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## G神团队2014年6月7日预测

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高频写作部分：万炜

北京新东方2014年6月7日热报班级：  
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全新体系，全新题目，完全不一样了

拒绝老一套GRE

010-82611818

预测填空词汇 :

- |                    |                    |
|--------------------|--------------------|
| 1. equivocal       | 36. egregious      |
| 2. seminal         | 37. surreptitious  |
| 3. slur            | 38. perfunctory    |
| 4. vestige         | 39. swift          |
| 5. flummery        | 40. turbulent      |
| 6. mundane         | 41. awry           |
| 7. interchangeable | 42. synopses       |
| 8. lambaste        | 43. malady         |
| 9. excoriate       | 44. augment        |
| 10. distend        | 45. adversary      |
| 11. shriek         | 46. shriek         |
| 12. reticent       | 47. warble         |
| 13. ebullient      | 48. croon          |
| 14. bleak          | 49. caterwaul      |
| 15. veracity       | 50. dissent        |
| 16. impenetrable   | 51. hypocrisy      |
| 17. proprietary    | 52. spontaneity    |
| 18. insular        | 53. pastiche       |
| 19. subversive     | 54. buoy           |
| 20. iconoclastic   | 55. paean          |
| 21. delegate       | 56. hubris         |
| 22. compunction    | 57. erudition      |
| 23. trifling       | 58. sophistication |
| 24. imperious      | 59. compelling     |
| 25. obviate        | 60. esoteric       |
| 26. bridle         | 61. impeccable     |
| 27. unkempt        | 62. rapprochement  |
| 28. buttress       | 63. hectic         |
| 29. gridlock       | 64. acquiescent    |
| 30. officious      | 65. parochial      |
| 31. emblematic     | 66. quip           |
| 32. upend          | 67. encumber       |
| 33. abstemious     | 68. discretionary  |
| 34. insouciance    | 69. oust           |
| 35. contentious    | 70. iconoclastic   |
|                    | 71. compunction    |

## 最新考试词汇

### 2014.4.13 考试词汇

lucrative

conjecture / speculative

epitome

scratching

geniality

dwindle

rebellious

quirky

steer

acrimony

digressional

formidable

obscure

unearth

attest

rusting

disequilibrium

naysayer

### 4月26日

1. stem from 源于

2. paucity 缺乏 少量

3. ample 丰富的

4. impediment 妨碍, 组织

5. vacillation 犹豫不决, 踌躇

5. headway 前进

6. alleviate 减轻, 缓和

7. aptness 倾向, 才能

8. uncanny 神秘的, 离奇的

9. spur 鼓舞, 激励

10. canvases 油画布

11. verisimilitude 逼真

12. exasperate 恶化

13. irascibility 易怒, 脾气暴躁

14. animate 有生命的; 使.....有生气

15. unassailable 无懈可击的

16. archetype 原型

17. rectitude 公正

18. rant 痛骂

19. vindication 辩护

20. cue 暗示, 线索

21. reiterate 重申, 反复的做

### 5月10日

1. fickle

2. stalwart

3. whimsical

4. impugn

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5. impertinent	intransigence
6. unwitting	coddle
7. feckless	mollify
8. preachy	delude
9. sanctimonious	excoriate
10. plaintive	anodyne
11. disingenuous	avatar (可不是阿凡达哦!)
12. coveted	abstemious
13. taxing	ebullient
14. hamper	esoteric
15. numinous	devious
16. sonorous	detractor
17. salutary	evenhanded
18. profitmongers	camaraderie
19. inertial	abstruse
20. clandestine	obtuse
21. spurn	precipitate (形容词含义)
22. obfuscate	tactful
23. canned	trivialize
24. formulaic	encroachment
25. vacuous	brazen
26. plummet	truculent

**5月18日**

faddish

句子等价词对预测:

- |                                      |                                    |
|--------------------------------------|------------------------------------|
| 1. pacific / dovish                  | 27. faultless / perfect            |
| 2. self-interest / opportunism       | 28. heterogeneous / disparate      |
| 3. slurs/ aspersions                 | 29. realize / achieve              |
| 4. versatile / capricious / volatile | 30. workday / quotidian            |
| 5. vestige / relics                  | 31. esoteric / recondite           |
| 6. foster / cultivate                | 32. reconciliation / rapprochement |
| 7. definitive / authoritative        | 33. unwarranted / groundless       |
| 8. veracity / truth                  | 34. hodgepodge / patchwork         |
| 9. belie / mask                      | 35. accession / acquiescence       |
| 10. disregard / defy / flout         | 36. affable / easygoing            |
| 11. encomium / tribute               | 37. fairness / objectivity         |
| 12. expel / oust / banish            | 38. rudimentary / primitive        |
| 13. inconsequential / trivial        | 39. remove / strip away            |
| 13. repudiate / recant               | 40. intelligible / readable        |
| 14. trifling / minimal               | 41. calm / quiescence              |
| 15. bypass / circumvent              | 42. intricate / convoluted         |
| 16. decay / deterioration            | 43. reveal / manifest              |
| 18. dichotomous / contradictory      | 44. elicit / draw                  |
| 19. inferable / entailed             | 45. utilitarian / functional /     |
| 20. generic / inclusive              | 46. conjectural / speculative      |
| 21. anticipate / prefigure           | 47. diminutive / minuscule         |
| 22. hierarchical / stratified        | 48. extremist / zealot             |
| 23. emblematic / totemic             | 49. disseminate / transmit         |
| 24. adversial / antagonistic         | 50. lucidity / clarity             |
| 25. augment / extend                 | 51. modern / advanced              |
| 26. caterwaul / shriek               | 52. disparities / variances        |

- |  |                                  |
|--|----------------------------------|
| 53. unconventional / quirky            | 82. euphoria / ecstasy           |
| 54. novel / original                   | 83. opprobrium / disdain         |
| 55. slippery / elusive                 | 84. maturity / precociousness    |
| 56. plethora / surfeit                 | 85. champion / advocate          |
| 57. placate / appease                  | 86. prudent / circumspect        |
| 58. ignore / overlook                  | 87. protean / versatile          |
| 59. unconventional / original          | 88. panacea / cure-all           |
| 60. friendliness / geniality           | 89. relatives / kinfolk          |
| 61. undermine / subvert                | 90. unfamiliarity / ignorance    |
| 62. preachy / sanctimonious            | 91. belie / contradict           |
| 63. coveted / enviable                 | 92. schism / factiousness        |
| 64. temper / moderate                  | 93. lull / respite               |
| 65. heterogeneous / dissimilar         | 94. conundrum / enigma           |
| 66. brook / tolerate                   | 95. adroit / dexterous           |
| 67. restorative / tonic                | 96. acknowledge / recognize      |
| 68. prevented / precluded              | 97. bucolic / pastoral           |
| 69. fractious / restive / skittish     | 98. disinterested / impartial    |
| 70. canned / formulaic                 | 99. bland / insipid              |
| 71. spirited / vigorous                | 100. fortuitous / accidental     |
| 72. preserving / safeguarding          | 101. garrulous / loquacious      |
| 73. private / insular                  | 102. glean / collect             |
| 74. inexplicable /<br>incomprehensible | 103. inconsequential / trivial   |
| 75. destroy / annihilate               | 104. lugubrious / gloomy         |
| 76. improbable / unlikely              | 105. sweeping / comprehensive    |
| 77. exacerbated / aggravated           | 106. successively / sequentially |
| 78. experimental / innovative          | 107. banter / raillery           |
| 79. combine / meld                     | 108. surmise / infer             |
| 80. tilting / listing                  | 109. laconic / taciturn          |
| 81. remedy / recipe                    | 110. sycophant / obsequious      |

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111. hitch / snag

115. spur / foster

112. adaptability / flexibility

116. 116. realism / verisimilitude

113. beneficence / altruism

117. irascibility / exasperation

114. persistence / survival

118. galvanize / animate

## G神团队2014年6月7日阅读预测

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## 1. 乙醇汽油 1993年04月

Although, recent years have seen substantial reductions in noxious pollutants from individual motor vehicles, the number of such vehicles has been steadily increasing, consequently, more than 100 cities in the United States still have levels of carbon monoxide, particulate matter, and ozone (generated by photochemical reactions with hydrocarbons from vehicle exhaust) that exceed legally established limits. There is a growing realization that the only effective way to achieve further reductions in vehicle emissions—short of a massive shift away from the private automobile—is to replace conventional diesel fuel and gasoline with cleaner-burning fuels such as compressed natural gas, liquefied petroleum gas, ethanol, or methanol.

All of these alternatives are carbon-based fuels whose molecules are smaller and simpler than those of gasoline. These molecules burn more cleanly than gasoline, in part because they have fewer, if any, carbon-carbon bonds, and the hydrocarbons they do emit are less likely to generate ozone. The combustion of larger molecules, which have multiple carbon-carbon bonds, involves a more complex series of reactions. These reactions increase the probability of incomplete combustion and are more likely to release uncombusted and photochemically active hydrocarbon compounds into the atmosphere. On the other hand, alternative fuels do have drawbacks. Compressed natural gas would require that vehicles have a set of heavy fuel tanks—a serious liability in terms of performance and fuel efficiency—and liquefied petroleum gas faces fundamental limits on supply.

Ethanol and methanol, on the other hand, have important advantages over other carbon-based alternative fuels: they have a higher energy content per volume and would require minimal changes in the existing network for distributing motor fuel. Ethanol is commonly used as a gasoline supplement, but it is currently about twice as expensive as methanol, the low cost of which is one of its attractive features. Methanol's most attractive feature, however, is that it can reduce by about 90 percent the vehicle emissions that form ozone, the most serious urban air pollutant.

Like any alternative fuel, methanol has its critics. Yet much of the criticism is based on the use of “gasoline clone” vehicles that do not incorporate even the simplest design improvements that are made possible with the use of methanol. It is true, for example, that a given volume of methanol provides only about one-half of the energy that gasoline and diesel fuel do; other things being equal, the fuel tank would have to be somewhat larger and heavier. However, since methanol-fueled vehicles could be designed to be much more efficient than “gasoline clone” vehicles fueled with methanol, they would need comparatively less fuel. Vehicles incorporating only the simplest of the engine improvements that methanol makes feasible would still contribute to an immediate lessening of urban air pollution.

1.1 The author of the passage is primarily concerned with

- (A) countering a flawed argument that dismisses a possible solution to a problem
- (B) reconciling contradictory points of view about the nature of a problem
- (C) identifying the strengths of possible solutions to a problem
- (D) discussing a problem and arguing in favor of one solution to it

(E) outlining a plan of action to solve a problem and discussing the obstacles blocking that plan

1.2 According to the passage, incomplete combustion is more likely to occur with gasoline than with an alternative fuel because

- (A) the combustion of gasoline releases photochemically active hydrocarbons
- (B) the combustion of gasoline involves an intricate series of reactions
- (C) gasoline molecules have a simple molecular structure
- (D) gasoline is composed of small molecules.
- (E) gasoline is a carbon-based fuel

1.3 The passage suggests which of the following about air pollution?

- (A) Further attempts to reduce emissions from gasoline-fueled vehicles will not help lower urban air-pollution levels.
- (B) Attempts to reduce the pollutants that an individual gasoline-fueled vehicle emits have been largely unsuccessful.
- (C) Few serious attempts have been made to reduce the amount of pollutants emitted by gasoline-fueled vehicles.
- (D) Pollutants emitted by gasoline-fueled vehicles are not the most critical source of urban air pollution.
- (E) Reductions in pollutants emitted by individual vehicles have been offset by increases in pollution from sources other than gasoline-fueled vehicles.

1.4 Which of the following most closely parallels the situation described in the first sentence of the passage?

- (A) Although a town reduces its public services in order to avoid a tax increase, the town's tax rate exceeds that of other towns in the surrounding area.
- (B) Although a state passes strict laws to limit the type of toxic material that can be disposed of in public landfills, illegal dumping continues to increase.
- (C) Although a town's citizens reduce their individual use of water, the town's water supplies continue to dwindle because of a steady increase in the total population of the town.
- (D) Although a country attempts to increase the sale of domestic goods by adding a tax to the price of imported goods, the sale of imported goods within the country continues to increase.
- (E) Although a country reduces the speed limit on its national highways, the number of fatalities caused by automobile accidents continues to increase.

1.5 The author describes which of the following as the most appealing feature of methanol?

- (A) It is substantially less expensive than ethanol.
- (B) It could be provided to consumers through the existing motor fuel

distribution system.

- (C) It has a higher energy content than other alternative fuels.
- (D) Its use would make design improvements in individual vehicles feasible.
- (E) Its use would substantially reduce ozone levels.

1.6 It can be inferred from the passage that a vehicle specifically designed to use methanol for fuel would

- (A) be somewhat lighter in total body weight than a conventional vehicle fueled with gasoline
- (B) be more expensive to operate than a conventional vehicle fueled with gasoline
- (C) have a larger and more powerful engine than a conventional vehicle fueled with gasoline
- (D) have a larger and heavier fuel tank than a “gasoline clone” vehicle fueled with methanol
- (E) average more miles per gallon than a “gasoline clone” vehicle fueled with methanol

1.7 It can be inferred that the author of the passage most likely regards the criticism of methanol in the last paragraph as

- (A) flawed because of the assumptions on which it is based
- (B) inapplicable because of an inconsistency in the critics’ arguments
- (C) misguided because of its exclusively technological focus
- (D) inaccurate because it ignores consumers’ concerns
- (E) invalid because it reflects the personal bias of the critics

答案: DBACEEA

## 2. 长江水稻 新题

Since the 1970s, archaeological sites in China's Yangtze River region have yielded evidence of sophisticated rice-farming societies that predate signs of rice cultivation elsewhere in East Asia by a thousand years. Before this evidence was discovered, it had generally been assumed that rice farming began farther to the south. This scenario was based both on the geographic range of wild or free-living rice, which was not thought to extend as far north as the Yangtze, and on archaeological records of very early domestic rice from Southeast Asia and India (now known to be not so old as first reported). Proponents of the southern-origin theory point out that early rice-farming societies along the Yangtze were already highly developed and that evidence for the first stage of rice cultivation is missing. They argue that the first hunter-gatherers to develop rice agriculture must have done so in this southern zone, within the apparent present-day geographic range of wild rice.

Yet while most strands of wild rice reported in a 1984 survey were concentrated to the south of the Yangtze drainage, two northern outlier populations were also discovered in provinces along the middle and lower Yangtze, evidence that the Yangtze wetlands may fall within both the present-day and the historical geographic ranges of rice's wild ancestor.

2.1. Which of the following, if true, would most clearly undermine the conclusion that the author makes based on the 1984 survey?

- A. Areas south of the Yangtze basin currently have less wild-rice habitat than they once did.
- B. Surveys since 1984 have shown wild rice populations along the upper Yangtze as well as along the middle and lower Yangtze.
- C. The populations of wild rice along the Yangtze represent strains of wild rice that migrated to the north relatively recently.
- D. Early rice-farming societies along the Yangtze were not as highly developed as archaeologists once thought.
- E. In East Asia, the historical geographic range of wild rice was more extensive than the present-day geographic range is.

2.2. Based on the passage, skeptics of the idea that rice cultivation began in the Yangtze River region can point to which of the following for support?

- A. Lack of evidence supporting the existence of rice-farming societies along the Yangtze at an early date
- B. Lack of evidence regarding the initial stages of rice cultivation in the Yangtze region
- C. Recent discoveries pertaining to the historical geographic range of rice's wild ancestor
- D. New information regarding the dates of very early domestic rice from Southeast Asia
- E. New theories pertaining to how hunter-gatherers first developed rice agriculture in East Asia

2.3. Which of the following can be inferred from the passage about the "southern-origin theory"?

- A. The theory is based on an unconventional understanding of how hunter-gatherers first developed rice agriculture.
- B. The theory fails to take into account the apparent fact that evidence for the first stage of rice cultivation in the north is missing.
- C. The theory was developed primarily in response to a 1984 survey of wild rice's geographic range.
- D. Reassessment of the dates of some archaeological evidence has undermined support for the theory.
- E. Evidence of sophisticated rice-farming societies in the Yangtze region provides support for the theory.

