

## Prison Bowl VII

Questions written and edited by Hunter College High School (Alexandra Bradu, Sam Brochin, Swathi Chakrapani, David Godovich, Ada-Marie Gutierrez, Sarah Hamerling, Sophey Ho, Jonathan Lin, Daniel Ma, Brent Morden, Alex Moschetti, Tenzin Norzin, Priya Srikumar, Albert Tai, Douglas Wong, Karina Xie, Marianna Zhang, Tal Zussman), University at Buffalo (Matt Hill and Zach Pace), Matthew Gurevitch, and Rohan Nag.

### Round 06 – Tossups

1. A head coach for this team, nicknamed The Emperor Chaz, is the only head coach to have won 4 Super Bowls. One member of this team was the first player to get an interception, fumble recovery and a forced fumble in a Super Bowl. That player, Joe Greene, was the cornerstone of this team's 1970s defensive line, and this team once played in the Three Rivers Stadium but now plays at Heinz field. The 1978 MVP award went to a player from this team, Terry Bradshaw, and during that time this team's nickname was a play on the phrase "Iron Curtain." For 10 points, name this football team with team colors black and gold that won the 2009 Super Bowl.

ANSWER: Pittsburgh **Steelers** <AM>

2. In his monograph on this process, Michael Dummett published three proofs of the Gibbard-Satterthwaite theorem and proposed a variation on the Borda count, which remains vulnerable to the "tactical" form of this action. Unrestricted domain, IIA ("eye eye ay"), Pareto efficiency, and non-dictatorship cannot all be satisfied for three or more choices in this process according to Arrow's impossibility theorem. Condorcet's paradox results in no winners under majority rule in this process. It includes first-past-the-post and runoff variations. For 10 points, name this action whereby individuals choose between candidates in an election.

ANSWER: **voting** <SH>

3. Milner, Witten, and Cates approximated the average density of the "brush" form of these molecules described in Carothers equation. They are produced in a reaction between copper compounds called ATRP. An equation for Gibbs free energy including terms for volume fraction comprises the Flory-Huggins model of these molecules. Organoaluminum cocatalysts are often used to produce these molecules along with Ziegler-Natta catalysts. They may be produced via step-growth, chain-growth, condensation, or addition. For 10 points, starch and nylon are what macromolecules consisting of repeating subunits called monomers?

ANSWER: **polymers** <SH>

4. A clumsy character in this text sings an original song, distinguishing between the song, its name, and what it is called, but the song turns out to be a familiar one. Another character claims he can explain all poems ever invented and emerges from the sheep-queen's egg. In this novel, framed as a possible dream of the protagonist, Humpty Dumpty explains phrases like "'Twas brillig" and "slithy toves". Including "The Walrus and Carpenter" and "Jabberwocky", this novel features a house where everything is reversed and a massive chess game played by the Red Queen. For 10 points, name this Lewis Carroll sequel to *Alice in Wonderland* where Alice steps into a mirror.

ANSWER: ***Through the Looking-Glass, and What Alice Found There*** <KX>

5. This work's first movement features an enigmatic oboe cadenza near the recapitulation, played in a prolonged descending phrase. The theme of the second movement, played by the cellos and double basses and answered by the flutes, is borrowed from Mozart's Symphony No. 40. This symphony's final movement begins without pause and ends with twenty-nine C major tonic chords. The opening motif, repeated throughout by the horns and the piccolo, consists of a short-short-short-long rhythm and symbolizes fate knocking at the door. For 10 points, name this symphony in C minor by Ludwig van Beethoven.

ANSWER: **Beethoven's 5th Symphony** [accept equivalents; prompt on **5th symphony** before Beethoven is mentioned] <KX>

6. High compressibility of objects subject to this phenomenon leads to instability at equilibria. Flows driven by this force can be estimated with the Boussinesq approximation. The Cartesian Devil demonstrates this force, whose ratio to viscosity can be approximated with the Grashof number. This force regulates isostasy, and is responsible for convection. The earliest claim about this force was that an object in a fluid is lifted with force equal to the weight of displaced fluid, this being Archimedes' principle. For 10 points, name this property that allows boats to float.

