

1. US Literature

Her latest novel is about people's remembrances of a dead man named Bill Cosey who ran a beachfront hotel. Other recent books are about women living in an old house called The Convent and a woman named Violet who is nicknamed Violent, and this author has also collaborated with her son Slade to write children's books. A 1987 novel concerned an escaped slave who had two daughters. Name this author of *Love, Paradise, Jazz*, and *Beloved*.

ANSWER: (Toni) Morrison (or Wofford)

2. Calculus/Combinatorics (30 Seconds)

Evaluate the double integral of  $x$  going from zero to five, of  $y$  going from zero to  $\pi$ , of  $\sin y \, dy \, dx$ .

ANSWER: 10

3. Music

He wrote the books *Our New Music* and *What to Listen For in Music*. He won an Academy Award for his work with *The Heiress* and also wrote a Clarinet Concerto for Benny Goodman. Name this composer whose ballets include *Grohg*, *Dance Panels*, *Billy The Kid*, and *Appalachian Spring*.

ANSWER: (Aaron) Copland

4. Chemistry (10 Seconds)

The use of this element in warfare is controversial—it is useful because of its density and flammability, but there is disagreement as to its long-term consequences even if it is depleted. Though none of its isotopes is stable, its most common isotope has a half-life of four billion years. Its atomic mass is about two hundred thirty-eight, though that number is slightly lower when it is enriched to be used in nuclear power plants. Name this element with atomic number 92.

ANSWER: Uranium

5. Religion/Mythology

She is a main character in the eleventh chapter of the Second Book of Samuel. Her first husband was Uriah the Hittite, who died in battle. Her first child died at the age of seven days, but her second son became a very wise king. Name this mother of Solomon whose second husband was King David.

ANSWER: Bathsheba

6. Algebra (30 Seconds)

Give your answer as a single fraction in simple radical form. Find the eccentricity of an ellipse that has a horizontal major axis, an x-radius of 2, and a y-radius of 1.

ANSWER:  $\sqrt{3}/2$  (accept  $\frac{1}{2}\sqrt{3}$  or  $.5\sqrt{3}$ ) (accept Square Root or Radical in place of Root)

7. World History

It started with the Battle of Cadsand and ended with the Battle of Castillon. It included the Battles of the Thirty, of Crecy, of Poitiers, and of Agincourt. When it was over, England controlled very little territory on the European continent. Name this series of conflicts eventually won by King Charles the Seventh of France that lasted from 1337 to 1453.

ANSWER: (The) Hundred Years War

8. Technology

This company has been criticized for not publicizing its toll free number, which is 1-888-221-1161. It was started in 1998 and bought out by eBay in 2002. The services on its website are divided into Buyers, eBay Sellers, and Merchants. Name this business that allows money transfers and credit card transactions to be made over the internet.

ANSWER: Paypal

9. Pop Culture

She was a correspondent for *Sixty Minutes* from 1989 to 1991. She has also worked for *West 57<sup>th</sup>*, *Turning Point*, and *CBS Morning News*. She recently replaced Katie Couric on *The Today Show* after leaving her position on *The View*. Name this host of the syndicated version of *Who Wants To Be A Millionaire?*

ANSWER: (Meredith) Vieira (prompt Meredith)

10. World Literature

He was a musician, a leader, and, according to his fiancée, a humanitarian. By the time he is found, he is near death. This ivory trader is revered by natives despite his cruelty. His last words are, "The horror! The horror!" Name this character in Conrad's *Heart of Darkness*.

ANSWER: (Mr. Georges-Antoine) Kurtz

11. Biology

This is inside almost all cells. In prokaryotes, it always contains DNA; in eukaryotes, it rarely contains DNA. Typically, it is about two-thirds water and contains a high concentration of proteins and all of the organelles. Name the part of the cell between the cell membrane and the nucleus.

ANSWER: Cytoplasm (accept Cytosol)

12. Language Arts

Spell the noun beginning with the letter E that refers to the state of being in self-conscious distress. This term can also refer to something that causes a person to feel uncomfortable within a situation. Spell the word embarrassment.

