5. The fallacy of appeal to ignorance occurs when
a. the fact that a statement \( p \) is true is taken to imply that the opposite of \( p \) must be false.
b. the fact that we cannot prove a statement \( p \) to be true is taken to imply that \( p \) is false.

c. a conclusion \( p \) is disregarded because the person who stated it is ignorant.

6. Consider the argument “I don’t support the President’s tax plan because I don’t trust his motives.” What is the conclusion of this argument?

a. I don’t trust his motives.
b. I don’t support the President’s tax plan.
c. The President is not trustworthy.

7. Consider again the argument “I don’t support the President’s tax plan because I don’t trust his motives.” This argument is an example of
a. a well-reasoned, logical argument.
b. an argument that uses the fallacy of personal attack.
c. an argument that uses the fallacy of appeal to emotion.

8. Consider the argument “Your lack of enthusiasm for soccer proves that you are not a sports fan.” This argument is an example of
a. a well-reasoned, logical argument.
b. an argument that uses the fallacy of diversion.
c. an argument that uses the fallacy of limited choice.

9. Suppose that the fact that an event \( A \) occurs before event \( B \) is used to conclude that \( A \) caused \( B \). This is an example of
a. a well-reasoned, logical argument.
b. an argument that uses the fallacy of false cause.
c. hasty generalization.

10. When we speak of a straw man in an argument, we mean
a. a misrepresentation of someone else’s idea or belief.
b. a person who has not used good logic.
c. an argument so weak that it is as if it were made of straw.

BASIC SKILLS & CONCEPTS

11–20: Analyzing Fallacies. Consider the following examples of fallacies.

a. Identify the premise(s) and conclusion of the argument.
b. Briefly describe how the stated fallacy occurs in the argument.
c. Make up another argument that exhibits the same fallacy.

11. (Appeal to popularity) Apple’s iPhone outsells all other smart phones, so it must be the best smart phone on the market.

12. (False cause) Tax cuts must cause recessions, because the current recession began just a few years after large tax cuts.

13. (Appeal to ignorance) Fifty years of searching has not revealed life on other planets, so life in the universe must be confined to Earth.

14. (Hasty generalization) Since 1982, federal deficits have increased under Republican presidents and decreased under Democratic presidents. Clearly, only Democrats can balance the federal budget.

15. (Limited choice) He refused to testify by invoking his Fifth Amendment rights, so he must be guilty.

16. (Appeal to emotion) Thousands of unarmed people, many of them children, are killed by firearms every year. It’s time we ban the sale of all guns.

17. (Personal attack) If the Senator doesn’t have any religious affiliation, then he can’t have the personal values required to represent me.

18. (Circular reasoning) Illegal immigration is against the law, so illegal immigrants are criminals.

19. (Diversions) Good grades are needed to get into college, and a college diploma is necessary for a good career. Therefore, attendance should count in high school grades.

20. (Straw man) The mayor wants to raise taxes to fund social programs, so the must not believe in the value of hard work.

FURTHER APPLICATIONS

21–36: Recognizing Fallacies. In the following arguments, identify the premise(s) and conclusion, explain why the argument is deceptive, and, if possible, identify the type of fallacy it represents.

21. Obesity among Americans has increased steadily for the last decade, as has the sale of video games. It follows that video games are compromising the health of Americans.

22. The polls show the Republican candidate leading by a 2 to 1 margin. So you should vote for the Republican.

23. All the mayors of my home town have been men, which shows that men are better qualified for high office than women.

24. My father & I plan to exercise daily. But he never exercised when he was young, so I see no need to follow his advice.

25. My baby was vaccinated and later developed autism, which is why I believe that vaccines cause autism.

26. The state has no right to take a life, so the death penalty should be abolished.

27. Everyone loves Shakespeare, because his plays have been read for many centuries.

28. All of these studies about the risks of driving without seat belts are flawed. It’s certainly not a good idea to have your seat belt on if your car is on fire or underwater.

29. I will not give money to the tsunami relief organization. After last I gave to a charity, an audit showed that most of the money was used to pay its administrators in the front office.

30. It’s not surprising that the President’s budget contains spending increases. Democrats don’t care about taxpayers’ pocketbook.

31. The Congressperson is a member of the National Rifle Association, so I’m sure she will not support a ban on assault rifles.

32. My three friends who drink wine have never had heart attacks. My two friends who have had heart attacks are non-drinkers. Drinking wine is clearly a good therapy.

33. Responding to Republicans who want to end the estate tax, which falls mostly on the wealthy, a Democrat says, “The Republicans think that rich people aren’t rich enough.”

34. The Wyoming toast has not been seen outside of captivity since 2002, so it must be extinct in the wild.

35. My little boy loves dolls and my little girl loves trucks, so there’s no truth to the claim that boys are more interested in mechanical toys while girls prefer maternal toys.

36. Responding to Democrats who want to raise the fuel efficiency standards for new cars and trucks, a Republican says, “Democrats think that government is the solution to all our problems… .”

37–40: Additional Fallacies. Consider the following fallacies (which are not discussed in the text). Explain why the fallacy applies to the example and create your own argument that displays the same fallacy.

37. The fallacy of division has this form:
Premise: X has some property.
Conclusion: All things or people that belong to X must have the same property.
Example: Americans use more gasoline than Europeans, so Jake, who is an American, must use more gasoline than Europeans.

38. The gambler’s fallacy has this form:
Premise: X has been happening more or less often recently.
Conclusion: X will come to an end soon.
Example: It has rained for 10 days, which is unusual around here. Tomorrow will be sunny.

39. The slippery slope fallacy has this form:
Premise: X has occurred and is related to Y.
Conclusion: Y will inevitably occur.
Example: America has sent troops to three countries recently. Before you know it, we will have troops everywhere.

40. The middle ground fallacy has this form:
Premise: X and Y are two extreme positions on a question.
Conclusion: Z, which lies between X and Y, must be correct.
Example: Senator Peters supports a large tax cut, and Senator Willis supports no tax cut. That means a small tax cut must be best.