

2014 ACF NATIONALS PACKET BY PENN A

Tossups

I. This work argues that a "bastard estheticism of a single uniform style" eventually prevailed because it gave precedence to "visible power" over the "invisible processes of life," in a chapter about a kind of "housekeeping." The subject of this work is described as a "collective invention... second only to language itself in the transmission of culture," but is periodically undermined by a phenomenon dubbed "negative symbiosis." This work, which draws heavily on the research of Patrick Geddes, ends with a chapter titled "Retrospect and Prospect," which argues that this work's title subject ought to be an "organ of love." This work built on its author's earlier methods of studying the development of technology expressed in such works as *Technics and Civilization*, and it argues against sprawl and suburbia while claiming the middle ages offered ideal and "organic" examples of the title entity. For 10 points, name this 1961 book about the "origins, transformations, and prospects" of the title entity, written by Lewis Mumford.

ANSWER: The CITY IN HISTORY

- 2. One character in this poem is asked to "Dance the Beggar's Dance" and after he is done, another character is asked to sing "Songs of love and songs of longing" before a third character tells the story of "Osseo, the Magician." The first section of this poem explains how a prophetic figure molded red stone from a quarry into a pipe, which he then smoked as a signal. Another section tells of "the unremembered ages" during which a woman fell "From the full moon" and gave birth to a girl whom she warned of the dangerous "West-Wind." A later section of this poem describes how "the Prophet... the Priest of Prayer, the Pale-face" arrived and instigated the main character's departure. This poem, written in trochaic tetrameter, describes a grandson of Nokomis and child of Wenonah who slays the magician Pearl-Feather and invents writing. For 10 points, name this poem set "By the shores of Gitche Gumee" where the protagonist falls in love with Minnehaha, written by Longfellow. ANSWER: The Song of Hiawatha
- 3. A "reductase A" combats the oxidation of this compound, a major contributing factor to age-related cataracts. An excess amount of this compound in the body leads to a condition whose sufferers' breath, sweat, and urine smell like boiled cabbage. It's not threonine, but this unmodified amino acid's metabolism can form alpha-ketobutyric acid, which in turn can be converted to propionyl-CoA. This amino acid is regenerated in concert with the conversion of 5-methyltetrahydrofolate to tetrahydrofolate in one of two metabolic reactions that vitamin B12 is involved in. Its "s-adenosyl" derivative names a bacterial riboswitch and is a common co-substrate in methyl group transfers. The immune system often recognizes the formylated derivative of this amino acid, which is only present in chloroplasts, mitochondria, and bacteria. This amino acid, whose side chain contains a terminal S-CH3 group, is coded for by the single codon AUG. For 10 points, name this amino acid which marks where protein synthesis begins.

ANSWER: METhionine [or M]

4. The first member of this house to become a prince built the Torre Aquila Castle of the Buonconsiglio; that man was Georg, prince-bishop of Trent. This family's ancestral castle in the Maria Enzersdorf region was called "the stone of light." One of its members, Joseph Wenzel, won the Battle of Piacenza and was called "the father of Austrian artillery." Despite providing numerous High Stewards to Habsburg emperors, its ducal holdings of Jagendorf and Troppau did not permit it to sit in the Council of Princes at the Imperial Diet. A head of this house, Anton Florian, fixed that issue by purchasing the Duchy of Schellenberg. Shortly after *Anschluss*, this house's head Franz Josef II relocated it to a country it had possessed but not resided in for over 250 years. Currently led by Franz's son Hans-Adam the Second, for 10 points, identify this royal family that serves as head of state for a namesake European country, which is located entirely in the Alps.

ANSWER: House of LIECHTENSTEIN

5. A duet in this opera is interrupted by the E-flat clarinet figure, which in performances acts as a signal for the frozen onlookers to leave the stage. A character in this opera boasts that he is "holy Jupiter in his thousand manifestations" in a scene in which he blows out some candles and takes advantage of a character who swoons, exclaiming "such lovely music!" Over the course of her career, the soprano Lotte Lehmann performed all of this opera's principal roles. People pop out of trapdoors in the stage, and children scream "Papa! Papa!" in its last act, which takes place in a rented room at an inn. The page Mohammed steps in to pick up a dropped handkerchief at the very end of this opera, after its two greatest numbers: the love duet "Ist ein traum" and a trio sung by the trouser role and his two lovers. Its protagonist impersonates Mariandel to fend off the boorish Count Ochs, and obtains the Marschallin's blessing to marry Sophie. For 10 points, name this comic opera by Richard Strauss, in which Octavian gives Sophie a silver flower.

