## Academic Bowl Round 4

## First Quarter

(1) This event's original name began with "an Aquarian Exposition," and this event's more familiar name was later applied to a bird from the Peanuts comics. This event drew over 460,000 people and included acts such as Ravi Shankar and Jimi Hendrix. For ten points, identify this massive music festival, which took place on a New York dairy farm in August 1969, a watershed moment for hippie subculture.

## ANSWER: Woodstock

(2) The so-called Triangle of Death lies south of this country's capital, and the "New Way Forward" was launched against insurgencies in this country under David Petraeus. One conflict in this country's Sunni Triangle involved two major battles at the city of Fallujah. Operation Desert Storm was launched against this country following its invasion of Kuwait. For ten points, name this Middle Eastern country, once governed by Saddam Hussein from Baghdad.

ANSWER: Republic of Iraq (or Jumhuriyat al-Irāq; or Komar-i Eraq)
(3) This element has the third-highest electronegativity and the highest electron affinity of any element. At room temperature, this element is a yellow-green gas, and sodium forms a common compound with this element. For ten points, name this element, a halogen with atomic number seventeen, which is often used to help keep swimming pool water clean.

ANSWER: Chlorine (or $\underline{\mathbf{C l}}$; accept $37 \underline{\mathbf{C l}}$; accept $35 \underline{\mathbf{C l}}$; accept $\underline{\text { Chlorine }}$ gas; do not accept or prompt on "Chloride" or "Sodium Chloride")
(4) After a collapse creating one of these features, steep, circular "ring dikes" form. These structures are considered "subsidence" when they are low in silica, as a result of the local crust being made of basalt. The deepest lake in the U.S. is one of these structures, which form when the ejection of magma empties the volcanic chamber, causing the upper surface to cave in. For ten points, name these basins, which are formed after volcanic eruptions.

ANSWER: Calderas (accept Crater or Crater Lake in place of Caldera before "magma" is mentioned and prompt after; accept Subsidence caldera)
(5) This hero is accompanied by the dog Sirius, which is represented by the extremely bright Dog Star. This hero's constellation is blocked by Tauros from reaching the Pleiades. This hero was killed and placed in the sky after bragging he would hunt all animals on Earth. This hero's constellation never appears in the sky at the same time as his killer's, Scorpio. For ten points, name this Greek hero depicted in a constellation with a bright three-star "belt."

ANSWER: Orion
(6) The processual school of this field was founded by Lewis Binford. The stratigraphic form of this field involves removing single layers at a time in order to determine the age of uncovered objects through seriation. One practitioner in this field, Heinrich Schliemann, used dynamite for his work, destroying parts of Troy. This field is carried out through excavation at sites called "digs." For ten points, name this study of human artifacts.

ANSWER: $\underline{\text { Archaeology (prompt on "anthropology") }}$
(7) In 1968, SCUM Manifesto author and radical feminist Valerie Solanas shot this man and Mario Amaya at The Factory. This man, who coined the term "fifteen minutes of fame," created a "blotted line" technique, as well as a sculpture of Brillo Boxes. For ten points, name this pop artist known for his works depicting Marilyn Monroe and Campbell's soup cans.

## ANSWER: Andy Warhol (or Andrew Warhola Jr.)

(8) In the aftermath of the Union of Lublin, this country's regions of Galicia and Zaporozhia were annexed as the Ruthenian provinces of the Polish-Lithuanian Commonwealth. As Poland gradually lost control of those territories, this country fragmented into Left and Right Banks, governed by Cossack Hetmans. The southern regions of this country were then governed by the Turkic Khanate of Crimea. The Dnipro River runs through a namesake city to the Black Sea in, for ten points, what country?

## ANSWER: Ukraine (or Ukraina)

(9) Quintus of Smyrna wrote a sequel to this poet's works titled "Things after" him. A set of dactylic hexameter hymns to the Greek pantheon are traditionally attributed to this blind poet, who is also the attributed author of the two largest poems of the Epic Cycle, telling the story of the Trojan War. For ten points, name this ancient poet who wrote the Iliad and the Odyssey.

## ANSWER: Homer

(10) This system mandated the pin se fu [[peen-suh-foo]] clothing colors to mark social positions, reserving the sun's yellow for emperors starting with Taizong. This system opposed Buddhism because the notion of emptiness undermined rule based on Heaven and Earth. Filial piety and the five social bonds were tenets of, for ten points, what state religion of China from 136 B.C.E. to 1905 ?