ANSWER: **buoyancy** <AM>

7. Some characters in this work theorize that women should express restraint rather than flamboyance. A representative of the Ministry of Rites tells of a scholarly poetess who writes in Chinese and drinks a garlic-smelling anodyne for her coryza. That chapter in this work is named after *The Broom Tree*, a poem written to one of the title figure's unrequited loves, Utsusemi. This novel's title character is exiled to Suma after kidnapping Futjisubo's 10-year-old niece, whom he marries after the death of To-No-Chujo's sister, Lady Aoi. For 10 points, name this Japanese novel from the Heian Era written by Lady Murasaki Shikibu.

ANSWER: *The Tale of Genji* [or *Genji Monogatari*] <ZP>

8. This event followed the death of two allied rivals during a battle on the River Derwent, for which the losers did not wear their armor. Tostig's death forced the loser to send Edwin and Morcar home before this battle, fearing their desertion. Its victors were stymied under the leadership of Eustace aux Gernons, who may have ordered a retreat from a nearby ditch called the *Malfosse*. Despite repeated attacks, one side's housecarls largely remained in formation until an arrow killed their leader who had earlier won the Battle of Stamford Bridge. For 10 points, name this decisive victory over Harold Godwinson for William the Conqueror during the 1066 Norman conquest of England.

ANSWER: Battle of Hastings <ZP>

9. A character created by this author socializes with Billy through sex with Billy's sister Trudy. In a story by this author, one character achieves masculinity by shooting a lion right before he is shot by his wife; that story features a triangle between Margot, Wilson, and Francis Macomber. His works often feature the theme of "nada" and follow the iceberg theory in omitting detail. He created a character who escapes the battle police and falls in love with Catherine Barkley, and he quoted Gertrude Stein on the Lost Generation for one novel's epitaph. For 10 points, name this writer who created Frederic Henry and Jake Barnes in *A Farewell to Arms* and *The Sun Also Rises*.

ANSWER: Ernest Hemingway <MZ>

10. This man names an approximation that includes an error term of a Bernoulli number-containing integral, used to approximate infinite series. He names a numerical process used to find solutions to ordinary differential equations. The number of positive integers less than and coprime to  $n$  is his totient function. This man found that all convex polyhedrons have the same value for the sum of their vertices, edges, and faces, his so-called "characteristic." That finding, as well as his negative resolution of the Seven Bridges of Königsberg problem, formed the basis for topology. For 10 points, name this Swiss mathematician whose namesake identity relates  $e$ ,  $\pi$ ,  $i$ , and 1.

ANSWER: Leonhard Euler <ZP>

11. While journeying under the name Rigr, this god was said to have introduced social classes to humanity. Sometimes referred to as the "brightest of the gods," this god hatched the plan to cross-dress Thor. A son of nine mothers, this god owns a horse named Gulltopp, and was sometimes known as Gullintani due to his golden teeth. This Norse god will assemble the other gods before Ragnarok by blowing into Gjallarhorn, and will kill and be killed by Loki. For 10 points, name this Norse god who watches over the rainbow bridge, Bifrost.

ANSWER: Heimdallr [or Heimdali; accept Gullintani before mentioned] <AM>

12. This party responded to the Taff Vale case by passing the Trade Disputes Act, which gave trade unions immunity from liabilities made by strike actions. A party of this name passed the Naval Service Bill introduced by William Laurier. A faction led by Robert Peel's followers combined with the Whigs to form this party, whose members included Herbert Asquith. An act passed by this party gave the Lord-Lieutenant of Ireland the right to indefinitely detain those disturbing the peace; that act was introduced by this party's Prime Minister William Gladstone. For 10 points, name this party displaced by the Labour Party in the 1920s as the opposition to the Conservative party.

ANSWER: Liberal Party [or Liberal-Democrat Party; or SDP-Liberal Party; do not accept "Labour Party"] <JL>

13. The preface of this novel describes the author's discovery of the Greek word ANARKH inscribed on a stone wall in the title location. This novel describes the protagonist's election as the Pope of Fools as Gringoire attempts to put on a play in the Palace of Justice. A red-haired character is described as beautiful as he carries Gudule's daughter into the title structure. This novel ends with the image of the protagonist's bones falling to dust as guards attempt to separate two skeletons. In this novel, Archdeacon Claude Frollo hands the gypsy dancer Esmeralda over to soldiers to be hanged. For 10 points, name this novel by Victor Hugo that features the deformed Quasimodo.

