

Iowa State University
The Beautiful and Damned

October 25-26, 1996 - Ames, Iowa

Round Fourteen

Toss-ups

(Mathematics: Calculus)

1. Take an arbitrary function and divide its domain on the real axis into an even number of segments. Fit a parabola to each segment and sum the areas under each parabola within its segment. This should be a good approximation to the total area under the curve. FTP, what procedure of quadrature have you performed?

Simpson's Rule

(Literature: English, poetry, 1701-1850)

2. Among this poet's works include "The Progress of Poesy" and "Ode on a Distant Prospect of Eton College." A reticent poet, he turned down the title of poet laureate when offered him. FTP, identify the author, buried in Stoke Poges, the site of his "Elegy Written in a Country Churchyard."

Thomas Gray

Bonuses

(Literature: Greek)

1. Identify the following Greek poets for ten points apiece.

A. This man boasted of throwing his shield away to save himself and wrote first love, and then hate, poems about a certain Neobule.

Archilocus of Paros

B. This author's two major works are an exhaustive collection of divinities and an appeal to his brother to give back the farm he stole.

Hesiod

C. This poet ran some sort of educational facility for women on Lesbos and wrote troubled verses implying strong emotional attachments to the students.

Sappho

(Modern Culture: Music)

2. The Smashing Pumpkins had to delay their tour this summer due to a problem involving drugs. FTP each,

A. Name the keyboardist who died of an overdose of heroin.

Jonathon Melvoyn

B. Name the drummer who was ousted from the group for his part in the death, and for his own drug use.

James "Jimmy" Chamberlain

C. Name Chamberlain's replacement, the former drummer for Filter.

Matt Walker

(Painting: Works)

3. Three men, one in brown on the left, one in dark yellow in the middle, and one in blue velvet on the right examine their hands. A fourth, smoking, stands behind them and watches. Four pipes hang on the wall, one more is on the rickety table. FTP, what is this Paul Cézanne work titled for men deciding whether or not to bluff?

The Card Players

(Literature--American, 1851 - 1900, prose)

4. He published two novels anonymously: *Democracy* and *Esther*, as well as nonfiction works like the nine volume *History of the United States During the Administrations of Jefferson and Madison*. The suicide of his wife Esther in 1885 was so jarring that he simply omitted their twenty years together from his autobiography, which became his most famous work. FTP, identify this author who died in 1918, the same year his *Education...* was published.

Henry Adams

(Life Science: Evolutionary Biology)

5. It will be a powerful force only if migration rates are implausibly low and group extinction rates implausibly high; in other cases this evolutionary effect will not be powerful enough to fix altruistic variants in a population. FTP, what name is given to this phenomenon in which natural selection operates at the level of the community or population?

group selection

(History: European, political, -1750)

3. Answer the following questions about the second half of the Thirty Years' War for ten points apiece.

A. Which Scandinavian king entered the war in 1630 with an eye toward restraining the reach of Holy Roman Emperor Ferdinand?

Gustavus Adolphus of Sweden

B. Which imperial general was defeated at Breitenfeld in 1631 and killed skirmishing with the Swedish in 1632?

Johan Tserclaes (Count of Tilly)

C. At which 1634 battle was the Swedish army destroyed?

Battle of Nördlingen

(Mathematics: Calculus)

4. Given each integral, give the function of x it defines for ten points apiece.

A. The integral from 1 to x of dt [dee tee] over t .

Answer: natural logarithm (ln [ell-en])

B. The integral from 0 to infinity of t to the x times e to the minus t dt .

Answer: gamma function

C. The integral from minus infinity to x of e to the minus t squared over two dt .

Answer: error function (erf)

(History: Japan)

5. Identify the following shoguns for ten points apiece.

A. This man was named the first shogun in 1192 after his clan defeated the rival Taira clan.

Minamoto Yoritomo

B. This samurai leader gained control of Kyoto in 1336 and had the emperor declare him shogun in 1338.

Ashikaga Takauji

C. This lieutenant of Hideyoshi took over the shogunate in 1603 after Hideyoshi's death; his descendants ruled for over 250 years.

Tokugawa Ieyasu

(Theatre)

6. It was bombed during WWII and was rebuilt in the Baroque style. It is scornfully said that its unusually restrained audiences "sit on their hands" during performances and has a reputation for being a hangout for Communists, but it is most often associated with such giants in the world of opera as Arturo Toscanini and Maria Callas. FTP, name this Milan opera house.