ANSWER: Confucianism (or Ruism; or Ru Classicism)

## Second Quarter

(1) One religious leader in this country was tied to a wall and ordered to be executed by firing squad, but the first volley cut the ropes. One follower of that man founded a universalist monotheist religion here. In addition to the Bab, this country was home to Bahaullah, who founded the Bahai faith. This country is the largest Shia-majority country in the world. For ten points, name this Islamic republic governed by the Supreme Leader Ayatollah Khamenei.

ANSWER: Iran (or Persia)
BONUS: Iran is also the origin of this dualistic religion, which worships a god praised in the Avesta.

## ANSWER: Zoroastrianism (accept Mazdaism)

(2) This composer based his Un ballo in Maschera on the assassination of King Gustav the Third of Sweden, and this composer's "Va, pensiero" has been proposed as Italy's national anthem. Gilbert and Sullivan's "With Cat-Like Tread" parodies the "Anvil Chorus" of this composer, whose name was used during the Risorgimento as an acronym identifying Victor Emmanuel the Second as king. The creator of Il trovatore and La Traviata, for ten points, who was this composer?

ANSWER: Giuseppe Verdi (or Giuseppe Fortunino Francesco Verdi)
BONUS: Verdi also composed an opera named for this Shakespeare play, involving a Moorish soldier who is duped by Iago into killing his wife, Desdemona.

ANSWER: Othello (accept Otello)
(3) This ancient nation contained a necropolis at Tophet that may provide evidence for child sacrifice. This civilization fought the Mercenary War after failing to pay the namesake soldiers who failed to win Sicily from the Romans. Fighting a series of war named for their Latin moniker, for ten points, what is this ancient civilization based in North Africa that opposed the Romans in the Punic Wars?

ANSWER: Carthage (or Oart-hadasht; or Kenaani; accept Punici before "Punic")
BONUS: Carthage's Latin name derives from its cultural descent from what Middle Eastern people who occupied what is now Lebanon?

ANSWER: Phoenicians (accept Poeni; accept Kenaani if not given above)
(4) Ronald Fisher re-analyzed an experiment involving these plants using a chi-squared test, calling it "too good to be true." The first observation of a " 9 to 3 to 3 to 1 " ratio for a dihybrid cross tracked traits such as "round vs. wrinkled" and "yellow vs. green" in these plants, which led an Austrian monk to develop his laws of segregation and independent assortment. Used by Gregor Mendel in his pioneering experiments on genetics, for ten points, what are these plants whose seeds come in colored pods?

## ANSWER: Peas (or Pea plants; accept Pisum sativum)

BONUS: Gregor Mendel's genetic inheritance principle is often visually displayed by what diagrams, that can show four results from two individuals crossing?

## ANSWER: Punnett Square

(5) One author from this country's most famous work is called The Flowers of Evil, though it is usually known by its original language title. This country is the setting of the children's book Madeleine and the elephant Babar was created by an author from this country. For ten points, name this country home to a man who declined the Nobel Prize in Literature, Jean-Paul Sartre.

## ANSWER: France

BONUS: The Nobel Prize winning dramatist Samuel Beckett wrote in French, but was from which country whose authors have also included James Joyce?

## ANSWER: Ireland

(6) In audio contexts, this process can be accomplished by Vorbis, and David E. Huffman names a type of code, often used in this process, which utilizes fewer bits for symbols that appear more frequently. MP3s are the product of this process, which can exist in lossy and lossless forms. Frequently performed by zip files, for ten points, what is this process in which the size of a file is reduced?

ANSWER: Data Compression (accept Lossy Compression; accept Lossless Compression; accept word forms)

BONUS: An extremely common file format for digital photography compression is known by what acronym, which as a slang term refers to digital pictures getting more and more unclear through continuous compression?

## ANSWER: IPEG (or Ioint Photographic Experts Group; accept IPEG'd)

(7) This government was complicit in the murder of Karl Liebknecht and Rosa Luxemburg. This government's first head was Friedrich Ebert, who was succeeded by the victor of the Battle of Tannenberg. This government eventually dissolved following the passage of the Reichstag Decrees, which occurred after its head, Paul von Hindenburg, was succeeded by Adolf Hitler. For ten points, what social democratic government led Germany from 1918 to 1933 before being succeeded by the Nazis?

