Answer Explanations **SAT Practice Test #7**

Section 1: Reading Test

QUESTION 1.

Choice D is the best answer. The final sentence of the first paragraph makes clear that before adopting his daughter, the weaver Silas was greedy for gold and chained to his work, "deafened and blinded more and more to all things except the monotony of his loom." But after adopting Eppie, Silas became more interested in life outside his job: "Eppie called him away from his weaving, and made him think all its pauses a holiday, reawakening his senses with her fresh life." A major theme of the passage can be seen in this transformation, as it represents how loving a child can improve or change a parent's life.

Choice A is incorrect because even if the passage implies that Silas was too materialistic before his daughter's arrival in his life, his greediness was a personal characteristic only, not a societal one; whether the society Silas lives in is overly materialistic is never addressed. Choice B is incorrect because even if the passage represents the "moral purity" of children, it does so only indirectly and not as a major theme. Choice C is incorrect because the passage addresses childhood enthusiasm and curiosity more than "naïveté" and never discusses the length or "brevity" of that naïveté.

QUESTION 2.

Choice A is the best answer. The first sentence of the first paragraph notes that "Unlike the gold . . . Eppie was a creature of endless claims and ever-growing desires, seeking and loving sunshine, and living sounds, and living movements; making trial of everything, with trust in new joy, and stirring the human kindness in all eyes that looked on her." These lines make clear that in contrast to Silas's gold, his new daughter is vibrant and alive.

Choices B, C, and D are incorrect because the lines from the first paragraph cited above reveal Eppie's interest in "living sounds" and "living movements" and thus characterize her vitality in comparison to the gold, rather than her durability, protection, or self-sufficiency.

QUESTION 3.

Choice A is the best answer. In the first paragraph, the narrator describes Silas as having been so obsessed as to have felt required to worship the gold "in close-locked solitude," with "his thoughts in an ever-repeated circle" centered on his hoard. Moreover, this obsession compelled him to "sit weaving longer and longer, deafened and blinded more and more to all things except the monotony of his loom and the repetition of his web." These lines convey the extent to which Silas's behaviors were determined by his obsession.

Choice B is incorrect because the narrator does not make it seem as if Silas's gold could reproduce on its own, with the first paragraph suggesting that his hoard was a consequence of hard work, his being "deafened and blinded more and more to all things except the monotony of his loom and the repetition of his web." Choice C is incorrect because even if the first paragraph mentions that, after Eppie's arrival, Silas thinks about "the ties and charities that bound together the families of his neighbors," the passage never addresses how Silas interacted with those neighbors previously. Choice D is incorrect because the third paragraph makes clear that Silas is not only able to recall life before Eppie, but that with her in his life, "his mind was growing into memory."

QUESTION 4.

Choice B is the best answer. The first paragraph of the passage describes Eppie as "a creature of endless claims and ever-growing desires," one who is "making trial of everything." In this context, her "making trial of everything" can be read as her acting on her curiosity by striving to experience the world around her.

Choices A, C, and D are incorrect because in the context of her "making trial of everything," Eppie can be seen as curious, not friendly (choice A), disobedient (choice C), or judgmental (choice D).

QUESTION 5.

Choice D is the best answer. In the first paragraph, the narrator indicates that with the arrival of Eppie, Silas's thoughts turn from his work and his gold toward Eppie's future and his life with her: "Eppie was an object compacted of changes and hopes that forced his thoughts onward, and carried them far away from their old eager pacing towards the same blank limit — carried them away to the new things that would come with the coming years." By influencing Silas to think "onward" and of "the coming years," Eppie prompts Silas to envision a far different future than he would experience otherwise.

Choice A is incorrect because although the passage implies that Silas is less obsessed with money than before, there is no indication that he has actually renounced his desire for it. Choice B is incorrect because although the passage explains that Silas spends time outdoors after the arrival of Eppie, there is no indication that her presence has necessarily changed his understanding of his place in nature. Choice C is incorrect because at no point in the passage is Silas shown accepting help from anyone.

QUESTION 6.

Choice B is the best answer. The previous question asks what consequence Silas has experienced as a result of adopting Eppie. The answer, that he begins to imagine a new future for himself and her, is supported in the first paragraph: "but Eppie was an object compacted of changes and hopes that forced his thoughts onward, and carried them far away from their old eager pacing towards the same blank limit — carried them away to the new things that would come with the coming years."

Choices A, C, and D are incorrect because the lines cited do not support the answer to the previous question about the consequence of Silas's adoption of Eppie, instead describing Silas's life before Eppie entered it (choice A), how he occasionally acts in her presence (choice C), and the changes in Eppie's perception of the world as she ages (choice D).

QUESTION 7.

Choice C is the best answer. In the second paragraph, the description of Silas and Eppie's interaction outdoors conveys the extent to which he has changed since her arrival: where he once worked all day at his loom to earn more and more money, he now "might be seen in the sunny mid-day" strolling with her, accepting the flowers she brings him, or listening to birdcalls with her. With these experiences also come "crowding remembrances" of his early life — the life he led before amassing his hoard of gold. In its entirety, the paragraph can therefore be seen as illustrating the profound change into a more sociable being that Silas has undergone as a result of parenting Eppie.

