the margins of the roost.

9. What does the passage mainly discuss?

(A) How birds find and store food (B) How birds maintain body heat in the winter

(C) Why birds need to establish territory (D) Why some species of birds nest together

10. The word "conserve "in line 3 is closest in meaning to
(A) retain (B) watch
(C) locate (D) share

11. Ptarmigan keep warm in the winter by
(A) huddling together on the ground with other birds
(B) building nests in trees
(C) burrowing into dense patches of vegetation
(D) digging tunnels into the snow

12. The word "magnified"in line 6 is closest in meaning to
(A) caused (B) modified
(C) intensified (D) combined

13. The author mentions kinglets in line 9 as an example of birds that
(A) protect themselves by nesting in holes
(B) nest with other species of birds
(C) nest together for warmth
(D) usually feed and nest in pairs

14. The word "forage"in line 12 is closest in meaning to
(A) fly (B) assemble
(C) feed (D) rest

15. Which of the following statements about lesser and common kestrels is true? (A) The lesser kestrel and the common kestrel have similar diets.
(B) The lesser kestrel feeds sociably but the common kestrel does not.
(C) The common kestrel nests in larger flocks than does the lesser kestrel.
(D) The common kestrel nests in trees; the lesser kestrel nests on the ground.

16. The word "counteracted"in line 24 is closest in meaning to
(A) suggested (B) negated
(C) measured (D) shielded

17. Which of the following is NOT mentioned in the passage as an advantage derived by birds that huddle together while sleeping?
(A) Some members of the flock warn others of impending dangers.
(B) Staying together provides a greater amount of heat for the whole flock
(C) Some birds in the flock function as information centers for others who are looking for food.
(D) Several members of the flock care for the young.

18. Which of the following is a disadvantage of communal roosts that is mentioned in the passage?
(A) Diseases easily spread among the birds.
(B) Groups are more attractive to predators than individual birds.
(C) Food supplies are quickly depleted.
(D) Some birds in the group will attack the others.

19. The word "they"in line 25 refers to
(A) a few birds (B) mass roosts
(C) predators (D) trees

Question 20 - 30

Before the mid-nineteenth century, people in the United States ate most foods only in season. Drying, smoking, and salting could preserve meat for a short time, but the availability of fresh meat, like that of fresh milk, was very limited; there was no way to prevent spoilage. But in 1810 a French inventor named Nicolas Appert developed the*(5)* cooking-and-sealing process of canning. And in the 1850's an American named Gail Borden developed a means of condensing and preserving milk. Canned goods and condensed milk became more common during the 1860's, but supplies remained low because cans had to be made by hand. By 1880, however, inventors had fashioned stamping and soldering machines that mass-produc cansfrom tinplate.

Suddenly all *(10)* kinds of food could be preserved and bought at all times of the year. Other trends and inventions had also helped make it possible for Americans to vary their daily diets. Growing urban populations created demand that encouraged fruit and vegetable farmers to raise more produce. Railroad refrigerator cars enabled growers and meat packers to ship perishables great distances and to preserve them for longer *(15)* periods. Thus, by the 1890's, northern city dwellers could enjoy

southern and western strawberries, grapes, and tomatoes, previously available for a month at most, for up to six months of the year. In addition, increased use of iceboxes enabled families to store perishables. An easy means of producing ice commercially had been invented in the 1870's, and by 1900 the nation had more than two thousand commercial ice plants,
(20) most of which made home deliveries. The icebox became a fixture in most homes and remained so until the mechanized refrigerator replaced it in the 1920's and 1930's.
Almost everyone now had a more diversified diet. Some people continued to eat mainly foods that were heavy in starches or carbohydrates, and not everyone could afford meat. Nevertheless, many families could take advantage of previously
(25) unavailable fruits, vegetables, and dairy products to achieve more varied fare.