ANSWER: Der Rosenkavalier [or The Knight of the Rose]

6. Modern commentaries on this religious text include Eknath Easwaran's Seeing with the Eyes of Love, which analyzes this work's chapter "The Wonderful Effect of Divine Love." In a section about living in a community with others, this text notes, "dress and tonsure profit little; but change of heart and perfect mortification of the passions" are desired. The fourth book of this work exhorts the reader to "purge out the old leaven and make clean the dwelling of your heart," to prepare for the sacrament, and the third book consists of fifty-nine chapters of consolatory dialogue. The author of this work was influenced by the teachings of Gerard Groote and the Devotio Moderna movement. The parts "Of interior consolation" and "Of the Blessed Sacrament" comprise the last of its four sections. This work opens with the quote, "he who follows me walks not in darkness." For 10 points, name this 15th century Christian devotional which advocates practicing a withdrawn life, attributed to Thomas Å Kempis.

ANSWER: The IMITATION OF CHRIST [accept De IMITATIONE CHRISTI, prompt on Thomas A Kempis]

7. This goal was abandoned by a group of people called the *remenca*, after they received guarantees from their king John II during a civil war. John's eldest son Charles, the Prince of Viana, became a royal figurehead for nobility who backed this cause. This cause was supported during a conflict that began with an incident called the Bloody Corpus; that conflict is the 1641 Revolt of the Reapers, stemming from unrest after the Thirty Years War. People supporting this cause often wear a hat known as a barretina or gorreta. A flag known as the Estelada, called the "lone star flag," is an emblem of this cause supported by the political parties ERO and ERC. It was intertwined with Carlism in the early 19th century, and resurfaced during the "Renaixensa" that promoted its native language. For 10 points, name this cause that seeks independence for the richest and most industrialized part of Spain, a northern region centered around Barcelona.

ANSWER: <u>CATALAN INDEPENDENCE</u> [or equivalents indicating the "freedom" or "separation" or "secession" of <u>CATALONIA</u> or the Catalonian region]

8. This theory predicts the existence of a tricritical point at a value of kappa equals 0.76 over rad 2 according to Monte Carlo simulations, though Kleinert found it to be 0.81 over rad 2 by considering vortex fluctuations. An extension of this theory was derived to explain how radiative corrections to models of massless scalar mesons can cause spontaneous symmetry breaking. This theory divides materials into those with positive and negative surface tension when one parameter crosses 1 over rad 2, and in this theory the coherence length dictates the size of the Abrikosov vortices in one of those material types. The central equations of this theory are developed by coupling the magnetic vector potential to the energy in a gauge-invariant way, thereby producing two equations, one of which gives the conserved current, while the other gives a nonlinear differential equation that determines the order parameter. In this model, the free energy is expanded in a quartic polynomial of the order parameter, and this theory modeled a certain transition as the coalescing of electrons into a superfluid. For 10 points, name this phenomenological theory of superconductivity which preceded the BCS theory, named for two physicists.

ANSWER: GINZBURG-LANDAU theory of superconductivity

9. In one incident from this novel, a priest waits outside a movie theater to see who is going to see the raunchy film *The Midnight Virgin* that he warned against twelve times at church. Later in this novel, Moses the Syrian warns the protagonist that tightrope walkers eat cats when he sees a circus arriving for the first time in ten years. The main character's attempt to sell his clock goes awry when Alvaro repairs the clock sending him further into debt and denying him the money to pay for his wife's

asthma treatment. This novel concludes with that wife asking the title character "meanwhile, what do we eat?" to which he replies, "Shit." The title character of this novel is nearly cheated by Sabato, who offers him only four hundred pesos for the prized cock that his murdered son Agustin left to him. The title character of this novella visits the same office every Friday waiting for a pension check to arrive for his service in the army of Colonel Aureliano Buendia. For 10 points, name this 1968 novella by Gabriel Garcia-Marquez about the futility of the title military officer.

ANSWER: No One Writes to the Colonel [or ElCoronel No Tiene Quién le Escriba]

10. The artist of this painting had his young son hang on the top of a ladder for hours to model the central figure's pose. The version of this painting at the Charlottenburg Palace shows the main figure with the hint of a smile while the original is called the Malmaison version and depicts the main figure in a golden rather than a red cloak. John Everett Millais has a print of this painting hanging in the background of his *The Black Brunswicker*, and the Earl of Onslow commissioned the artist's pupil Paul Delaroche to paint a more realistic version of this painting. The names "HANNIBAL and KAROLVS MAGNVS IMP" are inscribed on rocks in the lower left below the title figure of this painting, who requested to appear "calm on a fiery steed" and is shown pointing at the St. Bernard Pass while holding the reins of a rearing steed modeled on the horse Marengo. For 10 points, name this iconic equestrian portrait of the title French emperor about to cross a mountain range by Jacques-Louis David.

