

## 2025 ACF Regionals

Packet K by Brown, Carnegie Mellon A, Liberty B, Manchester, Minnesota B, Oxford B

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### Tossups

1. A “Tired” one of these title people stretches her arms in front of a setting sun in a characteristic painting by Jules Breton. Edmond Hédouin’s (“aid-WANN’s”) painting of these people “Fleeing Before the Storm” is pulled from storage at the end of a documentary that likens these people to individuals like a Michelin chef and a homeless drifter. The large size of an 1857 painting of these people contributed to its poor reception at the Salon and its artist’s smaller follow-up showing two people bent in prayer beside a wheelbarrow. Agnès Varda (“on-YES var-DAH”) stands in front of a painting of these people in her documentary titled for them “and I.” These people title a Barbizon school painting of three peasant women bending down in a field. For 10 points, name these wheat-gatherers who title a painting by Jean-François Millet (“mee-LAY”).

ANSWER: gleaners [accept *Des Glaneuses*; accept *The Gleaners and I*; accept *Les glaneurs et la glaneuse*; accept *Les glaneurs et la glaneuse*; prompt on farmers or harvesters or reapers or scavengers or laborers; prompt on peasants until read; prompt on wheat-gatherers until read]

<TM, Painting and Sculpture>

2. With Fisher and Henry, this economist names a framework of option value applied to wildlife preservation. With a French colleague, this economist names a model that states that, for all commodities, there is a set of prices for which aggregate supply equals aggregate demand. An equation written as the negative of the second derivative of utility over the first derivative of utility is named for this economist and John W. Pratt. Freedom from irrelevant alternatives and nondictatorship are conditions that cannot be simultaneously satisfied per a theorem named for this economist, which states community preference cannot be determined by the preferences of individual voters. For 10 points, a general equilibrium model is named for Gérard Debreu and what American economist who names an “impossibility theorem?”

ANSWER: Kenneth Arrow [accept Arrow’s impossibility theorem]

<Manchester, Social Science>

3. During this decade, a transfer of cash from the US to the Moscow Narodny Bank created perhaps the first batch of Eurodollars. An agreement at Messina during this decade created the Spaak Committee, which rejected the term “supranationalism.” The *Gastarbeiter* guest worker program began during this decade, which included most of the years in which economic minister Ludwig Erhard presided over the *Wirtschaftswunder*. This was the first full decade of the “Glorious Thirty” in France. During this decade, the Treaty of Rome formed the EEC, expanding on the Coal and Steel Community. This was the [emphasize] *later* of two consecutive decades in which European leaders like Konrad Adenauer received billions in American aid money to combat communism. For 10 points, name this decade that saw the end of the Marshall Plan.

ANSWER: 1950s [prompt on ’50s]

<EC, European History>

4. These objects title nine sets of seven dances for solo piano by Takashi Yoshimatsu inspired by the colors of the rainbow. Sibelius salvaged a theme from *Kuutar* titled for these objects for the opening *Adagio* of his seventh symphony. A group of these objects titles an orchestral work by Kaija Saariaho (“KYE-yah SAH-ree-ah-ho”) with movements including “Memento mori” and “Hunter.” Suzuki’s violin method begins with four variations on a theme titled in English for one of these objects that is quoted by the piano in the “Fossils” movement of Saint-Saëns’s (“san-SAWNS’s”) *The Carnival of the Animals*. These are the [emphasize] *first* title objects of a piece that features a famous piccolo solo in its trio section representing the American South. For 10 points, the title of a John Philip Sousa march pairs what objects with stripes?

ANSWER: **stars** [accept **constellations**; accept “Twinkle, Twinkle, Little **Star**”; prompt on **Pleiades** or **Orion** by asking “what objects are those examples of?”] (The piece in the first sentence is *Pleiades Dances*. The piece in the second sentence is *Orion*.)

<Brown, Classical Music>

5. In a story from this region, a woman was turned into a plant after drowning while searching for the moon goddess Jaci. Travelers in this region can be led astray by the backwards footprints of a flaming dwarf-like demon or a hairy one-eyed giant. A mythical “land of cinnamon” was the destination of an expedition in this natural region chronicled by Gaspar de Carvajal (“kar-vah-HALL”). Men in this natural region may be targeted by a siren-like figure named Iara (“Yara”), while women may be impregnated by shapeshifting dolphins. The 100-foot-long snake Yacumama inhabits this natural region, where Henry Fawcett disappeared while searching for the Lost City of Z. For 10 points, myths of the Tupi peoples tell of creatures from what South American rainforest?

ANSWER: **Amazon** rainforest [or **Amazon** jungle; accept **Amazon** River or **Amazon** River Basin; accept **Gran Chaco**; prompt on **Brazil**] (The first line refers to a common story about the creation of the giant water lily *Victoria amazonica*. The second line describes the Curupira and Mapinguari.)

