

AREC 213 Midterm I Exam

Student Name_____

Instructions for Exam

- 1) You will have exactly 1 hours and 50 minutes to complete the exam (The full class time).
- 2) There are 15 multiple choice questions, 10 true/false questions, 5 short answer, and 2 essay questions
- 3) **Show all your Work** on Short Answer and Essay Questions for Full Credit
- 4) You may use a calculator but you may not use your cell phone at all during the exam
- 5) The scoring for each question type is listed below
 - a. Multiple Choice- 15 Questions, 3 points each for total of 45 Points
 - b. True False- 10 Total, 3 points each for total of 30 Points
 - c. Short Answer- 5 Total, 10 points each for a total 50 Points
 - d. Essay 1: Porter's Five Forces- 25 Points
 - e. Essay 2: Sandwich Costing- 50 Points

True/False

Indicate whether the statement is true or false.

- ___ 1. Online payment gateways only charge you a service fee after a certain level of income has been reached.
- ___ 2. To conduct a break even analysis for a sole proprietorship you only need your fixed costs because variable costs are only needed if you are preparing a break even analysis for a public firm that is regulated by the SEC.
- ___ 3. A General Partnership is required by law to have a board of advisors
- ___ 4. If you are going to start selling homemade art at local festivals the easiest business to set up would be a Subchapter P Corporation designed for single business owners.
- ___ 5. A market segment refers to the stage the market is in which usually includes emerging, growth, mature and declining
- ___ 6. The terms market and industry mean the same thing
- ___ 7. If you run an organic farm your business profitability will be affected by the organic farming industry (Industry Level Factors) and also how you run your business (Firm Level Factors)
- ___ 8. Your Profit is equal to what you sell times the price of what you sell
- ___ 9. Even though they are called variable costs these costs are actually fairly fixed because they include things like rent and utilities and any other cost that is not related to direct labor or materials.
- ___ 10. A C Corporation experiences double taxation but is not taxed as a separate entity

Multiple Choice

Identify the choice that best completes the statement or answers the question.

- ___ 11. A(n) _____ is a group of firms producing a similar product or service, such as soft drinks, electronic games, or computers.
 - a. Sector
 - b. Industry
 - c. Division
 - d. Network
 - e. Market
- ___ 12. John just spoke to an investor, who is interested in his business idea. John offered to send the investor a copy of his full business plan, but the investor asked for a short overview of the business plan instead. What portion of his business plan should John send the investor?
 - a. company description
 - b. marketing plan
 - c. operations plan
 - d. elevator pitch
 - e. executive summary

- _____ 13. According to our class discussions, a business plan is best described as a(n):
- a. narrative description of a new business
 - b. agreement
 - c. contract
 - d. marketing initiative
 - e. budget
- _____ 14. _____ depict relationships between items on a firm's financial statements.
- a. Financial proportions
 - b. Fiscal relations
 - c. Monetary balances
 - d. Fiscal projections
 - e. Financial ratios
- _____ 15. From the in class video, which statement most accurately describes how Paul Graham feels about Competition and its role for the startups at Y-Combinator.
- a. Competition among leading software firms offers a significant threat to their software startups
 - b. Competition is of little concern to Y-Combinator and they place a higher emphasis on other areas
 - c. They have found that indirect competitors end up being a larger threat than direct competitors, but both play significant roles in startup success
 - d. Competition has directly led to over one quarter of their startups they funded not being successful
- _____ 16. A business plan is important for two reasons: it forces the founding team to systematically think through every aspect of their new venture and:
- a. it allows customers to quickly find out if the business offers the products they need
 - b. it is a budget with a proforma income statement that will not change
 - c. it communicates the merits of a new venture to outsiders, such as investors and bankers
 - d. it is a contract that must be signed by the founders of the firm
- _____ 17. _____ is a company's ability to meet its short-term financial obligations.
- a. Effectiveness
 - b. Efficiency
 - c. Stability
 - d. Profitability
 - e. Liquidity
- _____ 18. Which financial statement records all of a firm's revenues and expenses for a given period and shows whether the firm is making a profit or experiencing a loss?
- a. statement of cash flows
 - b. owner's equity statement
 - c. balance sheet
 - d. income statement
 - e. forecast