ANSWER: Napoleon Crossing the Alps; or Bonaparte at the Saint-Bernard Pass [accept anything mentioning Napoleon or Bonaparte in connection with the Alps or the St. Bernard Pass or Bonaparte Franchissant Le Grand-Saint-Bernard]

II. A Lawrence Shapiro article titled after this concept considers the example of a pair of corkscrews and compares the causal contribution of their material versus their color. David Lewis argued that this idea is not inconsistent with its opposite if it is made domain specific, using the example of a lottery having different winning numbers in different weeks. Arguments against this idea include the "denying projectability" reply, which uses the example of jade, and one which notes that this idea allows local structure-specific bridge laws; those replies were formulated by Jaegwon Kim. This idea was generalized to occur within a single token system by Jerry Fodor, who used it to show that the special sciences cannot be reduced to physics. This idea was introduced in a series of papers attacking the identity thesis by Hilary Putnam, who considered the fact that many different kinds of animals feel pain, and is generally conceived of as a challenge to psychophysical reductionism. For 10 points, name this thesis from the philosophy of mind, which states that a single mental kind can have more than one physical instantiation. ANSWER: MULTIPLE REALIZABILITY

12. Archaeological discoveries within this modern country include the Raimondi Stela, which depicts a massive deity holding two staffs; that stela is associated with a people in this country whose other artifacts include the Tello obelisk, the tenon heads, and the Lanzón, a carved granite shaft adorned with a characteristic image of a fanged deity. This country was home to the Koshan Religious Tradition, which includes the burial plots at its architectural complex of La Galgada. A well-studied preceramic burial complex in this country at Aspero led Michael Moseley to formulate his "maritime hypothesis" of development. This country is home to a frozen mummy called the Lady of Ampato and the walled complex at Saksaywaman. It was also the birthplace of the Chavín culture and contains a temple of the sun called the Coricancha. For 10 points, name this country which witnessed the Battle of Cajamarca, where conquistadors captured its native leader Atahualpa, and was home to a capital at Cuzco.

ANSWER: Peru

13. One character in this play defends the act of interbreeding flowers as "an art which does mend nature" until "the art itself is nature." Christopher Fry composed the music for Peter Brook's influential 1951 production of this play, which eliminated a dance from Act IV, scene iv. One character in this play pretends to have been robbed so that he can pick the pocket of the man who comes to assist him, and later shows up and steals the show at the sheep-shearing contest where the longest scene of this play is set. The Delphic oracle's words are delivered by Dion and Cleomenes just at the nick of time during a trial in this play, in which a woman reveals that the boy Mamillius died of grief. In its last scene, a statue of a woman appears to come to life, and the widow Paulina gets remarried to the long-suffering Camillo. In this play, a shepherd raises the daughter of the Sicilian king, who was abandoned by her caretaker Antigonus. For 10 points, name this Shakespeare play in which Florizel marries Perdita and Leontes is reunited with his wife Hermione.

ANSWER: The Winter's Tale

14. According to Jeffrey Kallberg, this piece was directly inspired by the Act II finale of Rossini's *La gazzaladra*. The second movement *Scherzo* of this piece reprises an E-flat minor theme at the end in the key of G-flat major. Part of this piece was orchestrally transcribed in D minor by Edward Elgar at the invitation of conductor Adrian Boult. A very long, four-bar *Grave* (grah-VAY) section opens this piece before proceeding to an *agitato* theme. An interlude in D-flat major interrupts its third movement, which was composed around two years before the rest of the piece. The disunity of this piece led Robert Schumann to suggest that the composer "simply bound together four of his most unruly children." The third movement, oft-performed on its own, gives this piece its common nickname and was performed at the composer's own burial. For 10 points, name this B-flat minor solo piece by Chopin with a gloomy nickname.

ANSWER: CHOPIN'S PIANO SONATA NO. 2 in B-flat minor, Opus 35 [or, The FUNERAL MARCH; or MARCH FUNEBRE; ONLY AFTER CHOPIN IS READ should you accept SECOND PIANO SONATA or PIANO SONATA #2; prompt on "Chopin's piano sonata" throughout, prompt on "piano sonata" after Chopin is read]

15. As a way to circumvent the heavily regulated research use of pseudoephedrine, A.G. Myers suggested carrying out this kind of transformation with pseudoephenamine instead. Dolling, Davis, and Grabowski used a cinchona alkaloid based phase transfer catalyst to effect this kind of transformation in the synthesis of indacrinone. The enantioselective version of the Tsuji-Trost reaction is an asymmetric allylic reaction of this kind. Nitrogen mustards and nitrosoureas belong to a class of compounds named for their ability to effect this kind of reaction at the N-7 atom of guanine. A "unit" named for this transformation uses hydrofluoric or sulfuric acid as a catalyst and increases the octane number of the input. Along with reduction, a transformation of this kind happens to aldehydes and ketones when the simplest Grignard reagents are added. Due to the risk of hydride transfer, the Friedel-Crafts reaction of this type suffers from poor selectivity. For 10 points, name this type of reaction in which a carbon chain like methyl is attached to a molecule.

