

Round 3

Packet by Yale Victor and Yale Aaron
Ramin Fatehi, James Goloboy, Victor Kao, Samuel Stubblefield
Aaron Lichtig, Eliot Brenner, Benjamin Gross, and Ned Andrews

TOSSUPS

TOSSUP 1 (General Knowledge):

The powder is heated in a solution of water and baking soda until the water evaporates (*). After the water has evaporated, the substance makes its characteristic sound, signaling that it is ready for consumption or sale. Developed around 1985, it is easier to transport, sell, and consume than its counterparts. FTP, name this form of cocaine, the penalties for possession of which are generally more severe than for corresponding amounts of the "upper class" powdered form.

ANSWER: crack cocaine (prompt on "cocaine" if given before it appears in the question)

TOSSUP 2 (History):

The president's refusal to sign this bill caused members of his own party to issue a "manifesto" accusing him of "usurping power and attempting to use readmitted (*) states to ensure his re-election." Its House sponsor, being a Maryland representative, might not have been expected to support denial of political rights to high-ranking Confederates and repudiation of Confederate war debts. But this 1864 bill would have done both, in addition to requiring the famous "Ironclad Oath" of allegiance to the Union. FTP, name it.

ANSWER: Wade-Davis Bill

TOSSUP 3 (Literature):

Educated at the University of Kansas at Lawrence, he worked as a schoolteacher and as a newspaper drama editor in St. Louis and his first play *Farther Off From Heaven* was produced in 1947 at the recommendation of Tennessee Williams. (*) He won an Oscar for his screenplay *Splendor in the Grass* and his less famous later works include *A Loss of Roses* and *Where's Daddy?* FTP, name this playwright more famous for *Come Back, Little Sheba*, *Bus Stop* and *Picnic*.

ANSWER: William Inge

TOSSUP 4 (Science):

When Wang and Rich determined the crystal structure of poly CGCGCG (*) they were surprised to find a new structure for the DNA. It has 12 base pairs per turn, and no major groove. In contrast to B-DNA, it is left-handed and the phosphate backbone runs in a zig-zag pattern. FTP name this unusual DNA conformation named after the pattern made by the backbone.

ANSWER: Z-DNA (prompt on "DNA").

TOSSUP 5 (Pop Culture):

Supposedly born Jaster Mareel, this man's name strikes as much fear throughout the galaxy as the sight of his Mandalorian armor and his ship *Slave I*. (*) Sporting nifty devices like a jet pack and a wrist gauntlet which fires a fibercord whip/grappling device, this ruthless tracker rarely lost his quarry. FTP, name this famous bounty hunter who met his supposed doom in the mouth of the monstrous Sarlacc in the Great Pit of Carkoon after bringing Han Solo back to Tatooine for Jabba the Hutt.

ANSWER: Boba Fett

TOSSUP 6 (Geography):

Founded in 1167 when the Bishop Absalon built a fortress near a fishing village on the island of Sjælland, this city has a name literally meaning "Merchant's Harbor." Most of the famous buildings, including (*) Rosenborg Castle, the Børsen Stock Exchange and the Rundetårn were built between 1588-1648 during the reign of King Christian IV. Other popular tourist attractions in this city include the Tycho Brahe Planetarium, Tivoli Gardens, and the Langelinie docks, home to the Little Mermaid statue. FTP, name this European capital.

ANSWER: Copenhagen

TOSSUP 7 (Science):

It is present in gnathomes, but not agnathans. It is a polypeptide molecule consisting of 29 amino acids, whose main function is to strongly oppose the action of (*) insulin, primarily through a hyperglycemic effect that results from its promotion of the breakdown of glycogen. For ten points, name this hormone that also reduces the rate of synthesis of glycogen, promotes the breakdown of protein, and promotes the use of fat as an energy source.

ANSWER: glucagon

TOSSUP 8 (Fine Arts):

[Note to moderator: This question is indeed supposed to be screwed-up.]

