

2002

TOSSUPS

1. They do not have distinct melting points, but instead melt gradually over a broad temperature range. When they break, they have irregular surfaces that are often smooth and curved because they are not organized into crystals. FTP, name this class of solids that includes supercooled fluids and whose best-known example is glass.

ANSWER: amorphous solids (prompt on early "supercooled fluids")

2. The last deciding vote was cast by Edmund Ross of Kansas. Without Ross, Fowler of Tennessee, and Fessenden of Maine, there were only 35 votes for conviction, one less than the two-thirds majority needed. Thus this man's trial, the only one of its kind until 1999, ended in acquittal. FTP, name this 17th president of the U.S., the only one before Bill Clinton to be impeached, who succeeded to the presidency upon Lincoln's death.

ANSWER: (the Senate impeachment trial of) Andrew Johnson

3. Perhaps one of the least appreciated painters of his time, this artist began as an Impressionist. He exhibited with his peers and learned Impressionist techniques from Pissaro. However, in the late 1870s, he moved away from that approach and developed his own style, making him a leader of the Post-Impressionists. FTP, name this painter who sought to emphasize underlying structure in his landscapes and still lifes, like his series on Mont St. Victoire.

ANSWER: Paul Cezanne

4. She has written poetry collections called "My Wicked, Wicked Ways", "Bad Boys", and "Loose Women", but is better known as a writer of prose. Her short stories include "The Eyes of Zapata" and "Woman Hollering Creek", and she is one of the first commercially successful Hispanic-American female writers. FTP, name this author of *The House on Mango Street*.

ANSWER: Sandra Cisneros

5. When this man told the Fsir his nightmares, they decided to seek protection for him from every kind of peril. Frigg exacted oaths from many plants, animals, and materials that they would not harm him. Unfortunately, Frigg did not exact the oath from "a little bush that grows west of Valhalla," and it was this bush that eventually killed this figure. FTP, name this Norse god, killed when Hod threw a sprig of mistletoe in the direction of Loki.

ANSWER: Balder

6. Dino Ignacio, a San Francisco artist, created a website a number of years ago claiming that this fictional character was evil and included images of him inserted into infamous historical situations. More recently, a picture made by a mirror site featured this character alongside a terrorist and was seen on a protest poster in Bangladesh. FTP, name this *Sesame Street* denizen whose best friend is Ernie.

ANSWER: Bert

7. Stephen Jones advanced one proposal for this idea that involved geologic processes and a slight increase in neutron emissions. However, it was buried in the publicity of the more extravagant 1989 assertions of Stanley Pons and Martin Fleischmann, who claimed to have used a simple apparatus and a palladium electrode to produce massive amounts of heat. FTP, name this scientific idea initially hailed as the solution to the world's energy problems but now generally believed impossible.

ANSWER: cold fusion

8. This river, at 5464 km, is one of the largest in its nation. As it enters the plains, it turns into a broad channel enclosed by dikes and becomes especially prone to flooding. Its worst recorded deluge occurred in

1931 and left about 80 million people homeless. FTP, name this river, also known as China's Sorrow due to its flooding and named for the color of the sediment it picks up as it travels south through China.

ANSWER: Yellow River or Huang He

9. Elbridge Gerry tried to continue negotiations despite the underhanded treatment of John Marshall and Charles Pinckney. The Americans were ordered to authorize a \$10,000,000 loan and a \$250,000 bribe to Talleyrand before negotiations could begin with France to protect U.S. shipping. Made public in 1798, this event nearly sparked war between the two nations. FTP, identify this diplomatic incident named for the code names of the three French agents involved.

ANSWER: XYZ Affair

10. Its requirement of a grand jury indictment for trial of certain crimes is probably the least known of its provisions. It also prohibits the seizure of private property for public use without just compensation, double jeopardy, and the deprivation of anyone of life, liberty, or property without due process of law. FTP, what Amendment to the U.S. Constitution is best known for the protection it provides against forced self-incrimination?

ANSWER: Fifth Amendment

11. He started his career as a journalist in Milwaukee before moving to the city with which he will always be associated. Influenced by Walt Whitman, his typically Midwestern poetry collections include "Cornhuskers" and "Slabs of the Sunburnt West". FTP, name this writer famous for a six-volume biography of Abraham Lincoln and the poem, "Chicago".