Teatro Alla Scalla (or La Scalla)

(History: American, social, 1800-1875)

7. This New York lawyer became famous as the leader of the attack on the "Tweed Ring" which was defrauding the city. He was also an active Fre Soiler and Barnburner. He became governor of New York in 1875 and was the Democratic nominee for President in 1876. FTP, name this man who received a majority of the popular votes in that election but was deemed the loser by an electoral commission.

Samuel Jones Tilden (1814-1886)

(Sports: Miscellaneous)

8. Some of the greats in this sport include Australians Michael Novakov, Mark Richards, Wendy Botha, and American Freida Zamba. The longest "course" is at Matanchen Bay in Mexico, where rides of over a mile are possible while the highest "course" is at Weimea Bay, Hawaii where one can ride waves of over 30 feet. FTP, identify this sport where participants try to "hang 10".

surfing

(Modern Culture: TV)

6. After the success of the X-Files, this fall's television lineup includes shows attempting to capitalize on the paranormal audience. For ten points each, name the new show from a brief description.

A. Congressional aide John Loengard and girlfriend Kimberly Sayers are involved in a stealthy alien invasion and a government cover-up in 1961 America.

Dark Skies

B. Former FBI agent Frank Black tracks down a series of homicidal psychopaths using his gifts of visualizing crimes as the year 2000 approaches.

Millenium

C. Former FBI agent Dr. Sam Waters returns to the agency to head the Investigative Support Unit, using her gifts of visualizing crimes to catch homicidal psychopaths.

Profiler

(Geography-Asia [VISUAL 96-RRH-19])

7. The moderator will provide you with a map of Iran and Iraq. Answer the following questions for ten points apiece.

A. Which letters are closest to Baghdad and Tehran?

D and L

B. Which letter is within the Elburz Mountains?

L

C. What lies directly north of "L"?

Caspian Sea

(Current Events: Science)

8. Recent medical studies show that a three-drug cocktail is effective in clearing the bloodstream of the HIV virus. This research may lead to an effective cure for the disease. For ten points each, name the three drugs which made up the cocktails used in the studies.

AZT, 3TC, indinavir (ritonavir)

(Earth Science)

9. Explorer I provided evidence of a “magnetic mirror” that reflects charged particles away from either pole along a flux line toward the other pole. This system is supplied with particles by the solar wind and solar flares. FTP, what name is given to these zones, instrumental in holding up the pants of a University of Iowa physicist?

Van Allen belts

(Geography: Oceania)

10. This territory is primarily low tablelands and has a tropical climate. Despite a lack of water the government has developed farming of crops such as peanuts in the interior. For 10 points name the area bordered on the north by the Timor Sea, the Arafura Sea, and the Gulf of Carpentaria; on the east by Queensland; on the south by South Australia; and on the west by Western Australia and whose capital is Darwin.

Northern Territory

HALFTIME

(Literature: German, prose)

11. It opens in 1835 with a housewarming party congratulating the title family on their new estate. Concerned mainly with the children of Johann the younger, it tells of the decline of a merchant dynasty family in Lübeck. FTP, identify this Thomas Mann novel.

Buddenbrooks

(History: Ancient)

9. Identify these men in the life of Cleopatra, last of the Ptolemies, Queen of Egypt.

A. This brother of Cleopatra was co-ruler with her until his guardians drove her from the throne.

Ptolemy XII

B. This Roman divorced his wife, the sister of future emperor Octavian, to marry Cleopatra.

Marcus Antonius (Mark Antony)

C. This son of Cleopatra and Mark Antony was killed after her suicide to prevent any claim to the throne against Octavian.

Caesarion

(Visual Art: Painting, recognition)

10. The moderator will hand you three reproductions of eerie, disturbing paintings. Give the painter of each for ten points apiece.

A. Giorgio de Chirico

B. Francis Bacon

C. Amedeo Modigliani

(Sports: Basketball)

11. Identify the following heroes of the NCAA men's Division I basketball championship game FTP each.

A. His dunk with 1 second left gave North Carolina State the 1983 title.

Lorenzo Charles

B. His baseline jumper in the closing seconds gave Indiana a 74-73 win over Syracuse in 1987.

Keith Smart

C. A 64% free-throw shooter, he sank both ends of a one-and-one with 3 seconds left in overtime to give Michigan the 1989 title.