He was born in 1807 and died circa 1742. His works include the oratorio "The Seasonings" and the collection (*) "The Short-Tempered Clavier," as well as shorter pieces such as "Good King Kong" and the one-act opera "A Little Nightmare Music." Name this 21st of J.S. Bach's 20 sons, whose alter ego survives today as Peter Schickele, host of Schickele Mix from PRI, Public Radio International.

ANSWER: P.D.Q. Bach (Do not accept Peter Schickele)

P.D.Q.

TOSSUP 9 (History):

After his murder, this man spent a good deal of time in the trunk of a CIA officer's car before his body was dumped. Viewed by the US government as a communist for his request of Soviet military assistance, he was in fact a (*) nationalist who held power from June-September 1960 and witnessed the secession of Katanga and the military coup of the man who would be his successor. FTP, name this first prime minister of the independent Belgian Congo.

ANSWER: Patrice Lumumba

TOSSUP 10 (RMP):

He was sent to the Vanir as a hostage, but was decapitated and his head was (*) returned to the Aesir. Odin preserved the head in herbs and gained knowledge from it. FTP, name this Norse god who resided by the well Mimisbrunnr, the personification of wisdom.

ANSWER: Mimir

TOSSUP 11 (Literature):

This novel was so successful that it spawned a less famous sequel *The Road Back*. Lew Ayres played (*) Paul and Louis Wolheim played Katczinsky in the 1930 film version. Using the terse, routine language of communiqués to emphasize the dehumanizing routine nature of trench warfare, it aroused the ire of many German nationalists after its first printing in 1928. FTP, identify this famous anti-war novel written by Erich Maria Remarque.

ANSWER: All Quiet on the Western Front

TOSSUP 12 (Science):

The University of Gottingen's repeated refusals to admit this theorist to the faculty caused David Hilbert to exclaim "The academy is not a bathhouse!" In abstract algebra, any ring whose set of ideals satisfies the ascending chain condition is said to have the property named for (*) her. Albert Einstein recognized her work in invariant theory, including her theorem relating symmetry and conservation laws, as essential in his formulation of general relativity. FTP, name this mathematician.

ANSWER: (Amilie) Emmy Noether

TOSSUP 13 (Current Events):

In early November, this man was suddenly cleared of charges of stealing \$600 million dollars from a national airline. Maybe now he will drop his (*) run for parliament, largely thought to be motivated by the immunity given to members of the Duma. FTP, name this Russian tycoon, a scientist by training but owner of a large media and industrial company.

ANSWER: Boris Berezovsky

TOSSUP 14 (Sports):

He started over 130 consecutive games in his career and holds the record for most career rushing touchdowns scored. Born in Columbia, Mississippi, he played for (*) Jackson State before entering the NFL in 1976. This running back also holds the record for most career games with 100 yards rushing and most games rushing for 100 or more yards. For ten points, name this Chicago Bear who died from cancer last month at the age of 45, the NFL's all-time leading rusher.

ANSWER: Walter Pavton

TOSSUP 15 (History):

It took place in a field just outside Manchester, where a group of 60,000 demonstrators had gathered to hear Henry Hunt and other radical leaders protest high food prices and the depressed economy. (*) Disturbed by the size and nature of the crowd, local leaders ordered the local Yeomanry to arrest the speakers. Misunderstanding the order, they attacked the crowd, killing 11 and wounding 500. FTP, name this 1819 event, whose name ironically compares it with a British victory over Napoleon.

ANSWER: The Peterloo Massacre

TOSSUP 16 (History):

The son of a German immigrant, he was commissioned into his country's army in 1932. He quickly rose through the ranks and became the commander in chief of the army in 1951. In 1954, he deposed (*) President Federico Chavez and assumed sole national rule. For ten points, name this man whose reign was the longest of any 20th century Latin American ruler, the dictator of Paraguay until 1989.

