

TOSSUP 1

Works left unfinished upon this man's death were a revision of his poems for a new edition and the blank verse epic poem Brutus. He submitted many poems and pastorals, including 1712's "The Messiah", to The Spectator, a London journal released by his friends Richard Steele and Joseph Addison. His two most famous works are in mock-epic form. For ten points, name this 18th-century English writer of "An Essay on Criticism", "The Dunciad", and "The Rape of the Lock".

Answer: Alexander **Pope**

TOSSUP 2

For every planet in our solar system, the square of a planet's orbital period divided by the semi-major axis of their orbit is the same. A line joining the stationary sun and the orbiting earth will sweep out equal areas in equal time intervals. The planets in our solar system have elliptical orbits with the sun at one of the two foci. These statements describe, for ten points, the third, second, and first, respectively, of these laws of planetary motion named after their discoverer.

Answer: **Kepler's** Laws of Planetary Motion

TOSSUP 3

This nation's first post-independence leaders, Boumèdiène and Ben Bella, created a one-party socialist state controlled by the FLN. Until the fall of the Fourth Republic, it was considered a part of France proper and not a colony, unlike other French possessions; this is due to its status as the oldest French African colony, conquered beginning in 1830. This nation gave France soccer star Zinedine Zidane, and France gave this nation its greatest author, Albert Camus. For ten points, name this large North African nation, which achieved independence in 1962 and contains much of the Sahara Desert and Atlas Mountains.

Answer: **Algeria**

TOSSUP 4

This river, mentioned in the Rigveda around 1500 BCE, is fed by the glaciers of the Karakoram and other ranges; it forms a wide alluvial plain stretching from the hills near Peshawar to the river's delta in Sindh. Its most important tributaries are the five rivers of the Punjab. For ten points, name this Pakistani river, flowing near Islamabad and Karachi, which lends its name to the great ancient civilization of India.

Answer: **Indus** River

TOSSUP 5

Its "codes of fair competition" were so popular among workers that a football team in Philadelphia was named after its emblem, the Blue Eagle. Its only director, Hugh Johnson, was named Time Man of the Year in 1933, the year it was created. Viewed as a failure only two years later after being overturned in Schechter Poultry Corp. v. United States, for ten points, name this centerpiece of President Franklin Delano Roosevelt's 1933 New Deal initiatives.

Answer: **National Recovery Administration**

TOSSUP 6

It was filed on behalf of the parents of a child not allowed to attend Seversville Elementary School. The Supreme Court upheld federal district judge James McMillan's decision in this case, as well as the solution he proposed to apply the directives of Brown v. Board in the namesake North Carolina county. For ten points, name this 1971 case, related to racial integration, which popularized the use of busing programs.

Answer: **Swann v. Charlotte-Mecklenburg Board of Education** (prompt on partial answer)

TOSSUP 7

Its four sites are a prison, power station, warehouse, and gas works. Founded by the man who patented the sugar cube, it currently houses "Shady Lane Productions", a fully-functioning office environment conceived by artist Phil Collins. He is on the short-list for an award recognizing achievement in contemporary art

awarded by this gallery. For ten points, name this institution which awards the Turner Prize annually to a young artist from Great Britain.

Answer: Tate Gallery

TOSSUP 8

This man taught that a king should not be a philosopher in his own right in *On Kingship*. His premier defender in the Arabic world was Avicenna. Works of his on logic include *Topics* and *Prior Analytics*. A student at the Academy, he left to tutor the youthful Alexander the Great. He returned to Athens late in life to form the Peripatetic School, also known as the Lyceum. For ten points, name this student of Plato, who wrote the *Nicomachean Ethics*.

Answer: Aristotle

TOSSUP 9

After the execution of the Prince of Persia, the male protagonist of this work cannot be dissuaded from attempting to marry the titular character, despite the entreaties of ministers Ping, Pang, and Pong and the aria "In questa reggia". Thanks to Liu's self-sacrifice and his correct responses to three riddles, the male protagonist, Prince Calaf, wins the titular character's hand in marriage. Containing the famous aria "Nessun Dorma", for ten points, name this posthumous Puccini opera about an eponymous Chinese princess.