Choice A is incorrect because the second paragraph does not present a particular moment when Silas realizes that Eppie has changed him but instead describes a pattern of behavior indicative of that change. Choice B is incorrect because the second paragraph shows the benefits Silas derives from Eppie's presence, rather than any sacrifices he has made for her. Choice D is incorrect because the second paragraph dramatizes a change in Silas's life overall, rather than showing a change in the dynamic that has arisen between Silas and Eppie.

QUESTION 8.

Choice B is the best answer. The third paragraph of the passage shows that as Eppie learns more and more, Silas reengages with life: "As the child's mind was growing into knowledge, his mind was growing into memory: as her life unfolded, his soul, long stupefied in a cold narrow prison, was unfolding too, and trembling gradually into full consciousness." As Eppie grows into a world that is new to her, Silas recovers a world he'd largely forgotten.

Choice A is incorrect because the narrator portrays Eppie as being curious and eager, not physically vulnerable, and also implies that Silas is becoming ever more emotionally robust, not psychologically fragile. Choice C is incorrect because the only connection the narrator makes regarding Silas's former greed and Eppie's presence in his life is that she has brought an end to his obsessive pursuit of wealth. Choice D is incorrect because the narrator does not address Silas's mortality in any way but rather shows him becoming more and more alive through Eppie's love.

QUESTION 9.

Choice D is the best answer. The previous question asks what connection the narrator draws between Eppie and Silas. The answer, that as she learns more about the world, he becomes more involved in it, is supported in the third paragraph: "As the child's mind was growing into knowledge, his mind was growing into memory: as her life unfolded, his soul, long stupefied in a cold narrow prison, was unfolding too, and trembling gradually into full consciousness."

Choices A, B, and C are incorrect because the lines cited do not support the answer to the previous question about the connection between Eppie and Silas, instead contrasting Silas's fixation on his gold with Eppie's curiosity (choice A) and describing Silas's habitual behavior when accompanying Eppie outdoors (choices B and C).

QUESTION 10.

Choice D is the best answer. In the last paragraph, the narrator states, "Also, by the time Eppie was three years old, she developed a fine capacity for mischief, and for devising ingenious ways of being troublesome." In this context, the word "fine" most nearly means keen, or acute.

Choices A, B, and C are incorrect because in the context of a description in which Eppie was said to have a "fine capacity for mischief," the word "fine" most nearly means keen, or acute, not acceptable (choice A), delicate (choice B), or ornate (choice C).

QUESTION 11.

Choice D is the best answer. The first paragraph of the passage explains the theory of two MIT business scholars who believe that technological advances in the workplace could lead to fewer jobs for human workers, explaining that they "foresee dismal prospects for many types of jobs as these powerful new technologies are increasingly adopted not only in manufacturing, clerical, and retail work but in professions such as law, financial services, education, and medicine." The fifth paragraph of the passage, however, offers a contrasting view, citing a Harvard economist who "says that no historical pattern shows these shifts leading to a net decrease in

jobs over an extended period." Combined, these different opinions indicate the main purpose of the passage, which is to assess how new technologies in the workplace might affect job growth as a whole.

Choice A is incorrect because the passage does not examine how workers' lives have been affected by technology during the last century. Choices B and C are incorrect because the passage does not advocate or argue for a course of action; instead, the passage considers both sides of an issue, taking no position of its own.

QUESTION 12.

Choice A is the best answer. In the first paragraph of the passage, Brynjolfsson and McAfee clearly state that technological advances since the year 2000 have led to low job growth in the United States: "MIT business scholars Erik Brynjolfsson and Andrew McAfee have argued that impressive advances in computer technology — from improved industrial robotics to automated translation services are largely behind the sluggish employment growth of the last 10 to 15 years."

Choice B is incorrect because although Brynjolfsson and McAfee assert that certain "changes" have occurred in the workplace as a result of technological advancement, they offer only tentative speculation that those changes may be reflected globally. Choice C is incorrect because the passage notes a decrease, rather than an increase, in skilled laborers. Choice D is incorrect because the passage makes no mention of the global creation of new jobs, even speculating that jobs may have been negatively impacted in technologically advanced nations.

QUESTION 13.

Choice A is the best answer. The previous question asks what Brynjolfsson and McAfee say has resulted in the workplace from advances in technology since the year 2000. The answer, that low job growth has resulted from these advances, is supported in the first sentence of the first paragraph: "MIT business scholars Erik Brynjolfsson and Andrew McAfee have argued that impressive advances in computer technology — from improved industrial robotics to automated translation services — are largely behind the sluggish employment growth of the last 10 to 15 years."

Choices B, C, and D are incorrect because the lines cited do not support the answer to the previous question about what Brynjolfsson and McAfee say has resulted in the workplace from advances in technology since the year 2000; instead they point to industries not under specific consideration by Brynjolfsson and McAfee (choice B), speculate as to whether changes might also be happening in other countries (choice C), and explain the importance of productivity in the marketplace in the decades following World War II. (choice D).