- ____ 19. Which of the following was not identified as one of the four main financial objectives of a firm?
- a. efficiency
 - b. timeliness
 - c. liquidity
 - d. stability
 - e. profitability
- ____ 20. Which one of the following statements about the break even point is not true
- a. The Break Even point is where expenses are recovered
 - b. Sales less than the Break Even Point mean you are losing money
 - c. The Break Even point is where total sales divided by net income equals fixed costs
 - d. Sales greater than the Break Even Point mean you are making money
 - e. The Break Even point is where net income equals \$0
- ____ 21. Cash based accounting and accrual based accounting are two major ways of accounting. Which statement below is true.
- a. Accrual accounting recognizes income when earned (rather than realized) and associates expenses with that income
 - b. It is easy to switch between these two methods and most firms do so at least once a year
 - c. Cash based accounting is required by law for public firms
 - d. Accrual based accounting is illegal for any business except a sole proprietorship since this is run by a single person
- ____ 22. Which of the following is not considered one of the Three General Approaches to Identify Opportunities:
- a. Observing trends
 - b. Finding gaps in the marketplace
 - c. Solving a problem
 - d. I tried to think of something that might not lead to coming up with an idea but couldn't so select (d)
- ____ 23. Which one of the following is untrue regarding political and environmental trends
- a. They have no influence on organic farming
 - b. Political action and regulatory change could provide the basis for opportunities
 - c. They are both part of the PESTEL analysis
 - d. Laws to protect the environment have created opportunities for entrepreneurs to start firms that help other firms comply with environmental laws and regulations.
- ____ 24. In economics the equilibrium point is considered to be where
- a. Supply and Demand cross each other
 - b. Where supply crosses the x axis (price)
 - c. Where demand crosses the y axis (price)
 - d. Where the y axis (price) and the x axis (quantity) intersect
- ____ 25. When operating in an industry that is not a monopoly, you should always price your product
- a. For less than your variable costs
 - b. At a price where you can cover your fixed and variable costs and make a profit
 - c. To be the same (per unit) as your fixed costs
 - d. Most markets are monopolies (because of the Anti-trust laws) so you should set your price where marginal revenue equals marginal cost