答案: CBD

3. The Color Purple 相关文章: [LSAT第22套 SECTION IV](#)

The publication of *The Color Purple* transformed Alice Walker from an indubitably serious black writer whose fiction belonged to a tradition of gritty, if occasionally "magical," realism into a popular novelist, with all the perquisites and drawbacks attendant on that position. Unlike either *The Third Life of Grange Copland* (1970) or *Meridian* (1976), *The Color Purple* gained immediate and widespread public acceptance, winning both the Pulitzer Prize and the American Book Award for 1982-83. At the same time, however, it generated immediate and widespread critical unease over what appeared to be manifest flaws in its composition. Robert Towers, writing in the *New York Review of Books*, concluded that on the evidence of *The Color Purple* "Alice Walker still has a lot to learn about plotting and structuring what is clearly intended to be a realistic novel." His opinion was shared by many reviewers, who pointed out variously that in the last third of the book the narrator-protagonist Celie and her friends are propelled toward a fairytale happy ending with more velocity than credibility; that the letters from Nettie, with their disconcertingly literate depictions of life in an African village, intrude into the middle of the main action with little apparent motivation or warrant; and that the device of the letters to God is especially unrealistic in as much as it foregoes the concretizing details that traditionally have given the epistolary 书信体的 form its peculiar verisimilitude: the secret writing-place, the cache, the ruses to enable posting letters, and especially the letters received in return.

#### 4. 鱼的social learning

Although social learning (通过模仿其它个体的行为来学会某种行为) is well documented among fish, few studies have investigated social learning within a developmental context in these taxa. Rather than investigating the development of a particular skill, Chapman, Ward, and Krause investigated the role of group density during development in later foraging success in laboratory-housed guppies. When raised with a small number of conspecifics (同种生物), guppies were quicker to locate food by following a trained adult guppy than were guppies raised in large groups. This counterintuitive finding is explained by the fact that guppies reared in the high-density condition were less likely to shoal (与群体一起游动) with others and, therefore, were less likely to learn the benefits of social learning. Instead, fish reared in high-density situations may learn that conspecifics are to be viewed as competitors, rather than as potential sources of adaptive information. This finding suggests that at least for guppies, the early social environment may have an effect on the capacity for social learning, if not on the socially learned behaviors themselves.

#### 5. 美洲人起源 新题

Recent discoveries in New World archaeology along with new scientific methods for analyzing data have led to new ideas regarding the origin of the first peoples of the Americas and their time of arrival.

The traditional theory held that the first Americans crossed the land bridge from Siberia to Alaska around 11,500 years ago and followed an "ice-free corridor" between two large Canadian ice sheets (the Laurentide and Cordilleran) to reach unglaciated lands to the south. These first inhabitants, whose archaeological sites are scattered across North and South America, were called the Clovis people,

named after the town in New Mexico where their fluted spear points used for hunting mammoth were first found in 1932.

There is now convincing evidence of human habitation sites that date earlier than the Clovis culture including sites located in South America. Monte Verde, a well-studied site located along a river near southern central Chile, dates 12,500 years ago. This site contains the buried remnants of dwellings, stone tools including large bifacial projectile points, and preserved medicinal and edible plants. How did people manage to settle this far south at such an early date? A coastal migration route is now gaining more acceptance, rather than the older view of small bands moving on foot across the middle of the land bridge between Siberia and Alaska and into the continents. Emerging evidence suggests that people with boats moved along the Pacific coast into Alaska and northwestern Canada and eventually south to Peru and Chile by 12,500 years ago—and perhaps much earlier. Archaeological evidence in Australia, Melanesia, and Japan indicate boats were in use as far back as 25,000 to 40,000 years ago. Sea routes would have provided abundant food resources and easier and faster movement than land routes. Many coastal areas were unglaciated at this time, providing opportunities for landfall along the way. Several early sites along the coast of Canada, California, Peru, Ecuador, and Chile date between 10,000 and 12,000 years ago. Many potential coastal sites are now submerged, making investigation difficult.

## 6. Honey bee的fungal 新题

Ingestion of food containing spores of the pathogen *Ascosphaera apis* causes a fatal fungal disease known as chalk brood in honeybee larvae. However, larvae must be chilled to about 30 °C (normal brood-comb temperature is 33-36 °C) for the disease to develop. Accordingly, chalk brood is most common in spring and in small colonies. A recent study revealed that honeybees responsible for hive-temperature maintenance purposely raised the hives' temperature when colonies were inoculated with *A.apis* this "fever," or up-regulation of temperature, occurred before any larvae died, suggesting that the response is preventative and that either honeybee workers detect the infection before symptoms are visible or larvae communicate the ingestion of the pathogen. Temperature returned to normal by the end of the study, suggesting that increased temperature is not optimal when broods are not infected, as well as that the fever does not result merely from normal colony growth (i.e., an increase in the number of workers available for temperature maintenance).

6.1. The primary purpose of the passage is to

- (A) discuss the findings and implications of a particular study
- (B) illustrate a process that formerly had been misunderstood
- (C) outline the methods used to investigate a problem
- (D) provide evidence to support a controversial theory
- (E) contrast alternative interpretations of certain data

6.2. According to the passage, researchers concluded that fever in honeybee colonies is preventative because their study showed that such fever

- (A) does not occur when hive temperatures are within normal range



- (B) protects adult bees from contracting chalk brood infection
- (C) occurs prior to the death of any larvae
- (D) is more likely to occur in spring than in summer
- (E) does not have an effect on uninfected broods

6.3. The passage implies that if hive temperature had not returned to normal by the end of the study in question, a probable conclusion of the researchers would have been that

- (A) up-regulation of temperature is a preventative measure against chalkbrood
- (B) honeybees are incapable of purposely raising hive temperatures
- (C) *A. apis* cannot be completely eradicated through up-regulation of temperature alone
- (D) honeybee larvae have a mechanism to alert adult honeybees to the presence of *A. apis*
- (E) honeybee larvae may benefit from increased hive temperature even when there is no *A. apis* present

6.4. According to the passage, which of the following is true of chalk brood infection among honeybee larvae ?

- (A) Larvae in small colonies are more likely to pass the infection to adult honeybees than are larvae in large ones.
- (B) Infection with chalk brood induces larvae to raise their hive's temperature.
- (C) The infection is more likely to affect larvae in winter than in spring.
- (D) Larvae fail to develop symptoms of the disease when their brood -comb temperature remains within the normal range.
- (E) Infected larvae exhibit visible symptoms of disease for a significant time before death.

答案: ACED

#### 7. 十四修正案 1994年10月 B 9104

The Fourteenth Amendment to the United States Constitution, ratified in 1868, prohibits state governments from denying citizens the "equal protection of the laws." Although precisely what the framers of the amendment meant by this equal protection clause remains unclear, all interpreters agree that the framers' immediate objective was to provide a constitutional warrant for the Civil Rights Act of 1866, which guaranteed the citizenship of all persons born in the United States and subject to United States jurisdiction. This declaration, which was echoed in the text of the Fourteenth Amendment, was designed primarily to counter the Supreme Court's ruling in *Dred Scott v. Sandford* that Black people in the United States could be denied citizenship. The act was vetoed by President Andrew Johnson, who argued that the Thirteenth Amendment, which abolished slavery, did not provide Congress with the authority to extend citizenship and equal protection to the freed slaves. Although Congress promptly overrode Johnson's veto, supporters of the act sought to ensure its constitutional foundations with the passage of the Fourteenth Amendment.

The broad language of the amendment strongly suggests that its framers were proposing to write into the Constitution not a laundry list of specific civil rights but a principle of equal citizenship that



forbids organized society from treating any individual as a member of an inferior class. Yet for the first eight decades of the amendment's existence, the Supreme Court's interpretation of the amendment betrayed this ideal of equality. In the Civil Rights Cases of 1883, for example, the Court invented the "state action" limitation, which asserts that "private" decisions by owners of public accommodations and other commercial businesses to segregate their facilities are insulated from the reach of the Fourteenth Amendment's guarantee of equal protection under the law.

After the Second World War, a judicial climate more hospitable to equal protection claims culminated in the Supreme Court's ruling in *Brown v. Board of Education* that racially segregated schools violated the equal protection clause of the Fourteenth Amendment. Two doctrines embraced by the Supreme Court during this period extended the amendment's reach. First, the Court required especially strict scrutiny of legislation that employed a "suspect classification," meaning discrimination against a group on grounds that could be construed as racial. This doctrine has broadened the application of the Fourteenth Amendment to other, nonracial forms of discrimination, for while some justices have refused to find any legislative classification other than race to be constitutionally disfavored, most have been receptive to arguments that at least some nonracial discriminations, sexual discrimination in particular, are "suspect" and deserve this heightened scrutiny by the courts. Second, the Court relaxed the state action limitation on the Fourteenth Amendment, bringing new forms of private conduct within the amendment's reach.

7.1. Which of the following best describes the main idea of the passage?

- (A) By presenting a list of specific rights, framers of the Fourteenth Amendment were attempting to provide a constitutional basis for broad judicial protection of the principle of equal citizenship.
- (B) Only after the Supreme Court adopted the suspect classification approach to reviewing potentially discriminatory legislation was the applicability of the Fourteenth Amendment extended to include sexual discrimination.
- (C) Not until after the Second World War did the Supreme Court begin to interpret the Fourteenth Amendment in a manner consistent with the principle of equal citizenship that it expresses.
- (D) Interpreters of the Fourteenth Amendment have yet to reach consensus with regard to what its framers meant by the equal protection clause.
- (E) Although the reluctance of judges to extend the reach of the Fourteenth Amendment to nonracial discrimination has betrayed the principle of equal citizenship, the Supreme Court's use of the state action limitation to insulate private activity from the amendment's reach has been more harmful.

7.2. The passage suggests that the principal effect of the state action limitation was to

- (A) allow some discriminatory practices to continue unimpeded by the Fourteenth Amendment
- (B) influence the Supreme Court's ruling in *Brown v. Board of Education*
- (C) provide expanded guidelines describing prohibited actions
- (D) prohibit states from enacting laws that violated the intent of the Civil Rights Act of 1866
- (E) shift to state governments the responsibility for enforcement of laws prohibiting discriminatory practices

7.3. The author's position regarding the intent of the framers of the Fourteenth Amendment would be most seriously undermined if which of the following were true?

- (A) The framers had anticipated state action limitations as they are described in the passage.
- (B) The framers had merely sought to prevent discriminatory acts by federal officials.
- (C) The framers were concerned that the Civil Rights Act of 1866 would be overturned by the Supreme Court.
- (D) The framers were aware that the phrase "equal protection of the laws" had broad implications.
- (E) The framers believed that racial as well as non-racial forms of discrimination were unacceptable.

7.4. According to the passage, the original proponents of the Fourteenth Amendment were primarily concerned with

- (A) detailing the rights afforded by the principle of equal citizenship
- (B) providing support in the Constitution for equal protection for all citizens of the United States
- (C) closing a loophole that could be used to deny individuals the right to sue for enforcement of their civil rights
- (D) asserting that the civil rights protected by the Constitution included nonracial discrimination as well as racial discrimination
- (E) granting state governments broader discretion in interpreting the Civil Rights Act of 1866

7.5. The author implies that the Fourteenth Amendment might not have been enacted if

- (A) Congress' authority with regard to legislating civil rights had not been challenged
- (B) the framers had anticipated the Supreme Court's ruling in *Brown v. Board of Education*
- (C) the framers had believed that it would be used in deciding cases of discrimination involving non-racial groups
- (D) most state governments had been willing to protect citizens' civil rights
- (E) its essential elements had not been implicit in the Thirteenth Amendment

7.6. According to the passage, which of the following most accurately indicates the sequence of the events listed below?

- I. Civil Rights Act of 1866
  - II. *Dred Scott v. Sandford*
  - III. Fourteenth Amendment
  - IV. Veto by President Johnson
- (A) I, II, III, IV
  - (B) I, IV, II, III
  - (C) I, IV, III, II
  - (D) II, I, IV, III
  - (E) III, II, I, IV

7.7. Which of the following can be inferred about the second of the two doctrines referred to in lines 39-41 of the passage?

- (A) It caused some justices to rule that all types of discrimination are prohibited by the Constitution.

- (B) It shifted the focus of the Supreme Court from racial to nonracial discrimination.
- (C) It narrowed the concern of the Supreme Court to legislation that employed a suspect classification.
- (D) It caused legislators who were writing new legislation to reject language that could be construed as permitting racial discrimination.
- (E) It made it more difficult for commercial businesses to practice racial discrimination.

答案: CABBAD E

## 8. Maya 旱灾

To understand the ancient Mayan people who lived in the area that is today southern Mexico and Central America and the ecological difficulties they faced, one must first consider their environment, which we think of as "jungle" or "tropical rainforest." This view is inaccurate, and the reason proves to be important. Properly speaking, tropical rainforests grow in high-rainfall equatorial areas that remain wet or humid all year round. But the Maya homeland lies more than sixteen hundred kilometers from the equator, at latitudes 17 to 22 degrees north, in a habitat termed a "seasonal tropical forest." That is, while there does tend to be a rainy season from May to October, there is also a dry season from January through April. If one focuses on the wet months, one calls the Maya homeland a "seasonal tropical forest"; if one focuses on the dry months, one could instead describe it as a "seasonal desert."

From north to south in the Yucatan Peninsula, where the Maya lived, rainfall ranges from 18 to 100 inches (457 to 2,540 millimeters) per year, and the soils become thicker, so that the southern peninsula was agriculturally more productive and supported denser populations. But rainfall in the Maya homeland is unpredictably variable between years; some recent years have had three or four times more rain than other years. As a result, modern farmers attempting to grow corn in the ancient Maya homelands have faced frequent crop failures, especially in the north. The ancient Maya were presumably more experienced and did better, but nevertheless they too must have faced risks of crop failures from droughts and hurricanes.

Although southern Maya areas received more rainfall than northern areas, problems of water were paradoxically more severe in the wet south. While that made things hard for ancient Maya living in the south, it has also made things hard for modern archaeologists who have difficulty understanding why ancient droughts caused bigger problems in the wet south than in the dry north. The likely explanation is that an area of underground freshwater underlies the Yucatan Peninsula, but surface elevation increases from north to south, so that as one moves south the land surface lies increasingly higher above the water table. In the northern peninsula the elevation is sufficiently low that the ancient Maya were able to reach the water table at deep sinkholes called cenotes, or at deep caves. In low-elevation north coastal areas without sinkholes, the Maya would have been able to get down to the water table by digging wells up to 75 feet (22 meters) deep. But much of the south lies too high above the water table for cenotes or wells to reach down to it. Making matters worse, most of the Yucatan Peninsula consists of karst, a porous sponge-like limestone terrain where rain runs straight into the ground and where little or no surface water remains available.

How did those dense southern Maya populations deal with the resulting water problem? It initially surprises us that many of their cities were not built next to the rivers but instead on high terrain in rolling uplands. The explanation is that the Maya excavated depressions, or modified natural depressions, and then plugged up leaks in the karst by plastering the bottoms of the depressions in order to create reservoirs, which collected rain from large plastered catchment basins and stored it for use in the dry season. For example, reservoirs at the Maya city of Tikal held enough water to meet the drinking water needs of about 10,000 people for a period of 18 months. At the city of Coba the Maya built dikes around a lake in order to raise its level and make their water supply more reliable. But the inhabitants of Tikal and other cities dependent on reservoirs for drinking water would still have been in deep trouble if 18 months passed without rain in a prolonged drought. A shorter drought in which they exhausted their stored food supplies might already have gotten them in deep trouble, because growing crops required rain rather than reservoirs.

#### 9. 鹿背上的hump

Which of following most logically completes the argument?

The last members of a now-extinct species of a European wild deer called the giant deer lived in Ireland about 16,000 years ago. Prehistoric cave paintings in France depict this animal as having a large hump on its back. Fossils of this animal, however, do not show any hump. Nevertheless, there is no reason to conclude that the cave paintings are therefore inaccurate in this regard, since \_\_\_\_\_.

- A some prehistoric cave paintings in France also depict other animals as having a hump
- B fossils of the giant deer are much more common in Ireland than in France
- C animal humps are composed of fatty tissue, which dose not fossilize
- D the cave paintings of the giant deer were painted well before 16,000 years ago
- E only one currently existing species of deer has any anatomical feature that even remotely resembles a hump

#### 10. Mystery of the Anasazi

As the tourists prepare to depart Spruce Tree House, one asks Qumawunu the question that's on everyone's mind: Why, after having invested so much work in this place, did the ancestral Pueblo people leave it all behind?

The park ranger's answer sounds well-rehearsed: "We can come up with so many thoughts about why they moved in and why they moved out. But no one really knows for sure."  
But it's a mystery that is finally beginning to unravel.

But while Crow Canyon has brought professional archaeology to the masses, it has yet to dismantle the biggest misconception about Mesa Verde's prehistory: that the ancestral Pueblo people simply vanished.

"I don't think we really ever thought that they just vanished into thin air," says Kuckelman. "I think the real enigma of the ancestral Pueblo people in the Mesa Verde region is, 'Why did they leave?'"

The ancestral Pueblo people didn't have a written language; no one left behind a detailed account of their last days in the Mesa Verde region. But Kuckelman believes that if she looks hard enough at places like Goodman Point Pueblo, she can find this story written on the walls -- and on the floors and in the trash heaps.