ANSWER: Carl Sandburg

12. This fashion house was started as a leather goods store in Milan in 1913 by the grandfather of its current namesake leader. The head designer had no real fashion training, only a Ph.D. in political science. Nevertheless, she led this fashion house to great success, making its symbol, the silver triangle, a prominent feature in a clothing line that includes the youth-targeted Miu Miu line as well as bags. FTP, name this Italian fashion house, led by a woman named Miuccia ["Mew-chia"].

ANSWER: Prada

13. This form was foreshadowed by Berlioz's *Symphonie Fantastique*, but it was Liszt who really developed it. Resulting from the search by Romantic composers for new orchestral forms, it died with the Romantic period, when composers who had previously favored it, such as Sibelius, abandoned it. FTP, identify this type of composition most closely associated with Richard Strauss in works like *Also Sprach Zarathustra*.

ANSWER: tone poem or symphonic poem

14. The first RNA enzymes discovered could remove these regions without the help of the spliceosome. They sometimes contain regulatory regions, but they are most often considered to be sites at which evolution occurs without affecting an organism's phenotype. FTP, identify this type of so-called junk DNA, the non-coding regions between exons.

ANSWER: introns

15. "A child educated only at school is an uneducated child" and "Skepticism, like chastity, should not be relinquished too readily." These assertions come from the works of this Spanish-born American philosopher, who wrote *The Sense of Beauty* and *The Life of Reason*. He is most famous, however, for another statement about his favorite discipline. FTP, name this Harvard professor and critic who said, "Those who cannot remember the past are condemned to repeat it."

ANSWER: George Santayana

16. One of his proudest achievements was reforming the ancient Hindu civil code to enable Hindu widows

to enjoy equality with men in inheritance and property. He championed democracy, social justice, and a neutral foreign policy during the Cold War. Selected as president of the Congress Party by Gandhi in 1929, he reluctantly accepted Muhammad Ali Jinnah's establishment of Pakistan. FTP, name this first prime minister of independent India, known for a popular, eponymous jacket.

ANSWER: Jawaharlal **Nehru**

17. The name's the same. One is the artist who climbed the charts in 1994 with the song, "Funk Dat". The other is a warrior from Thailand whose pupil, Adon, abandoned him when he was defeated in a championship match. He carries the shame of a scar on his chest from a Dragon Punch suffered at the hands of Ryu, the opponent who defeated him. FTP, give the shared name of the rapper and the master of Muay Thai, one of the bosses in Capcom's *Street Fighter II*.

ANSWER: **Sagat**

18. Pencil and paper ready. Johnny buys three apples and four oranges for one dollar and twenty-five cents. Janey buys six apples and two oranges for one dollar and thirty cents. FTP, how much does Joey pay for two apples and three oranges? You have 10 seconds.

ANSWER: **ninety cents**

19. The children's book he wrote, *Haroun and the Sea of Stories*, has been seen as an allegorical treatment of his experiences with censorship. He is better known for the Booker-Prizewinning *Midnight's Children*, *The Moor's Last Sigh*, and most famously the book that led the Ayatollah Khomeini to issue a *fatwa* calling for his death. FTP, name this author of *The Satanic Verses*.

ANSWER: Ahmed Salman **Rushdie**

20. Voltaire famously described it as being none of the things its name suggested. After 1648, it was indeed a diplomatic fiction composed of autonomous states. It was established formally under Otto I in the 10th century and the area it once occupied consists mainly of Germany. FTP, name this European political entity that became mostly theoretical with the Peace of Westphalia and ended with the rule of Francis II in 1806.

ANSWER: **Holy Roman Empire**

21. Tony Marston ran down two children while driving recklessly. Doctor Armstrong killed a patient by operating on her while drunk. Miss Brent caused the suicide of a girl pregnant out of wedlock. Vera Claythorne drowned a little boy named Cyril. Mysterious invitations for a holiday on an English island brought these and other suspects together. All nine perished one by one at the hands of Judge Wargrave in, FTP, this 1939 Agatha Christie book.