ANSWER: *The Hunchback of Notre Dame* [or *Notre-Dame de Paris*] <AM>

14. One work by this philosopher argues that slavery is in reality a state of conflict between a conqueror with absolute power and the conquered. In a namesake proviso, this man argued that one gained rights over an object from putting labor into it, a precursor to the homestead principle. He proposed that we are born without innate ideas, since our minds are *tabula rasa*. This empiricist wrote *An Essay Concerning Human Understanding* and *Two Treatises of Government*. For 10 points, name this British philosopher who argued for the natural rights to life, liberty, and property.

ANSWER: John **Locke** <JL>

15. Many steel beams in this structure were painted red to evoke the ore they originated from. It was originally proposed to be covered in gold leaf to mimic the color of dying leaves, but was eventually painted beige. Cornered windows in this structure give the impression of glass melding into stone. In 2002, this structure was permanently repaired via tensioning. In this house commissioned by Edgar Kaufmann, deflection of concrete cantilevers caused its various balconies to sag. For 10 points, name this Pennsylvania house designed by Frank Lloyd Wright partially over a waterfall.

ANSWER: **Fallingwater** [accept Edgar **Kaufmann Residence** before mentioned] <SoH/AT>

16. Chengdu and Kharagpur were the initial bases for the first of these events, which targeted coke ovens and led to the Zhejiang-Jiangxi Campaign. Another of these military campaigns, Operation Meetinghouse, saw Carl Spaatz order the use of white phosphorus and napalm in the Tokai and Hanshin industrial regions. The American capture of Saipan allowed for the escalation of these attacks, the first of which was the Doolittle Raid. For 10 points, name these military attacks on the Pacific front of World War II, later executed with B-29s, by the American air force which culminated with the destruction of Hiroshima and Nagasaki.

ANSWER: American **bombing** raids on **Japan** [prompt on partial answers such as **raids**, **raids** on **Japan**, **attack** on **Japan** or **bombing**] <JL/RN>

17. This molecule is produced from the methylation of its precursor via PNMT in chromaffin cells. This catecholamine is metabolized by catechol-o-methyl transferase, and at high levels of this hormone, the beta types of a class of G-protein coupled receptors mediate vasodilation. Synthesized using tartaric acid, this hormone triggers increased lipolysis and gluconeogenesis. Its production is regulated by ACTH and it acts on the sympathetic nervous system, resulting in suppressed digestion and pupil dilation. It is produced in the medulla of glands above the kidneys. For 10 points, name this hormone responsible for the “fight or flight” response.

ANSWER: **adrenaline** [or **epinephrine**; do not accept but do not otherwise reveal “noradrenaline” or “norepinephrine”] <SH>

18. A doomsday prophecy in this faith states that a comet named Gochihr will strike the Earth, creating a river of metal that purifies the wicked. Weddings in this religion include trays with pomegranates and sugar cones on them. Two four-eyed dogs guard the Chinvat bridge in this faith, which all souls cross after death. In this religion, the dead are placed on Dakhmas, or Towers of Silence. Its demons are called daevas, and its main text is the Avesta. For 10 points, name this Persian dualistic religion that focuses on the conflict between the evil force Ahriman and the benevolent force Ahura Mazda.

ANSWER: **Zoroastrianism** [accept **Magianism** or **Mazdaism**] <PS>

19. One of these objects is framed on the left by five roundels depicting Christ’s life and on the right by five roundels depicting Christ’s death and resurrection. That object symbolizes God’s omniscience. Another one of these features Edward James’s backside in *Not to be Reproduced*, and a bored woman serving drinks stands in front of one of these items in a Manet painting. Another shows Mariana and Philip IV, who pose for a painting as their young daughter and her attendants watch. Often held by nude Venuses, they appear in the background of *A Bar at the Folies-Bergere*, *Las Meninas* and *The Arnolfini Wedding*. For 10 points, name these objects used to paint self-portraits.