<Brown, Mythology>

6. A 1975 novel set in this country titled for a “cockfight” was the first written in one of its languages and is by the mononymous Frankétienne (“fron-kay-tee-EN”). In a play, this country’s king appoints the dukes of Lemonade and Marmalade and is haunted by the ghost of a murdered bishop. In a novel set in this country, which embodies “the marvelous real,” a one-armed revolutionary transforms into a succession of animals. In a 1994 novel, a girl from this country named Sophie is kicked out of her Brooklyn house when she fails her mother’s virginity test. This country is the setting of Alejo Carpentier’s *The Kingdom of This World* and the birthplace of an author who wrote *Krik? Krak!* and *Breath, Eyes, Memory*. For 10 points, name this birth country of Edwidge Danticat (“don-tee-KAH”), who grew up speaking its French-derived Creole.

ANSWER: **Haiti** [or Republic of **Haiti**; or République d’**Haïti**; or Repiblik d **Ayiti**] (The play is *The Tragedy of King Christophe* by Aimé Césaire.)

<Carnegie Mellon A, World Literature>

7. Gamma ray bursts such as Swift J1644+57 occasionally turn out to be “disruption events” named for this phenomenon that occur near supermassive black holes. The heating rate due to this process is proportional to a body’s second-order Love number. This phenomenon between interacting galaxies generates the “tails” in the Tadpole and Antenna galaxies. This phenomenon is primarily responsible for hypothetical “eyeball planets.” The strength of this phenomenon has an inverse cubic dependence on distance and exceeds a body’s internal gravitational binding beyond the Roche (“rohsh”) limit. Satellites whose rotational period equals their orbital period exhibit a “locking” named for this phenomenon. For 10 points, name this phenomenon that causes sea levels to oscillate due to the position of the moon.

ANSWER: **tides** [or **tidal** forces; accept **tidal** locking or **tidal** tails or **tidal** heating or **tidal** disruption events]

<MY, Other Science>

8. A tower in Guatemala City named for this word commemorates a “revolution” in 1871 spearheaded by Justo Rufino Barrios. The United States financed one side in a conflict named for this word in exchange for extraterritorial rights through the McLane–Ocampo Treaty. An initiative named for this word weakened the Catholic Church’s power by confiscating their land through the Lerdo Law. Félix María Zuloaga triggered a war named for this word by issuing the Plan of Tacubaya, calling for the nullification of the Constitution of 1857. Ignacio Comonfort enacted many pieces of legislation during a period of this name that began after the Revolution of Ayutla deposed Santa Anna. For 10 points, name this term for the era of liberal changes in 1850s Mexico led by Benito Juárez.

ANSWER: **reform** [or **reforma**; accept *La Reforma*; accept **Reform** War or the War of **Reform**; accept Guerra de **Reforma**; accept Tower of the **Reformer**; accept Torre del **Reformador**]

<AK, World History>

9. A species of these organisms that act as pests in one ecosystem are injected with bile salts using autonomous drones like RangerBot. A relaxin-like peptide hormone found in these organisms called “gonad-stimulating substance” makes them a useful model to study oocyte maturation. They aren’t deer, but two recent studies have disproved the theory that the densovirus SSaDV caused a mysterious “wasting disease” in these organisms. The Triton Snail is one of the few natural predators capable of containing outbreaks of a corallivorous type of these animals in the genus *Acanthaster*. Studying the purple *Pisaster* genus of these animals in rocky intertidal ecosystems led Robert Paine to coin the term “keystone species.” For 10 points, what echinoderms are named for having five arms?

ANSWER: **starfish** [or **sea stars**; accept **Asteroidea**; accept specific species like purple **sea star** or common **sea star** or crown-of-thorns **sea star**; accept *Acanthaster planci* until read; prompt on **Asterozoa**; prompt on **echinodermata**; reject “brittle stars”]

<Carnegie Mellon A, Biology>

10. In a book by this author, a researcher notes that a subject can read after he pronounces the word “delicatessen” backwards. In a novella by this author, a scientist discovers a frog’s belly enlarged by a red ray from a microscope. Humanity is attacked by aggressive reptile-bird hybrids created in the wake of a chicken extinction in that book by this author, *The Fatal Eggs*. The title character of a novella by this author gets a job catching stray cats after an experiment in which Dr. Preobrazhensky attaches a human pituitary gland and testicles to the stray mutt Sharik. In a novel by this author, a writer destroys his book on Pontius Pilate, prompting Professor Woland to tell him that “manuscripts don’t burn.” For 10 points, name this Soviet author of *Heart of a Dog* and *The Master and Margarita*.