ANSWER: **And Then There Were None** or **Ten Little Indians**

22. His roommate at Harvard, Paul O'Brien, officiated at his Saturday, Jan. 12 wedding to Liza Powel, a Seattle-based advertising executive. Though he went to Harvard, this 6'6" Brookline, Massachusetts native is one of America's most talented comedians and his show is famous for such characters as Triumph the Insult Dog. FTP, name this talk show host, who met his wife when she was a guest on *Late Night* and whose last name has already appeared in this question.

ANSWER: **Conan O'Brien**

23. Taught piano at age 5, she was known throughout Europe by the time she was 16. Marriage curtailed her career, but despite eight children, she continued to compose, teach, and even tour. Many of her husband's piano works were written for her to perform, and she and her husband were close friends with Brahms, who is thought to have been in love with her. FTP, name this female composer and wife of Robert Schumann.

ANSWER: **Clara Schumann** (acc. Clara Wiecks)

BONUSES

1. FTSNOP, answer these questions about Japanese food.

a [5]. This term technically refers to any of a variety of dishes prepared with a particular kind of seasoned rice.

ANSWER: sushi

b [5]. This term, rather than sushi, describes raw fish, specifically raw fish served without rice.

ANSWER: sashimi

c [10]. This fermented soybean paste, often also involving barley, wheat, or rice, is used as a base for soups and an ingredient in many other dishes.

ANSWER: miso

d [10]. This fish is often dried, smoked, and shaved into thin curls. It tops various dishes, and is essential for dashi, Japanese soup stock, along with other items that are usually the particular chef's secret.

ANSWER: bonito (accept "katsubushi")

2. Given a symphony nickname and number, identify the composer, FTPE.

a [10]. *Pathetique*, #6

ANSWER: Piotr Tchaikovsky

b [10]. *Spring*, #1

ANSWER: Robert Schumann

c [10]. *Leningrad*, #7

ANSWER: Dmitry Shostakovich

3. FTPE, identify the following characters from the Jane Austen novel, *Pride and Prejudice*.

a [10]. The main protagonist, she is the second-oldest of the five Bennet sisters.

ANSWER: Elizabeth Bennet

b [10]. Elizabeth rejects this man's first, condescending marriage proposal, but weds him at the end of the novel.

ANSWER: Mr. Fitzwilliam Darcy

c [10]. This friend of Mr. Darcy's, the host of the ball at which Elizabeth and Darcy first meet, eventually marries Elizabeth's sister Jane after initially being convinced by Darcy that Jane does not love him.

ANSWER: Mr. Bingley

4. Think the civil rights movement began in the '60s? Guess again and answer these questions about an earlier African American crusader.

a [10]. This Jamaican-born black nationalist encouraged African Americans to have pride in their history and heritage, and believed in black independence and separatism.

ANSWER: Marcus Mosiah Garvey

b [10]. Garvey founded this organization in 1914 to encourage black economic independence and a black-governed nation in Africa. Unsuccessful in Jamaica, he founded branches in Harlem.

ANSWER: Universal Negro Improvement Association or UNIA

c [10]. Garvey created this travel company to send blacks to Africa, but was indicted for allegedly defrauding investors in its stock.

ANSWER: Black Star Lines

5. Give the molecular geometry of the following molecules or ions FTPE. For example, if I said "water," you would respond, "bent."

a [10]. methane, CH₄

ANSWER: tetrahedral

b [10]. carbonate ion, CO₃

ANSWER: trigonal planar (accept obvious equivalents)

c [10]. phosphorus pentachloride, PCl₅

ANSWER: **trigonal bipyramidal**

6. FTPE, answer the following about the birth of Greek gods.

a [10]. Name this goddess, born from the blood of Zeus mixed with the ocean.

ANSWER: **Aphrodite**

b [10]. Name this goddess, born from Zeus' headache.

ANSWER: **Athena**

c [10]. FTPE, these two gods were the offspring of Leto and Zeus.

ANSWER: **Apollo** and **Artemis**

7. Identify the Abstract Expressionist from the brief description, FTSNOP.

a [5]. He was known for his drip painting technique.

ANSWER: Jackson **Pollock**

b [10]. His paintings consisted of large regions of color, a style known as color field painting.