ANSWER: Weimar Republic (prompt on "German Republic" or "German Reich" or "Deutsches Reich")
BONUS: Liebknecht and Luxemburg were members of what radical left-wing political ideology which led the Spartacist Uprising in post-war Germany?

ANSWER: Communism (accept Communist Party of Germany; or Kommunistiche Partei Deutschlands; or KPD)
(8) An event that took place during this war is the basis for a 2017 Booker Prize-winning novel by George Saunders. Mary Boykin Chesnut's diary was written during this war, which is also the setting for a poem in which a woman tells a general to "shoot if you must this old gray head". For ten points, name this war that is the setting for John Greenleaf Whittier's "Barbara Frietchie" and the novel Lincoln in the Bardo, which also featured the battle cry "John Brown's Body".

ANSWER: U.S. Civil War (accept any synonym like "American" for "U.S.", prompt on just "Civil War", reluctantly accept an unlikely-in-Europe answer like "War Between the States" or "War of Northern Aggression")

BONUS: One novel that takes place during the U.S. Civil War is this Stephen Crane work in which the protagonist Henry Fleming receives the title mark of "honor" while attempting to desert from the Union army.

## ANSWER: The Red Badge of Courage

## Third Quarter

The categories are:

1. Religions

## 2. $20^{\text {th }}$ Century Art

3. Bones of the Body

## Religions

Name the religion that...
(1) Counts Methodism and Presbyterianism among its denominations

ANSWER: Christianity (accept Protestantism)
(2) Is adhered to by the majority of residents of Thailand and Sri Lanka ANSWER: Buddhism
(3) Is typically divided into branches such as Reconstructionist, Reform, and Conservative.

ANSWER: Iudaism (or Lewish)
(4) Is an ancient Japanese faith, whose divine spirits are known as kami

ANSWER: Shinto
(5) Is a non-violent Indian religion which was founded in the 6th Century BC in India by Mahavira. ANSWER: 【ainism (or ism (or 【ain Dharma)
(6) Venerates Ethiopian emperor Haile [[HIGH-lee]] Selassie, and whose adherents often wear dreadlocks

ANSWER: Rastafarianism
(7) Was founded by Guru Nanak and blends multiple Hindu and Muslim practices.

ANSWER: Sikhism (or Sikhi; or Sikh Dharma)
(8) Like Voodoo, incorporates Catholic and West African beliefs, but developed in Cuba.

ANSWER: Santería (or Regla de Ocha; or Regla Lucumí)

## 20th Century Art

Concerning 20th Century Art, name the...
(1) Early $20^{\text {th }}$ century movement featuring geometric shapes developed by Georges Braque

ANSWER: Cubism (accept word forms)
(2) Home country of artists Pablo Picasso and Joan Miro

ANSWER: Spain
(3) Artist, who was also from that country, who created surrealist works, including one depicting melting watches

## ANSWER: Salvador Dali

(4) Museum in New York that is home mostly to $20^{\text {th }}$ century works and is nicknamed MOMA

## ANSWER: Museum of Modern Art

(5) Art and architecture style typified by the Empire State Building and hotels in Miami Beach ANSWER: Art Deco
(6) Was the type of art that Diane Arbus and Alfred Stieglitz were best known for creating

ANSWER: Photography
(7) European Country whose painters included Willem De Kooning and Piet [[PEET]] Mondrian ANSWER: Netherlands
(8) Was an avant-garde movement in the 1920s and may have taken its name from a French term for a hobby horse?

ANSWER: Dada (accept word forms)

## Bones of the Body

Concerning the bones in the human body, name the...
(1) Bones that protect the lungs and heart in which humans have 12 sets of.

## ANSWER: Ribs

(2) Column of vertebrae, also called the "backbone."

ANSWER: Spine (prompt on "Vertebral column")
(3) Long bone located in the upper arm.

ANSWER: Humerus
(4) Triangular bone that is the lowest-most portion of the spine, also known as the "tailbone."

ANSWER: Coccyx (accept Tailbone before mentioned)
(5) Only moveable bone of the skull and forms the lower jawline.

ANSWER: Mandible
(6) Bones that make up the fingers and toes.

ANSWER: Phalanges (accept Phalanx)
(7) Joint in which you would find the patella bone.