ANSWER: Mikhail **Bulgakov** [or Mikhail Afanasyevich **Bulgakov**]

<Carnegie Mellon A, European Literature>

11. An opponent of this politician planned a mass “piss-in” to crowd toilets at a recently completed infrastructure project. This politician’s tendency for misspeaking prompted his press secretary to tell reporters, “Write what he means, not what he says.” This politician’s support from council members was recounted in Mike Royko’s book *Boss*. This politician’s administration responded to an event after which Rennie Davis and Abbie Hoffman were among seven defendants charged with conspiracy. Abraham Ribicoff criticized the “gestapo” tactics of this politician, who had previously ordered police to “shoot to kill” during riots following the death of Martin Luther King, Jr. For 10 points, name this longtime mayor of Chicago in office during the 1968 Democratic National Convention.

ANSWER: Richard J. **Daley** [or Richard Joseph **Daley**; reject “Richard M. Daley”] (The opponent is Saul Alinsky.)

<Manchester, American History>

12. This choreographer set a Boccaccio-inspired libretto to music from Respighi's *Ancient Airs and Dances* for a ballet in which this choreographer played a "priggish" virgin who meets the Devil. In the premiere of a ballet by this choreographer, Alicia Alonso danced a *pas de deux* as a woman called the "Accused." After watching this choreographer receive 22 curtain calls at a ballet's premiere, a songwriting duo invited this dancer to choreograph a "dream ballet" in which Laurey "Makes Up Her Mind." This choreographer adapted the tale of Lizzie Borden in her ballet *Fall River Legend*. This choreographer asked the composer of *Billy the Kid* to score a ballet in which a "Hoe-Down" is danced by cowgirls. For 10 points, Aaron Copland scored what choreographer's ballet *Rodeo* ("ro-DAY-oh")?

ANSWER: Agnes **de Mille** [or Agnes George **de Mille**] (The first ballet is *Three Virgins and a Devil*. The "dream ballet" is from *Oklahoma!*.)

<AP, Other Fine Arts>

13. High-valency gold complexes with this geometry have been catalyst candidates for enantioselective cyclizations. Ligand substitutions of complexes with this geometry form intermediates that undergo Berry pseudorotation. An addition of methyl iodide to an iridium complex with this geometry is the first step in the Cativa process. Low-spin d8 complexes, which have this geometry, violate the 18-electron rule, as exemplified by group 10 complexes such as Zeise's salt. Compounds with this geometry have D<sub>4h</sub> point groups. Complexes with this geometry are stabilized by the "trans effect," which impacts the synthesis of cisplatin, a drug with this geometry. For 10 points, name this geometry of compounds that have four substituents and two lone pairs, in which all bond angles are 90 degrees.

ANSWER: **square planar**

<Minnesota B, Chemistry>

14. The role of women of this ethnicity throughout history is discussed in a book by Karen Turner titled for a proverb about what happens "when war strikes close to home." A commander hung phallic images on doors to ward off the spirit of a female general of this ethnicity who wanted to "ride storms [and] kill whales in the open sea." For putting down a rebellion of this ethnicity, another leader gained the name "General who Calms the Waves" and subsequently melted down bronze drums produced by the Luòyuè ("l'wo-y'weh"). The Second Era of Northern Domination followed an uprising that was suppressed by Mã Yuán ("mah y'wen") and led against the Hàn dynasty by two women of this ethnicity who are often depicted riding elephants. For 10 points, name this ethnicity of Lady Triệu ("TREE-oo") and the Trưng ("trung") sisters.

ANSWER: **Vietnamese** [or **Viet**; or người **Việt**; or **Kinh**] (The book by Karen Turner is *Even the Women Must Fight*; the Vietnamese proverb states "when war strikes close to home, even the women must fight." Lady Triệu is the woman clued in the second line.)

<AT, Other History>

15. A form of this quantity occurs in integer multiples due to the space of circular translations in R<sup>3</sup> being contractible. By using this quantity's components as the basis for a Lie algebra, one can derive the Wigner D-matrix. This quantity's inner product with itself can be described as the Casimir element of the Lie ("lee") algebra su(2, C) ("S-U-two-C"). The values of this quantity span the group SO(3) ("S-O-three"). This quantity's components commute with its square but not with each other. The coupling of this quantity is described by the Clebsch–Gordan coefficients. This quantity is equal to integer multiples of  $\hbar$  in the Bohr model. In atoms, this quantity is characterized by the azimuthal and magnetic quantum numbers. For 10 points, name this quantity that comes in "orbital" and "intrinsic" forms, the latter of which is spin.