ANSWER: <u>ALKYLATION</u> [prompt on "making carbon-carbon bonds" and similar stuff; reverse prompt on "methylation," "ethylation," "propylation," and "butylation"]

16. Before a national nominating convention for one party in this election, a dissatisfied state convention in Staunton, Virginia nominated its own candidate on a ticket that had William Richardson Davie as vice president. The losing candidate in this election published a book on the history of science in the US entitled *An Introductory Discourse*. That man was selected as a "fusion" candidate to bridge party divides. The winning side would have nominated John Langdon as vice president, but he turned down the offer, while the losing side nominated Jared Ingersoll and formed the Washington Benevolent Societies to try to gain electoral votes. The losing candidate was the Mayor of New York and the first New Yorker to be nominated for president. This election centered around the dispute between the Peace Doves and the War Hawks; it was the nation's first wartime election, and resulted in a loss for DeWitt Clinton. For 10 points, name this election in which James Madison won a second term in office.

ANSWER: United States Presidential Election of 1812

17. This man ominously sees a bird kill itself for her young during his time sauntering around, eating only bread and water, and wearing only a plain shirt. This man sees a chapel with a chair flanked by a worm-eater tree and some lilies in his dreams, in which he also receives competing offers from black and white birds. Shortly after a hermit dies in vain to protect this man, his life is saved by a column of fire sent from the heavens. This man refuses to sleep with a lady, who kills herself and transforms into a demon, signifying that he passed a test of virtue. However, Claire, the daughter of King Brandegoris, uses a magic ring to bend him to her will. This man chooses to save a maiden rather than his brother, who was being whipped with thorns, leading that brother to go to comical lengths to murder him in retribution. This man's father of the same name was killed in a campaign against Claudas. This man is the only one of his group to return alive from Sarras, and he was rescued along with the aforementioned brother, Lionel, by the Lady of the Lake. For 10 points, name this knight of the Round Table who along with Sir Percival and Sir Galahad finds the Holy Grail.

ANSWER: Sir Bors the Younger

18. This thinker was offended by a condescending 1960 review from Levi-Strauss, which criticized him for using a "syntagmatic" approach that followed events in a text in chronological order rather than a "paradigmatic" approach analyzing binaries. Semiotician AJ Greimas based his "actant model" on this man's theory, which included phases called "absentation", when someone

goes missing, and the "interdiction", when someone is warned not to go somewhere. This thinker identified an event called the "branding" which occurs at the end of the "donor sequence" when the figure of the "donor" provides some magical agent to the protagonist. He included the magical helper, the false hero, and the princess among his seven character archetypes, and listed the hero's wedding as the last of the thirty-one "narratemes" or recurring narrative story elements that he found while analyzing a hundred regional fairy tales. Associated with a school of literary criticism led by Boris Eichenbaum and Viktor Shklovsky, for 10 points, name this Soviet Formalist scholar who wrote *The Morphology of Folk Tales*.

19. One character in this novel known for giving long speeches explaining mundane objects is run over by a cart while giving an impromptu talk on the definition of pavement. The author gives a self-portrait in a character who edits the magazine *Animal World* before being fired for inventing fictional beasts. In a chapter named for the protagonist's "Anabasis," he wanders the countryside after being kicked off a train for accidentally hitting the emergency brake. The protagonist works for the alcoholic chaplain Otto Katz, who substitutes a sports trophy for the communion chalice and loses him in a poker game to Lukas. The main character of this novel uses his experience as a dogcatcher to steal Colonel Kraus von Zillergut's dog as a gift for his commanding officer, who does not know the dog is stolen. This novel's title character is initially put in an asylum as unfit to serve, but goes to the front after his cleaning woman takes him to a recruiting office in a wheelchair. At the end, the title character is arrested by his own troops after trying on a Russian soldier's uniform. For 10 points, name this picaresque novel about a foolish Czech infantryman by Jaroslav Hasek.

ANSWER: The Good Soldier Svejk [accept Osudy Dobreho Vojaka Svejka za Svetove Valky]

20. Tian and Wells developed an algorithm that combines bit-plane reduction with arithmetic compression to implement a difference-reduction method for these mathematical objects. The "tree-adapted shrinkage" algorithm uses these objects to implement a denoising procedure that is superior to Wiener filters. The JPEG 2000 algorithm uses the CDF 9/7 and the CDF 5/3 methods named after these objects to implement either lossy or lossless compression, respectively. A family of these objects that is optimal in the sense that they have the minimal support for a given number of vanishing moments was developed by Ingrid Daubechies, improving on a previous construction of these objects and their associated transforms by Alfred Haar. These mathematical objects are useful in multiresolution signal analysis and like Fourier series allow the decomposition of square integrable functions into orthonormal components. For 10 points, identify these mathematical functions, which can be thought of as localized vibrations of finite duration or extent.