ANSWER: Mark **Rothko**

c [15]. He was best known for his paintings of women, which were figurative, in contrast to the works of most Abstract Expressionists.

ANSWER: Willem **de Kooning**

8. Identify the following from *Brave New World* FTPE.

a [10]. This tranquilizing drug is used to keep the population of the World State complacent and happy.

ANSWER: **soma**

b [10]. This best friend of Bernard's is an aspiring poet, a fact he hides behind his facade as the perfect citizen.

ANSWER: **Helmholtz Watson** (accept either name)

c [10]. This World Controller explains to Bernard and John the reasons the society has been set up as it has.

ANSWER: **Mustapha Mond** (accept either name)

9. Answer these questions about the first defeat of a Western power by an Asian nation in modern times, FTPE.

a [10]. This war lasting from 1904-1905 resulted from rivalry by the two countries over control of Korea and Manchuria. Teddy Roosevelt helped negotiate its end.

ANSWER: **Russo-Japanese War**

b [10]. This treaty ended the Russo-Japanese war and was signed in a New Hampshire city.

ANSWER: Treaty of **Portsmouth**

c [10]. Japan had been angry with Russia for forcing it to relinquish a strategic coastal city won from China in the Sino-Japanese War through diplomatic pressure by France, Germany, and Russia. Name either the diplomatic incident or the city.

ANSWER: **Triple Intervention** or **Port Arthur** (accept "**Lushun**")

10. FTPE, answer the following questions about auto racing in 2001.

a [10]. This golden boy of NASCAR won his fourth Winston Cup title in 2001 in his familiar number 24 Dupont Chevy Monte Carlo. It was his first championship under crew chief Robbie Loomis.

ANSWER: Jeff **Gordon**

b [10]. This Chrysler company returned to NASCAR for the first time in 20 years. The company's "Intrepid" chassis captured four races.

ANSWER: **Dodge**

c [10]. This German Formula 1 driver won his fourth championship in 2001--his second for Ferrari. His younger brother Ralf finished 4th overall in the standings.

ANSWER: Michael **Schumacher**

11. Answer the following about a certain class of plants, F15PE.

a [15]. Plants that live in hot, dry climates often have Kranz anatomy, with rings of photosynthetic cells around the leaf veins, and use this unusual type of photosynthesis, which functions at low concentrations of carbon dioxide.

ANSWER: **C4** photosynthesis

b [15]. C4 photosynthesis is necessary because of this process, in which a malfunctioning enzyme reacts with oxygen instead of CO₂ and causes the Calvin cycle to release energy instead of storing it.

ANSWER: **photorespiration** (do not accept or prompt on "respiration")

12. FTPE, answer the following questions.

a [10]. This political leader was called "irrelevant" by an Israeli leader on Dec 13, 2001.

ANSWER: Yasser **Arafat**

b [10]. This group claimed responsibility for the bus attack that killed 10 Israelis and prompted Sharon to cut ties with Arafat.

ANSWER: **al-Aqsa Martyrs Brigade**

c [10]. The al-Aqsa Martyrs Brigade was linked to this political movement founded by Arafat.

ANSWER: **Fatah**

13. Identify the following characters from *One Hundred Years of Solitude*, all of whom are Buendias, FTPE.

a [10]. The first of the line, he founds the town of Macondo.

ANSWER: **José Arcadio**

b [10]. He leads thirty-two uprisings and loses them all.

ANSWER: Colonel **Aureliano**

c [10]. Her beauty and innocence result in her being taken straight up to heaven while still alive.

ANSWER: **Remedios** Moscote

14. FTSNOP, identify the following terms from economics.

a [5]. Literally a general increase in prices, it is sometimes associated with an increase in the supply of money.

ANSWER: **inflation**

b [10]. This term denotes a long-term decline in economic activity. Currency volume often falls during this period.

ANSWER: **recession**

c [15]. Famously drawn on a napkin by its namesake, this curve which purportedly depicts the relationship between tax rates and revenue is often used by supply-siders to argue for tax cuts.

ANSWER: **Laffer** curve

15. FTSNOP, answer the following questions about a certain body of water.

a [10]. This is the largest inland body of water in the world.