ANSWER: Alfredo Stroessner

TOSSUP 17 (Literature):

Born in 1928, this writer spent his early life growing up in a small Hasidic community in the town of Sighet, Romania. World War II barely touched his life until 1944 when authorities (*) deported him and his family to the concentration camps. Scarred by the deaths of his mother and sister at Auschwitz and his father at Buchenwald, he channeled his grief into such works as *A Beggar in Jerusalem* and *The Town Beyond the Wall*. FTP, identify this winner the 1986 Nobel Peace Prize, the author of *Night*.

ANSWER: Elie Wiesel

TOSSUP 18 (RMP):

A development of the Vaisnava Bhakti movement, it started in Tamil regions, but moved north early in the millennium. Devotees, known as Bhaktas, believe that the best way to approach God is through (*) repetition of his name and singing hymns of praise. It reached its political apex in the early 19th century era of Ranjit Singh. FTP, name this Punjab-centered religion.

ANSWER: Sikhism

TOSSUP 19 (Science):

In some references it is given as zero kiljoules per mole for beryllium and neon, -26 kJ/mol for Boron, roughly -50kJ/mol for the alkali metals, and -328kJ/mol for fluorine. Its high value for carbon indicates that a half-filled 2p-orbital set does provide some energy advantage, whereas its near-zero value for nitrogen indicates the presence of significant (*) electron repulsion. FTP, name this periodic property, often invoked to explain ionic bonding, which measures the energy needed to add an electron to a free atom.

ANSWER: electron affinity

TOSSUP 20 (Fine Arts):

Early in his career he designed a *St. Mark* and *St. George* for the Or San Michele and demonstrated his mastery of ponderation, or weight-shift, a concept which eluded his predecessors. Probably his two most famous works are an (*) equestrian statue of Erasmo da Narni, completed around 1450, and the first free-standing nude since antiquity. FTP, name this Italian sculptor of the *Gattamelata* and a very famous *David*.

ANSWER: Donatello

TOSSUP 21 (Social Science):

It occurs from ages 2 to 6, when children can represent actions and objects internally but cannot systematically (*) manipulate these representations or relate them to each other. The child is therefore unable to take points of view other than his own in, FTP, which stage of cognitive development classified by Jean Piaget?

ANSWER: preoperational stage

TOSSUP 22 (Current Events):

Its theoretical peak performance tops out at 3.6 gigaflops, with sustained actual rates above 1 gigaflop. It uses (*) 128-bit vector processing and generally deals with data in 128 bit chunks, 2-4 times as much as a normal processor. It can perform up to 8 32-bit floating point operations per cycle and still look cool in its grey and white case. FTP name either the processor or the Apple computer built around it, which cannot be sold outside the US due to laws restricting the distribution of supercomputers.

ANSWER: The G4

TOSSUP 23 (Literature):

This name is shared by a Jules Verne sailor, a minor character in Shakespeare's *Henry IV* plays, a former Governor of Tennessee, (*) and a "straight man" in an award-winning comedy series. FTP give this name, which is often ascribed to Satan and is a corruption of "Edmund" or "Edward."

ANSWER: Ned

TOSSUP 24 (History):

Proclaimed as an Augustus less than 10 years after his co-ruler had murdered his father, he replaced (*) Valens as eastern emperor. Under his reign, he admitted the Goths into the empire, and assented to the removal of the Altar of Victory from the Senate house. A strictly orthodox catholic, he deprived the Arians of their privileges in 380 and imposed the Nicene version of Christianity on the empire. FTP, name this last man to rule an undivided Roman Empire, the namesake of a famous law code.

ANSWER: Theodosius I [his law code was the *Codex Theodosianus*]

TOSSUP 25 (RMP):

A wit once summed up his philosophy in limericks: "There was a young man who said 'God/Must think it exceedingly odd/If he finds that this tree/Continues to be/When there's no one about in the Quad./(REPLY) Dear Sir: Your astonishment's odd:/I am always about in the Quad. And that's why this tree/Will continue to be,/Since observed by Yours faithfully, (*) GOD." FTP, name this promoter of Tar Water and immaterialism, who published his *Dialogues of Hylas and Philonous* long before becoming Bishop of Cloyne.