Answer: Turandot

TOSSUP 10

An 11th to 15th-century Shona city, it thrived as the center of trade between the Limpopo and Zambezi Rivers. Its Great Enclosure is a double-walled structure with a 33-foot tall tower at the center. A soapstone carving of a bird found here appears on its namesake modern country's flag. For ten points, name this largest ancient structure in southern Africa that inspired inhabitants of white-ruled Rhodesia to rename their country after it.

Answer: Great Zimbabwe

TOSSUP 11

It is approximately 0.70 Angstroms for nitrogen and 0.66 Angstroms for oxygen. For fluorine, it is even smaller, at 0.64 Angstroms, which is expected since its nuclear charge is greater than that of nitrogen and oxygen. Although chlorine has a greater nuclear charge than fluorine, its value of 0.99 Angstroms is bigger, because chlorine has an additional electronic shell. The general trend is that this value decreases moving to the right across the periodic table, but increases moving downward. For ten points, identify this "length", equal to the distance from the center of an atom to its outer edge.

Answer: Atomic Radius (accept word forms)

TOSSUP 12

In 1982, this actress was sued at the age of five by McDonald's for appearing in a Burger King commercial. She has appeared in wide variety of television shows and films, including *Beverly Hills Family Robinson*, *Robot Chicken*, *Simply Irresistible* and the *Scooby Doo* movies. Married since 2002 to actor Freddie Prinze Jr., for ten points, name this actress, best known for her role as Buffy the Vampire Slayer.

Answer: Sarah Michelle Gellar

TOSSUP 13

In the 1990's, this author opposed the Disney theme park that was to be built near Manassas National Battlefield. His first novel, 1951's "Lie Down in Darkness", was set in his native tidewater region of Virginia, and was followed by "The Long March" and "Set This House on Fire". In 2000, he was part of a delegation to Fidel Castro that also included Arthur Miller and Gabriel García Márquez. For ten points, name this writer who died on November 1st at the age of 81, author of *Sophie's Choice* and the Pulitzer Prize-winning *The Confessions of Nat Turner*.

Answer: William Styron

TOSSUP 14

Works of this kind end on a positive note, though perhaps tempered by resignation and nostalgia. The first of the genre was Wilhelm Meister's Apprenticeship, written in 1796 by Goethe. Better-known examples include Great Expectations, Little Women, Portrait of an Artist as a Young Man, and the Harry Potter series. Taking its name from the German words for 'education' and 'a novel', for ten points, name this novel genre more commonly known as "coming of age".

Answer: **bildungsroman** (accept word forms of **coming of age** before mentioned)

TOSSUP 15

He founded the League for Spiritual Discovery religion, and later developed a theory called the Eight Circuit Model of Consciousness. A former psychologist at Harvard, he did a speaking tour with G. Gordon Liddy, who as a prosecutor had him arrested several times for drug charges in the late 1960s. It was at a speech on January 14, 1967 at Golden Gate Park before 30,000 hippies that he gave his famous "turn on, tune in, and drop out" speech, advocating the benefits of recreational drugs. For ten points, name this counterculture advocate of LSD use.

Answer: Dr. Timothy Francis **Leary**

TOSSUP 16

Pencil and paper ready: Quentin and Zach both start pouring water into funnels at the same time. Quentin's funnel has a volume of 200 milliliters, and while he is pouring water in at a rate of 10 milliliters per second, the water is draining out at 5 milliliters per second. As a result, Quentin's funnel eventually becomes full. Zach's funnel has a volume of 400 milliliters. If Zach's funnel is draining water out at a rate of 40 milliliters per second, then, for ten points, at what rate in milliliters per second should Zach pour water in to his funnel so that it becomes full at the same time as Quentin's funnel? You have fifteen seconds.

Answer: **50** milliliters per second

TOSSUP 17

Common critiques of this method include: that it is not falsifiable and therefore not scientific, or that it is falsifiable but plain false. Josef Breuer studied neurotic patients under hypnosis in the 1890s along with the man who coined this term. Common diagnoses of this include references to mythological figures Electra and Oedipus and the ego, superego, and id. Sometimes described as "depth psychology", for 10 points, name this branch of psychotherapy created by Sigmund Freud.