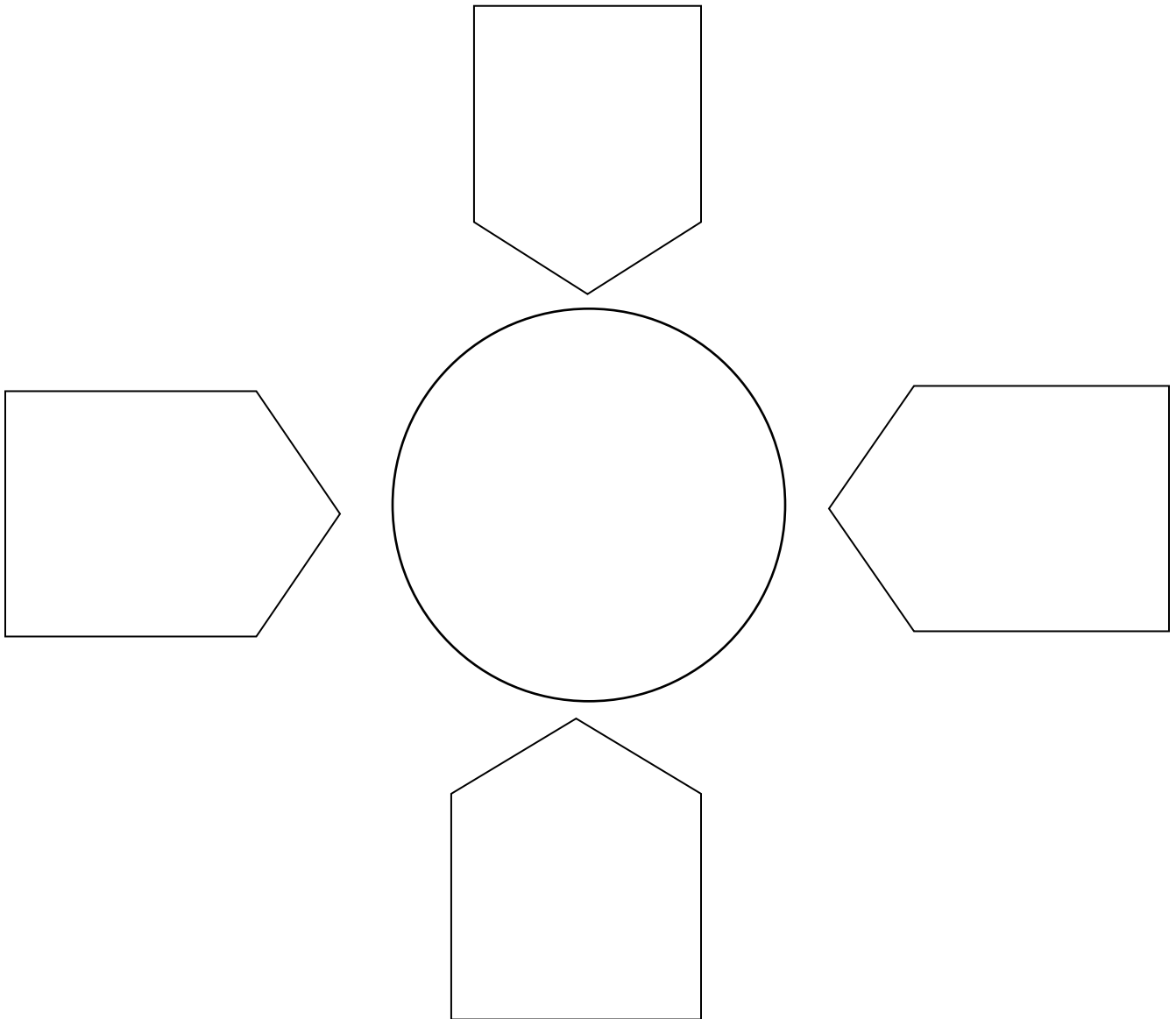
SHORT ANSWER

- 1) Calculate the Profit Margin for 2016 for the company whose income statement is given.
- 2) From the above profit margin how does this firm appear to be doing financially and would you invest in them? Give a brief explanation why you would or would not invest, you can also reference the past three years shown.
- 3) Your business has made 10 million gross revenue with a net profit margin of 10% over 5 years of operations. An investor put in an initial investment of \$250,000 for a 10% equity stake in the company. How much money has the investor made (or lost) from this deal?

- 4) An entrepreneur decides to invest \$150,000 for a 20% stake in your ranch. What valuation does this put on your ranch?
- 5) Why might you seek VC funding over an angel investment and at which stage of the business might one be more appropriate than the other.

LONG ANSWER

- 1) You want to enter the market by starting a Coffee Shop, but want to do some analysis of what the industry is like before making a decision. You decide to use Porter's Five Forces to analyze Starbucks since you see them as an important industry leader.
 - a. In the space below use the 5 Forces to conduct this analysis of Starbucks.
 - i. For instance rank each of the five forces as High, Medium or Low. High being this is not an attractive industry and low meaning this is an attractive industry.
 - b. Does your overall outcome make this appear like an attractive industry to enter?
 - c. Starbucks has done quite well, does your outcome agree with how well Starbucks has done?



The Gross Profit represents how much each sandwich “contributes” toward fixed expenses and profits. Every time you sell a sandwich, how much is it contributing toward paying your fixed expenses or eventually your income? \$_____

How many Sandwiches do you need to sell every month to pay your monthly expenses?

How many additional sandwiches do you need to sell every month to make \$500 Net Profit?

Income Statement

View: [Annual Data](#) | [Quarterly Data](#)

Period Ending	Dec 31, 2014	Dec 31, 2013	Dec 31, 2012
Total Revenue	1,403,002	664,890	316,933
Cost of Revenue	446,309	266,718	128,768
Gross Profit	956,693	398,172	188,165
Operating Expenses			
Research Development	691,543	593,992	119,004
Selling General and Administrative	804,016	440,011	146,244
Non Recurring	-	-	-
Others	-	-	-
Total Operating Expenses	-	-	-
Operating Income or Loss	(538,866)	(635,831)	(77,083)
Income from Continuing Operations			
Total Other Income/Expenses Net	(5,500)	(4,455)	399
Earnings Before Interest And Taxes	(578,351)	(647,146)	(79,170)
Interest Expense	-	-	-
Income Before Tax	(578,351)	(647,146)	(79,170)
Income Tax Expense	(531)	(1,823)	229
Minority Interest	-	-	-
Net Income From Continuing Ops	(577,820)	(645,323)	(79,399)
Non-recurring Events			
Discontinued Operations	-	-	-
Extraordinary Items	-	-	-
Effect Of Accounting Changes	-	-	-
Other Items	-	-	-
Net Income	(577,820)	(645,323)	(79,399)
Preferred Stock And Other Adjustments	-	-	-
Net Income Applicable To Common Shares	(577,820)	(645,323)	(79,399)

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Answer Section

TRUE/FALSE

- | | |
|------------|--------|
| 1. ANS: F | PTS: 1 |
| 2. ANS: F | PTS: 1 |
| 3. ANS: F | PTS: 1 |
| 4. ANS: F | PTS: 1 |
| 5. ANS: F | PTS: 1 |
| 6. ANS: F | PTS: 1 |
| 7. ANS: T | PTS: 1 |
| 8. ANS: T | PTS: 1 |
| 9. ANS: F | PTS: 1 |
| 10. ANS: F | PTS: 1 |

MULTIPLE CHOICE

- | | |
|------------|--------|
| 11. ANS: B | PTS: 1 |
| 12. ANS: E | PTS: 1 |
| 13. ANS: A | PTS: 1 |
| 14. ANS: E | PTS: 1 |
| 15. ANS: B | PTS: 1 |
| 16. ANS: C | PTS: 1 |
| 17. ANS: E | PTS: 1 |
| 18. ANS: D | PTS: 1 |
| 19. ANS: B | PTS: 1 |
| 20. ANS: C | PTS: 1 |
| 21. ANS: A | PTS: 1 |
| 22. ANS: D | PTS: 1 |
| 23. ANS: A | PTS: 1 |
| 24. ANS: A | PTS: 1 |
| 25. ANS: B | PTS: 1 |