Rumeal Robinson

(History: European, political, -1750)

12. Spain and France would never be united under one ruler, but the French Duke of Anjou was to be King of Spain. Sicily went to the Duke of Savoy. Milan, Naples, and Sardinia went to Austria. Nova Scotia, Newfoundland, the Hudson Bay Territory, Gibraltar, and Minorca went to England. FTP, these were the major provisions of which treaty, signed in 1713, which ended the War of Spanish Succession?

Peace of Utrecht

(Geography: Central America)

13. Past Flamenco Island, under Thatcher Ferry bridge, through the Miraflores locks, through the Gaillard cut, through Gatun Lake, through Gatun locks, past Colon, through Limon Bay, and into the Atlantic Ocean. FTP, which aqueous waterway from the Pacific to the Atlantic passes these landmarks in that order?

Panama Canal

(Modern Culture—Computer Games)

14. Witt's End, the Swiss Cheese Room, a small building by a stream which flows into a grate, a dragon you can kill with your hands, a snake-eating bird, and the magic word "XYZZY" are all things which can be found—FTP—in which first ever computer adventure game?

Adventure

(Biology: Cellular)

12. Certain structures of a cell are necessary for maintaining the skeleton of the cell or components of the cell. FTP each, name the following structures.

A. These long, straight, hollow tubes provide the most rigid structural stability to the cytoskeleton. Connected to the centrosome, they seem to form a path on which all organelles travel during mitosis.

microtubules

B. These are double stranded, flexible fibers that are bound in linear, two dimensional or three dimensional structures. They are found largely in the cell cortex, and are most prevalent in muscle cells.

actin filaments or microfilaments

C. These are the most flexible fibers of the cytoskeleton, and are generally used more to connect the cytoplasms of different cells than to maintain structure of a specific cell, though they also form parts of the nuclear membrane.

intermediate filaments

(Classical Music: Recognition-AUDIO)

13. The moderator will play three excerpts from masses. Identify each for ten points apiece.

A. Wolfgang Amadeus Mozart's Coronation Mass

B. Franz Josef Haydn's Mass in Time of War

C. Ludwig van Beethoven's Missa Solemnis

(Literature: American, prose, 1901-1950)

14. Identify the Ernest Hemingway novel from characters FTP each.

A. Jake Barnes, Brett Ashley, and Robert Cohn

The Sun Also Rises

B. Catherine Barkley and Frederic Henry

A Farewell to Arms

C. Henry Morgan, a Florida fishing boat captain

To Have and Have Not

(Philosophy: People, 1700-1900)

15. He had a dog named "Atma," and in his study were a bust of Kant and a bronze Buddha. He claimed his great 1818 work was dictated by the Holy Ghost and employed correspondents to hunt up evidences of his fame. He advocated oriental asceticism and self-torture and thought the only good Christian doctrine was that of Original Sin. FTP, who is this pessimistic philosopher and author of *The World as Will and Idea*?

Arthur Schopenhauer

(Literature: English, - 1700, non-poetry)

16. Narrated by Raphael Hythloday, it was originally written in Latin, though its title is a pun in Greek. It describes a communist city-state governed by reason. FTP, identify this work about "no place" by Thomas More.

Utopia

(History: South America)

17. He was born in Ireland, but entered business in Peru and joined the Spanish service in Chile. He was captain general of Chile from 1788 to 1796 and then served as viceroy of Peru from 1796 until his death in 1801. FTP, who was this conservative father of a more well-known son who became the liberator of Chile?

Ambrosio O'Higgins

(History: American, political, -1800)

15. Answer the following questions about Valley Forge for ten points apiece.

A. Along which river does it lie?

Schuylkill River [SKOO-kill]

B. Which former Prussian officer helped Washington drill his troops?

Baron von Steuben [first name?]

C. What news from May reached Washington near the end of his stay in Valley Forge and helped him move against the British in June?

The U.S. had concluded an alliance with France.

(Physics: Newtonian)

16. Identify the following physical quantities for ten points apiece.

A. The integral of applied force with respect to time

impulse

B. The line integral of the dot product of an applied force and the infinitesimal path component

work

C. The integral of jerk with respect to time

acceleration

(Literature: English, drama, 1850-1994)

17. Identify the play from a description FTP.

A. Set in Zurich during WWI, the dramatis personae include Vladimir Lenin, James Joyce, Tristan Tzara, and the main character Henry Carr, a British Consular official.