There's a partially excavated kiva, a subterranean dwelling near the northwest corner, that could hold part of the story. Standing over it, Kuckelman lifts the plywood covering that will protect the underground chamber over the winter and peers into the darkness. When this kiva was first excavated last summer, workers discovered prehistoric ash in the hearth and a rabbit skeleton nearby. Kuckelman thinks those findings may be the remains of one of the last meals ever eaten in the village.

She believes that when researchers dissolve the ash in liquid and analyze what remains, they'll find markedly little evidence of maize, compared to the amount of maize refuse in rubbish pits around the village. This isn't a wild guess. Kuckelman and her co-workers noticed the pattern when they ran similar tests at a nearby contemporary ruin, Sand Canyon Pueblo. These findings helped Kuckelman piece together a new theory about the ancestral Pueblo's departure, a theory she hopes to bolster with evidence from Goodman Point Pueblo and other excavations.

Kuckelman believes that as more and more people settled in the Mesa Verde region in the thirteenth century, they overwhelmed wild food sources in the area, such as deer and wild plants. As a result, they became increasingly dependent on maize crops -- not just for food, but for feed for domesticated turkeys -- as evidenced by the ubiquity of maize in refuse pits, essentially time capsules of the villagers' eating habits and customs. But then something wiped out their ability to cultivate their crops, as indicated by the limited maize remains in hearths. The rabbit skeleton may also be a clue, suggesting that turkey populations may have died out and forced these people to fall back on small wild game. This could mean that Kuckelman has found more than just evidence of the last meals ever eaten by the ancestral Pueblo people in the Mesa Verde region; she's found a possible impetus for their leaving: to search out new means of sustenance.

"The folks in this area had become very, very dependent on crops, like maize, and wild turkeys. Ultimately, I think that system backfired and collapsed on them," she says. But why did the system backfire? Why did the entire population collapse? For a while, archaeologists thought they had the single answer: a great drought.

This idea was born from ancient wooden beams found in Mesa Verde ruins, beams whose tree rings captured the exact date and climate conditions of the prehistoric time period. Andrew E. Douglass, the father of tree-ring dating, studied these beams and, in a 1929 National Geographic article evocatively titled "The Secret of the Southwest Solved by Talkative Tree-rings," announced that he'd

cleared up the mystery of the prehistoric migration. The beams, he wrote, showed evidence of a massive drought in the region from 1276 to 1299. Drought can be apocalyptic in the Mesa Verde region -- soil turns to powder, trees hold less moisture than kiln-dried wood -- and this one, it seemed, had led to a mass exodus.

Scholars are skeptical of single-factor explanations. Could one drought, no matter how devastating, be enough to depopulate an entire region? But for decades, no one had the hard evidence to challenge the drought theory. "Interpretations were kind of all over the board," says Kuckelman. That changed seventeen years ago, thanks to the work of a Ph.D. student named Carla Van West.

#### 11. 彗星的pristine relics

The long-held perspective that comets are pristine remnants from the formation of the solar system has evolved from the prevailing views of 30 years ago, finds planetary scientist Dr. S. Alan Stern in a paper published in the journal Nature.

"It's fair to say that a sea change has taken place," says Stern, director of the Space Studies Department in the SwRI Space Science and Engineering Division. "We used to consider comets as wholly unchanged relics that had been stored ever since the era of solar system formation in a distant, cold, timeless deep freeze called the Oort cloud. We now appreciate that a variety of processes slowly modify comets during their storage there," he says. "As a result, it's become clear that the Oort cloud and its cousin the Kuiper Belt are not such perfect deep freezes."

The first evolutionary process to be recognized as affecting comets during their long storage was radiation damage, followed by the discovery that sandblasting from dust grains in the interstellar medium plays an important role. Next, researchers theorized that comets in the Oort cloud are heated to scientifically significant temperatures by passing stars and supernovae, says Stern. More recently, researchers are finding that comets in the Kuiper Belt are heavily damaged by collisions.

"It also now seems inevitable that most comets from the Kuiper Belt, though constructed of ancient material, cannot themselves be ancient -- instead they must be 'recently' created chips off larger Kuiper Belt Objects, formed as a result of violent impacts," says Stern. "This is truly a paradigm shift. Many of the short-period comets we see aren't even ancient!"

The classical view that comets do not evolve while they are stored far from the sun in the Oort cloud and Kuiper Belt began to change as far back as the 1970s, but the pace of discoveries about the way comets evolve picked up considerably in the 1980s and 1990s.

As a result of these findings, astronomers now better appreciate that comets, though still the most pristine bodies known, have been modified in several important ways since their birth, says Stern.

The realization that comets evolve during their long storage in the Oort cloud and Kuiper Belt provides insight and context to more confidently evaluate the results of astronomical and space mission



observations of comets. So, too, it suggests that cometary sample return missions now on the drawing board for NASA should employ relatively deep subsurface sampling if truly pristine, ancient material is to be collected.

## 12. 法国二月革命 B 9304

In February 1848 the people of Paris rose in revolt against the constitutional monarchy of Louis-Philippe. Despite the existence of excellent narrative accounts, the February Days, as this revolt is called, have been largely ignored by social historians of the past two decades. For each of the three other major insurrections in nineteenth-century Paris—July 1830, June 1848, and May 1871—there exists at least a sketch of participants' backgrounds and an analysis, more or less rigorous, of the reasons for the occurrence of the uprisings. Only in the case of the February Revolution do we lack a useful description of participants that might characterize it in the light of what social history has taught us about the process of revolutionary mobilization.

Two reasons for this relative neglect seem obvious. First, the insurrection of February has been overshadowed by that of June. The February Revolution overthrew a regime, to be sure, but met with so little resistance that it failed to generate any real sense of historical drama. Its successor, on the other hand, appeared to pit key socioeconomic groups in a life-or-death struggle and was widely seen by contemporary observers as marking a historical departure. Through their interpretations, which exert a continuing influence on our understanding of the revolutionary process, the impact of the events of June has been magnified, while, as an unintended consequence, the significance of the February insurrection has been diminished. Second, like other "successful" insurrections, the events of February failed to generate the most desirable kinds of historical records. Although the June insurrection of 1848 and the Paris Commune of 1871 would be considered watersheds of nineteenth-century French history by any standard, they also present the social historian with a signal advantage: these failed insurrections created a mass of invaluable documentation as a by-product of authorities' efforts to search out and punish the rebels.

Quite different is the outcome of successful insurrections like those of July 1830 and February 1848. Experiences are retold, but participants typically resume their daily routines without ever recording their activities. Those who played salient roles may become the objects of highly embellished verbal accounts or in rare cases, of celebratory articles in contemporary periodicals. And it is true that the publicly acknowledged leaders of an uprising frequently write memoirs. However, such documents are likely to be highly unreliable, unrepresentative, and unsystematically preserved, especially when compared to the detailed judicial dossiers prepared for everyone arrested following a failed insurrection. As a consequence, it may prove difficult or impossible to establish for a successful revolution a comprehensive and trustworthy picture of those who participated, or to answer even the most basic questions one might pose concerning the social origins of the insurgents.

12.1. According to the passage, "a useful description of participants" (lines 11-12) exists for which of the following insurrections of nineteenth-century France?

- I. The July Insurrection of 1830
- II. The February Revolution of 1848
- III. The June insurrection of 1848

IV. The May insurrection of 1871

- (A) I and III only
- (B) II and IV only
- (C) I, II, and III only
- (D) I, III, and IV only
- (E) II, III, and IV only

12.2. It can be inferred from the passage that support for the objectives of the February Revolution was

- (A) negligible
- (B) misguided
- (C) fanatical
- (D) spontaneous
- (E) widespread

12.3. Which of the following, best describes the organization of the second paragraph?

- (A) The thesis of the passage is stated and supporting evidence systematically presented.
- (B) Two views regarding the thesis presented in the first paragraph are compared and contrasted.
- (C) Evidence refuting the thesis presented in the first paragraph is systematically presented.
- (D) The thesis presented in the first paragraph is systematically supported.
- (E) The thesis presented in the first paragraph is further defined and a conclusion drawn.

12.4. It can be inferred from the passage that the author considers which of the following essential for understanding a revolutionary mobilization?

- (A) A comprehensive theory of revolution that can be applied to the major insurrections of the nineteenth century
- (B) Awareness of the events necessary for a revolution to be successful
- (C) Access to narratives and memoirs written by eyewitnesses of a given revolution
- (D) The historical perspective provided by the passage of a considerable amount of time
- (E) Knowledge of the socioeconomic backgrounds of a revolution's participants

12.5. Which of the following can be inferred about the "detailed judicial dossiers" referred to in line 49?

- (A) Information contained in the dossiers sheds light on the social origins of a revolution's participants.
- (B) The dossiers closely resemble the narratives written by the revolution's leaders in their personal memoirs.
- (C) The information that such dossiers contain is untrustworthy and unrepresentative of a revolution's participants.
- (D) Social historians prefer to avoid such dossiers whenever possible because they are excessively detailed.
- (E) The February Revolution of 1848 produced more of these dossiers than did the June insurrection.

12.6. Which of the following is the most logical objection to the claim made in lines 38-39?



- (A) The February Revolution of 1848 is much less significant than the July insurrection of 1830.
- (B) The backgrounds and motivations of participants in the July insurrection of 1830 have been identified, however cursorily.
- (C) Even less is known about the July insurrection of 1830 than about the February Revolution of 1848.
- (D) Historical records made during the July insurrection of 1830 are less reliable than those made during the May insurrection of 1871.
- (E) The importance of the July insurrection of 1830 has been magnified at the expense of the significance of the February Revolution of 1848.

12.7. With which of the following statements regarding revolution would the author most likely agree?

- (A) Revolutionary mobilization requires a great deal of planning by people representing disaffected groups.
- (B) The objectives of the February Revolution were more radical than those of the June insurrection.
- (C) The process of revolutionary mobilization varies greatly from one revolution to the next.
- (D) Revolutions vary greatly in the usefulness of the historical records that they produce.
- (E) As knowledge of the February Revolution increases, chances are good that its importance will eventually eclipse that of the June insurrection.

答案: DEDEABD

13. 小说Mary Barton A 9604

Mary Barton, particularly in its early chapters, is a moving response to the suffering of the industrial worker in the England of the 1840's. What is most impressive about the book is the intense and painstaking effort made by the author, Elizabeth Gaskell, to convey the experience of everyday life in working-class homes. Her method is partly documentary in nature: the novel includes such features as a carefully annotated reproduction of dialect, the exact details of food prices in an account of a tea party, an itemized description of the furniture of the Bartons' living room, and a transcription (again annotated) of the ballad "The Oldham Weaver." The interest of this record is considerable, even though the method has a slightly distancing effect.

As a member of the middle class, Gaskell could hardly help approaching working-class life as an outside observer and a reporter, and the reader of the novel is always conscious of this fact. But there is genuine imaginative re-creation in her accounts of the walk in Green Heys Fields, of tea at the Bartons' house, and of John Barton and his friend's discovery of the starving family in the cellar in the chapter "Poverty and Death." Indeed, for a similarly convincing re-creation of such families' emotions and responses (which are more crucial than the material details on which the mere reporter is apt to concentrate), the English novel had to wait 60 years for the early writing of D. H. Lawrence. If Gaskell never quite conveys the sense of full participation that would completely authenticate this aspect of Mary Barton, she still brings to these scenes an intuitive recognition of feelings that has its own sufficient conviction.

The chapter “Old Alice’s History” brilliantly dramatizes the situation of that early generation of workers brought from the villages and the countryside to the urban industrial centers. The account of Job Legh, the weaver and naturalist who is devoted to the study of biology, vividly embodies one kind of response to an urban industrial environment: an affinity for living things that hardens, by its very contrast with its environment, into a kind of crankiness. The early chapters—about factory workers walking out in spring into Green Heys Fields; about Alice Wilson, remembering in her cellar the twig-gathering for brooms in the native village that she will never again see; about Job Legh, intent on his impaled insects—capture the characteristic responses of a generation to the new and crushing experience of industrialism. The other early chapters eloquently portray the development of the instinctive cooperation with each other that was already becoming an important tradition among workers.

13.1. Which of the following best describes the author’s attitude toward Gaskell’s use of the method of documentary record in *Mary Barton*?

- (A) Uncritical enthusiasm
- (B) Unresolved ambivalence
- (C) Qualified approval
- (D) Resigned acceptance
- (E) Mild irritation

13.2. According to the passage, *Mary Barton* and the early novels of D. H. Lawrence share which of the following?

- (A) Depiction of the feelings of working-class families
- (B) Documentary objectivity about working-class circumstances
- (C) Richly detailed description of working-class adjustment to urban life
- (D) Imaginatively structured plots about working-class characters
- (E) Experimental prose style based on working-class dialect

13.3. Which of the following is most closely analogous to Job Legh in *Mary Barton*, as that character is described in the passage?

- (A) An entomologist who collected butterflies as a child
- (B) A small-town attorney whose hobby is nature photography
- (C) A young man who leaves his family’s dairy farm to start his own business
- (D) A city dweller who raises exotic plants on the roof of his apartment building
- (E) A union organizer who works in a textile mill under dangerous conditions

13.4. It can be inferred from examples given in the last paragraph of the passage that which of the following was part of “the new and crushing experience of industrialism” (lines 46-47) for many members of the English working class in the nineteenth century?

- (A) Extortionate food prices
- (B) Geographical displacement
- (C) Hazardous working conditions

(D) Alienation from fellow workers

(E) Dissolution of family ties

13.5. It can be inferred that the author of the passage believes that Mary Barton might have been an even better novel if Gaskell had

(A) concentrated on the emotions of a single character

(B) made no attempt to re-create experiences of which she had no firsthand knowledge

(C) made no attempt to reproduce working-class dialects

(D) grown up in an industrial city

(E) managed to transcend her position as an outsider

13.6. Which of the following phrases could best be substituted for the phrase “this aspect of Mary Barton” in line 29 without changing the meaning of the passage as a whole?

(A) the material details in an urban working-class environment

(B) the influence of Mary Barton on Lawrence’s early work

(C) the place of Mary Barton in the development of the English novel

(D) the extent of the poverty and physical suffering among England’s industrial workers in the 1840’s

(E) the portrayal of the particular feelings and responses of working-class characters

13.7. The author of the passage describes Mary Barton as each of the following EXCEPT:

(A) insightful

(B) meticulous

(C) vivid

(D) poignant

(E) lyrical

KEY: CADBEEE

#### 14. 冰川沉积物

Tills are commonly classified according to the perceived process of deposition. However, it is increasingly recognised that this classification, which is mainly based on macroscopic field data, has severe limitations. At the same time the concept of the deforming glacier bed has become more realistic as a framework for discussing tills and their properties, and this (tectonic) concept is irreconcilable with the existing (depositional) till classification scheme. Over the last 20 years large thin sections have been used to study tills, which has provided new insights into the textural and structural properties of tills. These results have revolutionised till sedimentology as they show that, in the main, subglacial tills possess deformational characteristics. Depositional properties are rare.

Based on this new insight the process of subglacial till formation is discussed in terms of glacier/ice sheet basal velocity, clay, water and carbonate content and the variability of these properties in space and time. The end result of this discussion is: till, the deforming glacier bed. To distinguish subglacial till from depositional sediments the term ‘tectomict’ is proposed. Within the single

framework of subglacial till as the deforming glacier bed, many textural, structural and geomorphological features of till beds can be more clearly and coherently explained and understood.

15. 云和气候变化预测 1996年04月北美 D9604

As of the late 1980's, neither theorists nor large-scale computer climate models could accurately predict whether cloud systems would help or hurt a warming globe. Some studies suggested that a four percent increase in stratocumulus clouds over the ocean could compensate for a doubling in atmospheric carbon dioxide, preventing a potentially disastrous planetwide temperature increase. On the other hand, an increase in cirrus clouds could increase global warming.

That clouds represented the weakest element in climate models was illustrated by a study of fourteen such models. Comparing climate forecasts for a world with double the current amount of carbon dioxide, researchers found that the models agreed quite well if clouds were not included. But when clouds were incorporated, a wide range of forecasts was produced. With such discrepancies plaguing the models, scientists could not easily predict how quickly the world's climate would change, nor could they tell which regions would face dustier droughts or deadlier monsoons.