ANSWER: **angular momentum** [or **rotational momentum**; accept orbital **angular momentum** or spin **angular momentum** or total **angular momentum**; prompt on **L** or **l** or **S**; prompt on **spin** until read; reject "momentum" or "linear momentum"]

<MY, Physics>

16. A thought experiment from this book can face status quo bias according to Joshua Greene, who made a variant in which you wake up in a white room in the year 2659. This book claims that “whatever arises from a just situation by just steps is itself just” in the section “How Liberty Upsets Patterns.” This book uses the example of pouring tomato juice into the sea to critique the idea that mixing one’s labor with land converts it to private property, which it calls the Lockean proviso. This book presents the experience machine and utility monster thought experiments and critiques distributive justice by imagining a society in which many people choose to spend 25 cents to watch Wilt Chamberlain. For 10 points, name this libertarian response to John Rawls’s *A Theory of Justice* by Robert Nozick.

ANSWER: **Anarchy, State, and Utopia**

<Carnegie Mellon A, Philosophy>

17. In a 1749 novel titled for this occupation, fairytales like “Barbarico and Benefico” alternate with physical descriptions of the characters reciting them in sections titled for days of the week. This job titles the first English children’s novel, which was written by Sarah Fielding. In another novel, the title person with this job crushes a brood of birds with a stone to save them from the sadistic Tom Bloomfield. A character with this job is reunited with Edward Weston as she walks along the beach in a novel written using the pen name Acton Bell. Agnes Grey has this job, as does a woman who is locked in the Red Room as a child and learns that her employer keeps his mad wife Bertha Mason in the attic. For 10 points, name this occupation of a woman at Thornfield Hall enamored with Mr. Rochester, Jane Eyre.

ANSWER: **governess** [accept *The Governess*; prompt on servant; prompt on teacher; prompt on tutor; reject “nanny” or “au pair”] (The Fielding novel is *The Governess*; or, *The Little Female Academy*.)

<Brown, British Literature>

18. A process for mass producing this good is named for the village of Chorleywood. Raymond Calvel’s innovations in the production of this good are extolled in a book on this good by Ken Forkish titled for four nouns. A paste is formed in a Chinese technique for making this good whose name translates to “soup method,” *tangzhong*. This good can be prepared using a flax linen sheet called a couche (“koosh”). A factory founded by the Boudin family makes a form of this good in a process that resembles the faster *biga* and *poolish* methods. When making this good, the window-pane test can be used to assess elasticity, and the poke test can be used to assess proofing. For 10 points, types of what food include the Japanese *shokupan*, the Middle Eastern lavash, and the Italian focaccia?

ANSWER: **bread** [or dough; accept flatbread; accept pastry or pastries or pastry dough; accept specific breads or doughs such as sourdough bread or baguette or pizza dough] (Ken Forkish’s book is *Flour Water Salt Yeast*.)

<Manchester, Other Academic>

19. A room in this play is described as “haunted by a relationship that must have involved a tenderness which was uncommon.” A character in this play is accused of “passing the buck” of his disgust after a speech recalling his time with the Dixie Stars. A man in this play describes a friendship as “one great good thing” and tells his wife that she is “naming it dirty” in an argument interrupted by a “no-neck monster.” A stage note in this play notes that a former football star’s suicide inspired a character’s hatred for “mendacity.” A man in this play blames his escalated drinking on a leg injury from jumping hurdles, rather than the death of his possible lover Skipper. For 10 points, Brick and Maggie Pollitt argue over their marital woes in what play by Tennessee Williams?

ANSWER: **Cat on a Hot Tin Roof**

<HG, American Literature>

20. Some Islamic scholars erroneously claim that a word in this book, commonly translated as “sweet,” actually refers to Muhammad. Nine types of “false peace” are outlined in Saint Teresa of Ávila’s *Meditations on this book*. This book originated a metaphor for virginity as a *hortus conclusus*, or “enclosed garden,” which often appears in iconography of Mary along with this book’s metaphor of the neck as an “ivory tower.” The speaker of this book mentions the “daughters of Jerusalem” in a section in which they claim “I am black, because the sun hath looked upon me.” This book contains the line “I am the rose of Sharon, and the lily of the valleys” and opens with the declaration “let him kiss me with the kisses of his mouth.” For 10 points, what love poem from the Old Testament is sometimes named for a wise Biblical king?

ANSWER: Song of Songs [or Canticle of Canticles; or Song of Solomon; accept *Meditations on the Song of Songs*; accept *Shir Hashirim*]

<Liberty B, Religion>

## Bonuses

1. The autobiographical poem cycle *Singing School* details both this poet's upbringing amidst sectarian tensions and his literary influences. For 10 points each:

[10e] Name this Irish Poet who translated *Beowulf* and reflected on his childhood in poems like "Digging" and "The Death of a Naturalist."

ANSWER: Seamus **Heaney** ("SHAY-muss HEE-nee") [or Seamus Justin **Heaney**]

[10h] *Singing School* opens by quoting this author's observation that "we have lived / In important places." This Irish contemporary of Heaney wrote the poems "On Raglan Road" and "The Great Hunger," as well as the novel *Tarry Flynn*.