ANSWER: George Berkeley (pronounced "Barkley")

Round 3: Yale Victor and Aaron

BONUS 1 (Pop Culture):

Given some lyrics from a Beatles song, name the song, TPE.

A) "Look at him working, darning his socks in the night when there's nobody there. What does he care?"

ANSWER: Eleanor Rigby

B) "Friday night arrives without a suitcase. Sunday morning creeping like a nun. Monday's child has learned to tie his bootlace. See how they run."

ANSWER: Lady Madonna

C) "Send me a postcard, drop me a line, stating point of view. Indicate precisely what you mean to say. Yours sincerely, Wasting Away."

ANSWER: When I'm 64

BONUS 2 (Geography):

Answer the following questions about Connecticut FTPE.

A) As of 1998, which city had the largest population in Connecticut?

ANSWER: Bridgeport

B) In 1997, Bridgeport residents paid the second lowest average income tax in the state. Hartford had the lowest average. FTP, which Southern Connecticut city's residents paid total income taxes ten times higher than Hartford?

ANSWER: Greenwich

C) Aside from Bridgeport and Hartford, three other Connecticut cities had population exceeding 100,000 in 1998. FTP, all or nothing, name any two of them.

ANSWER: New Haven, Stamford, Waterbury

BONUS 3 (Science):

Alberto the Asinine Assassin is attempting to dispatch the lovely Annabelle Lee. FTPE, answer the following questions.

A) Alberto corners Annabelle Lee with a butter knife, which he thrusts with all of his weak strength into her forehead. Name the most anterior bone of Annabelle's cranium that deflects his blow.

ANSWER: frontal bone

B) Stymied in his first attack, Alberto directs his second towards Annabelle's shapely hip. The dull and now bent knife bounces off of what projecting bony ridge of the pelvic girdle?

ANSWER: iliac crest

C) The momentum of his second attack carries Alberto to the ground where he falls on his knife which slips through his left abdominal wall and punctures this lymphoid organ that is responsible for destroying red blood cells. Name the organ Alberto managed to ruin.

ANSWER: spleen

BONUS 4 (History):

Answer these questions on Persia FTSP.

[5] This dynasty unseated the Parthian (Arsacid) dynasty in the early third century and ruled Persia until the Arab conquests.

ANSWER: the Sassanian dynasty

[5] This city, built on the Tigris just south of Seleucia, served as both the Parthian and Sassanian capital city.

ANSWER: Ctesiphon (TEEZ-i-fon)

[10] This Persian emperor captured the Roman emperor Valerian I in battle in AD 260, an event preserved in monumental rock sculpture in present-day Iran.

ANSWER: Shapur I (Sepor I)

[10] The Sassanian empire fell definitively after this stinging AD 641 battle, in which 100,000 Persian troops were supposedly massacred.

ANSWER: Battle of Nahavand

BONUS 5 (RMP)

Name these female divinities of Near-Eastern myth on a 15-5 basis.

A) (15) Her remains, along with Kingu's, were used to fashion the universe. While his blood went into the creation of man, her body became the earth.

(5) When Apsu and this dragon-goddess rebelled, the old Pantheon, led by Anu and Ea, were afraid to counterattack, and Marduk had to take the lead, with the result that the kingship of the gods passed to him.

ANSWER: **Tiamat**

B) (15) Gilgamesh resists her advances, kills the bull of heaven which she sends against him, and, with Enkidu's help, hurls the carcass back at her in heaven.

(5) Sister of the Underworld goddess Ereshkigal and bereft lover of Tammuz.

ANSWER: **Ishtar**

BONUS 6 (Literature)

Given a character, name the novel they come from FTSNOP:

[5] Harry Haller

ANSWER: **Steppenwolf**

[5] Quentin Compson

ANSWER: **The Sound and the Fury**

[10] Fermina Daza

ANSWER: **Love in the Time of Cholera**

[10] Peter Quint

ANSWER: **Turn of the Screw**

BONUS 7 (Current Events):

Answer these questions about the recent elections in Argentina, FTPE.