ANSWER: **mirrors** [or synonyms; do not accept “paintings”] <MZ>

20. After police shot a local drunk, the Wadi Salib riots created turmoil in this country. A Peace Now rally here supported the Disengagement Plan maintaining the Green Line surrounding it. Thousands of its citizens in Sudan and Ethiopia were repatriated due to famine in Operation Moses, while Operation On Wings of Eagles allowed for the immigration of many Yemenis to this country. This nation accidentally bombed the USS *Liberty*, and its occupation of disputed territories led to the First and Second Intifada in Palestine. Its prime ministers included Yitzhak Rabin and David Ben-Gurion. For 10 points, name this country currently led by Benjamin Netanyahu.  
ANSWER: State of Israel <JL>

TB. This man responded to a papal bull with *Brutum fulmen* Pape Sixti V, and his Treaty of Vervins saw peace with Spain. The Peace of Alais reduced some of the rights this man gave to a religious minority in his country. The Briare Canal and silk factories were built by this man's superintendent who fought with him at the Battle of Ivry, the Duke of Sully. A *tiers parti* picked Charles de Bourbon and Isabella Eugenia to oppose this man; that was the Catholic League. Assassinated by Francois Ravaillac, this *politique* reduced *intendants* powers and issued the Edict of Nantes, ending the French Wars of Religion. For 10 points, name this Bourbon king preceded by Henry III.  
ANSWER: Henry IV [or Henry of Navarre] <RN>

## **Round 06 – Bonuses**

1. John Marston fights these beings in a *Red Dead Redemption* downloadable pack. For 10 points each:

[10] Name these beings who drop rotten flesh in *Minecraft* and name a special mode in the *Call of Duty* series. They are the principal enemies in *Left 4 Dead*, *Resident Evil*, and *The Walking Dead*.

ANSWER: **zombies** [accept equivalents like the **undead**]

[10] This video game follows Joel and Ellie, who fight *Cordyceps*-infected zombies as they traverse a post-apocalyptic landscape to find the Fireflies.

ANSWER: *The **Last of Us***

[10] Infection by *Cordyceps* also inspired tochukaso, which grow on the back of this orange Bug and Grass type Pokemon found in Mt. Moon. It evolves into a large sightless Pokemon fully controlled by the mushroom on its back.

ANSWER: **Paras** <MZ>

2. This work's theme begins slowly and is played by cellos, double basses, and bassoons, which then it speeds up until it is played fortissimo by the full orchestra. For 10 points each:

[10] Name this work that suggests a protagonist being pursued by a court of trolls, gnomes, and goblins in the title location. It ends with a short B minor chord played by the full orchestra.

ANSWER: ***In The Hall of the Mountain King*** [accept ***I Dovregubbens hall***]

[10] *In the Hall of the Mountain King* is a piece from the *Peer Gynt* suite by this composer. His piano concerto in A minor begins with a timpani roll and the notes A, G sharp, E.

ANSWER: Edvard **Grieg**

[10] Peer Gynt's fourth act opens with this piece. Its melody alternates between flute and oboe, and its B, G-sharp, F-sharp, E, F-sharp, G melody is frequently used to evoke imagery of spring.

ANSWER: ***Morning Mood*** [accept ***Morgenstemning***] <AT>

3. For 10 points each, answer these questions about cartography.

[10] This Greek-Egyptian mathematician revolutionized mapmaking in his treatise *Geography* by creating longitude and latitude. Around 150 CE, he created an influential map of the known world.

ANSWER: Claudius **Ptolemy** [or Claudius **Ptolemaeus**]

[10] This map projection named after a Flemish cartographer was widely used in nautical navigation. It has straight latitudinal and longitudinal lines, and greatly distorts land area and shape near the poles as latitude lines diverge.

ANSWER: **Mercator** projection

[10] This English physician created a map of cholera outbreaks in London to prove that the contaminated water in the Broad Street pump was the source of the cholera epidemic.

ANSWER: John **Snow** <DM>

4. Ivan Baldry found that these objects tend to cluster in a "blue cloud," whose peak took a sigmoid shape. For 10 points each:

[10] Name this class of astronomical objects, classified in the Hubble sequence by the presence of a bar and the tightness of curved arms. They include the Whirlpool Galaxy or M51, and the Milky Way.

ANSWER: **spiral** galaxy [prompt on just **galaxy**]

[10] The structures associated with these stars in M51b are almost completely decoupled from the regions containing younger stars. These older, metal-rich stars are generally found in the galactic halo and in globular clusters.

ANSWER: **population II** stars

[10] The "M" in M51 stands for Charles Messier, who compiled a catalog of 110 objects easily mistaken for this other class of objects whose composition was famously described by Fred Whipple.