ANSWER: Patrick **Kavanagh** ("KAV-uh-nuh")

[10m] *Singing School* later quotes this author's resolution to "tell everything, even of how the laundry basket squeaked." A story by this non-Irish author ends with Laura stammering "Isn't life?" after she delivers a basket of leftover food.

ANSWER: Katherine **Mansfield** (The story is "The Garden Party.")

<Manchester, British Literature>

2. MacroH2A has been shown to preferentially associate with these structures, supporting the idea that they have a high nucleosome density. For 10 points each:

[10m] Name these structures formed via the recruitment of polycomb-group proteins by the non-coding RNA Xist ("exist"), during a process called lyonization.

ANSWER: **Barr bodies** [or **X-chromatin**; accept **inactivated X** chromosomes; prompt on **X** chromosomes]

[10h] Reactivating Barr bodies is a potential therapy for a variety of X-linked disorders, including this disorder whose patients often present with microcephaly and small hands and feet. Until the discovery of a mutation in the MECP2 gene, this disorder was included in the DSM alongside autism.

ANSWER: **Rett** syndrome

[10e] MECP2 binds to this substance after it has been methylated. This substance, which comes in "eu" and "hetero" forms, consists of DNA wrapped around histones and is often likened to "beads on a string."

ANSWER: **chromatin** [accept **euchromatin** or hetero**chromatin**]

<MS, Biology>

3. The Sherlock Holmes story "The Red-Headed League" ends with Holmes quoting a letter from this author to George Sand that claims, "the man is nothing – the work is everything." For 10 points each:

[10e] Name this author who corresponded extensively with Sand in his later years. A review by Sand praises this author's novel *Salammbô* and chastises the critics of his first novel, *Madame Bovary*.

ANSWER: Gustave **Flaubert** ("flo-BAIR")

[10h] Echoing Flaubert's gender-bending remark "Madame Bovary, c'est moi" ("say mwah"), Sand wrote to him, "it seemed to me that I was" this literary hero. In a novella published alongside the novel *Atala*, this character lives with the Natchez people.

ANSWER: **René** ("ruh-NAY") (He is the title character of *René* by François-René de Chateaubriand.)

[10m] Flaubert wrote this story from his *Three Tales* in honor of Sand's sincere sensibilities. In this story, the kind servant woman Felicité ("fuh-lee-see-TAY") sees a heavenly vision of her stuffed parrot Loulou as she dies.

ANSWER: "A **Simple Heart**" [or "Un **cœur simple**"]

<HG, European Literature>

4. Asma Barlas claimed that patriarchal interpretations of this text were not supported by the text itself in a book titled for “*Believing Women*” in this text. For 10 points each:

[10e] Amina Wadud wrote a “rereading” of what sacred text in Islam “from a Woman’s Perspective”?

ANSWER: **Qur’an** [or **Koran**; accept **Qur’an** and *Woman*]

[10m] In *Expectations from the Muslim Woman*, Ali Shariati argues that this woman from the Qur’an stands as a role model for Muslim women. Shariati also wrote a feminist biography of this mother of Husayn.

ANSWER: **Fatima** [or **Fatima** bint Muhammad; or **Fatima** al-Zahra]

[10h] In *Women and Gender in Islam*, Leila Ahmed argued that Western views of Islamic society created a new “discourse of [this object].” Fatema Mernissi advocated an intersectional analysis of Muslim feminism in the book *Beyond* [this object].

ANSWER: **veils** [or **khimar**; accept “The Discourse of the **Veil**”; accept *Beyond the **Veil***; prompt on **hijabs**]

<AK, Religion>

5. An attempt to end this period at the *conciliabolo*, or “secret meeting,” ended up creating a third faction by electing Alexander V. For 10 points each:

[10m] Name this period in which two, then three, people simultaneously laid claim to the papacy. The 1409 Council of Pisa failed to end this period.

ANSWER: **Western Schism** [accept Schism of **1378**; accept **Papal Schism**; accept Great **Occidental Schism**]

[10e] During the Western Schism, the three popes resided respectively in Rome, Pisa, and this city. Earlier, seven legitimate popes successively reigned from this French city.

ANSWER: **Avignon** (“ah-veen-YON”)

[10h] The Western Schism ended in 1417 with the Council of Constance and the election of this pope. This pope signed a bull that called for a crusade against the Wycliffites and Hussites.

ANSWER: **Martin V** [or Otto **Colonna**; prompt on **Martin**]

<Carnegie Mellon A, European History>

6. A designer of this ethnicity created a 1995 series of clothes on which a leader of her birth country is depicted variously with pigtails, sunglasses, and a bee on his nose. For 10 points each:

[10m] Name this ethnicity of an influencer known as the “lipstick king.” A designer of this ethnicity was *Vogue*’s youngest-ever editor before becoming the go-to creator of luxury wedding gowns for celebrities.