ANSWER: <u>wavelets</u> [accept things like <u>wavelet transform</u> or any specific type of wavelet, e.g. <u>Daubechies</u> wavelet or Haar wavelet until mentioned]

Tiebreaker

ANSWER: Vladimir Propp

21. One poem by this author describes an unlucky person who moved "through the unheeding many," like a "bright blot upon this gloomy scene," and calls Fear and Hope "twin destinies; who ever weave their shadows, o'er the chasm, sightless and drear." This poet wrote a sonnet warning mankind that "knowledge must to thee, like the great flood of Egypt, ever be." A better known poem by this author lists a starved people, an army, religion, and a senate as "graves from which a glorious Phantom may burst to illumine our tempestuous day," and includes the image of "Rulers who neither see, nor feel, nor know" who cling "leech-like" to "their fainting country . . . Till they drop, blind in blood, without a blow." This poet began one of his sonnets with the line "Lift not the painted veil which those who live call Life," and wrote another that states "an old, mad, blind, despised, and dying king" ruled "England in 1819." In his most famous poem, he described a "wrinkled lip, and sneer of cold command" belonging to a statue beckoning its viewers to "Look on my works, ye Mighty, and despair!" For 10 points, name this Romantic poet who wrote "Ozymandias."

ANSWER: Peter Bysshe Shelley

Bonuses

- I. Robert Muldoon attempted to grow the industrial infrastructure of this nation by using the "Think Big" strategy, which involved borrowing from foreign powers. For 10 points each:
- [10] Muldoon served as National Party leader in this country, where he conducted the "Dawn Raids" after taking power in 1975.

ANSWER: New Zealand

[10] Muldoon poked fun at this massive hydroelectric scheme, begun in Australia in 1949 under the direction of William Hudson. This scheme employed 16 dams and 7 power stations to divert three upland rivers into serving as irrigation for hundreds of miles of arid Australian land.

ANSWER: Snowy Mountains Scheme

[10] Muldoon also created a hilarious TV commercial in which several of these historical figures dance across the screen and tell the audience that the Labour government is communist. Unfortunately, these historical people, who have included Ivan Mazeppa and Yemelyan Pugachev, were not all that friendly to communists.

ANSWER: Cossacks

- 2. This man is patient enough to defeat a three-armed monster with three lives, named Herulus. For 10 points each:
- [10] Name this originally Arcadian culture hero who brought the Greek pantheon to Italy, where he raised an altar to Heracles for having killed the giant Cacus. He later assisted Aeneas in the war against the Rutuli.

ANSWER: Evander of Pallene

[10] Evander may have inaugurated this holiday, a mid-February festival in which the "brothers of the wolf" ritually laughed after getting goat and dog blood smeared on their foreheads.

ANSWER: LUPERCALIA

[10] Though Evander's mother Carmenta, the Cimmerian Sibyl, was one of approximately nine million Roman goddesses of childbirth, she stakes her claim to fame for inventing this thing, which was then popularized by Evander.

ANSWER: LATIN ALPHABET [prompt on either part of this answer, since it's not the Latin language]

- 3. The title of this work comes from an analogy presented by the central figure of study, to illustrate his point that angels arose from a mass mixed elements. For 10 points each:
- [10] Name this historical work which uses the 16th century miller Domenico Scandella, or Menocchio, as a case study for reactions to the Inquisition.

ANSWER: The Cheese and the Worms of Il Formaggio e i Vermi

[10] Carlo Ginzburg's *The Cheese and the Worms* is an example of this type of historical work, an intensive examination of a circumscribed domain, which originated partly as a response to the "serial history" methods of the *Annales* school.

ANSWER: MICROHISTORY

[10] Ginzburg's *The Night Battles* explores how the *benandanti* folk custom were exterminated by the Inquisition on the pretext that the *benandanti* were these kinds of people. The *Malleus Maleficarum* is a treatise on how to try these types of people, some of whom were also tried in a notable episode in Salem, Massachusetts.

ANSWER: WITCHES

- 4. One of this building's rooms was decorated with murals that allegorized its owner and his wife as Sir Degravaunt and his bride. For 10 points each:
- [10] Identify this L-shaped building in Bexleyheath, London, designed in a Tudor-Gothic style by Philip Webb, with an interior featuring furniture designed by its owner.

ANSWER: the RED HOUSE

[10] The Red House was made for this leader of the Arts and Crafts movement and socialist author of *The News From Nowhere* whose artistic leanings were inspired by John Ruskin's "The Nature of Gothic."