ANSWER: Knee
(8) Generally accepted number of bones in the human body

ANSWER: $\underline{\mathbf{2 0 6}}$

## Fourth Quarter

(1) This artist, who painted the Bathers at Asnières [[ahz-NYEHR]], includes a depiction of a woman walking a pet monkey in one noted work. This artist collaborated with Paul Signac to create an art form which critics termed "Neo-Impressionism," ( + ) including works such as $A$ Sunday Afternoon on the Island of La Grande Jatte. Known for a dot-centric style of art called (*) pointilism, for ten points, who was this French artist?

ANSWER: Georges Seurat (or Georges Pierre Seurat)
(2) George Peele titled a work for this monarch's Troublesome Reign. This man's nephew, Arthur, jumps from a wall in a play featuring a legate of Innocent the Third. The Merry Men oppose this man in a set of stories about a figure who robs from the ( + ) rich and gives to the poor. This king was the brother of Richard the Lionheart, and his reign is the setting of the (*) Robin Hood stories. For ten points, name this king who was forced to sign the Magna Carta.

ANSWER: King Iohn (accept 【ohn Lackland; or 【ohn the First)
(3) In a novel from this country, the protagonist feels the Milky Way flow through him as a fire destroys a hot springs village, which was abridged into a story from the "Palm-of-the-Hand Stories." An author from this country included Spring Snow and Runaway Horses in a collection $t$ titled ( + ) The Sea of Fertility. Snow Country is by an author from this country, another of whom wrote about a man who destroys the title Temple of the Golden Pavilion. (*) For ten points, name this home country of Yasunari Kawabata and Yukio Mishima.

ANSWER: Japan (or Nihon-koku; or Nippon-koku
(4) Justin Khoury suggested a particle that generates the opposite effect of this quantity, known as the chameleon particle. "Loop theory" attempts to describe this quantity in quantum mechanics, and black hole mergers cause ( + ) waves of this quantity that, on Earth, can be calculated as moving an object ( ${ }^{*}$ ) 9.8 meters per second squared. For ten points, name this attraction between mass that causes objects to fall.

ANSWER: Gravity
(5) This man was given a Flying Fortress that he was promised by Walter Bedell Smith after capturing Sfax [[suh-FAKS]]. One politician allegedly described this man as "in defeat, unbeatable; in victory, unbearable." This man was put in charge of the First and Ninth Army ( + ) of the U.S. as part of his command of one shoulder of Allied troops during the Battle of the Bulge. Commanding another country's Eighth Army during the invasion of Sicily, (*) for ten points, who was this British general during the Second World War?

ANSWER: Bernard Law Montgomery (or 1st Viscount Montgomery of Alamein; prompt on "Monty")
(6) These entities are related to Mersenne primes in the Euclid-Euler theorem, and American theorist Carl Pomerance argued and proved that any (+) odd versions of these things must have at least seven distinct prime factors. (*) For ten points, give this term for any number which is equal to the sum of its positive integers, excluding itself, examples of which include 496,28 , and 6.

ANSWER: Perfect number (prompt on descriptive answers)
(7) Despite a warning from his brother, Epimetheus accepted this figure as a gift from Zeus. This figure was created by Hephaestus as a punishment for Prometheus's theft of fire. After opening a pithos, ( + ) this figure released all of its contents, except for hope. The first woman from Greek (*) mythology, for the point, who is this figure who released evil into the world after opening her namesake box?

ANSWER: Pandora (or Anesidora; accept Pandora's Box)
(8) A poet with this first name wrote about "yellow dinosaur steamshovels" in a poem set near "the old South Boston Aquarium." That poet with this first name wrote about an animal who "jabs her wedge-head in a cup of sour cream" in ( + ) "Skunk Hour." Another poet with this first name wrote, "I have promises to keep / and miles to go before I sleep." That poet with this first name comes across (*) "two roads diverged in a wood." For ten points, give this first name of "For the Union Dead" author surnamed Lowell and "The Road Not Taken" author surnamed Frost.

ANSWER: Robert (accept Robert Lowell; or Robert Frost)

## Extra Question

(1) This concept spread when a man from Samos was sent to Egypt by Thales and captured by Persians. The formulator of this concept found Babylonian (+) triples to meet it, and the irrational numbers demanded by this concept unsettled followers of its originator, who may have proved this concept before Euclid's windmill. ( ${ }^{*}$ ) For ten points, name this theorem often written as a-squared plus b-squared equals c-squared.

ANSWER: Pythagorean Theorem (accept Finding the Hypotenuse; $\mathbf{A}$-Squared Plus B-Squared Equals C-Squared before mentioned)

BONUS: What is the capital of Liechtenstein?
ANSWER: Vaduz