QUESTION 14.

Choice D is the best answer. The second sentence of the third paragraph reads, "In economics, productivity — the amount of economic value created for a given unit of input, such as an hour of labor — is a crucial indicator of growth and wealth creation." In this context, the primary purpose of the appositive ("the amount of economic value . . . such as an hour of labor") is to define "productivity."

Choices A, B, and C are incorrect because in the context of the third paragraph, the appositive ("the amount of economic value . . . such as an hour of labor") is clearly provided to help explain the term "productivity," not to describe a process (choice A), highlight a dilemma (choice B), or clarify a claim (choice C).

QUESTION 15.

Choice D is the best answer. The third paragraph states that "the pattern is clear: as businesses generated more value from their workers, the country as a whole became richer." In this context, the word "clear" most nearly means obvious, or unmistakable.

Choices A, B, and C are incorrect because in the context of the third paragraph, the word "clear" can be seen to mean obvious, or unmistakable, not pure (choice A), keen (choice B), or untroubled (choice C).

QUESTION 16.

Choice C is the best answer. Katz doesn't necessarily agree with Brynjolfsson and McAfee that new technologies will lead to sluggish job growth, saying in the fifth paragraph that "no historical pattern shows these shifts leading to a net decrease in jobs over an extended period." However, he's not sure that will remain true, explaining in the sixth paragraph that no one can be certain what is going to happen to the workplace as a result of these new technologies: "If technology disrupts enough, who knows what will happen?"

Choices A, B, and D are incorrect because it would not be accurate to characterize Katz as being alarmed (choice A), unconcerned (choice B), or optimistic (choice D) about today's digital technologies. Rather, it's clear from the conclusion of the sixth paragraph that Katz isn't sure how technological advancement will affect the workplace: "If technology disrupts enough, who knows what will happen?"

QUESTION 17.

Choice D is the best answer. The previous question asks how Katz's attitude toward "today's digital technologies" can best be characterized. The answer, that he is uncertain about their possible effects, is supported in the final sentence of the sixth paragraph: "If technology disrupts enough, who knows what will happen?" Choices A, B, and C are incorrect because the lines cited do not support the answer to the previous question Katz's attitude toward "today's digital technologies"; instead, they describe some of his earlier research (choice A) and provide insight only into his initial thoughts but not his final conclusion on the matter (choices B and C).

QUESTION 18.

Choice B is the best answer. The sixth paragraph of the passage states that "Katz doesn't dismiss the notion that there is something different about today's digital technologies — something that could affect an even broader range of work." In the context of this sentence, the "range" of work being discussed means the scope of work or all the various kinds of work.

Choices A, C, and D are incorrect because in the context of the sentence, the "range" of work being discussed means the array or scope of work, not a physical delineation like a region (choice A) or distance (choice C), or the professional position of those who perform particular jobs (choice D).

QUESTION 19.

Choice D is the best answer. Figure 1 shows the highest gap between the percentages of productivity and employment in relation to 1947 levels occurring in 2013, when there was a difference of approximately 150 percentage points between 2013 employment (under 400%) and 2013 productivity (well over 500%).

Choices A, B, and C are incorrect because Figure 1 shows a gap of well over 100 percentage points between 2013 employment and 2013 productivity in relation to 1947 levels, while 1987 (choice A) and 1997 (choice B) show a difference of about 30 percentage points or less between employment and productivity, and 2007 (choice C) indicates a difference of approximately 100 percentage points.

QUESTION 20.

Choice C is the best answer. Figure 2 clearly shows an increase of worker output in all three countries between 1960 and 2011, with workers in each country producing on average less than 50 units of output in 1960 but more than 100 units by 2011.

Choice A is incorrect because figure 2 shows that Japan saw greater growth in output between 1960 and 1990 than Germany saw. Choice B is incorrect because figure 2 shows that Japan experienced its greatest increase in output from 2000 to 2011, not its smallest. Choice D is incorrect because figure 2 shows that the United States had the greatest output of all three countries only in 2011, not in each of the years shown.

QUESTION 21.

Choice B is the best answer. In the fourth paragraph, Brynjolfsson asserts, "Productivity is at record levels, innovation has never been faster, and yet at the same time, we have a falling median income and we have fewer jobs." In order to evaluate his statement that today "we have fewer jobs," figure 2 would need to include accurate information about the number of jobs held by people employed in factories from 1960 to 2011. Without knowing those numbers, it's not possible to determine whether Brynjolfsson's statement is correct.

Choice A is incorrect because a comparison of the median income of all three nations' factory workers within a single year would not aid in the evaluation of Brynjolfsson's statement regarding changes in worker productivity over a span of 10 to 15 years. Choices C and D are incorrect because knowing either the types of organizations where those outputs were measured or which specific manufacturing jobs might have been lost to new technologies would not be helpful in evaluating Brynjolfsson's statement about how median incomes have fallen and job growth has reduced over time.

QUESTION 22.