Travisties

B. Jimmy Porter, a candy store worker, vents his against his wife Alison and her friend Helena whom he takes as his lover.

Look Back in Anger

C. A philosophy professor returns to his home with his wife. The professor's father and brothers make love to his wife and convince her to stay with them.

The Homecoming

(Film)

18. Directed by Milos [mce-LOHSH] Forman, this film won eight Academy Awards in 1984, including Best Picture. F. Murray Abraham won the "Best Actor" Oscar for his portrayal of the bitter rival of the title character, played by Tom Hulce. Name this film, whose soundtrack included selections from The Abduction from the Seraglio, the Symphony #25 in G Minor and Requiem, K.626.

Amadeus

(History: European, 1900 - 1994, political)

19. She first held office in 1977, when she became mayor of Thure, and followed up becoming agriculture minister, mayor of Chatellerault, minister of tourism and trade, minister of trade and industry, minister of European affairs, and, after a brief stint in the private sector, prime minister of France in May 1991. FTP, name this woman, the first female prime minister in French history, who managed to offend almost everyone while in office, and was nicknamed, late in her term, "Madame 19" for her low popularity ratings.

Edith Cresson

(Literature: American, 1901 - 1950, poetry)

20. Incredibly prolific, he produced autobiographies (*The Big Sea*), plays (*Tambourines to Glory*), novels (*Not Without Laughter*), as well as a series of short story collections about Jesse B. Simple, a streetwise working man and the lyrics to Kurt Weill's *Street Scene*. FTP, identify this author of the poetry collections *The Weary Blues* and *Montage of a Dream Deferred*.

Langston Hughes

END OF ROUND

(History: Central America)

18. Identify the following enemies defeated in the construction of the Panama Canal.
A. This artificial passageway across the Continental Divide required the excavation of a million tons of dirt and caused more deaths than any other section.

Gaillard Cut [gill-YARD] (Culebra Cut)

B. This elevated river downed the French plans for a sea-level canal and is the source of Gatun lake.

Chagres River

C. These two mosquito-born diseases caused the most deaths among the French and American workers.

yellow fever, malaria

(Anthropology)

19. Given the hominid remains, identify the Leakey that first found them for ten points apiece. "None" is a possible answer. [Do not give answers until the end.]

A. *Australopithecus anamensis*

Meave Leakey

B. *Homo habilis*

Louis Leakey

C. *Australopithecus afarensis*

None

(Classical Music)

20. Identify the composer 30-20-10.

30: *Seven Sonnets of Michealangelo, A Ceremony of Carols*

20: *Albert Herring, A Midsummer Night's Dream*

10: *Billy Bud, A War Requiem*

Benjamin Britten

(History: Central America)

E1. He refused Stimson's agreement of Tipitapa and was forced into Mexico in 1928 by a U.S. Tactical Air Squadron. He returned twice with new troops in 1930, only to be captured and executed by Anastasio Somoza. FTP, name this communist guerilla of Nicaragua, namesake of the Sandinista party.

"General don" Augusto "Cesar" Sandinista

(Literature: American, prose, 1901-1950)

E2. The novel opens with the main character "eloquently drunk, lovingly and pugnaciously drunk." He hooks up with the Baptists, is seduced by Sharon Falconer (who burns to death in a fire at her Tabernacle), and then hooks up with the Methodists while he marches toward his vision of being "emperor of America." FTP, identify this satire of American religion by Sinclair Lewis.

Elmer Gantry

(History: American, social, 1800-1875)

E3. In 1861, after the eastern and western work crews met in Salt Lake City, Stephen J. Field declared California's loyalty to the Union. This engineering feat ended the Pony Express and was to make Western Union untold profits. FTP, what was this success which was followed in 1866 by a transatlantic version?

the laying of the first transcontinental telegraph cable

(Literature: Miscellaneous)

E1. Answer the following questions about English grammar for the stated number of points.

A. For five points each, name the three moods of English verbs.

indicative, subjunctive, imperative

B. For ten points, what is the perfect participle of "draw"?

having drawn

C. For five points, what name is given to a present participle used as a noun?

gerund [JAIR-und]

(Miscellaneous)

E2. Given the brief description of the members of a group known by a number, give the number for five points each.

A. French composers.

6

B. Canadian landscape artists

7

C. Athenian tyrants

30

D. Ringwraith's rings

9

E. Black Michael's henchmen

6

F. American realist painters

8