20. What does the passage mainly discuss?
(A) Causes of food spoilage
(B) Commercial production of ice
(C) Inventions that led to changes in the American diet
(D) Population movements in the nineteenth century

21. The phrase "in season" in line 2 refers to
(A) a kind of weather (B) a particular time of year
(C) an official schedule (D) a method of flavoring food

22. The word "prevent" in line 4 is closest in meaning to
(A) estimate (B) avoid (C) correct (D) confine

23. During the 1860's, canned food products were
(A) unavailable in rural areas (B) shipped in refrigerator cars
(C) available in limited quantities (D) a staple part of the American diet

24. It can be inferred that railroad refrigerator cars came into use
(A) before 1860 (B) before 1890 (C) after 1900 (D) after 1920

25. The word "them " in line 14 refers to
(A) refrigerator cars (B) perishables (C) growers (D) distances

26. The word “fixture” in line 20 is closest in meaning to
(A) luxury item (B) substance (C) commonplace object (D) mechanical device

27. The author implies that in the 1920's and 1930's home deliveries of ice
(A) decreased in number (B) were on an irregular schedule
(C) increased in cost (D) occurred only in the summer

28. The word “Nevertheless” in line 24 is closest in meaning to
(A) therefore (B) because
(C) occasionally (D) however

29. Which of the following types of food preservation was NOT mentioned in the passage?
(A) Drying (B) Canning
(C) Cold storage (D) Chemical additives

30. Which of the following statements is supported by the passage?
(A) Tin cans and iceboxes helped to make many foods more widely available.
(B) Commercial ice factories were developed by railroad owners.
(C) Most farmers in the United States raised only fruits and vegetables.
(D) People who lived in cities demanded home delivery of foods.

Question 31 - 38

The ability of falling cats to right themselves in midair and land on their feet has been a source of wonder for ages. Biologists long regarded it as an example of adaptation by natural selection, but for physicists it bordered on the miraculous. Newton's laws of motion assume that the total amount of spin of a body cannot change *(5)* unless an external torque speeds it up or slows it down. If a cat has no spin when it is released and experiences no external torque, it ought not to be able to twist around as it falls. In the speed of its execution, the righting of a tumbling cat resembles a magician's trick. The gyrations of the cat in midair are too fast for the human eye to follow, so the *(10)* process is obscured. Either the eye must be speeded up, or the cat's fall slowed down for the phenomenon to be observed. A century ago the former was accomplished by means of high-speed photography using equipment now available in any pharmacy.

But in the nineteenth century the capture on film of a falling cat constituted a scientific experiment.
(15) The experiment was described in a paper presented to the Paris Academy in 1894. Two sequences of twenty photographs each, one from the side and one from behind, show a white cat in the act of righting itself. Grainy and quaint though they are, the photos show that the cat was dropped upside down, with no initial spin, and still landed
on its feet. Careful analysis of the photos reveals the secret ; As the cat rotates the front *(20)* of its body clockwise, the rear and tail twist counterclockwise, so that the total spin remains zero, in perfect accord with Newton's laws. Halfway down, the cat pulls in its legs before reversing its twist and then extends them again, with the desired end result. The explanation was that while no body can acquire spin without torque, a flexible one can readily change its orientation, or phase. Cats know this instinctively, but scientists
(25) could not be sure how it happened until they increased the speed of their perceptions a thousandfold.

31. What does the passage mainly discuss?
(A) The explanation of an interesting phenomenon (B) Miracles in modern science
(C) Procedures in scientific investigation (D) The differences between biology and physics

32. The word "process"in line 10 refers to
(A) the righting of a tumbling cat (B) the cat's fall slowed down
(C) high-speed photography (D) a scientific experiment

33. Why are the photographs mentioned in line 16 referred to as an "experiment"?
(A) The photographs were not very clear.
(B) The purpose of the photographs was to explain the process.
(C) The photographer used inferior equipment.
(D) The photographer thought the cat might be injured.

34. Which of the following can be inferred about
high-speed photography in the late 1800's ?
(A) It was a relatively new technology.
(B) The necessary equipment was easy to obtain.
(C) The resulting photographs are difficult to interpret.

(D) It was not fast enough to provide new information.