Choice C is the best answer. The main purpose of the passage is conveyed by the first sentence: "Anyone watching the autumn sky knows that migrating birds fly in a V formation, but scientists have long debated why." The first paragraph continues by focusing on new research that might answer the question of why birds fly in that formation ("presumably to catch the preceding bird's updraft — and save energy during flight"). As a whole, the passage can therefore be seen as a discussion of the biological motivation behind migrating birds' reliance on the V formation.

Choice A is incorrect because the squadrons of planes mentioned in the second paragraph are used as an example to discuss migrating birds but are not themselves the main subject of this passage. Choice B is incorrect because although the fourth paragraph does discuss the role of downdrafts in V-formation flight, this discussion is brief and does not constitute a main purpose. Choice D is incorrect because the passage does not illustrate how birds sense air currents through their feathers; instead, the seventh paragraph suggests in passing that such sensation may play a role in maintaining the V formation: "Scientists do not know how the birds find that aerodynamic sweet spot, but they suspect that the animals align themselves either by sight or by sensing air currents through their feathers."

QUESTION 23.

Choice A is the best answer. In the second paragraph of the passage, the quotation "Air gets pretty unpredictable behind a flapping wing" immediately follows the statement that "currents created by airplanes are far more stable than the oscillating eddies coming off of a bird."

The inclusion of the above quotation can therefore be seen as a way to explain that the current created by a bird's flapping wings is different from the current coming off the fixed wing of an airplane.

Choice B is incorrect because the quotation's explanation that air is "unpredictable" behind a bird's wing stresses the bird's lack of control over the air current. Choice C is incorrect because the quotation attributes the unpredictability of the current "behind a flapping wind" to the action of the wing rather than to wind, and in fact the passage makes no mention of wind. Choice D is incorrect because the quotation characterizes the flapping of the bird's wings in terms of the unpredictability of its effects, not of its comparative strength.

QUESTION 24.

Choice D is the best answer. The reason Usherwood used northern bald ibises as the subjects of his study is clearly stated at the beginning of the third paragraph: "The study, published in *Nature*, took advantage of an existing project to reintroduce endangered northern bald ibises (*Geronticus eremita*) to Europe." Because the project reintroducing those birds was already underway, it was therefore easy for Usherwood and his team to join it.

Choice A is incorrect because it would not be accurate to say that ibises were well acquainted with their migration route, as the third paragraph explains that scientists needed to "show hand-raised birds their ancestral migration route." Choice B is incorrect because the third paragraph states that the ibises wore "data loggers specially built by Usherwood and his lab" but never indicates that they had worn any such device before or undertaken migration previously. Choice C is incorrect because the passage never claims that ibises' body shape is similar to the design of a modern airplane, instead comparing only a V formation of birds to an airplane in the fourth paragraph.

QUESTION 25.

Choice C is the best answer. The previous question asks why Usherwood used northern bald ibises as the subject of his study. The answer, that he had easy access to them because they were being used in another scientific study, is supported at the beginning of the passage's third paragraph: "The study, published in *Nature*, took advantage of an existing project to reintroduce endangered northern bald ibises (*Geronticus eremita*) to Europe."

Choices A, B, and D are incorrect because the lines cited do not support the answer to the previous question as to why Usherwood chose northern bald ibises as the subject of his study; instead, they describe the results of the study (choice A), compare birds and planes in flight (choice B), and describe one element of the actual study (choice D) but not the reason ibises were chosen.

QUESTION 26.

Choice A is the best answer. At the end of the third paragraph the author notes that the GPS tracking devices attached to the birds "determined each bird's flight position to within 30 cm." This detail, along with the author's mention in the same sentence of another device that measured the timing of the wing flaps, provides evidence for the inference that the author likely specified 30 cm to underscore Usherwood's use of precise data-collection methods.

Choice B is incorrect because the passage does not state that the distance an ibis flies between wing flaps was something that could be ascertained by Usherwood's study. Choice C is incorrect because the passage does not discuss the wingspan length of juvenile ibises or suggest that this length could be determined from Usherwood's tracking data. Choice D is incorrect because the passage does not discuss the distance maintained between the plane and the ibises in flight.

QUESTION 27.

Choice C is the best answer. At the beginning of the fifth paragraph the passage states that "the findings likely apply to other long-winged birds, such as pelicans, storks, and geese, Usherwood says. Smaller birds create more complex wakes that would make drafting too difficult." In these lines the author therefore implies that unlike smaller birds, pelicans, storks, and geese flying in a V formation likely create a similar wake to that of ibises.

Choice A is incorrect because the passage focuses entirely on bird flight, not bird communication. Choices B and D are incorrect because the passage discusses pelicans, storks, and geese only with respect to their drafting behavior, not in terms of their migration routes or how much energy they might expend when flying.

QUESTION 28.