ANSWER: William Morris

[10] The interior of the Red House includes many works in this medium by Burne-Jones and Morris himself, including one depicting Jane Morris holding the Wheel of Fortune. Marc Chagall produced many notable works in this medium for Metz Cathedral and the UN Headquarters in New York.

ANSWER: STAINED GLASS [prompt on partial answers]

- 5. Northrop Frye claims the rare female example of this type of character is Kat from *The Taming of the Shrew*. For 10 points each:
- [10] Name this stock character from Greek Old Comedy known as the imposter who usually is pretending to be something greater than he is. Typically, this figure is opposed to the buffoon or *eiron*.

ANSWER: ALAZON

[10] This stock figure from Roman drama is derived from the Greek figure of the *alazon*. Falstaff is an example of this archetype of the braggart warrior, which shares its name with a play about Pyrgopolynices.

ANSWER: MILES GLORIOSUS

[10] Pyrgopolynices is the title braggart soldier in this Roman author's play *Miles Gloriosus*. His play *Menaechmi* was the basis for Shakespeare's *The Comedy of Errors*.

ANSWER: Titus Maccius Plautus

- 6. The *Gongsun Longzi* is the only surviving text of this philosophical tradition, and among its claims is that a white horse is not a horse because "horse" represents form while "white horse" represents color. For 10 points each:
- [10] Identify this branch of classical Chinese philosophy which grew out of the *bian* tradition of disputation during the Warring States period.

ANSWER: School of Logicians or the School of Names or the Mingjia School or the School of the Terminologists

[10] This philosopher expressed opposition to the philosophy of the School of Names in a book that bears his name and consists of 33 chapters divided into "Inner," "Outer," and "Miscellaneous" groups. Much of that work is dedicated to epistemological relativism, arguing that there is no privileged position from which things can be seen.

ANSWER: Zhuangzi or Chuang-Tsu

[10] The *Zhuangzi* is a central text of this philosophical tradition, which has a name often translated as "the way." Its other main text was composed by Laozi, by whose name it is sometimes known.

ANSWER: Daoism

- 7. This event was organized by Philippa Strachey and led by Millicent Fawcett. For 10 points each:
- [10] Name this February 1907 trek of over 3000 people from Hyde Park to Exeter Hall in London, which was organized by the National Union of Women's Suffrage Societies.

ANSWER: MUD MARCH

[10] British suffragettes were no longer force-fed in jail after the Asquith government passed this legislation, which gained its official nickname from the fact that it encouraged the government to play with prisoners by letting them out of jail when they grew weak, only to lock them back up again soon after.

ANSWER: <u>CAT AND MOUSE</u> Act (or the <u>Prisoners Act of 1913</u>, or the <u>Temporary Discharge for Ill Health Act</u>) [10] The Cat and Mouse Acts were especially prompted by this family of militant suffragettes which included Sylvia, Christabel and Emmeline, who together founded the Women's Social and Political Union.

ANSWER: Pankhurst

- 8. This author wrote about two middle-aged journalists, one on assignment in Italy and the other in India, in his bipartite novel *Jeff in Venice*, *Death in Varanasi*. For 10 points each.
- [10] Name this eclectic British writer and essayist who wrote about jazz in *But Beautiful*, and won the National Book Critics Circle Award for his collection *Otherwise Known as the Human Condition*.

ANSWER: Geoff Dyer

[10] Dyer's book *Out of Sheer Rage* is a memoir about the author's repeated frustrated attempts to write a study about this English writer, who made Paul Morel the protagonist of his novel *Sons and Lovers*.

ANSWER: David Herbert Lawrence

[10] In his most recent book, *Zona*, Dyer ventured into this genre, whose classics include Molly Haskell's *From Reverence to Rape*, Pauline Kael's *Going Steady*, and several *Nation* and *Time* articles by James Agee.

ANSWER: FILM CRITICISM [accept similar answers, like FILM THEORY OF MOVIE REVIEWS]

9. When impregnated with silver, this substance is often used to purify domestic water. For 10 points each:

[10] Name this substance that is produced by taking sources like coal and wood and subjecting them to thermal decomposition in a furnace, creating pores that raise the surface area for reactions.

ANSWER: ACTIVATED CARBON [or ACTIVATED CHARCOAL; or CARBO ACTIVATUS; grudgingly prompt on "carbon"]

[10] Activated carbon is an example of this kind of species, which has small holes of a precise and uniform size. Similar to zeolites, they're used for adsorbing gas molecules of particular sizes.

ANSWER: MOLECULAR SIEVES [prompt on "sieve"]

[10] Another example of a molecular sieve is silica gel, which often serves as the stationary phase in these techniques used to separate mixtures based on their relative polarities.