15.1. The author of the passage is primarily concerned with

- (A) confirming a theory
- (B) supporting a statement
- (C) presenting new information
- (D) predicting future discoveries
- (E) reconciling discrepant findings

15.2. It can be inferred that one reason the fourteen models described in the passage failed to agree was that

- (A) they failed to incorporate the most up-to-date information about the effect of clouds on climate
- (B) they were based on faulty information about factors other than clouds that affect climate
- (C) they were based on different assumptions about the overall effects of clouds on climate
- (D) their originators disagreed about the kinds of forecasts the models should provide
- (E) their originators disagreed about the factors other than clouds that should be included in the models

15.3. It can be inferred that the primary purpose of the models included in the study discussed in the second paragraph of the passage was to

- (A) predict future changes in the world's climate
- (B) predict the effects of cloud systems on the world's climate
- (C) find a way to prevent a disastrous planetwide temperature increase
- (D) assess the percentage of the Earth's surface covered by cloud systems
- (E) estimate by how much the amount of carbon dioxide in the Earth's atmosphere will increase

15.4. The information in the passage suggests that scientists would have to answer which of the following questions in order to predict the effect of clouds on the warming of the globe?

- (A) What kinds of cloud systems will form over the Earth?
- (B) How can cloud systems be encouraged to form over the ocean?
- (C) What are the causes of the projected planetwide temperature increase?
- (D) What proportion of cloud systems are currently composed of cirrus of clouds?
- (E) What proportion of the clouds in the atmosphere form over land masses?

答案: B C A A

#### 16. Supernova D 89-12

Astronomers observe a supernova that is dimmer than expected because of dust screening. If a supernova (the explosion of a massive star) triggered star formation from dense clouds of gas and dust, and if the most massive star to be formed from the cloud evolved into a supernova and triggered a new round of star formation, and so on, then a chain of star-forming regions would result. If many such chains were created in a differentially rotating galaxy, the distribution of stars would resemble the observed distribution in a spiral galaxy.

This line of reasoning underlies an exciting new theory of spiral-galaxy structure. A computer simulation based on this theory has reproduced the appearance of many spiral galaxies without assuming an underlying density wave, the hallmark of the most widely accepted theory of the large-scale structure of spiral galaxies. That theory maintains that a density wave of spiral form sweeps through the central plane of a galaxy, compressing clouds of gas and dust, which collapse into stars that form a spiral pattern.

相关文章:

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16.1. The primary purpose of the passage is to

- (A) describe what results when a supernova triggers the creation of chains of star-forming regions
- (B) propose a modification in the most widely accepted theory of spiral-galaxy structure

- (C) compare and contrast the roles of clouds of gas and dust in two theories of spiral-galaxy structure
- (D) describe a new theory of spiral-galaxy structure and contrast it with the most widely accepted theory
- (E) describe a new theory of spiral-galaxy structure and discuss a reason why it is inferior to the most widely accepted theory

16.2. The passage implies that, according to the new theory of spiral-galaxy structure, a spiral galaxy can be created by supernovas when the supernovas are

- (A) producing an underlying density wave
- (B) affected by a density wave of spiral form
- (C) distributed in a spiral pattern
- (D) located in the central plane of a galaxy
- (E) located in a differentially rotating galaxy

16.3. Which of the following, if true, would most discredit the new theory as described in the passage?

- (A) The exact mechanism by which a star becomes a supernova is not yet completely known and may even differ for different stars.
- (B) Chains of star-forming regions like those postulated in the new theory have been observed in the vicinity of dense clouds of gas and dust.
- (C) The most massive stars formed from supernova explosions are unlikely to evolve into supernovas.
- (D) Computer simulations of supernovas provide a poor picture of what occurs just before a supernova explosion.
- (E) A density wave cannot compress clouds of gas and dust to a density high enough to create a star.

答案: DEC

#### 17. 鸟叫研究 新题

Over the years, biologists have suggested two main pathways by which sexual selection may have shaped the evolution of male birdsong. In the first, male competition and intrasexual selection produce relatively short, simple songs used mainly in territorial behavior. In the second, female choice and intersexual selection produce longer, more complicated songs used mainly in mate attraction; like such visual ornamentation as the peacock's tail, elaborate vocal characteristics increase the male's chances of being chosen as a mate, and he thus enjoys more reproductive success than his less ostentatious rivals. The two pathways are not mutually exclusive, and we can expect to find examples that reflect their interaction. Teasing them apart has been an important challenge to evolutionary biologists.

Early research confirmed the role of intrasexual selection. In a variety of experiments in the field, males responded aggressively to recorded songs by exhibiting territorial behavior near the speakers. The breakthrough for research into intersexual selection came in the development of a new technique for investigating female response in the laboratory. When female cowbirds raised in isolation in sound-proof chambers were exposed to recordings of male song, they responded by exhibiting mating behavior. By quantifying the responses, researchers were able to determine what particular features of

the song were most important. In further experiments on song sparrows, researchers found that when exposed to a single song type repeated several times or to a repertoire of different song types, females responded more to the latter. The beauty of the experimental design is that it effectively rules out confounding variables; acoustic isolation assures that the female can respond only to the song structure itself.

If intersexual selection operates as theorized, males with more complicated songs should not only attract females more readily but should also enjoy greater reproductive success. At first, however, researchers doing fieldwork with song sparrows found no correlation between larger repertoires and early mating, which has been shown to be one indicator of reproductive success; further, common measures of male quality used to predict reproductive success, such as weight, size, age, and territory, also failed to correlate with song complexity.

The confirmation researchers had been seeking was finally achieved in studies involving two varieties of warblers. Unlike the song sparrow, which repeats one of its several song types in bouts before switching to another, the warbler continuously composes much longer and more variable songs without repetition. For the first time, researchers found a significant correlation between repertoire size and early mating, and they discovered further that repertoire size had a more significant effect than any other measure of male quality on the number of young produced. The evidence suggests that warblers use their extremely elaborate songs primarily to attract females, clearly confirming the effect of intersexual selection on the evolution of birdsong.

17.1. The passage is primarily concerned with

- (A) showing that intrasexual selection has a greater effect on birdsong than does intersexual selection
- (B) contrasting the role of song complexity in several species of birds
- (C) describing research confirming the suspected relationship between intersexual selection and the complexity of birdsong
- (D) demonstrating the superiority of laboratory work over field studies in evolutionary biology
- (E) illustrating the effectiveness of a particular approach to experimental design in evolutionary biology

17.2. The author mentions the peacock's tail in line 8 most probably in order to

- (A) cite an exception to the theory of the relationship between intrasexual selection and male competition
- (B) illustrate the importance of both of the pathways that shaped the evolution of birdsong
- (C) draw a distinction between competing theories of intersexual selection
- (D) give an example of a feature that may have evolved through intersexual selection by female choice
- (E) refute a commonly held assumption about the role of song in mate attraction

17.3. According to the passage, which of the following is specifically related to intrasexual selection?

- (A) Female choice
- (B) Territorial behavior



- (C) Complex song types
- (D) Large song repertoires
- (E) Visual ornamentation

17.4. Which of the following, if true, would most clearly demonstrate the interaction mentioned in lines 11-13?

- (A) Female larks respond similarly both to short, simple songs and to longer, more complicated songs.
- (B) Male canaries use visual ornamentation as well as elaborate song repertoires for mate attraction.
- (C) Both male and female blackbirds develop elaborate visual and vocal characteristics.
- (D) Male jays use songs to compete among themselves and to attract females.
- (E) Male robins with elaborate visual ornamentation have as much reproductive success as rivals with elaborate vocal characteristics.

17.5. The passage indicates that researchers raised female cowbirds in acoustic isolation in order to

- (A) eliminate confounding variables
- (B) approximate field conditions
- (C) measure reproductive success
- (D) quantify repertoire complexity
- (E) prevent early mating

17.6. According to the passage, the song sparrow is unlike the warbler in that the song sparrow

- (A) uses songs mainly in territorial behavior
- (B) continuously composes long and complex songs
- (C) has a much larger song repertoire
- (D) repeats one song type before switching to another
- (E) responds aggressively to recorded songs

17.7. The passage suggests that the song sparrow experiments mentioned in lines 37-43 failed to confirm the role of intersexual selection because

- (A) females were allowed to respond only to the song structure
- (B) song sparrows are unlike other species of birds
- (C) the experiments provided no evidence that elaborate songs increased male reproductive success
- (D) the experiments included the songs of only a small number of different song sparrows
- (E) the experiments duplicated some of the limitations of previous field studies

答案: CDBDADC

18. 恐龙灭绝和行星撞地球(逻辑)

Iridium, a hard, whitish metal similar to platinum, is extremely rare on Earth. Extremely high concentrations of iridium on Earth result from only two scenarios: massive volcanic eruptions that release iridium from deep within the Earth and meteorites that shower down on Earth from space. When scientists found concentrations of iridium 30 times higher than normal in rock stratum from 65



million years ago, they concluded that a massive meteor or comet hit the Earth and caused the massive extinction of the dinosaurs.

Which of the following, if true, most strongly supports the scientist's conclusion?

- A. Volcanoes massive enough to generate high concentrations of iridium are very rare.
- B. Massive volcanic eruptions occurred frequently 80 million years ago.
- C. Most scientists support the hypothesis that a cosmic impact wiped out the dinosaurs.
- D. The massive extinction that occurred 70 million years ago killed not only the dinosaurs but also 70 percent of all life on Earth.
- E. A comet struck the earth some 120 million years ago, but no widespread extinction occurred.

答案：

19. Design---Engineering: D 9504

Many objects in daily use have clearly been influenced by science, but their form and function, their dimensions and appearance, were determined by technologists, artisans, designers, inventors, and engineers—using non-scientific modes of thought. Many features and qualities of the objects that a technologist thinks about cannot be reduced to unambiguous verbal descriptions; they are dealt with in the mind by a visual, nonverbal process. In the development of Western technology, it has been non-verbal thinking, by and large, that has fixed the outlines and filled in the details of our material surroundings. Pyramids, cathedrals, and rockets exist not because of geometry or thermodynamics, but because they were first a picture in the minds of those who built them.

The creative shaping process of a technologist's mind can be seen in nearly every artifact that exists. For example, in designing a diesel engine, a technologist might impress individual ways of nonverbal thinking on the machine by continually using an intuitive sense of rightness and fitness. What would be the shape of the combustion chamber? Where should the valves be placed? Should it have a long or short piston? Such questions have a range of answers that are supplied by experience, by physical requirements, by limitations of available space, and not least by a sense of form. Some decisions, such as wall thickness and pin diameter, may depend on scientific calculations, but the nonscientific component of design remains primary.

Design courses, then, should be an essential element in engineering curricula. Nonverbal thinking, a central mechanism in engineering design, involves perceptions, the stock-in-trade of the artist, not the scientist. Because perceptive processes are not assumed to entail "hard thinking," nonverbal thought is sometimes seen as a primitive stage in the development of cognitive processes and inferior to verbal or mathematical thought. But it is paradoxical that when the staff of the Historic American Engineering Record wished to have drawings made of machines and isometric views of industrial processes for its historical record of American engineering, the only college students with the requisite abilities were not engineering students, but rather students attending architectural schools.

If courses in design, which in a strongly analytical engineering curriculum provide the background required for practical problem-solving, are not provided, we can expect to encounter silly but costly errors occurring in advanced engineering systems. For example, early models of high-speed railroad cars loaded with sophisticated controls were unable to operate in a snowstorm because a fan sucked snow into the electrical system. Absurd random failures that plague automatic control systems are not merely trivial aberrations; they are a reflection of the chaos that results when design is assumed to be primarily a problem in mathematics.

19.1. In the passage, the author is primarily concerned with

- (A) identifying the kinds of thinking that are used by technologists
- (B) stressing the importance of nonverbal thinking in engineering design
- (C) proposing a new role for nonscientific thinking in the development of technology
- (D) contrasting the goals of engineers with those of technologists
- (E) criticizing engineering schools for emphasizing science in engineering curricula

19.2. It can be inferred that the author thinks engineering curricula are

- (A) strengthened when they include courses in design
- (B) weakened by the substitution of physical science courses for courses designed to develop mathematical skills
- (C) strong because nonverbal thinking is still emphasized by most of the courses
- (D) strong despite the errors that graduates of such curricula have made in the development of automatic control systems
- (E) strong despite the absence of nonscientific modes of thinking

19.3. Which of the following statements best illustrates the main point of lines 1-28 of the passage?

- (A) When a machine like a rotary engine malfunctions, it is the technologist who is best equipped to repair it.
- (B) Each component of an automobile—for example, the engine or the fuel tank—has a shape that has been scientifically determined to be best suited to that component's function.
- (C) A telephone is a complex instrument designed by technologists using only nonverbal thought.
- (D) The designer of a new refrigerator should consider the designs of other refrigerators before deciding on its final form.
- (E) The distinctive features of a suspension bridge reflect its designer's conceptualization as well as the physical requirements of its site.

19.4. Which of the following statements would best serve as an introduction to the passage?

- (A) The assumption that the knowledge incorporated in technological developments must be derived from science ignores the many non-scientific decisions made by technologists.
- (B) Analytical thought is no longer a vital component in the success of technological development.
- (C) As knowledge of technology has increased, the tendency has been to lose sight of the important role played by scientific thought in making decisions about form, arrangement, and texture.

(D) A movement in engineering colleges toward a technician's degree reflects a demand for graduates who have the nonverbal reasoning ability that was once common among engineers.

(E) A technologist thinking about a machine, reasoning through the successive steps in a dynamic process, can actually turn the machine over mentally.

19.5 The author calls the predicament faced by the Historic American Engineering Record "paradoxical" (lines 36-37) most probably because

(A) the publication needed drawings that its own staff could not make

(B) architectural schools offered but did not require engineering design courses for their students

(C) college students were qualified to make the drawings while practicing engineers were not

(D) the drawings needed were so complicated that even students in architectural schools had difficulty making them

(E) engineering students were not trained to make the type of drawings needed to record the development of their own discipline

19.6. According to the passage, random failures in automatic control systems are "not merely trivial aberrations" (lines 53) because

(A) automatic control systems are designed by engineers who have little practical experience in the field

(B) the failures are characteristic of systems designed by engineers relying too heavily on concepts in mathematics

(C) the failures occur too often to be taken lightly

(D) designers of automatic control systems have too little training in the analysis of mechanical difficulties

(E) designers of automatic control systems need more help from scientists who have a better understanding of the analytical problems to be solved before such systems can work efficiently

19.7. The author uses the example of the early models of high-speed railroad cars primarily to

(A) weaken the argument that modern engineering systems have major defects because of an absence of design courses in engineering curricula

(B) support the thesis that the number of errors in modern engineering systems is likely to increase

(C) illustrate the idea that courses in design are the most effective means for reducing the cost of designing engineering systems

(D) support the contention that a lack of attention to the nonscientific aspects of design results in poor conceptualization by engineers

(E) weaken the proposition that mathematics is a necessary part of the study of design

答案: BAEAEBD

20. 能源消费 (逻辑)

Between 1970 and 1980, energy consumption by United States industry peaked and then declined, so that by 1980 total industrial use of energy was below the 1970 level even though total industrial output

had grown substantially in the same period. Industry must have instituted highly effective energy conservation measures in those years to have achieved such impressive results.

Which of the following, if true, most seriously weakens the conclusion of the argument?

- (A) Many industries switched to the greatest extent possible from high-priced oil to lower-priced alternatives throughout the 1970's.
- (B) Total residential energy consumption was higher in the United States in 1980 than it had been in 1970
- (C) Many industrial users of energy had paid little attention to energy conservation prior to 1970.
- (D) Industrial output grew less rapidly from 1970 to 1980 than it had from 1960 to 1970.
- (E) The industries whose production dropped sharply during the 1970's included a disproportionately large number of energy-intensive industries.

21. 地球冷暖周期通过石头含铁量推定 新题

Recent studies of sediment in the North Atlantic's deepwaters reveal possible cyclical patterns in the history of Earth's climate. Therock fragments in these sediments are too large to have been transported thereby ocean currents; they must have reached their present locations by travelingin large icebergs that floated long distances from their point of origin beforemelting.

Geologist Gerard Bond noticed that some of the sedimentgrains were stained with ironoxide, evidence that they originated in localeswhere glaciers had overrun outcrops of red sandstone. Bond's detailed analysisof deep-water sediment cores showed changes in the mix of sediment sources overtime: the proportion of these red-stained grains fluctuated back and forth fromlows of 5 percent to highs of about 17 percent, and these fluctuations occurredin a nearly regular 1,500-year cycle.

Bond hypothesized that the alternating cycles might bevidence of changes in ocean-water circulation and therefore in Earth'sclimate. He knew that the sources of the red-stained grains were generallycloser to the North Pole than were the places yielding a high proportion of "clean" grains. At certain times, apparently, more icebergs from the ArcticOcean in the far north were traveling south well into the North Atlantic beforemelting and shedding their sediment. Ocean waters are constantly moving, andwater temperature is both a cause and an effect of this movement. As watercools, it becomes denser and sinks to the ocean's bottom. During some periods,the bottom layer of the world's oceans comes from cold, dense water sinking inthe far North Atlantic. This causes the warm surface waters of the Gulf Streamto be pulled northward. Bond realized that during such periods, the influx ofthese warm surface waters into northern regions could cause a large proportionof the icebergs that bear red grains to melt before traveling very far into theNorth Atlantic. But sometimes the ocean's dynamic changes, and waters from theGulf Stream do not travel northward in this way. During these periods, surfacewaters in the North Atlantic would generally be colder, permitting icebergsbearing red-stained grains to travel farther south in the North Atlantic beforemelting and depositing their sediment.