Choice B is the best answer. The previous question asks what the author implies about pelicans, storks, and geese flying in a V formation. The answer, that they produce a similar wake to ibises, is supported at the beginning of the fifth paragraph: "Smaller birds create more complex wakes that would make drafting too difficult." This sentence, in conjunction with the preceding sentence's assertion of the probable applicability of Usherwood's findings to pelicans, storks, and geese, underscores that the point of probable similarity between ibises and those other species is in their wake and the drafting it makes possible. Choices A, C, and D are incorrect because the lines cited do not support the answer to the previous question regarding what the author implies about pelicans, storks, and geese flying in a V formation. Instead, they explain one finding in the ibis study, with no reference to other long-winged species (choice A); highlight the findings of a previous study of energy use in bird flight, with no reference to the relationship between ibises and other species (choice C); and offer a theory about ibises in flight, again with no reference to other species (choice D).

QUESTION 29.

Choice C is the best answer. The seventh paragraph speculates that further research may provide insight into how and why birds fly in formation: "In future studies, the researchers will switch to more common birds, such as pigeons or geese. They plan to investigate how the animals decide who sets the course and the pace." In sum, the seventh paragraph can therefore be seen as recognizing that more research is needed to explain the phenomenon of flight formation more completely.

Choice A is incorrect because neither the seventh paragraph nor the passage as a whole is concerned with bird hierarchies; the decision as to which bird sets the "course" or "pace" is mentioned only as another aspect of bird flight that scientists have yet to explain fully. Choice B is incorrect because the seventh paragraph only briefly mentions mistakes in V-formation flight, and this subject is not a central focus of the paragraph. Choice D is incorrect because although the seventh paragraph mentions the sighting of a lead bird or "leader" as a possible factor in the V formation, this factor is mentioned briefly and in conjunction with other factors, so that to describe it as a main idea would misrepresent the paragraph as a whole.

QUESTION 30.

Choice D is the best answer. In describing the way that long-winged birds like ibises fly in a V formation by drafting off each other, the seventh paragraph begins by stating, "scientists do not know how the birds find that aerodynamic sweet spot." In context, the phrase "aerodynamic sweet spot" characterizes the particular spatial relationship among birds in the formation that affords the least amount of wind resistance and is thus beneficial for flock members to maintain.

Choice A is incorrect because the author uses the phrase "aerodynamic sweet spot" in relation to bird flight, not plane flight. Choice B is incorrect because the phrase is not meant to imply the joy of flight so much as the optimum efficiency that can be found by flying in a certain position. Choice C is incorrect because the phrase is not used to discuss synchronized wing movement among birds, nor is synchronization addressed anywhere in the seventh paragraph.

QUESTION 31.

Choice B is the best answer. In the seventh paragraph, the passage explains that one aspect of bird flight that awaits further study by scientists is the question of whether "a mistake made by the leader can ripple through the rest of the flock to cause traffic jams." In this context, to say that a mistake might "ripple" through the flock most nearly means that it might progressively spread through the flock.

Choices A, C, and D are incorrect because in the context of the seventh paragraph, to "ripple" through the flock means to spread through it progressively, not to fluctuate (choice A), to wave, or move in the pattern of the ebb and flow of waves (choice C), or to undulate, or move in a manner that creates a textured, undulating appearance (choice D).

QUESTION 32.

Choice D is the best answer. In the first paragraph of Passage 1, Tocqueville predicts that "the social changes which bring nearer to the same level the father and son, the master and servant, and superiors and inferiors generally speaking, will raise woman and make her more and more the equal of man." In this context, to "raise" women to a higher social position most nearly means to elevate, or lift, them.

Choices A, B, and C are incorrect because in the context of Tocqueville's prediction that women will attain a higher social position, the word "raise" most nearly means elevate, not increase (choice A), cultivate, or support (choice B), or nurture (choice C).

QUESTION 33.

Choice B is the best answer. In Passage 1, Tocqueville expresses concern that treating men and women as identical would likely harm both genders, rather than benefit them. This sentiment can be seen most clearly in the second paragraph, when he writes that "it may readily be conceived, that by thus attempting to make one sex equal to the other, both are degraded."

Choice A is incorrect because Tocqueville says treating men and women as identical in nature would result in the degradation of both genders, a condition closer to oppression than to freedom from oppression. Choice C is incorrect because Tocqueville does not address the issue of whether men might ultimately try to reclaim any authority they lost as a result of the treatment of both genders as identical. Choice D is incorrect because in the passage, Tocqueville never claims that treating men and women the same would result in superfluous privileges for either.

QUESTION 34.

Choice C is the best answer. The previous question asks what Tocqueville implies would result from treating men and women as identical in nature. The answer, that he believes such treatment would harm both men and women, is supported in the second paragraph of Passage 1: "It may readily be conceived, that by thus attempting to make one sex equal to the other, both are degraded."

Choices A, B, and D are incorrect because the lines cited do not support the answer to the previous question about what Tocqueville implies would result from treating men and women as identical; instead, they discuss European approaches to such treatment, with no reference to the actual effects of it on men and women (choices A and B), and what Tocqueville considers Americans' proper conception of equality as it relates to gender roles (choice D).

QUESTION 35.

Choice B is the best answer. In the first paragraph of Passage 2, when discussing changing social relations, Mill writes that in her time there had come to exist "a just equality, instead of the dominion of the strongest." In this context of a society where some had once wielded much greater power than others, the word "dominion" most nearly means supremacy, or greater power.