ANSWER: **Caspian** Sea

b [20]. FTPE, name any four of the five countries that the Caspian Sea borders.

ANSWER: **Iran, Azerbaijan, Russia, Turkmenistan** or **Kazakhstan**

16. Identify the museum from the works it houses, 30-20-10.

[30] *The Raft of the Medusa*, *Erasmus of Rotterdam*

[20] *the Venus of Milo*, *The Oath of the Horatii*

[10] *the Mona Lisa*

ANSWER: the **Louvre**

17. FTPE, identify these African nations from historical clues.

a [10]. This country, independent since 1957, is named after a 4th - to 11th-century empire ruled first by Berbers and then by the native Soninke people. It is known for its wealth in gold.

ANSWER: **Ghana**

b [10]. This large former French colony is named for a 13th- to 15th-century empire which had its capital at Timbuktu and whose most famous king was Mansa Musa.

ANSWER: **Mali**

c [10]. Famously uncolonized by any European power until the mid-1930s, this nation did at one point break up into multiple kingdoms but was reunified by Emperor Menelik II in the late 19th century.

ANSWER: **Ethiopia**

18. FTPE, given a description, name the type of RNA.

a [10]. This carries aminoacyl groups into protein synthesis and inserts the amino acid into the forming polypeptide chain.

ANSWER: **transfer** RNA or **tRNA**

b [10]. This encodes the primary structure of the polypeptide chains.

ANSWER: **messenger** RNA or **mRNA**

c [10]. This catalyzes the formation of peptide bonds and creates the structural framework of its namesake subunits.

ANSWER: **ribosomal** RNA or **rRNA**

19. Identify the classical philosophers, FTPE.

a [10]. This pre-Socratic emphasized the constant nature of change, and is famous for saying, "You cannot step into the same river twice."

ANSWER: **Heraclitus**

b [10]. One of the most influential pre-Socratics, this man measured the pyramids and philosophized that the prime matter of the universe is water.

ANSWER: **Thales** of Miletus

c [10]. This philosopher, the leader of the Eleatic school, denied the existence of change, stating that all existence was part of one transcendent Being.

ANSWER: **Parmenides**

20. Identify the following related songs from their descriptions, FTPE.

a [10]. He can't stand to fly. He's not that naïve. He's just out to find a better part of himself. Who is this figure, who's more than a bird, more than a plane, and more than some pretty face without a name?

ANSWER: **Superman** (by Five for Fighting)

b [10]. This song asks, "If I go crazy, then will you call me superman?"

ANSWER: **Kryptonite** (by 3 Doors Down)

c [10]. This song by Our Lady Peace combines Nietzschean philosophy with a more common theme. Alone, alone, alone, an ordinary boy asks why the title event occurred.

ANSWER: **Superman's Dead** (accept "**Superman is Dead**", but not "Superman Dead")

21. Answer these questions about liberal reforms in the Soviet Union, FTPE.

a [10]. This man became leader of the Soviet Union after the retirement of Konstantin Chernenko in 1985 and initiated many democratic reforms.

ANSWER: Mikhail **Gorbachev**

b [10]. FTPE, give the Russian name for Gorbachev's two most famous reforms, one meaning "openness" and free speech, and the other signifying economic restructuring.

ANSWER: **glasnost** and **perestroika**

c [10]. Allowing free elections in 1990, Gorbachev paved the way for the election of this man as president of the Russian Federation, who later pulled Russia out of the USSR and served as president until his resignation in December 2000.

ANSWER: Boris **Yeltsin**

22. Here's a bonus about the cruder points of organic chemistry. Identify the non-carbon, non-hydrogen

atom in each of the following functional groups, FTPE.

a [10]. ketone

ANSWER: oxygen

b [10]. amide

ANSWER: nitrogen

c [10]. thiols or mercaptans

ANSWER: sulfur

23. Identify the Shakespeare plays from characters FTPE.

a [10]. Rosalind, Orlando, Jaques

ANSWER: As You Like It

b [10]. Emilia, Roderigo, Brabantio

ANSWER: Othello

c [10]. Orsino, Malvolio, Viola

ANSWER: Twelfth Night