The onset of the so-called Little Ice Age (1300-1860), which followed the Medieval Warm Period of the eighth through tenth centuries, may represent the most recent time that the ocean's dynamic changed in this way. If ongoing climate-history studies support Bond's hypothesis of 1,500-year cycles, scientists may establish a major natural rhythm in Earth's temperatures that could then be extrapolated into the future. Because the midpoint of the Medieval Warm Period was about A.D. 850, an extension of Bond's cycles would place the midpoint of the next warm interval in the twenty-fourth century.

21.1. According to the passage, which of the following is true of the rock fragments contained in the sediments studied by Bond?

- A. The majority of them are composed of red sandstone.
- B. They must have reached their present location over 1,500 years ago.
- C. They were carried by icebergs to their present location.
- D. Most of them were carried to their present location during a warm period in Earth's climatic history.
- E. They are unlikely to have been carried to their present location during the Little Ice Age.

21.2. In the final paragraph of the passage (lines 27-33), the author is concerned primarily with

- A. answering a question about Earth's climatic history
- B. pointing out a potential flaw in Bond's hypothesis
- C. suggesting a new focus for the study of ocean sediments
- D. tracing the general history of Earth's climate
- E. discussing possible implications of Bond's hypothesis

21.3. According to the passage, Bond hypothesized that which of the following circumstances would allow red-stained sediment grains to reach more southerly latitudes?

- A. Warm waters being pulled northward from the Gulf Stream
- B. Climatic conditions causing icebergs to melt relatively quickly
- C. Icebergs containing a higher proportion of iron oxide than usual
- D. The formation of more icebergs than usual in the far north
- E. The presence of cold surface waters in the North Atlantic

21.4. It can be inferred from the passage that in sediment cores from the North Atlantic's deep waters, the portions that correspond to the Little Ice Age

- A. differ very little in composition from the portions that correspond to the Medieval Warm Period
- B. fluctuate significantly in composition between the portions corresponding to the 1300s and the portions corresponding to the 1700s
- C. would be likely to contain a proportion of red-stained grains closer to 17 percent than to 5 percent
- D. show a much higher proportion of red-stained grains in cores extracted from the far north of the North Atlantic than in cores extracted from further south
- E. were formed in part as

答案: CEEC

## 22. 飞鼠寻找食物

The objective of this study was to evaluate how northern flying squirrels (*Glaucomys sabrinus*) locate truffles (*Gautieria monticola*), a subterranean and ephemeral but primary food source. Thus, we evaluated the importance of three factors to the foraging behavior of northern flying squirrels: (i) olfactory chemicals that emanate from truffles; (ii) the presence of coarse woody debris (decaying logs), which are often associated with fungi; and (iii) we explored the potential role animal memory could play in truffle detection as well. In a foraging arena, squirrels successfully retrieved buried truffles that lacked aboveground cues in 19 of 30 trials and failed to search near treatments that lacked truffles altogether, confirming the importance of olfaction to squirrel foraging. However, squirrels also retrieved truffles that were associated most frequently with surface logs (27 of 30). In addition, the initial detection rate of the truffle + log treatment was significantly greater than the truffle-only treatment. Thus, although squirrels search for truffles primarily using olfaction, they may also benefit by searching near coarse woody debris on the forest floor as an aboveground cue to truffle locations. In addition, because 82% of Sierra Nevada truffle-fruited locations that were marked in 1996 yielded truffles again the following 2 years, mycophagous animals like northern flying squirrels may benefit by memorizing fruiting locations and foraging at these same locations from year to year.

## 23. 戏剧家Lloyd Webber

A standard criticism of Lloyd Webber, especially from drama critics, is that his music is derivative—a gloss on his betters when it is not an outright theft. Since most drama critics are, to put it charitably, nonmusical, this is an odd criticism, and one that smacks of received opinion: "Puccini-esque" is a term one encounters often in criticism of Lloyd Webber's music, but aside from "Growltiger's Last Stand," which parodies the first-act love duet from *Madama Butterfly*, there is precious little Puccini in *Cats*.

Indeed, Lloyd Webber has always been more highly regarded by music critics, who not only know the repertoire he is alleged to be pilfering, but also can place him correctly in a dramatic-operatic context. Far from being the love child of Puccini and Barry Manilow, as some would have it, Lloyd Webber is more correctly seen as a kind of latter-day Giacomo Meyerbeer, the king of the Paris Opera in the mid-19th century, whose name was synonymous with spectacle. But a little ignorance goes a long way, and with "Memory" the notion that Lloyd Webber is a secondhand pastiche artist—if not an outright plagiarist—got its start.

This is partly Lloyd Webber's own fault. His melodies sometimes skirt perilously close to earlier classical and Broadway sources, and while the showbiz axiom that "good writers borrow, great writers steal" may well apply, it is also true that some of his tunes, both large and small, evoke earlier sources. As drama critic John Simon wrote after the premiere of *Phantom*: "It's not so much that Lloyd Webber lacks an ear for melody as that he has too much of a one for other people's melodies.... I predict that Gershwin and Rodgers, let alone Puccini and Ravel (another of his magnets), have nothing to fear from him." Other critics have been less subtle: "Webber's music isn't so painful to hear, if you don't mind its being so soiled from previous use," wrote Michael Feingold of the *Village Voice*.

24. 蝴蝶产卵 (逻辑)

Upon maturity, monarch butterflies travel hundreds of miles from their places of origin and lay their eggs on milkweed. The caterpillars that emerge feed on milkweed and absorb the glycosides in milkweed sap. The specific glycosides present in milkweed differ from region to region within the monarch butterfly's range. Mature butterflies retain the glycosides in a mature monarch butterfly could be used to determine its place of origin.

Which of the following, if true, most strengthens the argument?

- A. Mature monarch butterflies do not feed on parts of milkweed that contain glycosides.
- B. The glycosides in milkweed sap are slightly toxic to caterpillars of other species.
- C. The vast majority of the monarch butterflies that are laying eggs in a given region will have traveled there from a single region.
- D. There are substances other than glycosides in milkweed sap that accumulate in a monarch caterpillar and are retained in the body of the mature butterfly.
- E. There are certain glycosides that are found in the sap of all milkweeds, no matter where they grow within the monarch butterfly's range.

25. Sea Cow

The disappearance of Steller's sea cow from the Bering and Copper is lands by 1768 has long been blamed on intensive hunting. But its disappearance took only 28 years from the time Steller first described the species, a remarkably short time for hunting alone to depopulate the is lands, especially given the large populations initially reported. However, by 1750, hunters had also targeted nearby sea otter populations. Fewer otters would have allowed sea urchin populations on which the otters preyed to expand and the urchins' grazing pressure on kelp forests to increase. Sea cows were totally dependent on kelp for food, and within a decade of the onset of otter hunting Steller noted that the is lands' sea cows appeared malnourished.

1. Which of the following can be inferred from the passage about kelp forests in the Bering and Copper is lands between 1750 and 1768?

- A. They were reduced significantly.
- B. They disappeared entirely from the region.
- C. They were the primary food source for sea otters.
- D. They were harvested in record numbers by humans.
- E. They increased pressure on sea urchin populations.

2. According to the passage, it is likely that during the mid-1700s, sea urchin populations near the Bering and Copper is lands

- A. were diminished by sea cow predation
- B. experienced substantial increases
- C. migrated to waters with more plentiful food supplies
- D. were reduced by the pressures of hunting
- E. appeared to be malnourished



答案: A B

26. 舞蹈物理动作分析 1994年02月 D9402

Analyzing the physics of dance can add fundamentally to a dancer's skill. Although dancers seldom see themselves totally in physical terms—as body mass moving through space under the influence of well-known forces and obeying physical laws—neither can they afford to ignore the physics of movement. For example, no matter how much a dancer wishes to leap off the floor and then start turning, the law of conservation of angular momentum absolutely prevents such a movement.

Some movements involving primarily vertical or horizontal motions of the body as a whole, in which rotations can be ignored, can be studied using simple equations of linear motion in three dimensions. However, rotational motions require more complex approaches that involve analyses of the way the body's mass is distributed, the axes of rotation involved in different types of movement, and the sources of the forces that produce the rotational movement.

26.1 The primary purpose of the passage is to

- (A) initiate a debate over two approaches to analyzing a field of study
- (B) describe how one field of knowledge can be applied to another field
- (C) point out the contradictions between two distinct theories
- (D) define and elaborate on an accepted scientific principle
- (E) discuss the application of a new theory within a new setting

26.2. The author mentions all of the following as contributing to an understanding of the physics of dance EXCEPT:

- (A) the law of conservation of angular momentum
- (B) analyses of the way in which the body's mass is distributed
- (C) equations of linear motion in three dimensions
- (D) analyses of the sources that produce rotational motions
- (E) the technical terms for movements such as leaps and turns

26.3. The author implies that dancers can become more skilled by doing which of the following?

- (A) Ignoring rotational movements
- (B) Understanding the forces that permit various movements
- (C) Solving simple linear equations
- (D) Learning the technical terms utilized by choreographers
- (E) Circumventing the law of conservation of angular momentum

26.4. Analysis of which of the following would require the kind of complex approach described in the last sentence?

- (A) A long leap across space



- (B) A short jump upward with a return to the same place
- (C) A sustained and controlled turn in place
- (D) Short, rapid steps forward and then backward without turning
- (E) Quick side steps in a diagonal line

答案: BEBC

27. 11月3日GRE考试原文: Music---Landowska

when, in the twentieth century, the concept of the virtuoso-as-hero retired, as a replacement came the scholar-pianist, the musician-pianist, the re-creator of the composers' thoughts. With this change came the abdication of technique. Virtuosity in and of itself, indeed, became something of a dirty word. One of the important new figures, though she was a harpsichordist and not a pianist, was Wanda Landowska, she was the one who demonstrated how Bach, Handel, Scarlet and Couperin sounded on the instrument for which their music was originally conceived. It would be a mistake to consider Landowska a classicist, however. She had been born in an age of romantic playing, an age dominated by the figures of Liszt, Leschetisky and their pupils. Thus she grew up with certain romantic traditions of performance and whatever the stringency of her musical scholarship, for Landowska knew how to hold an audience breathless and when she gave a recital, it was to the accompaniment that all great artists receive deathlike silence and rapt attention.

Her playing was romantic, but who is to say that it was not closer to Bach than the dry munching of some later harpsichordists? She had a miraculous equality of touch, with a left hand that seemed to say the least, colorful. But no artist in this generation (and, one is confident, in any generation) could clarify with such deftness the polyphonic writing of the baroque masters. And none could make the music so spring to life.

Her secret was a lifetime of scholarship, plus perfect technical equipment and resilient rhythm, all combined with knowledge of just when not to hold the printed note sacrosanct. Of course, that alone demands a lifetime of knowledge. She was a genius at underlining the dramatic and did have meaning and emotional significance. She took liberties, all kinds of liberties, but like all great artists she could get away with them. In short, her entire musical approach was romantic: intensely personal, full of light and shade, never pedantic.

Thanks to Landowska, Bach began to sound thick when played on the piano. One by one, pianists stopped playing Bach as adapted by Liszt, Bach as adapted by Tausig. Then they began to think twice before performing any kind of baroque music, including even Scarlatti. The piano repertoire, it began to be felt, was extensive enough without reverting to transcriptions and Bach and Scarlatti on the piano were in a way, transcriptions no matter how faithfully the original notes were played. In line with this kind of purity came the emphasis on the back to nature study of the composers' manuscripts that has continued to the present, will continue and is something new in the scheme of things.

28. Maya遗迹

The results from an autecological study of the growth, reproduction, and population dynamics of *Brosimum alicastrum* (ramon) in southern Mexico are applied to the controversy surrounding the use of this species in Maya subsistence practice. The frequent occurrence of *B. alicastrum* near ruins is

explained by its competitive advantage on shallow limestone soils coupled with a continual input of bat-dispersed seed. Populations of the tree at Tikal are then compared with other naturally occurring populations as an example of how a detailed ecological analysis may furnish valuable insight into the historical use of a plant species. The Tikal populations are shown to be atypical in terms of phenology, productivity and breeding systems, suggesting that some form of artificial selection may have been practiced by the Maya.

## 29. Snowshoe hare population

The snowshoe hare is one of the northern mammals that go through periodic cycles of changes in their populations. Over a period of years, their population will increase in numbers and then suddenly crash to very low numbers, only to rise again. Snowshoe hare tend to cycle about once every ten years. The snowshoe hare cycle is one of the best known and fur trappers and traders working in northern Canada first described it. In 1865, traders with the Hudson's Bay Company were flooded by hare pelts brought in by trappers. But, by 1870, only a few hare pelts trickled in. This pattern of high and low abundance of hare pelts repeated itself over and over, roughly every ten years.

Snowshoe hares are a dominant herbivore in northern forest ecosystems. In Alaska and western Canada, their populations cycle over 8 to 11 years. The difference in densities and abundance during the cycle are extreme. Densities as high as 4,000 hares per square kilometer (or 10,000 hares per square mile) have been estimated at the peak (or high point) of the cycle. These populations can "crash" to densities of less than one hare per square kilometer (or 2.6 hares per square mile) within a period of one year. The populations slowly increase to peak densities over the next 6 to 13 years. The densities during peak years, however, are not always the same.

Just what is it that drives the snowshoe hare cycle? This question has puzzled people living in northern areas and scientists for many years. On a broad scale, it may be the 22- year sunspot cycle and its effects on boreal forest weather patterns or forest fires. On a smaller scale, the cycles may be affected by over browsing the food supply, predators, shock disease due to stress, parasites, or a combination of these. The primary theory pertaining to the snowshoe hare population cycle describes the mechanics as a combination of predators and browse (food) availability. During the peak of their cycle, hares eat a large proportion of the shrubs available in their area. They can also kill many of the shrubs in their area by chewing through the outer layer of bark. Over-browsing of shrubs results in a food-shortage that causes malnourishment, starvation, and reduced reproduction. This leads to the start of the population crash or decline. Also, as food supplies decrease, the health of hares declines and makes many individuals more vulnerable to predators and disease. In the western Yukon, scientists believe that the hare cycle is caused by changes in food supply and predation. The declines and increases in the population of hares were influenced by the reproductive rates of adult hares and the survival rates of all ages of hares.

## 30. Supernovae & Obscuration by dust

Recently, significant progress has been made by using Type Ia supernovae as "standardizable candles". Supernovae are rare - perhaps a few per century in a Milky-Way-sized galaxy - but modern telescopes allow observers to probe very deeply into small regions of the sky, covering a very large number of galaxies in a single observing run. Supernovae are also bright, and Type Ia's in particular all seem to be of nearly uniform intrinsic luminosity (absolute magnitude, typically comparable to the brightness of the entire host galaxy in which they appear). They can therefore be detected at high redshifts, allowing in principle a good handle on cosmological effects.

Obscuration by dust is the leading concern about the reliability of the supernova results. Ordinary astrophysical dust does not obscure equally at all wavelengths, but scatters blue light preferentially, leading to the well-known phenomenon of "reddening". Spectral measurements by the two supernova teams reveal a negligible amount of reddening, implying that any hypothetical dust must be a novel "grey" variety. This possibility has been investigated by a number of authors. These studies have found that even grey dust is highly constrained by observations: first, it is likely to be intergalactic rather than within galaxies, or it would lead to additional dispersion in the magnitudes of the supernovae; and second, intergalactic dust would absorb ultraviolet/optical radiation and re-emit it at far infrared wavelengths, leading to stringent constraints from observations of the cosmological far-infrared background. Thus, while the possibility of obscuration has not been entirely eliminated, it requires a novel kind of dust which is already highly constrained (and may be convincingly ruled out by further observations).

### 31. 星系吞食

Galactic cannibalism refers to the process by which a large galaxy, through tidal gravitational interactions with a companion, merges with that companion, resulting in a larger, often irregular galaxy. The most common result of the gravitational merger of two or more galaxies is an irregular galaxy of one form or another, although elliptical galaxies may also result.

It has been suggested that galactic cannibalism is currently occurring between the Milky Way and the Large and Small Magellanic Clouds. Streams of gravitationally-attracted hydrogen arcing from these dwarf galaxies to the Milky Way is taken as evidence for this theory.