Choices A, C, and D are incorrect because in the context of a paragraph discussing differences in the amount of power possessed by members of a society, "dominion" means supremacy, or greater power, not omnipotence, or the state of being all-powerful (choice A), ownership (choice C), or territory (choice D).

QUESTION 36.

Choice B is the best answer. In the first paragraph of Passage 2, Mill suggests that social roles are resistant to change in part because of their being entrenched in the cultural tradition: "for, in proportion to the strength of a feeling is the tenacity with which it clings to the forms and circumstances with which it has even accidentally become associated." In the context of a discussion of equality between men and women, Mill's statement serves to imply that gender roles change so slowly precisely because they are so deeply ingrained in society and culture.

Choice A is incorrect because although Mill suggests in Passage 2 that gender roles are deeply entrenched, she does not imply that they serve as the foundation of society. Choice C is incorrect because Passage 2 does not address the issue of legislative reforms, only societal ones. Choice D is incorrect because although Mill addresses the difficulty of reforming traditional gender roles, she does not attribute it to the benefits that certain groups or institutions derive from those roles.

QUESTION 37.

Choice C is the best answer. The previous question asks about what Mill implies is the reason it is hard to change gender roles. The answer, that they are deeply entrenched in tradition, is supported in the first paragraph of Passage 2: "In proportion to the strength of a feeling is the tenacity with which it clings to the forms and circumstances with which it has even accidentally become associated."

Choices A, B, and D are incorrect because the lines cited do not support the answer to the previous question about what Mill implies is the reason it is hard to change gender roles, instead describing the condition of general inequality in prior eras (choices A and B) and optimistically considering a future society that she imagines will be less unequal (choice D).

QUESTION 38.

Choice A is the best answer. Although the authors generally disagree about the roles men and women should occupy, both Tocqueville and Mill share the idea that gender equality is one small part of a societal shift toward equality in general. This can be seen in the first paragraph of Passage 1, where Tocqueville explains that raising woman to be "more and more the equal of man" is part of the overall "social changes which bring nearer to the same level the father and son, the master and servant," and in the first paragraph of Passage 2, where Mill writes that "mankind have outgrown" the state of inequality and "now tend to substitute, as the general principle of human relations, a just equality," with gender roles being the last of these relations to undergo such a shift.

Choice B is incorrect because although in Passage 1 Tocqueville argues that there are costs to treating men and women the same, in Passage 2 Mill characterizes gender equality as a source of benefits only. Choice C is incorrect because neither author considers changing gender roles in terms of economic ramifications, focusing instead on questions of fairness and justice and the fulfillment of people's potential. Choice D is incorrect because Mill does not discuss the issue in terms of American democracy, though Tocqueville does.

QUESTION 39.

Choice C is the best answer. In the second paragraph of Passage 2, Mill writes that she believes job opportunities in her society should be open to all: "Let every occupation be open to all, without favor or discouragement to any, and employments will fall into the hands of those men or women who are found by experience to be most capable of worthily exercising them." In the second paragraph of Passage 1, Tocqueville argues that equality between men and women would leave both degraded; nonetheless, he recognizes that the belief in such equality is widespread: "There are people in Europe who . . . would give to both the same functions, impose on both the same duties, and grant to both the same rights; they would mix them in all things — their occupations." It can be inferred, then, that although Tocqueville would consider Mill's position ill-advised, he does recognize this position as one that is held by a number of reformers.

Choice A is incorrect because Tocqueville in Passage 1 never characterizes advocacy on behalf of gender equality (such as Mill engages in, in Passage 2) as less radical than it initially seems. Choice B is incorrect because Mill's stated belief that all jobs should be open to both men and women would clearly be refuted by Tocqueville as harmful to men and women alike. Choice D is incorrect because what Tocqueville praises the United States for is not gender equality as a component of economic progress, but rather the United States' division of activity into masculine and feminine spheres, which he likens to the division of labor in industrial production.

QUESTION 40.

Choice A is the best answer. In Passage 1, Tocqueville argues that equality is generally beneficial for society, but he moderates that claim in the third paragraph by further stating that even if men and women should be considered equal, they should not work in the same jobs: "As nature has appointed such wide differences between the physical and moral constitution of man and woman, her manifest design was to give a distinct employment to their various faculties." In contrast, Mill argues in the second paragraph of Passage 2 that men and women should be awarded work based on individual ability: "Let every occupation be open to all, without favor or discouragement to any, and employments will fall into the hands of those men or women who are found by experience to be most capable of worthily exercising them." It can therefore be said that Tocqueville believes one's gender should play a determining factor in one's position in society, whereas Mill believes it should not.

Choice B is incorrect because both Tocqueville in Passage 1 and Mill in Passage 2 would likely argue against limiting an individual to the social class he or she was born to. Choice C is incorrect because it is Mill, not Tocqueville, who argues that individual temperament is the proper determining factor for social position. Choice D is incorrect because although it accurately represents Tocqueville's implicit stance that an individual's social position should contribute to society as a whole, it misrepresents Mill's argument, which conceives of social position in relation to individual aptitude, not individual satisfaction.