ANSWER: **Chinese** [or **Chinese**-American; accept specific Chinese ethnicities like **Han**] (The designers are Vivienne Tam, who created the MAO series, and Vera Wang. The “lipstick king” is Li Jiaqi.)

[10e] Before she launched her bridal line, Vera Wang was a design director for this designer. The collared tennis shirts sold by this designer’s namesake brand popularized the term “polo.”

ANSWER: Ralph **Lauren** [or Ralph **Lifshitz**; accept Polo Ralph **Lauren**]

[10h] This Detroit-born Chinese-American designer broke onto the New York scene in the 1990s with her boutique fashion inspired by punk and grunge aesthetics. Her brand’s perfumes include Fantasia and Sundae.

ANSWER: Anna **Sui** (“swee”) [or **Xiǎo** Zhiměi]

<AP, Other Fine Arts>



7. At a battle off the Paxi Islands, these people used a formation in which four ships were lashed together in order to entangle and capture their opponents. For 10 points each:

[10m] Name these people whose power expanded under the rule of Agron and Teuta of the Ardiaei (“AR-dee-eye”) kingdom.

ANSWER: **Illyrians** [or **Illyrioi** or **Illyrii**; prompt on **Ardiaei** until read]

[10h] During the First Illyrian War, this person surrendered Corcyra (“COR-kih-ruh”) to the Romans out of fear of punishment from Queen Teuta, later being installed as a client ruler. Polybius contrasted this person’s advice to Philip V of Macedon with that of Aratus of Sicyon (“SICK-ee-on”).

ANSWER: **Demetrius** of **Pharos** [prompt on **Demetrius**; reject “Demetrius Phalereus” or “Demetrius of Phaleron”]

[10e] The fortifications at Pharos were destroyed after Demetrius later reneged on his alliance with Rome, not long before the latter became distracted with the outbreak of this war against the Hannibal-led Carthage.

ANSWER: **Second Punic** War [prompt on **Punic** Wars]

<AT, Other History>

8. Answer the following about TV characters who demonstrate a comical ignorance regarding the prices of basic grocery items, for 10 points each.

[10m] Lucille, a member of this family, asks her son Michael “what could it cost? Ten dollars?” when discussing the price of bananas, despite the fact that this family owns a banana stand.

ANSWER: **Bluth** family [or the **Bluths**; accept Lucille **Bluth** or Michael **Bluth**] (They are the protagonists of *Arrested Development*.)

[10e] On this show, Jack Donaghy estimates that a typical family pays “90 dollars a gallon” for milk. Tina Fey played sketch comedy writer Liz Lemon on this sitcom titled for NBC’s headquarters.

ANSWER: **30 Rock**

[10h] On another show, one of these two characters fails to answer the other’s question about the cost of milk, since only “kittens and perverts” drink milk. One of these two characters accidentally texts a picture of his genitals to the other and has a panic attack while giving the other’s eulogy. Name both.

ANSWER: **Roman** Roy AND **Logan** Roy [accept **Romulus** Roy in place of “Roman”; prompt on the **Roy**s] (from *Succession*)

<TM, Pop Culture>

9. Answer the following about lamps in Ancient Greek philosophy, for 10 points each.

[10m] This philosopher likened the eye to a lamp lit by Aphrodite in his emission theory of vision. This philosopher introduced the four classical elements and claimed that they are mediated via the opposing forces of Love and Strife.

ANSWER: **Empedocles** of Acragas

[10h] In this text, a philosopher chooses calm over anger when his iron lamp is stolen. This conversational text discusses a form of volition called “prohairesis” and was the primary source for a shorter “Handbook,” or “Manual.”

ANSWER: **Discourses** of **Epictetus** [or **Diatribai**] (The “Handbook” is the *Enchiridion*, also compiled by Arrian.)

[10e] James F. Thomson’s lamp puzzle, in which a lamp is flicked on and off at intervals of shrinking duration, was inspired by this philosopher’s many paradoxes of motion, including one about Achilles and a tortoise.

ANSWER: **Zeno** of Elea

<Brown, Philosophy>

10. Because of extraneous processes such as “flip-flops,” one form of this process always occurs at a faster rate than another. For 10 points each:

[10m] Name this process that describes how long it takes for the energy from an absorbed radiofrequency pulse to dissipate. This process comes in “T1” and “T2” types.

ANSWER: **relaxation** time [accept T1 **relaxation** or T2 **relaxation**]

[10e] Relaxation time is a property commonly measured when using this technique that uses a B-field to align spins in a molecule. MRI is based on this technique that typically involves either protons or carbon-13.

ANSWER: **NMR** spectroscopy [or **nuclear magnetic resonance** spectroscopy]

[10h] T1 and T2 relaxations are sometimes given two names describing their energy interactions, one of which causes demagnetization in the longitudinal z-axis and the other of which causes demagnetization in the transverse xy-plane. Name either.