A) After ten years in office, this rightist president was constitutionally barred from seeking a third term

ANSWER: Carlos Saul **Menem**

B) This candidate of Menem's Justicialist Party finished second, garnering 38% of the vote.

ANSWER: Eduardo **Duhalde**

C) The winner of the election was this candidate of the Alianza alliance, the mayor of what large city?

ANSWER: **Buenos Aires**

BONUS 8 (Fine Arts):

FTSNOP, give the instrument which plays each of the following characters' motifs from Sergei Prokofiev's "Peter and the Wolf." For example, Peter's theme is played by the violin. You will not receive notification of correct or incorrect answers until the question is finished.

[Note to moderator: Don't give 'em the answers until the question is finished.]

A) (10) The wolf

ANSWER: **French horn**

B) (5) The duck

ANSWER: **Oboe**

C) (10) The cat

ANSWER: **Clarinet**

D) (5) The bird other than the duck

ANSWER: **Flute**

BONUS 9 (Science):

Alberto the Asinine Assassin, now recovered from emergency spleen surgery, adopts a new tact for dispatching Annabelle Lee. After raiding a university chemistry department and purchasing a Super Soaker MDS, Alberto sets out.

A) He first loads the Super Soaker with a mixture of water and this colorless liquid with empirical formula C_7H_8 and a specific gravity of 0.87. Knowing that it is flammable and toxic, but not that it does not mix with water and is commonly used as a solvent, he squirts Annabelle a few times. FTP, Name the chemical left in the gun.

ANSWER: toluene (or 1-methylbenzene)

B) Alberto then tries food poisoning. Onto Annabelle's salad he liberally sprinkles this white fine-grained solid with molecular weight 84.01 that decomposes to give off carbon dioxide above 270°C . This compound is nontoxic, however, and commonly used in preparing cookies and biscuits. FTP, name this compound that Annabelle shakes off of her lettuce with disgust.

ANSWER: sodium bicarbonate (acc. "N-A-H-C-O-3" or "baking soda"; DNA "baking powder")

C) After cleaning out his Super Soaker, Alberto fills it all the way up with this colorless, sweet smelling liquid of empirical formula $C_4H_{10}O$ and molecular weight 74.12. This chemical with a specific gravity of 0.71 depresses Alberto's central nervous system so he lights a cigarette to pick himself back up. FTP, name this chemical that Alberto learns is highly flammable.

ANSWER: ethyl ether (or "diethyl ether" or "1,1-oxybisethane").

BONUS 10 (History):

Answer these questions on modern Indonesian history FTPE:

A) Sukarno, Indonesia's first president, formed this party in 1927 as a center of anti-Dutch resistance.

ANSWER: Indonesia Nationalist Party

B) The Netherlands granted Indonesia provisional independence in 1949, which Indonesia dissolved in 1954 over continued Dutch occupation of this region.

ANSWER: Irian Barat or Irian Jaya or West New Guinea

C) The Indonesian government annexed East Timor in 1975–6 from this former colonial power.

ANSWER: Portugal

BONUS 11 (Literature):

Do you know your literary trilogies? FTPE, given the names of the individual parts, name the trilogy FTPE. If you don't know the name, you can **alternatively** name the author for 5 points. Give only one answer per part.

A) *Agamemnon*, *The Libation Bearers*, *Eumenides*

ANSWER: The Oresteia [10] or Aeschylus [5]

B) *All the Pretty Horses*, *The Crossing*, *Cities of the Plain*

ANSWER: The Border Trilogy [10] or Cormac McCarthy [5]

C) *Sexus*, *Plexus*, *Nexus*

ANSWER: The Rosv Crucifixion Trilogy [10] or Henry Miller [5]

BONUS 12 (Science)

With third degree burns over half his body, Alberto seeks a way to finish off his target from a distance and settles on using a giant lens to create a point of concentrated solar heat. Alberto uses the thin lens equations in his calculations and assumes air to have a refractive index of 1 (and so should you). Answer these questions about Alberto's final attempt FTPE. You have 10 seconds per part.