ANSWER: **comets** <ZP>

5. Answer some questions about women who have their own Old Testament books, for 10 points each.

[10] This woman married the Persian king in order to stop a plot to kill the Jews. Her namesake book forms the basis for the holiday *Purim*.

ANSWER: **Esther** [or **Hadassah**]

[10] This woman set the precedent for conversion and familial piety in her namesake book by telling her mother-in-law that “your people shall be my people, and your God shall be my God”.

ANSWER: **Ruth**

[10] Ruth was formerly a resident of this land before marrying Boaz. Namesake residents of this region east of the Dead Sea and south of Ammon were rivals with the Israelites.

ANSWER: **Moab** [accept **Moabites**] <MAG>

6. Many artists were inspired by the nationalistic fervor of the French Revolution. For 10 points each:

[10] In this Eugène Delacroix painting, the flag-waving title figure wears a Phrygian cap while displaying a bare chest, but not much else.

ANSWER: **Liberty Leading the People** [or *La Liberté guidant le peuple*]

[10] This contemporary of Eugène Delacroix depicted many scenes from the French Revolution, including one where a man holds a letter to Charlotte Corday. He also depicted Napoleon crossing the alps on horseback.

ANSWER: Jacques-Louis **David**

[10] In this David work, spectators peer in through large windows, which also shed light on the central scene. In the front of this painting, a protestant, a monk, and a statesman embrace.

ANSWER: *The* **Tennis Court Oath** [or **Oath of the Tennis Court**; or **Serment du jeu de paume**] <SoH/AT>

7. The Mongol Empire in the 1200s was the largest contiguous land empire in history. For 10 points each:

[10] Name this unifier of the Mongolian tribes and the founder of the Mongol Empire, also known as Temujin. He developed the *tumen* system, subdividing forces into units of 10, 100, and 1,000 soldiers each.

ANSWER: **Genghis Khan**

[10] The Mongol armies were mostly composed of this ranged cavalry unit. These lightly armored troops could turn around and fire backwards in a “parting shot”, and Mongols paired these mounted units with lancers.

ANSWER: **horse archers** [grudgingly accept **mounted archers**, do not accept “kashik” or “keshig”]

[10] The Ilkhanate suffered a defeat at Ayn Jalut to this monarchy ruled by former slaves, finally halting the Mongols’ advance. They had previously taken over the Ayyubid Sultanate.

ANSWER: **Mamluk** Sultanate [or **Mameluke** Sultanate] <DM/RN>

8. Answer the following about an industrial process used to separate liquids with a small difference in boiling point. For 10 points each:

[10] Substances exit this process’s namesake column at different locations depending on their boiling point, with substances with lower boiling points further to the top.

ANSWER: **fractional distillation** [prompt on **distillation**]

[10] Fractional distillation is frequently used to refine crude oil, which is partly composed of these saturated hydrocarbons. They only have single bonds, and have the empirical formula C sub n, H sub 2n plus 2.

ANSWER: **alkanes** [prompt on **paraffins**]

[10] These mixtures cannot be separated by distillation without the help of an entrainer. Attempting to distill ethanol and water will only bring the mixture closer to one of these.

ANSWER: **azeotropes** <SH>

9. The 1906 San Francisco earthquake destroyed many immigrant records, leading to widespread fraud. For 10 points each:

[10] Name this act, renewed in 1892 and made permanent in 1902, which prohibited immigration of a certain group to the United States. The California Gold Rush sparked this act repealed in 1943 by the Magnuson Act.

ANSWER: **Chinese Exclusion Act** of 1882

[10] This US president initially vetoed the Chinese Exclusion Act for its inclusion of a 20 year ban on Chinese immigration. He signed off on the revised version which had a 10 year provision.

ANSWER: Chester A. **Arthur**

[10] Founded partly by Bill Haywood, this organization openly opposed the Chinese Exclusion Act upon its inception. J.H. Walsh from this group claimed that Chinese were wage laborers.

ANSWER: **Industrial Workers of the World** [or **IWW**] <JL/RN>

10. These cells can be M1 or M2 polarized, producing primarily pro- and anti-inflammatory cytokines, respectively. For 10 points each:

[10] Name these differentiated monocytes marked by CD68. They engulf and destroy target pathogens, dying cells, and cell debris via phagocytosis.