A long time ago, in a galaxy far, far away, the real battle of "star wars" was wreaking havoc on two galaxies. These two galaxies, known as the "Antennae Galaxies," were locked in a cosmic battle of tug-of-war. This process of galactic destruction is more common than once thought, and may even contribute to the growth of some galaxies. Figure 1: The Antennae Galaxies. Each galaxy contains billions and billions of stars. This makes galaxies extraordinarily heavy, or massive, and massive objects can exert very strong gravitational forces in space. Just as Earth can "feel" the pull of the Sun from millions of miles away, so too can a galaxy "feel" the gravitational tug of another galaxy. This gravitational tug is much stronger for massive objects like galaxies than it is for our Sun, so galaxies that are millions of light-years away from each other can still feel the pull of another massive galaxy, even though they are so far apart. Like the Antennae Galaxies (Figure 1), two galaxies that feel the tug of each other will race towards each other at incredible speeds, eventually colliding in a galactic

display of fireworks.

So how do we know if two galaxies are in the process of merging? We cannot simply say that two galaxies that look close together are going to collide; we often see images containing two or more galaxies lying on top of each other and that are millions of light years away from each other! Astronomers can use various tools to find the distances between galaxies, which can tell us if the galaxies are close enough to be merging; however, a much easier method is to look for distorted galaxies. The first signs of war are streams of stars that are pulled out from each galaxy<sup>2</sup>. In Figure 2 below, we can see a large stream of stars, dust, and gas that is being plucked out from the galaxy on the left by its neighboring galaxy. The explanation for this stream is relatively straightforward, but wordy. First, let's label the galaxy on the left "Galaxy A" and the galaxy on the right "Galaxy B". As the two galaxies approach each other, the stars in Galaxy A will all feel the gravitational pull of Galaxy B. However, because the stars on the right side of Galaxy A are closer to Galaxy B, they will feel a stronger pull. This is due to the fact that the force of gravity is inversely proportional to distance (i.e., objects close to a massive object will feel a stronger force, or tug, than objects far away). Eventually the two galaxies will get so close that Galaxy A will not be able to hold on to its stars closest to Galaxy B. The gravitational pull of Galaxy B will be strong enough that it can begin to pull out material from Galaxy A, creating a stream of stars, dust, and gas. This scenario is not unique to Galaxy A, however. Just as Galaxy B will exert a force on Galaxy A, so will Galaxy A exert a force on Galaxy B. Typically, both merging galaxies will have these streams. This is only the first stage in a galactic collision, however. The end results are much more interesting. The final scenario for this galactic battle is one of two cases. If the galaxies are moving fast enough, then all that may remain is a misshapen clump of stars, the remnant of a destroyed galaxy. Faster moving galaxies may even punch a hole in another galaxy, leaving its victim with a gaping hole surrounded by a ring of stars. The other scenario is a galactic merger. In this case, bigger is always better. The larger, more massive galaxy will swallow up the smaller, less massive galaxy, resulting in galactic cannibalism. There is evidence that our own galaxy, the Milky Way, has participated in this uncouth ceremony. You might think it impossible for astronomers to know if the Milky Way has devoured its neighboring brethren. If our galaxy really did absorb another galaxy, then all of the victim's stars would now be part of the Milky Way, and there would be no way to tell if any single star is our own or came from the victim. To solve this riddle, we must return to the topic of streams. As a small, dwarf galaxy collides and passes through our large, massive galaxy, it will pull some of the Milky Way's own stars with it. Galaxies may collide several times over millions of years before they merge, so there is a good chance we can catch these streams of stars.

### 32. 海底火山生物

The deep sea typically has a sparse fauna dominated by tiny worms and crustaceans, with an even sparser distribution of larger animals. However, near hydrothermal vents, areas of the ocean where warm water emerges from subterranean sources, live remarkable densities of huge clams, blind crabs, and fish.

Most deep-sea faunas rely for food on particulate matter, ultimately derived from

photosynthesis, falling from above. The food supplies necessary to sustain the large vent communities, however, must be many times the ordinary fallout. The first reports describing vent faunas proposed two possible sources of nutrition: bacterial chemosynthesis, production of food by bacteria using energy derived from chemical changes, and advection, the drifting of food materials from surrounding regions. Later, evidence in support of the idea of intense local chemosynthesis was accumulated: hydrogen sulfide was found in vent water; many vent-site bacteria were found to be capable of chemosynthesis; and extremely large concentrations of bacteria were found in samples of vent water thought to be pure. This final observation seemed decisive. If such astonishing concentrations of bacteria were typical of vent outflow, then food within the vent would dwarf any contribution from advection. Hence, the widely quoted conclusion was reached that bacterial chemosynthesis provides the foundation for hydrothermal-vent food chains—an exciting prospect because no other communities on Earth are independent of photosynthesis.

There are, however, certain difficulties with this interpretation. For example, some of the large sedentary organisms associated with vents are also found at ordinary deep-sea temperatures many meters from the nearest hydrothermal sources. This suggests that bacterial chemosynthesis is not a sufficient source of nutrition for these creatures. Another difficulty is that similarly dense populations of large deep-sea animals have been found in the proximity of “smokers”-vents where water emerges at temperatures up to 350°C. No bacteria can survive such heat, and no bacteria were found there. Unless smokers are consistently located near more hospitable warm-water vents, chemosynthesis can account for only a fraction of the vent faunas. It is conceivable, however, that these large, sedentary organism do in fact feed on bacteria that grow in warm-water vents, rise in the vent water, and then rain in peripheral areas to nourish animals living some distance from the warm-water vents.

Nonetheless advection is a more likely alternative food source. Research has demonstrated that advective flow, which originates near the surface of the ocean where suspended particulate matter accumulates, transports some of that matter and water to the vents. Estimates suggest that for every cubic meter of vent discharge, 350 milligrams of particulate organic material would be advected into the vent area. Thus, for an average-sized vent, advection could provide more than 30 kilograms of potential food per day. In addition, it is likely that small live animals in the advected water might be killed or stunned by thermal and/or chemical shock, thereby contributing to the food supply of vents.

32.1. the primary purpose of the passage is to

- (A) describe a previously unknown natural phenomenon
- (B) reconstruct the evolution of a natural phenomenon
- (C) establish unequivocally the accuracy of a hypothesis

(D) survey explanations for a natural phenomenon and determine which is best supported by evidence.

(E) entertain criticism of the author's research and provide an effective response

32.2. which of the following does the author cite as a weakness in the argument that bacterial chemosynthesis provides the foundation for the food chains at deep-sea vents?

(A) vents are colonized by some of the same animals found in other areas of the ocean floor

(B) vent water does not contain sufficient quantities of hydrogen sulfide.

(C) bacteria cannot produce large quantities of food quickly enough.

(D) large concentrations of minerals are found in vent water.

(E) some bacteria found in the vents are incapable of chemosynthesis

32.3. which of the following is information supplied in the passage that would support the statement that the food supplies necessary to sustain vent communities must be many times that of ordinary fallout?

(A) large vent faunas move from vent to vent in search of food

(B) vent faunas are not able to consume food produced by photosynthesis.

(C) vents are more densely populated than are other deep-sea areas

32.4. the author refers to "smokers" (line 26) most probably in order to

(A) show how thermal shock can provide food for some vent faunas by stunning small animals

(B) prove that the habitat of most deep-sea animals is limited to warm-water vents

(C) explain how bacteria carry out chemosynthesis

(D) demonstrate how advection compensates for the lack of food sources on the seafloor.

(E) present evidence that bacterial chemosynthesis may be an inadequate source of food for some vent faunas.

### 33. 蝙蝠的回声定位

Echolocating bats emit sounds in patterns—characteristic of each species—that contain both frequency-modulated (FM) and constant-frequency (CF) signals. The broadband FM signals and the narrowband CF signals travel out to a target, reflect from it, and return to the hunting bat. In this process of transmission and reflection, the sounds are changed, and the changes in the echoes enable the bat to perceive features of the target.

The FM signals report information about target characteristics that modify the timing and the fine frequency structure, or spectrum, of echoes—for example, the



target's size, shape, texture, surface structure, and direction in space. Because of their narrow bandwidth, CF signals portray only the target's presence and, in the case of some bat species, its motion relative to the bat's. Responding to changes in the CF echo's frequency, bats of some species correct in flight for the direction and velocity of their moving prey.

33.1. According to the passage, the information provided to the bat by CF echoes differs from that provided by FM echoes in which of the following ways?

- (A) Only CF echoes alert the bat to moving targets.
- (B) Only CF echoes identify the range of widely spaced targets.
- (C) Only CF echoes report the target's presence to the bat.
- (D) In some species, CF echoes enable the bat to judge whether it is closing in on its target.
- (E) In some species, CF echoes enable the bat to discriminate the size of its target and the direction in which the target is moving.

33.2. According to the passage, the configuration of the target is reported to the echolocating bat by changes in the

- (A) echo spectrum of CF signals
- (B) echo spectrum of FM signals
- (C) direction and velocity of the FM echoes
- (D) delay between transmission and reflection of the CF signals
- (E) relative frequencies of the FM and the CF echoes

33.3. The author presents the information concerning bat sonar in a manner that could be best described as

- (A) argumentative
- (B) commendatory
- (C) critical
- (D) disbelieving
- (E) objective

33.4. Which of the following best describes the organization of the passage?

- (A) A fact is stated, a process is outlined, and specific details of the process are described.
- (B) A fact is stated, and examples suggesting that a distinction needs correction are considered.
- (C) A fact is stated, a theory is presented to explain that fact, and additional facts are introduced to validate the theory.
- (D) A fact is stated, and two theories are compared in light of their explanations of this fact.
- (E) A fact is stated, a process is described, and examples of still another process are

illustrated in detail.

#### 34. 蓝脱序星blue straggler的两种形成过程

##### **Vampires and collisions rejuvenate stars**

Using the NASA/ESA Hubble Space Telescope, astronomers have uncovered two distinct kinds of "rejuvenated" stars in the globular cluster Messier 30. A new study shows that both stellar collisions and a process sometimes called vampirism are behind this cosmic "face lift". The scientists also uncover evidence that both sorts of blue stragglers were produced during a critical dynamical event (known as "core collapse") that occurred in Messier 30 a few billion years ago. Stars in globular clusters [1] are generally extremely old, with ages of 12-13 billion years. However, a small fraction of them appear to be significantly younger than the average population and, because they seem to have been left behind by the stars that followed the normal path of stellar evolution and became red giants, have been dubbed blue stragglers [2]. Blue stragglers appear to regress from "old age" back to a hotter and brighter "youth", gaining a new lease on life in the process. A team of astronomers used Hubble to study the blue straggler star content in Messier 30, which formed 13 billion years ago and was discovered in 1764 by Charles Messier. Located about 28 000 light-years away from Earth, this globular cluster — a swarm of several hundred thousand stars — is about 90 light-years across.

Although blue stragglers have been known since the early 1950s, their formation process is still an unsolved puzzle in astrophysics. "It's like seeing a few kids in the group picture of a rest-home for retired people. It is natural to wonder why they are there," says Francesco Ferraro from the University of Bologna in Italy, lead author of the study that will be published this week in Nature [3]. Researchers have been studying these stars for many years and knew that blue stragglers are indeed old. They were thought to have arisen in a tight binary system [4]. In such a pair, the less massive star acts as a "vampire", siphoning fresh hydrogen from its more massive companion star. The new fuel supply allows the smaller star to heat up, growing bluer and hotter — behaving like a star at an earlier stage in its evolution.

The new study shows that some of the blue stragglers have instead been rejuvenated by a sort of "cosmic facelift", courtesy of cosmic collisions. These stellar encounters are nearly head-on collisions in which the stars might actually merge, mixing their nuclear fuel and re-stoking the fires of nuclear fusion. Merged stars and binary systems would both be about twice the typical mass of individual stars in the cluster.

"Our observations demonstrate that blue stragglers formed by collisions have slightly different properties from those formed by vampirism. This provides a direct demonstration that the two formation scenarios are valid and that they are both operating simultaneously in this cluster," says team member Giacomo Beccari from ESA.

Using data from the now-retired Wide Field Planetary Camera 2 (WFPC2) aboard Hubble,



astronomers found that these "stragglers" stars are much more concentrated towards the centre of the cluster than the average star. "This indicates that blue stragglers are more massive than the average star in this cluster," says Ferraro. "More massive stars tend to sink deep into the cluster the way a billiard ball would sink in a bucket of honey."

The central regions of high density globular clusters are crowded neighbourhoods where interactions between stars are nearly inevitable. Researchers conjecture that one or two billion years ago, Messier 30 underwent a major "core collapse" that started to throw stars towards the centre of the cluster, leading to a rapid increase in the density of stars. This event significantly increased the number of collisions among stars, and favoured the formation of one of the families of blue stragglers. On the other hand, the increase of stellar crowding due to the collapse of the core also perturbed the twin systems, encouraging the vampirism phenomenon and thus forming the other family of blue stragglers. "Almost ten percent of galactic globular clusters have experienced core collapse, but this is the first time that we see the effect of the core collapse imprinted on a stellar population," says Barbara Lanzoni, University of Bologna.

"The two distinct populations of blue stragglers discovered in Messier 30 are the relics of the collapse of the core that occurred two billion years ago. In a broad context our discovery is direct evidence of the impact of star cluster dynamics on stellar evolution. We should now try to see if other globular clusters present this double population of blue stragglers," concludes Ferraro.

### 35. Maya文明

Most of the animals which feed on the fruit of *B. alicastrum* eat the seed as well, and, therefore, function more as seed predators than as dispersal agents. Frugivorous bats, however, display the interesting behavior of collecting the fruit, flying to their roosts, and later eating only the fleshy pericarp and dropping the seed intact. Bats of the genus *Artibeus* have been shown to disperse large quantities of *B. alicastrum* seed in this manner, the fruit comprising the major part of their diet when available (Vazquez-Yanes et al. 1975). Puleston (1968:56-57) reviewed the dispersal of ramon seeds by *Artibeus* bats but later rejected the possibility at they were an important seed vector to the ruins. This is surprising in light of his observations that "large numbers of bats occupy the inner chambers and vaults of the larger palaces and temples," that "their nests are littered with whole ramon seeds" and that "the seeds can apparently be carried great distances if the bats have young." I have seen similar accumulations of seeds and seedlings around the ruins of Palenque and Bonampak in Chiapas, and under bat roosts in mango plantations in Veracruz where the nearest ramon tree was more than 5 km away. A more reasonable explanation for the commonly observed aggregations of *B. alicastrum* near ruins, therefore, is the competitive advantage this species possesses on limestone soils coupled with the continual input of bat-dispersed seed.

### 36. 寂静的春天

Fifty years ago, Rachel Carson wrote and published *Silent Spring*. Carson was

ahead of her time. She said pesticides like DDT were damaging the environment and human health. Although the book became an inspiration for the environmental movement, the battle for the environment continues.

In the 1950s, the U.S. Department of Agriculture was spraying more than a quarter-million kilograms of pesticides each year. *Silent Spring*, by Rachel Carson, revealed that pesticides like DDT were lethal not only for insects but for all living things.

“*Silent Spring* essentially told the reading public that human beings could alter the natural world in ways that were quite deadly and that it could be potentially lethal to human beings as well as to other parts of the natural world,” said Linda Lear, the author of a biography on Carson.

More than six million copies of the book have been sold in the U.S. It's been translated into some 30 languages.

In the Washington suburbs, the house where Carson wrote *Silent Spring* is now a National Historic Landmark. Carson was a pathbreaker. “In *Silent Spring*, she is writing in a voice that I call apocalyptic writing,” added Linda Lear. “She is trying to sound an alarm to get our attention.”

Thirty years after *Silent Spring* was published, public television, in its program *The American Experience*, called the book one of the most important of our time. But there were dissenters. Norman Borlaug, the 1970 Nobel Peace Prize winner, led the defense of pesticides. “We’re having troubles now feeding this hungry world,” said Borlaug. “If you remove DDT with the hysteria that is present in the USA, the U.S. will be importing food, only there won’t be any place from where to import it.” By 1972, DDT was banned for agricultural use in the U.S. But thousands of new chemicals were being developed. For years, the U.S. Senate's Committee on the Environment has been trying to ban or control hundreds of chemicals from agricultural products and consumer goods. “This committee heard from CDC [Centers for Disease Control] officials who told us their scientists found 212 industrial chemicals, including six carcinogens, coursing through Americans’ bodies,” said Democratic Senator Frank Lautenberg. In 2006, the World Health Organization announced plans to use DDT again - indoors - in its campaign against malaria. Syngenta is a major producer of agricultural chemicals. Like others in the industry, it says its chemicals are safe if used properly. “We try to do every single study that is necessary to support the safety characteristics of the product.” said Tim Pastoor, the company's principal scientist. Fifty years after *Silent Spring*, millions of kilograms of new pesticides and other chemicals are being sprayed across US farmlands. And the environmental movement is still fighting back.