Answer: **Psychoanalysis**

TOSSUP 18

This 1939 play takes its title from a line in the Old Testament Song of Solomon. It follows the Hubbard siblings, whose quest for power comes at the expense of their own family and the town in which they live. Its setting is a plantation where Regina Giddens takes the life of her husband and daughter. Exposing the South's destruction by the forces of industrialization and capitalism, for ten points, name this play written by Lillian Hellman.

Answer: The Little Foxes

TOSSUP 19

If fused quartz is placed into a beaker of glycerine, it becomes rather indistinguishable from the glycerine due to this property. As light passes through the glycerine and into the fused quartz, the light does not bend, since for both media, this value is nearly the same. The same phenomenon would not occur for water, since water's value of 1.33 is smaller than fused quartz's 1.47. For ten points, what is this unitless number, equal to the speed of light in a vacuum divided by the speed of light in a given substance?

Answer: Index of refraction

TOSSUP 20

In the aftermath of the Third Battle of Kharkov, both sides realized the importance of a salient left flank in the lines west of the Don River. Delays in bringing up new Panther tanks gave one side four months to fortify. Pincer attacks from the north and south, led by Von Manstein, prompted the largest tank battle of all-time at Prokhorovka, in which the Germans failed to break through. For ten points, name this battle in the summer of 1943, the last major Nazi offensive on the Eastern Front.

Answer: Battle of Kursk (or Kursk Campaign)

TOSSUP 21

During his time at The Ohio State University, he won national amateur competitions in 1959 and 1961. His 73 wins as a professional puts him in 2nd place on the all-time list, only trailing Sam Snead. His chief rival was fellow legend Arnold Palmer, with whom he dominated the PGA Tour for over a decade. For ten points, name this golfer who holds the all-time record for major tournament championships, with 18.

Answer: Jack Nicklaus

TOSSUP 22

Born in Germany in 1825, he studied at Giessen under Justus von Liebig and Friedrich Kekule. Among his contributions to chemistry were the discovery and synthesis of many organic compounds, but he is better remembered for standardizing conventions still in use today. An example is the use of one solid line for a single bond, two for a double bond, and three for a triple bond. For ten points, name this chemist who most famously invented a flask which now bears his name.

Answer: Richard August Carl Emil Erlenmeyer

BONUS

World War II battles in the Pacific Ocean, ten points each.

a. The battle for this island city began after the conquest of Malaya and ended on February 15, 1942, when Japanese forces overwhelmed British defenses and took 80,000 soldiers prisoner.

Answer: **Singapore**

b. This May 1942 battle was fought by aircraft carriers in the ocean north of Australia. An American carrier, the USS Lexington, was lost, but it halted the Japanese advance toward Australia.

Answer: Battle of the **Coral Sea**

c. This battle, fought from August 1942 to February 1943 over one of the southern Solomon Islands, was the first major Allied offensive in the Pacific. The Allied victory here marked a turning point in the war.

Answer: Battle of **Guadalcanal** (or **Guadalcanal** Campaign)

BONUS

Pencil and paper ready: Kevin and Lloyd are moving a 10-kilogram cart. Ten points each, answer the following questions. Fifteen seconds per part.

a. Kevin is pushing the cart across a horizontal frictionless floor with a force of 50 Newtons. What is the acceleration of the cart across the floor, in meters per second squared?

Answer: **5** m/s²

b. Lloyd decides to reduce the acceleration to 2 meters per second squared by applying force to the cart in the other direction. What force must he apply in the opposite direction, in Newtons, to achieve this goal, assuming none of the force is being applied to Kevin?

Answer: **30** N

c. Lloyd throws sand on the floor, which further reduces the acceleration of the cart from 2 meters per second squared to 1 meter per second squared. Assuming that the acceleration due to gravity is 10 meters per second squared, what is the coefficient of kinetic friction?