ANSWER: **spin-lattice** relaxation OR **spin-spin** relaxation [reject answers that mention “splitting” or “coupling”]  
<Manchester, Chemistry>

11. Answer the following about sociological interpretations of the role of music in society, for 10 points each.

[10e] Sociomusicology deviates from a related field with this prefix since it puts less emphasis on national identity. This prefix partly names a method of describing cultural practices while submerged in a group.

ANSWER: **ethno-** [or **ethnography**; or **ethnomusicology**]

[10m] This sociologist outlined the social meanings of music in his *Psychological and Ethnological Studies on Music*. This sociologist discussed a “blasé outlook” on urban life in his essay “The Metropolis and Mental Life.”

ANSWER: Georg **Simmel** (“GAY-org ZIM-ull”)

[10h] In his essay “Philosophy of Modern Music,” this thinker remarked that popular music is “regarded as the absolute criterion of social truth.” This thinker outlined “structural listening” in “On the Fetish-Character in Music and Regression in Listening.”

ANSWER: Theodor **Adorno** [or Theodor W. **Adorno**; or Theodor Ludwig **Wiesengrund**]

<NS, Social Science>

12. In this story, the phrase “Red... Red...” describes the stupefaction of a group of four “idiots” by the title object. For 10 points each:

[10h] Name this story in which Mazzini and Berta’s youngest child is killed by her mentally impaired brothers.

ANSWER: “The **Decapitated Chicken**” [or “La **gallina degollada**”]

[10m] The author of “The Decapitated Chicken,” Horacio Quiroga (“oh-RAH-see-yo kee-RO-ga”), was born in this country. This country’s author Eduardo Galeano wrote *The Memory of Fire* trilogy and *The Open Veins of Latin America*.

ANSWER: **Uruguay** [or Oriental Republic of **Uruguay**; or República Oriental del **Uruguay**]

[10e] A section of Galeano’s *Memory of Fire* records a “song of the shield” written by a person from this empire. This empire’s Indigenous poets included Nezahualcoyotl and the Nahuatl-speaking authors of Texcoco School codices.

ANSWER: **Aztec** Empire [or **Mexicas**; accept **Triple Alliance**]

<Brown, World Literature>

13. In a bipolar junction transistor, this process can be set using voltage dividers or emitter resistors. For 10 points each:

[10m] Name this process that defines the operating point of an electrical device. Band bending in  $p-n$  junctions can induce the “forward” or “reverse” types of this process.

ANSWER: **biasing** [accept forward **bias** or reverse **bias**]

[10e] Ideal instances of these electrical components have zero resistance in the forward bias polarity and infinite resistance in the reverse bias polarity, forcing current to only flow in one direction.

ANSWER: **diodes**

[10h] Crystal defects in diodes caused by transition metals can cause these undesirable energy states in the band gap. SRH recombination occurs when bands pass through these states that come in “shallow” and “deep” variants.

ANSWER: **traps** [accept shallow **traps** or deep **traps**]

<Brown, Physics>

14. The Yoruba artist Olowe of Ise sculpted veranda posts featuring female examples of these figures, which partly inspired the Corona of the National Museum of African American History and Culture. For 10 points each:

[10m] Give this Greek-derived term for human figures, typically female, that serve as architectural columns. The Porch of the Maidens in the Erechtheion contains six of these figures.

ANSWER: **caryatids**

[10e] Luba artists like the Master of Buli are known for carving elaborate caryatids into “prestige” examples of these objects. A “Golden” one of these objects serves as the royal throne of the Asante people.

ANSWER: **stools** [prompt on **seats** or **chairs**]

[10h] This artist reinterpreted the role of female caryatids in African art in her bronze series *The Seated*. In 2019, that series by this contemporary Kenyan-born artist became the first art to sit in the Met’s facade alcoves.

ANSWER: Wangechi **Mutu**

<TM, Painting and Sculpture>

15. When discussing this phenomenon, the textbook *Model Selection and Model Averaging* rhetorically asks “Is the monkey who typed Hamlet actually a good writer?” For 10 points each:

[10m] Name this phenomenon in machine learning that can be prevented using  $k$ -fold cross-validation and regularization.

ANSWER: **overfitting** [or **overtraining**]

[10h] This technique can prevent overfitting in neural networks by introducing a layer that randomly “shuts off” some incoming units by setting their weights to zero.

ANSWER: **dropout** [prompt on **dilution**]

[10e] The patent for dropout is owned by this company that maintains the TensorFlow library. In 2024, this company introduced “AI overview” to supplement its PageRank algorithm.

ANSWER: **Google** [accept **Alphabet**]

<Oxford B, Other Science>

16. This poet notes, “then the sneezes got up to go” after describing “burghers” who “become aware / that their time is passing too” in an ekphrasis on a Johannes Vermeer painting. For 10 points each:

[10m] Name this poet who included “View of Delft” in his collection *Chinese Whispers*. Another ekphrastic poem by this author begins by describing “the right hand / bigger than the head.”