QUESTION 41.

Choice A is the best answer. In the third paragraph of Passage 1, Tocqueville credits the Americans of his time for applying "to the sexes the great principle of political economy . . . by carefully dividing the duties of man from those of woman." In contrast, in the second paragraph of Passage 2, Mill argues that rigid social roles function to "declare that whatever be the genius, talent, energy, or force of mind, of an individual of a certain sex or class, those faculties shall not be exerted." It can be inferred, then, that Mill would argue that the principle praised by Tocqueville tends to limit both men and women from developing their full potential.

Choice B is incorrect because in Passage 2, Mill focuses her argument on gender roles and equality between sexes but never addresses the idea of sympathy between them. Choice C is incorrect because Mill considers the division of professions by gender as a perpetuation of a long tradition of gender inequality. Choice D is incorrect because although Mill suggests that gender equality would involve rethinking the professional options available to men and women, she dismisses the notion that one gender is better suited to certain professions or would displace the other gender in certain professions.

QUESTION 42.

Choice C is the best answer. The passage's first two paragraphs describe how "Peter Higgs and a handful of other physicists were trying to understand the origin of a basic physical feature: mass," and the third paragraph discusses the idea put forth ("now called the Higgs field") to explain the environment where mathematical equations are most helpful in understanding mass. The passage shifts its focus, however: the fourth and fifth paragraphs describe how the idea of the Higgs field was not initially well-received in the scientific community, and the last paragraph illustrates that in modern times, the idea ultimately became an accepted fact to most scientists. Over the course of the passage, then, it can be seen that the main focus of the passage changes from an explanation of what the Higgs field is to an explanation of how the theory of it was received.

Choice A is incorrect because the passage makes no shift from a more to a less technical mode of description, and indeed the entire passage is aimed at readers with no specialized knowledge of physics. Choice B is incorrect because the passage never provides any contextualization of Higgs's work within other lines of inquiry in physics contemporary to Higgs. Choice D is incorrect because the passage offers no speculation regarding future discoveries that may result from the confirmation of the Higgs field's existence.

QUESTION 43.

Choice D is the best answer. The third paragraph of the passage provides the following analogy: "For a mental toehold, think of a ping-pong ball submerged in water." Since this analogy occurs in a discussion of how mass operates within the Higgs field, it functions to explain an abstract concept in terms more readily grasped by readers with no background in physics.

Choices A, B, and C are incorrect because the analogy of the ping-pong ball is used in the passage to help laypeople understand the difficult concept of the Higgs field, rather than to make a little-known fact more widely known (choice A), draw a contrast between oppositional scientific theories (choice B), or refute any established explanation (choice C).

QUESTION 44.

Choice D is the best answer. The fourth paragraph of the passage explains why Higgs's idea of the Higgs field was initially rebuffed by the scientific community: "The paper was rejected. Not because it contained a technical error, but because the premise of an invisible something permeating space, interacting with particles to provide their mass, well, it all just seemed like heaps of overwrought speculation." In other words, the scientific community was skeptical of Higgs's idea because it appeared to be mere theoretical speculation, with no empirical evidence to support it.

Choice A is incorrect because the passage makes clear that Higgs's idea addressed a theoretical problem already recognized by scientists, rather than a problem yet to be noticed by them. Choice B is incorrect because the fourth paragraph implies that Higgs's paper was rigorous (free from "technical error"), rather than problematic at the level of its equations. Choice C is incorrect because the passage never indicates that the acceptance of the Higgs field had the effect of rendering other, earlier theories in physics obsolete.

QUESTION 45.

Choice C is the best answer. The previous question asks why the scientific community initially rejected the idea of the Higgs field. The answer, that Higgs offered only theoretical speculation for the existence of the field, not actual evidence, is supported in the fourth paragraph: "The paper was rejected. Not because it contained a technical error, but because the premise of an invisible something permeating space, interacting with particles to provide their mass, well, it all just seemed like heaps of overwrought speculation."

Choices A, B, and D are incorrect because the lines cited do not support the answer to the previous question about why the scientific community initially rejected the idea of the Higgs field, instead discussing how Higgs dealt with established equations in physics when he theorized the field (choice A), describing the circumstances in which Higgs revealed his theory to the scientific community (choice B), and illustrating the fact that the Higgs field eventually came to be an accepted fact to most scientists (choice D).

QUESTION 46.

Choice A is the best answer. The fifth paragraph of the passage explains how the idea of the Higgs field eventually came to be accepted in the scientific community: "But Higgs persevered (and his revised paper appeared later that year in another journal), and physicists who took the time to study the proposal gradually realized that his idea was a stroke of genius, one that allowed them to have their cake and eat it too. In Higgs's scheme, the fundamental equations can retain their pristine form because the dirty work of providing the particles' masses is relegated to the environment." In saying that the Higgs field came to be accepted because it allowed scientists to "have their cake and eat it too," the author suggests that Higgs's theory was ultimately accepted as fact in part because it allowed physicists to reconcile what had seemed to be contradictory conditions: the harmony of the mathematical equations and the particles' apparent mass.