Answer: **0.1** (or **1/10**)

BONUS

Questions about a Japanese writer, ten points each.

a. This man wrote the Sea of Fertility Tetralogy as well as the novel Confessions of a Mask

Answer: Yukio **Mishima**

b. Mishima is perhaps most famous for this novel in which Mizoguchi narrates his obsession with beauty, which culminates in his destroying the title structure.

Answer: The **Temple of the Golden Pavilion**

c. Mishima committed this form of ritual suicide after a failed attempt to overthrow the Japanese government and restore power to emperor.

Answer: **seppuku** or **hara-kiri**

BONUS

Madame Bovary, ten points each.

a. This lover of Emma Bovary deserts her, refusing to elope. Later, he refuses her attempt to prostitute herself to him.

Answer: **Rodolphe**

b. The other lover of Emma whom she eventually gets bored with is this law clerk in Rouen (ru-on). He refuses to help her with her accumulating debt.

Answer: **Leon**

c. Emma finally kills herself at the end of the novel using this poisonous element, with atomic number 33.

Answer: **Arsenic**

BONUS

A piece of legislation and its ramifications, ten points each.

a. This act, passed in 1787 under the Articles of Confederation, created a namesake territory north of the Ohio River and east of the Mississippi River.

Answer: Northwest Ordinance

b. The Northwest Ordinance established direct federal control over the territory, invalidating the land claims of existing states, especially this state which claimed the entire region as well as Kentucky.

Answer: Virginia

c. Another provision of the Northwest Ordinance established the illegality of this practice, a foreshadowing of similar prohibitions written into the Compromises of 1820 and 1850 and the Wilmot Proviso.

Answer: slavery

BONUS

Given an opera and its premiere date, name the composer. Five points each and a five-point bonus for all correct.

a. L'incoronazione di Poppea, 1642.

Answer: Claudio Monteverdi

b. The Bartered Bride, 1866.

Answer: Bedrich Smetana

c. Manon, 1884.

Answer: Jules Massenet

d. Ariadne auf Naxos, 1912.

Answer: Richard Strauss

e. The Rake's Progress, 1951.

Answer: Igor Stravinsky

BONUS

Chemistry laws, ten points each.

a. Comparing the effusion rates for two different gases, a greater quantity of a light gas escapes from a given hole than a heavy gas, ceteris parabus.

Answer: Graham's Law

b. For an ideal solution, the vapor pressure of an individual chemical component is proportional to the mole fraction of that component in the system.

Answer: Raoult's Law

c. The entropy of an isolated system can increase but cannot decrease.

Answer: Second Law of Thermodynamics (accept similar sounding equivalent answers)

BONUS

Name the civilization, 30-20-10.

30: A surviving religious tract of these people is a story of creation and a tale of Huhnapu and Ixbalanque.

20: That scripture, the Popul Vuh, is written in the Quiché dialect of this culture.

10: The Quiché people are a group descended from this Central-American culture who built Chichen Itza.

Answer: Maya

BONUS

Name these past champions of tennis's U.S. Open, ten points each.

a. This male Swiss phenom has won the past 3 tournaments.

Answer: Roger Federer

b. This American male, nicknamed the "King of Wimbledon", also won 5 U.S. Open tournaments.

Answer: Pete Sampras

c. This Russian's victory in 2006 was her second major tournament title, adding to Wimbledon in 2004.

Answer: Maria Sharapova

BONUS

Henry Wadsworth Longfellow poems, ten points each.

a. Part of the collection Tales of a Wayside Inn, the titular character warns, "The British are coming!"

Answer: Paul Revere's Ride

b. Modeled after Nordic epics and the Kalevala, it tells of an Indian chieftain and Minnehaha “by the shores of Gitche Gumee”.

Answer: The Song of Hiawatha

c. Subtitled “A Tale of Acadie”, it tells of Gabriel’s betrothed who, deported from Canada, wandered across America in search of him.

Answer: Evangeline, A Tale of Acadie

BONUS

Election of 1876, ten points each.

a. This Democratic Presidential nominee won the popular vote and was ahead by 19 electoral votes with 20 left uncounted, but he went on to lose perhaps the most corrupt election in U.S. history.

Answer: Samuel J. Tilden

b. This Republican won the election by striking an informal deal known as the Compromise of 1877.