ANSWER: John **Ashbery** (The other poem is “Self-Portrait in a Convex Mirror.”)

[10e] Ashbery named as his greatest influence this poet, who mused on Homeric ekphrasis in his poem “The Shield of Achilles.” This poet also wrote “Musée des Beaux Arts.”

ANSWER: W. H. **Auden** [or Wystan Hugh **Auden**]

[10h] The title poem of *Chinese Whispers* laments that these “barren” objects “have been described more than once.” These objects title Ashbery’s first poetry collection, which Auden awarded the Yale Younger Poets Prize despite not understanding it.

ANSWER: **trees** [accept *Some **Trees***]

<Manchester, American Literature>

17. The first major composition of Arthur Sullivan was a set of works in this genre modeled on an earlier collection that is introduced by four sustained woodwind chords before a frenetic theme in the strings. For 10 points each:

[10m] Name this genre of a set of music by Edvard Grieg that opens with a flute solo depicting a sunrise, from which two suites are often extracted.

ANSWER: **incidental** music [prompt on **overture** by asking “what is the genre of the set of works that is from?”; prompt on music written to accompany a **play**]

[10e] Sullivan’s *The Tempest* was inspired by Mendelssohn’s incidental music to this other Shakespeare play, whose main theme imitates scampering “fairy feet.”

ANSWER: *A **Midsummer Night’s Dream*** [or *Ein **Sommernachtstraum***]

[10h] Herbert Beerbohm Tree commissioned incidental music to *Othello* from this composer, whose *Ballade* in A minor was premiered at the Three Choirs Festival. A 1900 cantata titled for a character’s “departure” completed a trilogy by this composer.

ANSWER: Samuel **Coleridge-Taylor**

<JC, Classical Music>

18. Joe Tumulty defended this woman as a “devoted helpmate,” a position she defended in her book *My Memoir* recounting her “stewardship.” For 10 points each:

[10m] Name this first lady who demanded British ambassador Edward Grey fire an aide for an inappropriate comment. She censored Thomas Marshall to protect the interests of her infirm husband.

ANSWER: **Edith Wilson** [or Edith **Galt**; or Edith **Bolling**; prompt on **Wilson** or Woodrow **Wilson’s wife**]

[10e] Edith Wilson traveled with her husband Woodrow before his stroke to visit troops and sign this treaty that ended World War I.

ANSWER: Treaty of **Versailles**

[10h] Edith Wilson pushed for removing this Secretary of State because he held meetings without her or her husband present. This Secretary of State took over the role after his predecessor resigned after the sinking of the *Lusitania*.

ANSWER: Robert **Lansing** (His predecessor was William Jennings Bryan.)

<NS, American History>

19. According to Pausanias, this city's first king was a river god who mediated a land dispute between Hera and Poseidon with his brothers Cephissus and Asterion. For 10 points each:

[10h] Name this city founded by the culture-hero Phoroneus, who was said to have discovered fire. Pliny the Elder claims that another king of this city introduced wells to Greece after sailing on the first ship from Egypt.

ANSWER: **Argos** (The two kings are Inachus and Danaus.)

[10e] Zeus visited the Argive princess Danaë in the form of golden rain, leading to this hero's birth. This hero used his shield as a mirror to avoid petrification while fighting a gorgon.

ANSWER: **Perseus**

[10m] In the longest *aristeia* of the Iliad, this king of Argos wounds Aeneas and Aphrodite. In book X ("ten"), this king teams up with Odysseus to steal the Palladium during a night raid.

ANSWER: **Diomedes**

<Liberty B, Mythology>

20. The *Nagarakretagama* was written as a eulogy to a ruler of this kingdom from the Rajasa dynasty. For 10 points each:

[10m] Name this kingdom ruled by Hayam Wuruk, who was advised by Gajah Mada. Raden Wijaya founded this kingdom after driving away a Mongol invasion.

ANSWER: **Majapahit** Empire [or **Wilwatikta**]

[10h] The *Nagarakretagama* describes Hayam Wuruk performing a ceremony for his great-grandfather Kertanagara, a ruler of this other empire. The *Pararaton*, or *Book of Kings*, describes Ken Arok's mythical reincarnation and founding of this empire.

ANSWER: **Singhasari** Kingdom [or **Tumapel**]

[10e] The *Nagarakretagama* focuses on the mix of influence of Hinduism and this religion in the Majapahit Empire. The Shailendra ("shy-LAIN-druh") dynasty in Java constructed many temples of this religion, including Borobudur.

ANSWER: **Buddhism** [accept Mahayana **Buddhism**; accept **Buddha Dharma**]

<AK, World History>