ANSWER: chromatography [accept types]

10. This work was adapted into a 1973 black and white film. Among its main points are a critique of commodity fetishism, influenced by the ideas of Gyorgy Lukacs, and a critique of mass media's influence on the maintenance of social classes. For 10 points each:

[10] Identify this 1967 work which notes that the title concept is, "a social relationship between people that is mediated by images."

ANSWER: The Society of the Spectacle [La Société du spectacle]

[10] *The Society of the Spectacle* was a work by this French Marxist and filmmaker who was involved in the Letterist International and Situationist International movements.

ANSWER: Guy Debord

[10] Much of the philosophy of Situationism was inspired by this interwar European *avant garde* movement whose members included Tristan Tzara and Marcel Duchamp, who congregated at the Cabaret Voltaire in Zurich.

ANSWER: Dadaism

II. Rhythm is internalized and expressed through body movements in eurhythmics, a key component of the nutty Dalcroze approach to this activity. For 10 points each:

[10] Name this activity that is facilitated through the use of Curwen hand signs in the Kodaly method, and is the focus of another composer's theory of Schulwerk. The Suzuki approach to this activity is widely used today.

ANSWER: MUSIC EDUCATION [or anything akin TEACHING MUSIC or LEARNING MUSIC; accept specific instruments]

[10] This German composer came up with the aforementioned Schulwerk approach to music education, and composed the *Carmina Burana*.

ANSWER: Carl ORFF

[10] The most popular piece from Orff's *Schulwerk* volumes is this calming arrangement of a 16th century lute work by Hans Neusiedler, which appears in many films, including *Badlands* and *Ratcatcher*.

ANSWER: GASSENHAUERnach Hans Neusiedler

12. One incarnation of the title character is Aunt Peggy, who legendarily placed a curse on the vineyard of an old plantation that would kill any black person who eats a grape. For 10 points each:

[10] Name this book beginning with the story "The Goophered Grapevine." Its stories are recited by the old slave Uncle Julius for a new master of his plantation.

ANSWER: The Conjure Woman

[10] *The Conjure Woman* is praised for its accurate representation of Negro vernacular as opposed to the exaggerated dialect used by this character, a former slave created by Joel Chandler Harris who tells folktales about animals.

ANSWER: Uncle Remus

[10] The author of *The Conjure Woman*, Charles Chesnutt also wrote this novel about Rena Walden's romance with the aristocrat George Tryon that falls apart when he discovers she is passing for white.

ANSWER: The House Behind the Cedars

13. Spirit levelling is used to calculate this entity over continents, which lies perpendicular to plumb lines and is mapped by the GRACE satellite. For 10 points each,

[10] Name this equipotential surface around the earth, which is not perfectly round because of small local variations in gravity and density throughout the planet.

ANSWER: GEOID

[10] One thing that alters the shape of the geoid is this phenomenon, which is the rise of landmasses that were pressed down by ice sheets during the last ice age.

ANSWER: <u>POST-GLACIAL REBOUND</u> or <u>ISOSTATIC REBOUND</u> or glacial <u>ISOSTATIC ADJUSTMENT</u> [prompt on partial answer]

[10] One of the most common uses of the GRACE satellite data is to study these phenomena, which include the Humboldt in the South Pacific, the Gulf Stream in the North Atlantic, and the Agulhas in the Indian.

ANSWER: oceanic CURRENTS

14. This French knight was known for putting all musketeers he found on the battlefield to death. For 10 points each:

[10] Name this soldier known as the "knight without fear and beyond reproach" and the "good knight," who served in the army of Charles VIII and Louis XII.

ANSWER: Pierre TERRAIL [or Chevalier de BAYARD]

[10] The Chevalier de Bayard played a key role in the Battle of Agnadello, which was the first battle in this conflict during the Italian Wars, which ended when Francis I was victorious at the Battle of Marignano.

ANSWER: War of the League of Cambrai [or War of the Holy League]

[10] The League of Cambrai war allowed Francis to remove this family from the throne of Milan. They had succeeded the Visconti, and included people like Ludovico il Moro who took in Leonardo da Vinci.

ANSWER: SFORZA

15. His works influenced by Swedenborg include a picture of a bountiful farm titled *Peace and Plenty* and his three-part series *The Triumph of the Cross*. For 10 points each:

[10] Name this American artist, a leader of the Tonalist school of neutral-colored atmospheric landscape painting, who did many landscapes of Montclair New Jersey at the end of his life including *The Home of the Heron*.

ANSWER: George Inness

[10] George Inness led one branch of American tonalism, while the other branch was informally led by this American expatriate who sued John Ruskin in a famous libel trial and painted several "nocturnes".