Answer: Rutherford B. Hayes

c. The Compromise of 1877 pulled Federal troops out of the South, heralding the rise of the “Redeemer” Democrats and spelling the end of this era that began after the Civil War.

Answer: Reconstruction

BONUS

Do the following organic compounds contain oxygen, sulfur, both, or neither? 5-10-20-30.

a. Ethanol Answer: Oxygen

b. 2,2,4 Trimethyl Pentane Answer: Neither

c. Polyvinyl Chloride Answer: Neither

d. Naphthalene Answer: Neither

BONUS

Trusts, ten points each.

a. Founded by John D. Rockefeller, it was busted by the Sherman Antitrust Act in 1911. The resulting companies from its dissolution included Chevron, Amoco, Exxon and Mobil.

Answer: Standard Oil

b. While it avoided being busted under the Sherman Act, this company founded by J.P. Morgan in 1901 once cornered 67% of the domestic market for its metallic product.

Answer: United States Steel Corporation

c. This 1895 Supreme Court case severely limited the scope of the Sherman Antitrust Act.

Answer: United States v. E. C. Knight Co. (prompt on “E.C. Knight”)

BONUS

Vice-Presidents, ten points each.

a. Elected in 1840, he was the first Vice President to ascend to the presidency after his predecessor’s death.

Answer: John Tyler

b. He resigned after being charged with tax evasion related to bribes he accepted as governor of Maryland.

Answer: Spiro Agnew

c. Agnew was the second Vice President to resign. This first VP to resign did so to run for the U.S. Senate; he led South Carolina against the federal government in the Nullification Crisis.

Answer: John C. Calhoun

BONUS

Given a non-SI unit, name the corresponding SI unit in MKS. Five points each and a five point bonus for all correct.

a. Foot Answer: Meter

b. Pound Answer: Newton

- c. Slug
- d. Rankine
- e. Torr

Answer: **Kilogram** (DO NOT accept "gram")

Answer: **Kelvin**

Answer: **Pascal**

BONUS

Name the play from characters, 30-20-10.

30: Graziano, Montano

20: Brabantio, Emilia

10: Desdemona, Iago

Answer: **Othello**

BONUS

Number one overall National Hockey League draft picks, ten points each.

a. This defenseman from Bloomington, Minnesota, formerly on the United States Under-18 national team, was picked by the Saint Louis Blues in 2006.

Answer: Erik **Johnson**

b. This Canadian center, who wears number 87 and has been dubbed the next Wayne Gretzky, has played with the Pittsburgh Penguins since they selected him in 2005.

Answer: Sidney **Crosby**

c. This Russian left winger, picked by the Washington Capitals in the 2004 draft, won the Calder Trophy in 2005.

Answer: Alexander **Ovechkin**

BONUS

A psychological theory, ten points each.

a. Founded by Max Wertheimer, this school of psychology comes from the German for "whole" or "form" and advocates the experience of a structured whole, in addition to individual sensations.

Answer: **Gestalt** psychology

b. This is a basic rule of Gestalt psychology, which states that we perceive stimuli in as "Gestalt" a way as possible; for example, stimuli may be seen as symmetric, simple, or orderly as possible.

Answer: Law of **Prägnanz**

c. This Gestalt law states that objects or elements moving together in the same direction are seen as a unit. For example, we perceive objects pointing in the same direction as being together.

Answer: Law of **Common Fate**

BONUS

Name the scientist, 30-20-10.

30: He refuted the idea that all kinds of atoms are alike; this conjecture was later disproven.

20: He was the first scientist to report on color blindness, a condition with which he has since been associated.

10: Based on the idea that like atoms in a mixture repel one another, he formulated a namesake law of partial pressures.

Answer: John **Dalton**

BONUS

Norse gods, ten points each.

a. This is the only object which could harm Balder; a weapon made of it eventually killed him.

Answer: **mistletoe**

b. This trickster god found out about Balder's one weakness and devised the plan to use it against him.

Answer: **Loki**

c. After causing the death of Balder, Loki was bound to a rock as punishment, resembling this Greek figure. This man, married to Merope, was the king of Corinth.

Answer: Sisyphus