ANSWER: macrophages

[10] Macrophages produce tumor necrosis factor alpha, a cytokine that initiates this biological pathway. It is the process of programmed cell death.

ANSWER: apoptosis

[10] This process occurs near the end of apoptosis as the cytoskeleton breaks up and causes the cell membrane to deform, creating its namesake bulges.

ANSWER: blebbing [accept blebs] <AT>

11. Epic poems classically open with the author's appeal to this figure for inspiration in telling the story. For 10 points each:

[10] Name this figure, which often refers to Calliope or Urania. *The Iliad*, *The Odyssey*, and *The Aeneid* all open with an invocation of this figure, which Homer performs with the line "Sing to me".

ANSWER: the Muse [prompt on the gods]

[10] The intersex narrator Cal cries, "Sing to me, O Muse, of the recessive mutation on my fifth chromosome!" in this American author's 2002 novel *Middlesex*. He also wrote *The Marriage Plot* and *The Virgin Suicides*.

ANSWER: Jeffrey Eugenides

[10] This blind English poet invoked the Muse who inspired the Ten Commandments to sing of man's first disobedience in *Paradise Lost*. His surname is also the American nickname given to Cal's father in *Middlesex*.

ANSWER: John Milton <MZ>

12. For 10 points each, identify the following about realism in international relations.

[10] Realists believe that the international system is characterized by this property, since it lacks a universal central authority. Because of this, uncertainty and self-help pervade the system.

ANSWER: anarchy

[10] Thucydides fictionalized a dialogue between realist Athens and this idealist island during the Peloponnesian War. This island refuses to surrender to the Athenians, who justify its destruction with "might makes right".

ANSWER: Melos [or Melian Dialogue]

[10] This Italian realist diplomat emphasized the importance of *virtu*. In *The Prince*, he advised Lorenzo II de' Medici to be feared rather than loved or hated.

ANSWER: Niccolò Machiavelli <MZ>

13. The Lake Poets were a part of this movement. For 10 points each:

[10] Name this 19th-century artistic movement that reacted to the Industrial Revolution by advocating a return to nature and spontaneous imagination. Its British members include Lord Byron and the Shelleys.

ANSWER: Romanticism

[10] A motif in Romantic literature is this time, representing a pre-societal innocence, wonder, and intimacy with nature. The speaker of Wordsworth's "Ode: Intimations of Immortality" recollects his experience during this time.

ANSWER: childhood [or infancy]

[10] Romantics cast this Greek figure as an archetypal hero tragically trying to save humanity. Mary Shelley portrayed Frankenstein as a modern version, while Percy described his unbound mercy stripping Jupiter's power.

ANSWER: Prometheus <MZ>

14. This island saw the Siege of Drogheda led by Oliver Cromwell. For 10 points each:

[10] Name this European island, nicknamed the Emerald Isle, where Elizabeth I imposed the Protestant faith and the Anglican Church on native Catholics. That was most successful in an area around Dublin, this island's Pale.

ANSWER: Ireland

[10] Elizabeth I subjugated Ireland by giving these lands to English farmers, settlers, and explorers. Undertakers, servitors, and freeholders ruled these monocultural agricultural plots after swearing an Oath of Supremacy.

ANSWER: plantations

[10] This largest plantation was established in Northern Ireland by James I in 1609, and Lord Chichester made Belfast its capital. In the English Civil War, Scots and Irish rebelled here until the New Model Army restored order.

ANSWER: Ulster plantation <RN>

15. This musician's jazz standard "Epistrophy" was first recorded under the name "Fly Right" and contains a section with alternating chords a half-step apart. For 10 points each:

[10] Name this jazz pianist who produced jazz standards such as "Well, You Needn't" and "Round Midnight". He may be best known for his album *Straight, No Chaser*.

ANSWER: Thelonious Monk

[10] Monk's music is often characterized by chords with unstable intervals, leading to this tone property. Contrasting with consonance, intervals with this property include the minor second and tritone.

ANSWER: dissonance [accept word forms]

[10] Monk influenced this genre of jazz music characterized by quick tempo and improvisation. Named for syllables used in scat singing, other notable musicians of this genre include Charlie Parker and drummer Kenny Clarke.

ANSWER: bebop <BM>

16. In a vulnerable moment, he admits he feels like Adam, "staggering beneath the piled centuries since Paradise". For 10 points each:

[10] Give this captain of the *Pequod* who obsessively chases a white whale to his and his crew's deaths.