### 37. 胡蜂吃天牛

Stem borers are insect pests that often ruin North American corn crops. On some other continents, crop damage by stem borers is controlled by a certain species of wasp. Since these wasps eat nothing but stem borers, importing them into North America will keep crop damage from stem borers under control without endangering other North American insect species.

Which of the following is an assumption on which the argument depends?

- (A) Corn is the principal food of stem borers that live on continents other than North America.
- (B) The wasps are capable of surviving in North America long enough to eat significant numbers of stem borers.
- (C) No wasp in North America is closely related to the species of wasp that eats stem borers.
- (D) On continent other than North America, the wasps control stem borers more effectively than does any other pest control measure.
- (E) Corn crops on continents other than North America are not damaged by any insect pests other than stem borers.

答案: B

### 38. 雄性动物养孩子

The main exception to primate researchers' general pattern of ignoring interactions between males and infants has been the study of male care among monogamous primates. It has been known for over 200 years, ever since a zoologist-illustrator named George Edwards decided to watch the behavior of pet marmosets in a London garden, that among certain species of New World monkeys males contributed direct care for infants that equaled or exceeded that given by females. Mothers among marmosets and tamarins typically give birth to twins, as often as twice a year, and to ease the female in her staggering reproductive burden the male carries the infant at all times except when the mother is actually suckling it. It was assumed by Kleiman that monogamy and male confidence of paternity were essential to the evolution of such care, and at the same time, it was assumed by Symons and others that monogamy among primates must be fairly rare.

Recent findings, however, make it necessary to reverse this picture. First of all, monogamy among primates turns out to be rather more frequent than previously believed (either obligate or facultive monogamy can be documented for some 17-20 percent of extant primates) and second, male care turns out to be far more extensive than previously thought and not necessarily confined to monogamous species, according to **Hrdy**. Whereas previously, it was assumed that monogamy and male certainty of paternity

facilitated the evolution of male care, it now seems **appropriate to consider the alternative possibility**, whether the extraordinary capacity of male primates to look out for the fates of infants did not in some way pre-adapt members of this order for the sort of close, long-term relationships between males and females that, under some ecological circumstances, leads to monogamy! Either scenario could be true. The point is that on the basis of present knowledge there is no reason to view male care as a restricted or specialized phenomenon. In sum, though it remains true that mothers among virtually all primates devote more time and/or energy to rearing infants than do males, males nonetheless play a more varied and critical role in infant survival than is generally realized.

1. The author of the passage mentions the work of Hrdy primarily to
  - A. present an instance of an untenable assumption
  - B. illustrate a consensus by citing a representative claim
  - C. provide evidence that challenges a belief
  - D. highlight a corollary of a widespread view
  - E. offer data that help resolve a debate
2. According to the passage, the evolutionary relationship between male care and monogamy is
  - A. incontestable
  - B. immutable
  - C. uncommon
  - D. immaterial
  - E. uncertain
3. The author of the passage suggests that it is “appropriate to consider the alternative possibility” because the previous view
  - A. results in a contradiction
  - B. depends on problematic data
  - C. appears less definite given certain facts
  - D. conflates two distinct phenomena
  - E. overlooks a causal relationship between correlated phenomena
4. Which of the following statements, if true, would pose the greatest challenge to “the alternative possibility” ?
  - A. The number of primate species in which male care of infants is exhibited is greater than the number of primate species that practice monogamy.

- B. Male care of infants among primates can be seen earlier in the evolutionary record than can monogamy among primates.
- C. Monogamous relationships among primates can be found in species living in a variety of physical environments.
- D. Most primate species that practice monogamy do not show any evidence of male care of infants.
- E. Male care of infants can be observed in some primate species that lack male confidence of paternity.

答案: CECA

### 39. 火星的风蚀

One reason researchers have long believed that Mars never enjoyed an extensive period of warm and wet climate is that much of the surface not covered by wind-borne dust appear to be composed of unweathered material. **If water flowed for an extended period, researchers reasoned, it should have altered and weathered the volcanic minerals, creating clays or other oxidized, hydrated phases (minerals that incorporate water molecules in their crystal structure).**

It turns out, though, that the scientists were not looking closely enough. New high-resolution mapping data and close-up surface studies have revealed clays and other hydrated minerals in many regions. The clay deposits are scattered all over, in ancient volcanic surfaces and heavily cratered highland regions, some of which have apparently been exposed by erosion only recently

### 40. Jane Austen

Jane Austen's relationship to Romanticism has long been a **vexed** one. Although her dates (1775-1817) place her squarely within the period, she traditionally has been studied apart from the male poets whose work defined British Romanticism for most of the twentieth century. In the past her novels were thought to follow an Augustan mode at odds with the Romantic ethos. Even with the advent of **historicist and feminist criticism**, which challenged many previous characterizations of Austen as detached from the major social, political, and aesthetic currents of her time, she continued to be distinguished from her male contemporaries. Jerome McCann, for example, insists that Austen does not espouse the Romantic ideology. Anne Mellor declares that Austen, along with other "leading women intellectual and writers of the day" "did not," participate in the Romantic "spirit of the age" but instead embraced an alternative ideology that Mellor labels "**feminine Romanticism**".

To be sure, some critics throughout the years have argued for Austen's affinities with one or more of the male Romantic poets. A special issue of the

*Wordsworth Circle* (Autumn 1976) was devoted to exploring connections between Austen and her male contemporaries. Clifford Siskin in his historicist study of Romanticism argued that Austen does participate in the same major innovation, the naturalization of belief in a developing self, as characterizes Wordsworth's poetry and other key works from the period. Recently, three books have appeared (by Clara Tuite, William Galperin, and William Deresiewicz) that in various ways treat Austen as a Romantic writer and together signal a shift in the tendency to segregate the major novelist of the age from the major poets.

The present essay seeks to contribute to this goal of firmly integrating Austen within the Romantic movement and canon. It does so by pointing out affinities between Austen and a writer with whom she has not commonly been associated, John Keats. Most comparisons of Austen and the Romantic poets have focused on Wordsworth and Byron, whose works we know she read. Although Austen could not have read Keats's poems, which only began to appear in print during the last years of her life, and there is no evidence that Keats knew Austen's novels, a number of important similarities can be noted in these writers' works that provide further evidence to link Austen with the Romantic movement, especially the period of second-generation Romanticism when all of her novels were published.

## G神团队2014年6月7日写作预测

### GRE高频机经写作题目思路 (201405月-8月考试适用)

#### Issue思路

36. Governments should not fund any scientific research whose consequences are unclear.

Write a response in which you discuss the extent to which you agree or disagree with the recommendation and explain your reasoning for the position you take. In developing and supporting your position, describe specific circumstances in which adopting the recommendation would or would not be advantageous and explain how these examples shape your position.

Arguments for the prompt	Evidence
Governments should issue a strict ban on research with unclear ethical implication.	Cloning technology is widely banned because of its ethically problematic nature (religious issue& issue regarding personal identity).
Governments in underdeveloped regions should use its research funding more prudently in areas with short-term effect.	The problem of scientific research with unclear consequences is twofold. First, it costs tons of money. Second, its effect is unpredictable. Yet underdeveloped regions have neither the money to waste nor the time to wait for the effect to happen.

Arguments against the position	Evidence
Governments in relatively developed regions should carefully provide financial support for researches even if their consequences may be temporarily unclear.	Technological strength marks a nation's current global status (see U.S. after World War II). Many now influential technologies did not seem at all promising when first developed (See Riemann Geometry, World Wide Web, Quantum Mechanics, and the Theory of Relativity...).

Conclusion: whether the suggestion should be adopted depends on the ethical



nature of a research as well as on a nation's economic power.

13. Universities should require every student to take a variety of courses outside the student's field of study.

Write a response in which you discuss the extent to which you agree or disagree with the claim. In developing and supporting your position, be sure to address the most compelling reasons and/or examples that could be used to challenge your position.

Arguments for the prompt	evidence
It is necessary to understand a variety of subjects even if one's only goal is to get a good grade.	Many fields have an interdisciplinary nature. Economics is based on math, biology on chemistry, philosophy on history and linguistics, public health on politics and finance, and etc.
As long as one aims to excel in an industry in the future, a wide repertoire will prove essential in unexpected ways.	Steve Jobs did not intend to profit from his typography knowledge, even though he ended up benefitting a lot from that class in college.
The current college education system focuses on analytic thinking; however, knowledge on humanity is also essential for a person's growth.	The access to literature, movies, philosophy and art makes people reflect on the essential human problems. Students will benefit from these experiences and come out as persons with concerns not just about themselves but about the whole humanity.

Arguments against the prompt	Evidence
Students may find it time-wasting and too challenging to pick a course that they are not familiar with.	Most students skip classes and pick the "easy" courses because they care about nothing but grades.

Arguments against the counterargument	Evidence
The fact that students will not voluntarily select these outside courses only makes it more necessary for college to enforce the rule on students.	The job of colleges is not to make life easy for students, but to make their stay in college worthwhile.

Conclusion: absolute agreement to the prompt



145. The general welfare of a nation's people is a better indication of that nation's greatness than are the achievements of its rulers, artists, or scientists. Write a response in which you discuss the extent to which you agree or disagree with the claim. In developing and supporting your position, be sure to address the most compelling reasons and/or examples that could be used to challenge your position.

Arguments for the prompt	Evidence
A nation will fall into pieces even if it witnesses many an achievement from great individuals.	The Soviet Union lasted less than a century even with its countless scientific achievements.

Arguments against the prompt	Evidence
A nation will not be memorable even if its people enjoy a happy life. The achievements of individuals are the contributions a nation makes to the world's civilization.	The nations on the Scandinavia and around the Persian Gulf are all rich enough to give their citizens a relatively comfortable life, but few would count these countries as great.

Conclusion: both criteria are necessary when we seek for great nations. In fact, every great civilization in human history, including ancient Greece, ancient China, the Great Britain and the modern America all meet both standards.

48. Educators should teach facts only after their students have studied the ideas, trends, and concepts that help explain those facts. Write a response in which you discuss the extent to which you agree or disagree with the recommendation and explain your reasoning for the position you take. In developing and supporting your position, describe specific circumstances in which adopting the recommendation would or would not be advantageous and explain how these examples shape your position.

Arguments for the prompt	Evidence
Rote memorizing facts will not prove useful if the facts are not logically interconnected.	Our history classes are often filled with boring facts that we easily forget later.
Memorizing a formula without understanding the concepts involved is how a calculator works, but not how a person should learn.	Many students know how to deal with exams with formulas like $F=ma$ without even understanding what "m" or "a" really stands for. They do not really grasp the true essence of physics.

Arguments against the prompt	Evidence
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Simple facts do not need to be told after so much preliminary work.	A student needs nothing else to learn “1+1=2”.
The sequence is unnecessary. A student may as well be informed of the facts first and then told about what is related.	

Conclusion: The author’s suggestion is quite reasonable, but should not be carried to an extreme.

42. Students should always question what they are taught instead of accepting it passively.

Write a response in which you discuss the extent to which you agree or disagree with the statement and explain your reasoning for the position you take. In developing and supporting your position, you should consider ways in which the statement might or might not hold true and explain how these considerations shape your position.

Arguments for the prompt	Evidence
The spirit of not taking authority for granted is the core spirit underlying human’s each and every breakthrough; in contrast, blind faith in what’s commonly accepted only results in lack of scientific development.	Nicolas Copernicus, Albert Einstein, De Broglie, Pasteur, and etc. Ancient China shackled by rigid rules of Confucianism

Arguments against the prompt	Evidence
Questioning a theory without any evidence is as wrong as blind faith.	A second year in middle school would not have what it takes to challenge the Pythagorean Theorem.

Conclusion: A questioning spirit is worth applauding. However, when it is taken to an extreme, it is as harmful as not questioning at all. One should base her belief on evidence, not on an inflexible rule of obeying or disobeying. Nonetheless, when learning, one should always engage actively, sometimes by questioning what is taught and looking for counterevidence and sometimes by supporting what is taught through one’s own proof or trying to apply what is taught in actual cases.

81. All parents should be required to volunteer time to their children's schools. Write a response in which you discuss the extent to which you agree or disagree with the recommendation and explain your reasoning for the position

you take. In developing and supporting your position, describe specific circumstances in which adopting the recommendation would or would not be advantageous and explain how these examples shape your position.

Arguments for the prompt	Evidence
Under a tight financial situation, public schools lack enough funding to maintain regular operation. The volunteer work parents engage in can significantly help schools combat these crises.	Right now in American schools, parents engage in all kinds of volunteer work, such as sorting out books in library, organizing sports event, organizing traffic at intersections, and etc.
Seeing parents devoting their time to society, students are likely to be inculcated with the spirit to work for community rather than just for themselves.	A lesson with action is more influential than a lesson with words.

Arguments against the prompt	Evidence
Parents are busy.	List all kinds of busy schedule.

Arguments against the counterargument	Evidence
No one, except for the physically handicapped, is really too busy to spare a day or two to engage in voluntary work, even Barack Obama.	The prompt does not require a fixed date. Parents are free to arrange their own schedule and find a spot to help at the school

Conclusion: A straightforward agreement to the prompt

17. Formal education tends to restrain our minds and spirits rather than set them free.

Write a response in which you discuss the extent to which you agree or disagree with the statement and explain your reasoning for the position you take. In developing and supporting your position, you should consider ways in which the statement might or might not hold true and explain how these considerations shape your position.

Arguments for the prompt	Evidence
Formal education often teaches a limited set of knowledge.	Medieval Europe and ancient China both had a strict rule of what to offer to students. Even nowadays, Steve Jobs accuse American educational system of being too analytic.

Some teachers are too obsessed with students' grades that what they teach is purely guided by test requirements.	Chinese high schools
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Arguments against the prompt	Evidence
Nowadays students in fact can access even non-mainstream methodology.	Astrology, alchemy, fengshui...All kinds of stuff can be accessed at the school library. There are even classes on ancient mysticism.
There still exist teachers who aim at widening students' horizon and giving students an all-round education.	Personal experience is OK.
Being free is not equal to having no rules to follow. Formal education provides the necessary tools a person needs in order to think freely.	Language skill, math skill, computer skill, interpersonal communication skill... They benefit, rather than hurt students.

Conclusion: A straightforward rebuttal

66. People who are the most deeply committed to an idea or policy are also the most critical of it.

Write a response in which you discuss the extent to which you agree or disagree with the statement and explain your reasoning for the position you take. In developing and supporting your position, you should consider ways in which the statement might or might not hold true and explain how these considerations shape your position.

Arguments for the prompt	Evidence
A critical spirit is the academic ideal. Supposedly, rational beings, typical in the academic world, would evaluate their own views from all possible angles before reaching a firm commitment.	For instance, all graduate dissertations are required to explore possible counterarguments before drawing a conclusion.

Arguments against the prompt	Evidence
In politics, people who commit to their ideas the most are generally uncritical.	The dialogue between democratic nations and dictators were solved by wars.
In spiritual life, people even call equate uncritical thinking with	Despite abundant geological evidence, Christian fundamentalists'

“faith”.	firmly believes that the earth is only thousands of years old.
Even in academic world, scientists choose what they wish to believe.	Newton devoted the latter half of his life to alchemy. Einstein abominated the idea of a fundamentally random world entailed by quantum mechanics, even though his own evidence supports the theory.

Conclusion: a direct rebuttal

65. Every individual in a society has a responsibility to obey just laws and to disobey and resist unjust laws.

Write a response in which you discuss the extent to which you agree or disagree with the claim. In developing and supporting your position, be sure to address the most compelling reasons and/or examples that could be used to challenge your position.

Arguments for the prompt	Evidence
The spirit of not taking for granted the current legal system is what steers the human civilization to more justice.	If people thousands of years ago simply believed that what is just is equal to what is permitted by the law, then the law of slavery would count as just.

Arguments against the prompt	Evidence
There is no universal agreement on what is just.	Debates on what is justice scattered along the entire human history.
Even if there is objective justice, individuals lack the ability to always correctly distinguish the right from the wrong.	Many people download pirated movies and games without even realizing they are violating the copyright law.
Direct disobedience of law will undercut the law's overall authority.	If the law is ever to function, it has to hold authority. Something is called the law because it is categorical and allows no exception. If an individual's transgression can still be regarded as just, then many will follow suit.

Conclusion: The spirit underlying the suggestion is worth commending. Yet, when one sees something unjust in a legal system, the right approach to take is not to directly go against the law, but to change it through legislation.

89. Claim: Many problems of modern society cannot be solved by laws and the legal system.

Reason: Laws cannot change what is in people's hearts or minds.

Write a response in which you discuss the extent to which you agree or disagree with the claim and the reason on which that claim is based.

Arguments for the reason	Evidence
Laws cannot change deeply entrenched ideas.	Even though one is required to treat men and women equally, the older generation in China still prefers boys to girls because of the deeply held ideas from the past.