Choice B is incorrect because the passage does not suggest that the Higgs field was necessarily a concept that could be applied to other problems in physics than those immediately under Higgs's consideration. Choice C is incorrect because the passage does not suggest that Higgs's theory was accepted because it provided an answer to a question that earlier scientists had failed to anticipate. Choice D is incorrect because the passage never addresses any two phenomena being misinterpreted as a single phenomenon.

QUESTION 47.

Choice C is the best answer. The previous question asks for one reason Higgs's theory eventually gained acceptance in the scientific community. The answer, that it reconciled two seemingly irreconcilable conditions, is supported in the passage's fifth paragraph: "But Higgs persevered (and his revised paper appeared later that year in another journal), and physicists who took the time to study the proposal gradually realized that his idea was a stroke of genius, one that allowed them to have their cake and eat it too. In Higgs's scheme, the fundamental equations can retain their pristine form because the dirty work of providing the particles' masses is relegated to the environment." These lines make clear that Higgs's theory allowed for the particles' mass, while at the same time accepting the fundamental equations as valid.

Choices A, B, and D are incorrect because the lines cited do not support the answer to the previous question about why the Higgs field eventually gained acceptance in the scientific community, instead explaining certain aspects of the Higgs field (choices A and B) and discussing how certain scientific theories become accepted as fact even before they are proven (choice D).

QUESTION 48.

Choice A is the best answer. The main point of the last paragraph can be seen in its final sentence, which states that "mathematical equations can sometimes tell such a convincing tale, they can seemingly radiate reality so strongly, that they become entrenched in the vernacular of working physicists, even before there's data to confirm them." This point is borne out by the preceding lines of the paragraph, which recount the author's own experience of studying the still unproven Higgs field as it if were already a settled fact.

Choice B is incorrect because the anecdote the author shares about his own education does not demonstrate that physics, as a discipline, has come to operate differently over the course of his career. Choice C is incorrect because the details of the author's experience do not point to the process by which the existence of the Higgs field was confirmed, and indeed the passage does not describe that process at all. Choice D is incorrect because the passage broadly discusses the status of Higgs's theory at two different times (its initial rejection and later acceptance by physicists) and never considers how the details of the theory may have evolved.

QUESTION 49.

Choice A is the best answer. In the last paragraph, the author states that "the professor presented the Higgs field with such certainty that for a long while I had no idea it had yet to be established experimentally." In this context, for a scientific theory to be established most nearly means that it is validated, or proven.

Choices B, C, and D are incorrect because in the context of the last paragraph describing a scientific theory as being "established experimentally," the word "established" means validated, or proven, not founded (choice B), introduced (choice C), or enacted (choice D).

QUESTION 50.

Choice B is the best answer. The graph shows the periods of time that transpired between the moment when certain scientific concepts were introduced and the moment when those concepts were scientifically proven. Given the passage's discussion of the Higgs field, which was initially rejected by the scientific community before ultimately being accepted by it, the graph can therefore be seen as a means to put Higgs's work on mass into a greater context with other radical concepts that were ultimately accepted by the scientific community.

Choice A is incorrect because the graph illustrates that the Higgs boson required significantly more time to be confirmed than did any of the other theorized particles. Choice C is incorrect because the graph displays information only on the length of time necessary for any of the particles to be confirmed experimentally and does not indicate how any of them were regarded by scientists. Choice D is incorrect because the graph does not clarify anything about the Higgs boson other than the time that transpired between its being introduced and being confirmed.

QUESTION 51.

Choice A is the best answer. Both the W boson and Z boson were introduced in the late 1960s and experimentally confirmed in the early 1980s. It is therefore accurate to say that they were both proposed and proven at about the same time.

Choice B is incorrect because the graph shows that it took more than forty years for the Higgs boson to be experimentally confirmed, while all the other particles were confirmed in a significantly shorter period of time than that. Choice C is incorrect because the graph shows that the tau neutrino was experimentally confirmed in 2000, while tau itself was experimentally confirmed in approximately 1975. Choice D is incorrect because the muon neutrino took approximately fifteen years to be confirmed, while the electron neutrino took well over twenty years.

QUESTION 52.

Choice D is the best answer. In the last paragraph of the passage, the author explains that by the mid-1980s, "the physics community had, for the most part, fully bought into the idea that there was a Higgs field permeating space." That was fifteen years after the concept was introduced but decades before it would be confirmed, which would be analogous to most physicists believing in the existence of the electron neutrino in 1940, well after it had been introduced but many years before it was confirmed via experiment.

Choices A, B, and C are incorrect because the author depicts the Higgs field in the mid-1980s as being virtually an accepted fact, even though it had not yet been proven experimentally. This situation is not analogous to a proposed particle that is widely disputed until it is confirmed experimentally (choice A), a particle that has already been confirmed and consequently elicits widespread acceptance (choice B), or particles that are not considered as possibilities before the date on which they are formally proposed (choice C).