

85 The new results provide a reason that Texas gourd plants never evolved to produce a stronger scent: “If you really ramp up the odor, you don’t get more pollinators, but you can really get ripped apart by your enemies,” says Rob Raguso, a chemical ecologist
90 at Cornell University who was not involved in the Texas gourd study.

22

The primary purpose of the passage is to

- A) discuss the assumptions and reasoning behind a theory.
- B) describe the aim, method, and results of an experiment.
- C) present and analyze conflicting data about a phenomenon.
- D) show the innovative nature of a procedure used in a study.

23

As presented in the passage, Theis and Adler’s research primarily relied on which type of evidence?

- A) Direct observation
- B) Historical data
- C) Expert testimony
- D) Random sampling

24

Which statement about striped cucumber beetles can most reasonably be inferred from the passage?

- A) They feed primarily on Texas gourd plants.
- B) They are less attracted to dimethoxybenzene than honey bees are.
- C) They experience only minor negative effects as a result of carrying bacterial wilt disease.
- D) They are attracted to the same compound in Texas gourd scent that squash bees are.

25

The author indicates that it seems initially plausible that Texas gourd plants could attract more pollinators if they

- A) did not have aromatic flowers.
- B) targeted insects other than bees.
- C) increased their floral scent.
- D) emitted more varied fragrant compounds.

26

As used in line 38, “treated” most nearly means

- A) altered.
- B) restored.
- C) provided.
- D) preserved.

27

What did Theis and Adler do as part of their study that most directly allowed Theis to reason that “bees were repelled not by the fragrance itself” (lines 70-71)?

- A) They observed the behavior of bees and beetles both before and after the flowers opened in the morning.
- B) They increased the presence of 1,4-dimethoxybenzene only during the August flowering season.
- C) They compared the gourds that developed from naturally pollinated flowers to the gourds that developed from hand-pollinated flowers.
- D) They gave bees a chance to choose between beetle-free enhanced flowers and beetle-free normal flowers.

28

Which choice provides the best evidence for the answer to the previous question?

- A) Lines 45-50 (“So every . . . beetles”)
- B) Lines 51-53 (“Finally . . . beetles”)
- C) Lines 59-61 (“We would . . . open”)
- D) Lines 76-79 (“Gourds . . . flowers”)

29

The primary function of the seventh and eighth paragraphs (lines 65-84) is to

- A) summarize Theis and Adler’s findings.
- B) describe Theis and Adler’s hypotheses.
- C) illustrate Theis and Adler’s methods.
- D) explain Theis and Adler’s reasoning.

30

In describing squash bees as “indifferent” (line 68), the author most likely means that they

- A) could not distinguish enhanced flowers from normal flowers.
- B) visited enhanced flowers and normal flowers at an equal rate.
- C) largely preferred normal flowers to enhanced flowers.
- D) were as likely to visit beetle-infested enhanced flowers as to visit beetle-free enhanced flowers.

31

According to the passage, Theis and Adler’s research offers an answer to which of the following questions?

- A) How can Texas gourd plants increase the number of visits they receive from pollinators?
- B) Why is there an upper limit on the intensity of the aroma emitted by Texas gourd plants?
- C) Why does hand pollination rescue the fruit weight of beetle-infested Texas gourd plants?
- D) Why do Texas gourd plants stop producing fragrance attractive to pollinators when beetles are present?

32

Which choice provides the best evidence for the answer to the previous question?

- A) Lines 17-20 (“In one . . . beetles”)
- B) Lines 22-25 (“The aroma . . . 1,4-dimethoxybenzene”)
- C) Lines 79-84 (“Hand . . . development”)
- D) Lines 85-86 (“The new . . . scent”)