ANSWER: James McNeill Whistler

[10] The neutral palette of Tonalist painting later influenced this photographer whose *The Pond - Moonlight* fetched the highest price for any photograph at auction. He also designed the cover art for the journal *Camera Work*.

ANSWER: Edward Steichen

16. These states occur when the interaction energy is less than the total energy for each particle individually, and examples include the hydrogen atom in the ground state. For 10 points each

[10] Name these quantum states in which particles are trapped and cannot exit without external energy input.

ANSWER: BOUND states

[10] In quantum field theory, bound states can be seen as poles of this matrix, whose entries are called amplitudes. This matrix maps particle in-states to out-states.

ANSWER: S-MATRIX

[10] The potential described by this function has a bound state at energy negative m lambda squared over 2 h-bar squared. This function is zero everywhere except where its argument equals zero, where it has an infinite value.

ANSWER: DIRAC DELTA

17. Practitioners of this religion call themselves "povo de santo," worship in temples called *terreiro*, and place great emphasis on individual fate, or *odu*. For 10 points each:

[10] Identify this syncretic religion which is similar to Umbanda. It incorporates elements of Yoruba and other African beliefs, and developed through the slave trade in Bahia.

ANSWER: CANDOMBLÉ

[10] Umbanda and Candomblé are mostly practiced in this South American nation, which uses the Capoeira martial art in some of its religious practice.

ANSWER: BRAZIL

[10] A clay statue of the Virgin Mary was discovered in the 18th century by three fishermen in this town in the Sao Paulo state of Brazil. From then on, the Lady of this town became the patron saint of Brazil, and she's worshipped at a namesake Basilica

by Brazilian Catholics. ANSWER: Aparecida

- 18. This organization is described as a rash with a 104-degree fever, which doctors prefer to the "agonizingly slow-rising temperature of the incubation of an illness." For 10 points each:
- [10] Identify this revolutionary organization, named for a character from German literature, that seeks to destroy the Green Wall and overthrow the Great Benefactor of the One State.

ANSWER: MEPHI

[10] D-503 betrays MEPHI to the Great Benefactor after undergoing the thought-suppressing Great Operation in this dystopian novel by Yevgeny Zamyatin.

ANSWER: WE [or MY]

[10] In his essays, Zamyatin considered members of MEPHI, and revolutionaries in general, to be like these real-life historical people, who gallop in no set direction and for no reason. R.V. Ivanov led a short-lived literary circle with this name, to which Andrey Bely and Sergei Esenin belonged.

ANSWER: SCYTHIANS [or SKIVY]

- 19. Mansions along the Strand District managed to survive a crisis in this city, which saw messengers aboard the Pherabe steamboat provide emergency escape. For 10 points each:
- [10] Name this city hit by a hurricane in 1900, the site of the deadliest natural disaster in the United States.

ANSWER: GALVESTON, Texas

[10] Winifred Bonfils was one of the first reporters on the scene after the Galveston hurricane; Bonfils worked for the news syndicate under this man, who owned the *San Francisco Examiner* and owned a castle at San Simeon.

ANSWER: William Randolph Hearst

[10] Six years after the Galveston hurricane, this nearby racial incident broke out when 167 soldiers in the 25th Infantry Regiment were discharged after one of them allegedly killed a white bartender.

ANSWER: Brownsville Raid [or Brownsville Affair/Incident/etc.]

- 20. Answer the following about avenues of HIV treatment, for 10 points each.
- [10] This protein, which is encoded by the HIV pol gene, is inhibited by nucleoside and non-nucleoside inhibitors. It is responsible for synthesizing DNA from HIV's RNA-based genome.

ANSWER: REVERSE TRANSCRIPTASE [or RT]

[10] Raltregavir and elvitregavir inhibit this HIV protein, which is responsible for inserting the HIV genome into the DNA of the target cell.

ANSWER: HIV INTEGRASE

[10] Some patients produce these antibodies against HIV, which include the VRCo1 class. They can react against a large number of different HIV strains.

ANSWER: BROADLY NEUTRALIZING antibodies [or BNAbs; prompt on "neutralizing antibodies" or "NAbs"]

Extra Bonus

21. For two manifolds M and N, this type of relation exists if there exists a manifold whose boundary is the disjoint union of M and N. For 10 points each:

[10] Identify this important relation in algebraic topology.

ANSWER: COBORDISM relation

[10] Because it is reflexive, symmetric, and transitive, the cobordism relation partitions manifolds into these divisions; other relations that split sets this way include the congruence operation with respect to integers.

ANSWER: EQUIVALENCE CLASSES

[10] A manifold is any topological space which has the local structure of this type of space; vectors in this type of space in n dimensions are simply lists of n real numbers, and the distance metric on this space is given by the square root of the sum of the squares of the coordinate differences.

ANSWER: EUCLIDEAN space or R-N