35. The word “rotates” in line 19 is closest in meaning to
(A) drops (B) turns (C) controls (D) touches

36. According to the passage, a cat is able to right itself in midair because it is
(A) frightened (B) small (C) intelligent (D) flexible

37. The word “readily”in line 24 is closest in meaning to
(A) only (B) easily (C) slowly (D) certainly

38. How did scientists increase “the speed of their perceptions a thousandfold”(lines 25-26)?
(A) By analyzing photographs (B) By observing a white cat in a dark room (C) By dropping a cat from a greater height (D) By studying Newton's laws of motion

Question 39 - 50

The changing profile of a city in the United States is apparent in the shifting definitions used by the United States Bureau of the Census. In 1870 the census officially distinguished the nation's “urban” from its “rural” population for the first time. “Urban population” was defined as persons living in towns of 8,000 inhabitants *(5)* or more. But after 1900 it meant persons living in incorporated places having 2,500 or more inhabitants. Then, in 1950 the Census Bureau radically changed its definition of “urban” to take account of the new vagueness of city boundaries. In addition to persons living in incorporated units of 2,500 or more, the census now included those who lived in *(10)* *un*incorporated units of that size, and also all persons living in the densely settled urban fringe, including both incorporated and unincorporated areas located around cities of 50,000 inhabitants or more. Each such unit, conceived as an integrated economic and social unit with a large population nucleus, was named a Standard Metropolitan Statistical Area (SMSA).
(15) Each SMSA would contain at least (a) one central city with 50,000 inhabitants or more or (b) two cities having shared boundaries and constituting, for general economic and social purposes, a single community with a combined population of at least 50,000, the smaller of which must have a population of at least 15,000. Such an area included the county in which the central city is located, and adjacent counties that are found to

(20) be metropolitan in character and economically and socially integrated with the county of the central city. By 1970, about two-thirds of the population of the United States was living in these urbanized areas, and of that figure more than half were living outside the central cities. While the Census Bureau and the United States government used the term SMSA *(25)* (by 1969 there were 233 of them), social scientists were also using new terms todescribe the elusive, vaguely defined areas reaching out from what used to be simple "towns" and "cities". A host of terms came into use: "metropolitan regions," "polynucleated population groups," "conurbations," "metropolitan clusters,""megalopolises," and so on.

39. What does the passage mainly discuss?
(A) How cities in the United States began and developed
(B) Solutions to overcrowding in cities
(C) The changing definition of an urban area
(D) How the United States Census Bureau conducts a census

40. According to the passage, the population of the United States was first classified as rural or urban in
(A) 1870 (B) 1900 (C) 1950 (D) 1970

41. The word "distinguished"in line 3 is closest in meaning to
(A) differentiated (B) removed (C) honored (D) protected

42. Prior to 1900, how many inhabitants would a town have to have before being defined as urban?
(A) 2,500 (B) 8,000 (C) 15,000 (D) 50,000

43. According to the passage, why did the Census Bureau revise the definition of urban in 1950?
(A) City borders had become less distinct.
(B) Cities had undergone radical social change.
(C) Elected officials could not agree on an acceptable definition.
(D) New businesses had relocated to larger cities.

44. The word "those"in line 9 refers to
(A) boundaries (B) persons (C) units (D) areas

45. The word “constituting” in line 16 is closest in meaning to
(A) located near (B) determined by (C) calling for (D) making up

46. The word “which ” in line 18 refers to a smaller
(A) population (B) city (C) character (D) figure

47. Which of the following is NOT true of an SMSA?
(A) It has a population of at least 50,000 (B) It can include a city's outlying regions.
(C) It can include unincorporated regions. (D) It consists of at least two cities.

48. By 1970, what proportion of the population in the United States did NOT live in an SMSA?
(A) 3/4 (B) 2/3 (C) 1/2 (D) 1/3

49. The Census Bureau first used the term “SMSA” in
(A) 1900 (B) 1950 (C) 1969 (D) 1970

50. Where in the passage does the author mention names used by social scientists for an urban area?
(A) Lines 4-5
(B) Line 7-8
(C) Line 21-23
(D) Line 27-29