A) Using a material of refractive index 2, Alberto wants to have a focal length of 100 meters. He decides that the radius of curvature of the side closest to the target will be 200 meters. What will be the radius of curvature of the other side? Sign is important.

ANSWER: negative 200 meters [$1/f = (1/R1 - 1/R2)/(n-1)$]

B) Alberto spots Annabelle about 50 meters away, then tries to see her more clearly through the lens, but sees only a blur. FTP, all or nothing, what are the nature, orientation, and location of the image of Annabelle formed in the lens?

ANSWER: virtual, upright, and 50 meters behind Annabelle (or 100 meters behind the lens)—i.e. at the focal point on the opposite side of the lens from Alberto

C) Using this lens, Alberto targets Annabelle on a sunny day and the lens yields only a diffuse glow (it's not really a thin lens) Frustrated, Alberto watches Annabelle about to walk at 1 meter per second directly under him from his perch 125 m in the air. Assuming that $g=10$ meters per second squared and no air resistance, Alberto should wait until Annabelle is how many meters away before jumping if he wants to land right on top of her.

ANSWER: 5 meters (it will take 5 seconds for him to fall. Note, a gust of wind catches Alberto on the way down and his charred carcass slams into the sidewalk a good 4 meters from the shrieking Annabelle).

BONUS 13 (Literature):

For ten points each, name these three characters who contribute to the death of Patroclus in Homer's *Iliad*.

A) This Olympian guides the arrow that first wounds Patroclus and reduces his fury enough to render him vulnerable to other heroes.

ANSWER: Apollo

B) This young hero in the prime of youth throws the spear that stabs Patroclus through the abdomen.

ANSWER: Euphorbus

C) This son of Priam, standing over the wounded Patroclus, strikes his death blow and brings on himself the revenge of Achilles.

ANSWER: Hector

BONUS 14 (RMP):

Name the school of ancient philosophy. You will receive fifteen points if you can name it from a description of doctrines concerning virtue, five points from a list of major proponents of those doctrines.

A) (15) Doctrine: Virtue is the highest good, and it is through virtue, not material fortunes, that man attains happiness.

(5) Proponents: Zeno of Citium, Epictetus

ANSWER: Stoicism

B) (15) Doctrine: Virtue is achieved only through the emancipation from all desire and the overthrow of inhibiting social norms such as property, marriage, and established religion.

(5) Proponents: Antisthenes, Diogenes of Sinope

ANSWER: Cynicism

BONUS 15 (History):

FTPE, name the successor of the following 20th century British prime ministers.

A) Stanley Baldwin (his last tenure)

ANSWER: Neville Chamberlain

B) Edward Heath

ANSWER: Harold Wilson

C) Anthony Eden

ANSWER: Harold Macmillan

BONUS 16 (Sports):

Given some players, name the college football team FTPE.

A) Lavar Arrington, Kevin Thompson, David Macklin

ANSWER: Penn State University

B) Michael Vick, Corey Moore

ANSWER: Virginia Tech or Virginia Polytechnical Institute

C) Jamal Lewis, Tee Martin

ANSWER: University of Tennessee

BONUS 17 (Science):

Answer the following concerning early attempts to classify the chemical elements, FTPE.

A) When, in 1817, J.W. Dobereiner showed that the combining weight of strontium lies midway between those of calcium and barium, he started a fashion of grouping similar elements, for example chlorine with bromine and iodine, and lithium with sodium and potassium. What was his theory called?

ANSWER: theory of triads

B) In the mid-nineteenth century, the Englishman J.A.R. Newlands proposed that the known elements be grouped into seven groups of seven, ordered by atomic weight. By what name was his much ridiculed suggestion known?

ANSWER: octaves

C) In 1871, the same year as Mendeleev's table appeared, what German independently produced a periodic table with only 8 columns?