ANSWER: Ahab

[10] Ahab's chase after the whale is the focus of this American author's novel *Moby-Dick*. In "Bartleby the Scrivener", he created a man trapped by walls who repeats, "I would prefer not to".

ANSWER: Herman Melville

[10] The only survivor of the *Pequod*'s chase is the narrator Ishmael, who survives in the sea by hanging onto this object. Reconfigured as a life buoy, it was built under the instruction of a feverish Yoyo-worshipping harpooner.

ANSWER: Queequeg's coffin [prompt on coffin] <PS>

17. For 10 points each, answer the following about one of Faraday's laws.

[10] Faraday's law governs this phenomenon, in which a voltage is generated along a conductor upon changes in the surrounding magnetic field.

ANSWER: electromagnetic induction

[10] This term describes the voltage induced by a changing magnetic field, equal to the negative rate of change of magnetic flux.

ANSWER: electromotive force

[10] Maxwell's generalization of Faraday's law of induction relates the curl of this quantity and the negative partial derivative of the magnetic field.

ANSWER: electric field <SH>

18. According to Mishkat al-Masabih's account of this event, Muhammad's wife was visited by an angel, who told her of the demise of Hussein ibn Ali. For 10 points each:

[10] Name this 680 CE battle in the Middle East, one cause of the division between Sunni and Shi'a Islam. The Banu Hashim tribe was destroyed here.

ANSWER: Battle of Karbala

[10] The Battle of Karbala took place in Iraq, near the city of Najaf and this major river. The ancient city-state Ur was supplied with water from this Mesopotamian river that roughly parallels the Tigris River.

ANSWER: Euphrates River

[10] At Karbala, Yazid I of this Muslim Caliphate defeated a small army belonging to Muhammad's grandson, who refused to recognize its legitimacy. This Caliphate controlled Spain and was defeated at Tours by Charles Martel.

ANSWER: Umayyad Caliphate <ZP/RN>



19. In Chinese mythology, Gun is first appointed to try to staunch the Great one of these with magically absorptive soil. For 10 points each:

[10] Name these disasters common in mythology and religion, usually as divine retribution intended to start human civilization anew. In the book of Genesis, Noah saves his family and pairs of animals from one of these events.

ANSWER: **floods**

[10] In the Sumerian creation myth, this patron god of Eridu warns one human to build an ark to escape the oncoming flood. He is also the god of seawater, crafts, and mischief.

ANSWER: **Enki** [or **Ea**]

[10] This figure of Greek mythology managed to escape Zeus's flood by hiding in a chest with his wife Pyrrha at the advice of his father, Prometheus.

ANSWER: **Deucalion** <SH>

20. This character is saved by the eternal-feminine and his love for Gretchen. For 10 points each:

[10] Name this character from a German play. He makes a deal with Mephistopheles to achieve happiness after living a successful but unsatisfying life.

ANSWER: Heinrich **Faust**

[10] The two-part play *Faust* was written by this German writer. He created a character who writes a suicide letter to Lotte in *The Sorrows of Young Werther*.

ANSWER: Johann Wolfgang von **Goethe**

[10] In Goethe's *Faust*, Mephistopheles's attempts to make Faust happy culminate in this frenzied and dream-like night. During this event, Faust encounters witches, Lilith, and a Gorgon who transforms into Gretchen.

ANSWER: **Walpurgisnacht** [or **Walpurgis Night**] <MZ>

TB. This composer instructed the claves and bongo players to play right in front of the conductor's stand for his *Cuban Overture*. For 10 points each:

[10] Name this American composer who scored taxi horns in his symphonic poem *An American in Paris* and included a famous clarinet glissando in his *Rhapsody in Blue*.

ANSWER: George **Gershwin**

[10] Gershwin collaborated with DuBose Heyward and his brother Ira on this folk opera which takes place in Catfish Row. It includes the songs "I Got Plenty o' Nuttin'" and "It Ain't Necessarily So."

ANSWER: **Porgy and Bess**

[10] Gershwin and Heyward were influenced by negro folk spirituals to write this song, which Clara sings to her baby in *Porgy and Bess*. She reflects that the "Fish are jumpin' / And the cotton is high" during the title time period.

ANSWER: **"Summertime"** <BM>