ANSWER: E M B A R R A S S M E N T

13. Geography/Astronomy/Earth Science

Many people credit Herbert Hall Turner for naming this unit. It is equal to about  $3 \times 10^{16}$  meters. Name this unit used in astronomy that is the distance away which would cause one astronomical unit to subtend one thirty-six hundredth of a degree of an arc.

ANSWER: Parsec

14. Current Events

Because the recognized government of this country does not control its recognized capital, Prime Minister Ali Muhammad Ghedi lives in the city of Jowhar, and President Abdullahi Yusuf Ahmed lives in Kenya. This government is based in Baidoa, but that city is being threatened by Ethiopia. Name this country, the site of a major US military operation in 1993, whose traditional capital is Mogadishu.

ANSWER: Somalia

15. Geometry/Trigonometry (30 Seconds)

Find all values in radians between zero and two pi that satisfy the equation: the sine of  $2x$  equals one.

ANSWER:  $\pi/4$  (and/or)  $5\pi/4$  (it is incorrect if only one answer is given)

16. British Literature

Give the first and last name of the Shakespeare character who states: "To be up after midnight and go to bed then is early." Often drunk, he is cruel towards Malvolio and is the uncle of Olivia. Name this character from Twelfth Night who often has drunken conversations with Sir Andrew Aguecheek.

ANSWER: (Sir) Toby Belch

17. Nonfiction

His scientific writings include works on thunder and balloons, his political writings include supporting arguments for paper currency and the Albany Plan, and he wrote a very successful autobiography, among other things. His autobiography includes a list of thirteen virtues that he tried to follow throughout his adult life. Name this American founding father who wrote *Poor Richard's Almanack*.

ANSWER: (Benjamin) Franklin

18. Physics (10 Seconds)

A simple fixed one usually has a mechanical advantage of one, while a simple movable one usually has a mechanical advantage of two. Fixed and movable ones can be combined to give greater mechanical advantages. These numbers assume that these devices are frictionless and massless, which of course never happens. Name these simple machines that generally have a groove around them to prevent a rope from falling out of place.

ANSWER: Pulley(s)

19. Art/Architecture

Two of his earliest works are reliefs titled Madonna Della Scala and Battle of the Centaurs. One of his most famous sculptures shows Jesus after the crucifixion in the arms of Mary, and another one depicts Bacchus. Both of them were completed in the late fifteenth century. One of his most famous paintings was so controversial that another painter was hired to paint over the subjects' nakedness; that painting is The Last Judgement. Name this artist who painted the Sistine Chapel ceiling.

ANSWER: Michelangelo (di Lodovico Buonarrati) (accept Buonarrati)

20. US History

It contained twenty-three articles, three of which were amended by the United States Congress. In the twelfth article, the United States agreed to pay fifteen million dollars, and in later articles the United States agreed to relieve debt. We gained over five hundred thousand square miles of territory. Name this treaty named after the town it was signed in, which is just North of Mexico City, in 1848.

ANSWER: (Treaty of) Guadalupe Hidalgo

Tiebreakers: (If you need to replace a question, take one from the Replacement Packet.) Use these questions in the order given if you need to break a tie. The first correct answer wins the match.

This term began being used around 1900, and it is disputed whether it came from German, French, or Latin. Before 1959, its definition was based on oxygen, but it is now based on carbon in its ground state. Sometimes referred to as a 'gram atom' or a 'gram molecule', it is based on a number that is defined exactly but not yet measured exactly. Name this dimensionless quantity based on Avogadro's Number.

ANSWER: Mole (prompt Gram Atom or Gram Molecule)

This state contains the Humboldt River. Some of its towns are Henderson, Paradise, and Sparks. Its Northern border is split between Idaho and Oregon, and most of its Eastern border is with Utah. Name this state, whose capital is Carson City, known for its casinos.

ANSWER: Nevada

Which state contains the towns of Mishawaka, Fort Wayne, Muncie, Gary, and Indianapolis?

ANSWER: Indiana