Arguments against the reason	Evidence
Laws cannot change an individual's deeply held ideas, but through education, a new generation can be born with the correct view.	Young people in China generally believe that men and women are equal.

Arguments for the claim	Evidence
Since the law can only operate on explicit transgression, unethical ideas held in people's mind cannot be treated. Since these ideas are the roots of crimes, the law only treats the symptom, but does not get the ultimate cure.	Parents are not allowed to throw away a girl infant, but they can still decide to favor their son rather than their daughter.
There are many grey areas of law where loopholes are found. In fact, since laws are man-made, they themselves succumb to injustice sometimes.	List the problematic laws.

Arguments against the claim	Evidence
Even if the law's function is limited, it still secures the basic operation of a society.	When people hold secret malice against one another, it is still better than they directly take a knife and stab each other. Here is to the law.

Conclusion: While the author is quite unjustified to say that the law cannot change people's mind, it is reasonable of her to claim that there exist many

problems that cannot be solved by the law.

### Argument思路

1. Woven baskets characterized by a particular distinctive pattern have previously been found only in the immediate vicinity of the prehistoric village of Palea and therefore were believed to have been made only by the Palean people. Recently, however, archaeologists discovered such a "Palean" basket in Lithos, an ancient village across the Brim River from Palea. The Brim River is very deep and broad, and so the ancient Paleans could have crossed it only by boat, and no Palean boats have been found. Thus it follows that the so-called Palean baskets were not uniquely Palean.

Write a response in which you discuss what specific evidence is needed to evaluate the argument and explain how the evidence would weaken or strengthen the argument.

(1). 河宽而深->P的人只能坐船过去

Assumption: the river has not changed drastically; there were no other ways to get to the other side of the river.

Counterexample: 以前河不宽不深; 绕源头; 冬天结冰

Additional Evidence: 河道变迁的信息, 到源头的距离, 冬天河水状况

(2). 没发现船->没有P的船

Assumption: if no boats were found, then there must have been no boats at all.

Counterexample: 木船经过几千年早腐朽了

Additional Evidence: 文献资料, 史料记载

(3). P的人只能坐船过去+没有P的船->在L发现的篮子不是P人造的

Assumption: the basket could only be carried by Palean people to Lithos at that time.

Counterexample: L人有船

Additional Evidence: L船的证据

2. The following appeared as part of a letter to the editor of a scientific journal. "A recent study of eighteen rhesus monkeys provides clues as to the effects of birth order on an individual's levels of stimulation. The study showed that in stimulating situations (such as an encounter with an unfamiliar monkey), firstborn infant monkeys produce up to twice as much of the hormone cortisol, which primes the body for increased activity levels, as do their younger siblings. Firstborn humans also produce relatively high levels of cortisol in stimulating



situations (such as the return of a parent after an absence). The study also found that during pregnancy, first-time mother monkeys had higher levels of cortisol than did those who had had several offspring."

Write a response in which you discuss one or more alternative explanations that could rival the proposed explanation and explain how your explanation(s) can plausibly account for the facts presented in the argument.

(1). 第一胎猴子分泌C两倍于其弟弟妹妹->第一胎的孩子面对刺激时反应更激烈

Assumption: there are no other causes that may lead to the same phenomena

Counterexample: 年龄; 年龄大的猴子可能更成熟, 面对外界刺激更能够意识到危险的存在, 因此反应更激烈。

Additional Evidence:

对照组1: 设计一群猴子, 拥有同样的胎数, 但是不同的年龄; 如果它们面对同样的刺激, 分泌的C量相似, 则能够排除年龄的解释。

对照组2: 设计一群猴子, 不同的胎数, 但是同样的年龄; 如果它们面对同样的刺激, 第一胎的猴子仍然分泌C更多, 则能够加强胎数的解释。

(2). 第一胎的人分泌的C也较多->第一胎的人面对刺激反应更激烈

Assumption: there are no other causes that may lead to the same phenomena

Counterexample: 多多少? 和谁比? 如果是和人类一生当中的平均值相比, 那就不能说明任何问题。很可能是年轻时分泌就多。

Additional Evidence: 多多少, 对比对象。

(3). 第一次怀孕的妈妈分泌的C也较多->孩子的胎数和面对刺激时反应的剧烈度有关

Assumption: how mothers respond to stimuli can be passed on to their infants.

Counterexample: 妈妈的剧烈性是因为没怀过孕, 紧张。这种机制不会传递给孩子。孩子的反应剧烈度和此毫无关系。

Additional Evidence: 提供生理上的信息来证明母子之间存在某种机制, 可以传递这种反应方式。

5. The following appeared in a letter to the editor of the Balmer Island Gazette.

"On Balmer Island, where mopeds serve as a popular form of transportation, the population increases to 100,000 during the summer months. To reduce the number of accidents involving mopeds and pedestrians, the town council of Balmer Island should limit the number of mopeds rented by the island's moped rental companies from 50 per day to 25 per day during the summer season. By limiting the number of rentals, the town council will attain the 50 percent annual reduction in moped accidents that was achieved last year on the neighboring island of Seaville, when Seaville's town council enforced similar limits on moped rentals."

Write a response in which you discuss what questions would need to be

answered in order to decide whether the recommendation is likely to have the predicted result. Be sure to explain how the answers to these questions would help to evaluate the recommendation.

(1). 人数多, 摩托车重要->需要减少摩托车带来的事故

Assumption: 车多人多, 事故就多

Counterexample: 秩序非常好, 街道宽阔, 遵守交通, 没必要限制

Additional Evidence: 历史记录

(2). S执行了禁令, 之后事故下降一半->禁令导致了S事故下降

Assumption: no other causes

Counterexample: 道路变好, 交规更严格

Additional Evidence: 城市交通环境的变化

(3). 禁令导致了S事故下降->禁令能够导致B事故下降

Assumption: B的租赁摩托车占总摩托车数量比例很高

Counterexample: S的摩托车主要是租赁, 而B的摩托车主要是私车

Additional Evidence: 租赁摩托车的数量, 以及总摩托车的数量

8. The following appeared in a memo from the director of student housing at Buckingham College.

"To serve the housing needs of our students, Buckingham College should build a number of new dormitories. Buckingham's enrollment is growing and, based on current trends, will double over the next 50 years, thus making existing dormitory space inadequate. Moreover, the average rent for an apartment in our town has risen in recent years. Consequently, students will find it increasingly difficult to afford off-campus housing. Finally, attractive new dormitories would make prospective students more likely to enroll at Buckingham."

Write a response in which you discuss what specific evidence is needed to evaluate the argument and explain how the evidence would weaken or strengthen the argument.

(1). 招生增加->未来学生人数翻番

Assumption: the trend of enrollment growth will continue in the next 50 years

Counterexample: 教育需求下降, 目前饱和, 但是人数有限, 增长到一定程度就不会增长了

Additional Evidence: 儿童人数的变化, 学校的承载力

影响: 没必要建楼

(2). 租房均价上升->学生租不起

Assumption: the type of apartments students rent are influenced by the trend

of rent increase

**Counterexample:** 很可能租房均价上升是被市中心的一些高级公寓拉动的, 而这些公寓通常不是学生租的。而学生租的房子并没有发生显著的价格变动。

**Additional Evidence:** 学生租的房子价格的变动

(3). 漂亮的楼能够吸引学生来B学校

**Assumption:** 就是这句话本身

**Counterexample:** 人们去学校的原因通常不是漂亮的楼

**Additional Evidence:** 调查人们去学校的原因

13. In an attempt to improve highway safety, Prunty County last year lowered its speed limit from 55 to 45 miles per hour on all county highways. But this effort has failed: the number of accidents has not decreased, and, based on reports by the highway patrol, many drivers are exceeding the speed limit. Prunty County should instead undertake the same kind of road improvement project that Butler County completed five years ago: increasing lane widths, resurfacing rough highways, and improving visibility at dangerous intersections. Today, major Butler County roads still have a 55 mph speed limit, yet there were 25 percent fewer reported accidents in Butler County this past year than there were five years ago.

Write a response in which you discuss what specific evidence is needed to evaluate the argument and explain how the evidence would weaken or strengthen the argument.

(1). BC报告事故减少+BC做了各种措施->这些措施帮助BC事故减少

**Assumption:** no other causes

**Counterexample:** 人少了, 惩罚更严格了

**Additional Evidence:** 人口变化, 制度的执行力度

(2). 这些措施帮助BC事故减少->这些措施能够帮助PC事故减少

**Assumption:** the road systems and conditions of the two cities are similar

**Counterexample:** PC的路又宽又平, 能见度又高, 提高空间极小, 而BC完全相反

**Additional Evidence:** 相关对比信息

(3). PC的事故量没有下降, 并且很多人超速->替代方案无效

**Assumption:** 车速没有下降, 并且没有其它因素抵消这个政策的积极作用。

**Counterexample:** 超速的人大幅减少; 以前超速更猛; 人多了, 车流量大了

**Additional Evidence:** 以前超速率, 超速的速度; 事故率

17. The following appeared in a memorandum from the manager of WWAC radio station.

"To reverse a decline in listener numbers, our owners have decided that WWAC must change from its current rock-music format. The decline has occurred despite population growth in our listening area, but that growth has resulted mainly from people moving here after their retirement. We must make listeners of these new residents. We could switch to a music format tailored to their tastes, but a continuing decline in local sales of recorded music suggests limited interest in music. Instead we should change to a news and talk format, a form of radio that is increasingly popular in our area."

Write a response in which you discuss what specific evidence is needed to evaluate the argument and explain how the evidence would weaken or strengthen the argument.

1. 人口增长由退休老头带来->我们需要关注老头听众

Assumption: 老头人数众多。

Counterexample: 虽然增长多, 但基数小, 因此比例仍然小

Additional Evidence: 人口组成

2. 音乐唱片卖得差->做音乐节目无前途

Assumption: 音乐唱片的销量代表了人们对于音乐的兴趣

Counterexample: 盗版猖獗, 唱片下滑; 但买盗版是因为喜欢音乐。并且, 可能广播音乐因为免费更受欢迎。

Additional Evidence: 音乐节目的关注度。

3. 音乐不行+老头多+新闻节目关注度上升->换成新闻能够更吸引关注

Assumption: 老头们喜欢新闻节目

Counterexample: 喜欢爵士, 根本就不怎么听广播。而且, 新闻节目关注度上升, 但不知道本来怎么样, 可能本来很差。

Additional Evidence: 新闻的收视率, 老头喜好的调查, 以及广播收听群体组成的调查

35. The following appeared in a letter from the owner of the Sunnyside Towers apartment complex to its manager.

"One month ago, all the showerheads in the first three buildings of the Sunnyside Towers complex were modified to restrict maximum water flow to one-third of what it used to be. Although actual readings of water usage before and after the adjustment are not yet available, the change will obviously result in a considerable savings for Sunnyside Corporation, since the corporation must pay for water each month. Except for a few complaints about low water pressure, no problems with showers have been reported since the adjustment. I predict that modifying showerheads to restrict water flow throughout all twelve buildings in the Sunnyside Towers complex will increase our profits even more dramatically."

Write a response in which you discuss what questions would need to be answered in order to decide whether the prediction and the argument on which it is based are reasonable. Be sure to explain how the answers to these questions would help to evaluate the prediction.

(1). 公司主要付水钱->节水带来了省钱

Assumption: 人们用水时间没有显著增加, 先前水压使用接近最大值。

Counterexample: 实际上, 人们使用淋浴时间更长; 实际上, 本身最大水压就远达不到水龙头的最大出水量的 $\frac{1}{3}$

Additional Evidence: 等到水表读数出来再说话

(2). 抱怨少->影响不大

Assumption: 不满的人会抱怨

Counterexample: 直接搬走

Additional Evidence: 调查人们的满意度, 调查楼里人数变化

(3). 这三个楼成功->所有楼这么做都会节水

Assumption: 各个楼类似

Counterexample: 其它楼高很多, 本来高层水压就不足

Additional Evidence: 不同楼特点的比较

37. The following appeared in a recommendation from the planning department of the city of Transopolis.

"Ten years ago, as part of a comprehensive urban renewal program, the city of Transopolis adapted for industrial use a large area of severely substandard housing near the freeway. Subsequently, several factories were constructed there, crime rates in the area declined, and property tax revenues for the entire city increased. To further revitalize the city, we should now take similar action in a declining residential area on the opposite side of the city. Since some houses and apartments in existing nearby neighborhoods are currently unoccupied, alternate housing for those displaced by this action will be readily available."

Write a response in which you discuss what specific evidence is needed to evaluate the argument and explain how the evidence would weaken or strengthen the argument.

(1). 改造之后各种变化->改建带来了变化

Assumption: 无它因

Counterexample: 厂子本来就是高污染的地方, 在地价低的地方才能建; 人少了, 所以犯罪下降; 全市的税收跟这儿一点关系都没的, 是别的地方带来的。

Additional Evidence: 厂子的属性, 该地区人口变化, tax收入的来源。



(2). 改建带来了f地区的变化->改建将会带来对面地区的变化

Assumption: 住宅需求不会上升

Counterexample: 改建完第一个区域之后, 工业发展需要已经得到了满足, 将会拉动住宅需求, 此时推掉住宅反而会带来人们住宅需求的不能满足, 进而反作用于工业的下降

Additional Evidence: 随着第一批楼改建所带来的住宅需要的变化

(3). 一部分房子没人住->可以改建

Assumption: 没人住的房子很多; 不会有人住

Counterexample: 新建的! 快卖出去了! 价太高卖不出去, 但是有人有需要的! 更多的房子有人住, 不能随便推!

Additional Evidence: 房子的类型, 价格; 没人住的比例

38. The following appeared in a memo from the new vice president of Sartorian, a company that manufactures men's clothing.

"Five years ago, at a time when we had difficulties in obtaining reliable supplies of high quality wool fabric, we discontinued production of our alpaca overcoat. Now that we have a new fabric supplier, we should resume production. This coat should sell very well: since we have not offered an alpaca overcoat for five years and since our major competitor no longer makes an alpaca overcoat, there will be pent-up customer demand. Also, since the price of most types of clothing has increased in each of the past five years, customers should be willing to pay significantly higher prices for alpaca overcoats than they did five years ago, and our company profits will increase."

Write a response in which you discuss what specific evidence is needed to evaluate the argument and explain how the evidence would weaken or strengthen the argument.

(1). New supplier -> 可以生产

Assumption: 厂子其它方面资源能够满足生产要求; 供应商原材料质量达标

Counterexample: 质量差, 专家技术设备都没了

Additional Evidence: 原材料的质量, 厂子的其它信息

(2). 5年没产也没竞争对手生产->有大量需求

Assumption: 不是因为没需求而导致没人生产

Counterexample: 过时

Additional Evidence: 调查人们的需要

(3). 衣服价钱上升->人们会舍得花钱->会赚钱

Assumption: 各种衣服之间有可比性, 成本没升

Counterexample: 可能其它衣服质量大幅度提高, 而A coat没有; 成本上升更厉害, 或者通货膨胀严重

Additional Evidence: 其它衣服和A coat质量变化; 成本价; 通货膨胀率

41. The following appeared in a health newsletter.

"A ten-year nationwide study of the effectiveness of wearing a helmet while bicycling indicates that ten years ago, approximately 35 percent of all bicyclists reported wearing helmets, whereas today that number is nearly 80 percent. Another study, however, suggests that during the same ten-year period, the number of bicycle-related accidents has increased 200 percent. These results demonstrate that bicyclists feel safer because they are wearing helmets, and they take more risks as a result. Thus, to reduce the number of serious injuries from bicycle accidents, the government should concentrate more on educating people about bicycle safety and less on encouraging or requiring bicyclists to wear helmets."

Write a response in which you examine the stated and/or unstated assumptions of the argument. Be sure to explain how the argument depends on these assumptions and what the implications are for the argument if the assumptions prove unwarranted.

(1). 35%→80%+增长200%的事故→事故由头盔造成

Assumption: 不戴头盔的人少了

Counterexample: 骑车人数大大增加, 不戴头盔的人其实也多了, 而出事故的普遍都是不带头盔的人

Additional Evidence: 出事故的人的特征

(2). 35%→80%+增长200%的事故→事故由头盔造成

Assumption: 没有其它原因可以解释

Counterexample: 车多了, 车速快了; 人就是多了很多

Additional Evidence: 城市交通特点的变化, 人数变化

(3). 头盔没能帮助减少事故→为了减少严重伤害不应该关注头盔

Assumption: 头盔没能减少严重伤害

Counterexample: 事故多了, 确实有虚假安全感, 但是头盔仍然很好的保护了出事故的人没出大的伤害

Additional Evidence: 严重伤害案例中的人戴头盔的比例

影响: 如果发现戴头盔的人普遍没受严重伤害, 那么我们仍然应该加大宣传头盔的力度