ANSWER: Lothar Meyer

BONUS 18 (Current events):

Recently there have been two shooting rampages at places of business in the US leaving a total of 9 people dead.

Answer the following questions about these tragic events.

A) F5P, both killers used what type of weapon (general class)

ANSWER: handgun

B) F5PE, give the cities in which the shootings took place

ANSWER: Seattle and Honolulu

C) As of this writing the killer in Seattle remains free and unknown; the shooter in Honolulu has been apprehended. Give his name FTP and his employer F5P.

ANSWER: Byran Uvesugi, Xerox Corporation

BONUS 19 (Literature):

Name the drama, 30-20-10.

30) The villains, four tempters, four knights, and murderers use only colloquial language.

20) During the interlude, Becket gives a sermon to his invisible congregation.

10) It is the foremost drama of T.S. Eliot

ANSWER: Murder in the Cathedral

BONUS 20 (Social Science):

Answer the following questions about languages FTPE

A) Examples of this type of language include Nahuatl, Estonian, and Japanese

ANSWER: Agglutinative

B) Examples of this type of language include Vietnamese and Classical Chinese

ANSWER: Analytic

C) Agglutinative languages and inflected languages are both in this class of language.

ANSWER: Synthetic

BONUS 21 (Pop Culture):

Given a television spin-off series, name the original series that birthed it FTPE:

[10] *Maude*

ANSWER: All in the Family

[10] *The Facts of Life*

ANSWER: Diff'rent Strokes

[10] *Mork and Mindy*

ANSWER: Happy Days

BONUS 22 (RMP):

Identify the following in the early life of Muhammed, for the stated number of points.

A) For five, his initial occupation in Mecca.

ANSWER: camel driver (accept equivalents)

B) For ten, the name of the widow who first employed and later married him.

ANSWER: Kadijah

C) For ten, the mountain at which he was staying when he had many of his celebrated visions.

ANSWER: Mount Hira

D) For five, the exact year AD in which he and Kadijah fled Mecca for Medina.

ANSWER: 622 AD

BONUS 23 (History):

Name these neurosurgical pioneers FTPE.

A) Britain's first neurosurgeon, he performed the first successful removal of a spinal tumor (1887) and identified the pituitary gland's role in regulating body growth and development. He died of heart stroke in Iraq in 1916 while serving as a field surgeon in the British Army

ANSWER: Sir Victor Horsley (acc. Alexander Hayden)

B) America's first neurosurgeon and one of the first men to perform a brain tumor operation, assisted in a secret operation to remove part of President Grover Cleveland's jaw on a yacht off Long Island Sound. He was president of the AMA in 1900.

ANSWER: William Williams Keen

C) A graduate of Yale College and Harvard Medical school and a professor at Harvard and later Yale Med, he devised many of the neurosurgical techniques still in use. He identified and lent his name to a specific form of pituitary malfunction and won a 1926 Pulitzer for his *Life of Sir William Osler*. On one visit to New Haven, he told his audience that he bore "with equanimity the burden of being an Eli in Cambridge."

ANSWER: Harvey Williams Cushing

BONUS 24 (Fine Arts):

30-20-10-5, name the painter from works.

[30] Self Portrait in Furred Coat (1500), Four Apostles (1526)

[20] The Venetian altarpiece, "The Feast of the Rose Garlands" (1506)

[10] Portrait of the Emperor Maximilian I (1519)

[5] The Four Horsemen of the Apocalypse (1498)

ANSWER: Albrecht Dürer

BONUS 25 (History):

Answer the following about a period of Japanese history, for the stated number of points.

A) (5) Lasting from 1185-1333, it is considered Japan's first Shogunate

ANSWER: Kamakura

B) (10) In 1192, he adopted the title Shogun for the first time.

ANSWER: Yoritomo Minamoto

C) (10) This clan, which dominated during the latter part of the Kamakura period, fended off a major threat of foreign invasion.

ANSWER: Hojo

D) (5) This group of people comprised the foreign invaders who were defeated by the Hojo clan.

ANSWER: Mongols