**MID TERM ASSIGNMENT**

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**STD ID: 16515**

**PROGRAM: MBA 3.5 1ST SEMESTER**

**SUBJECT: FINANCIAL MANAGEMENT**

**INSTRUCTOR: MS MARIUM SALEEM**

**Q1 (A): If the expected return is 9% and the standard deviation is 8.38%, what is the probability that return will be more than 10 percent? Also find the probability for return to be less than 40 percent. (7 marks)**

**Answer:**

Expected return = 9% = 0.9

Standard deviation = 8.38% = 0.0838

What is the probability that the return will be more than 10 percent?

* + - Z = $\frac{R-\overbar{R}}{σ}$
		- Z= $\frac{0.1-0.09}{0.0838}$
		- Z=$\frac{0.01}{0.0838}$
		- Z=0.1193
		- Z=0.4602
		- Z=46.02%

**So, there is the 46.02% probability that the return will be more than 10 %.**

Now finding out the probability for return to be less than 40%

Expected return = 9% = 0.09

Standard deviation = 8.38 = 0.0838

* + - Z = $\frac{R-\overbar{R}}{σ}$
		- Z = $\frac{0.4-0.09}{0.0838}$
		- Z =$\frac{0.31}{0.0838}$
		- Z = 3.699
		- Z = 0.0013
		- Z = 0.13%

**There is 0.13% probability for the return to be less than 40 percent.**

**Q1 (B): Keeping the current pandemic in mind, which type of risk i.e. systematic or unsystematic risk is faced by stocks traded on Pakistan Stock Exchange and why? (3 marks)**

This is the systematic risk which is being faced by the Pakistan stock exchange because the current pandemic state is effecting the entire economy of Pakistan. One the reason is that the dollar has reached the sky value at this point in time and the Pakistani currency rupee is currently losing its value. Other than that our textile industries are suffering with the shortages. And as we know that it is almost 60% that all Pakistan’s exports are textiles. So In this situation, there is next to no expectation or proof that there would any drawn out increases in the coming days or weeks due to the coronavirus pandemic which has shocked and deadened the whole world. And in the same time period, Pakistan stock exchange has also witnessed the worst single day performance after losing over 2,400 points and due to this the shares prices are going down so therefore we can say that the current pandemic state is killing Pakistan’s economy.

**Q2. Consider two investment opportunities, A and B, whose normal probability distributions of one-year returns have the following characteristics:**

|  |  |  |
| --- | --- | --- |
|  | Investment A | Investment B |
| Expected Return | 0.09 | 0.20 |
| Standard deviation | 0.05 | 0.10 |

1. **Calculate coefficient of variation for both investment A and B. Identify which of the two investments is more risky and why? (7 marks)**

Answer:

Firstly we’ll calculate the coefficient of variation for investment **A.**

**CV =** $\frac{σ}{\overbar{R}}$

**CV =** $\frac{0.05}{0.09}$

**CV = 0.55**

Now we’ll calculate the coefficient of variation for investment **B**

**CV =** $\frac{σ}{\overbar{R}}$

**CV =** $\frac{0.10}{0.20}$

**CV = 0.50**

**“So therefore, Investment A is more Risky because it has greater value of variation relative to the size of expected Return”**

1. **Briefly explain the difference between the characteristic line and security market line. (3 marks)**

**Characteristic Line**

Characteristic Line is a graph representing the relationship between **Security Returns and Market Index returns**. It plots the performance of a particular security against that of a market portfolio at every point in time. Characteristic Line is used to estimate Beta and determine how a security’s return correlates to a market index return.

**Security market line**

The security market line shows the linear relationship between Systematic risk (which is non diversifiable, and affects the market as a whole) and expected return of the entire financial market. It signifies the relationship between expected returns and beta, on which both portfolios and individual securities lie.

**Q3. (a) Keeping the pros and cons of different goals in mind, what should be the ultimate goal of a firm? Give reasons for your answer. (5 marks)**

**Answer:** The goal of a firm is always to maximize its profit. Profit Maximization is constantly utilized as an ultimate goal or objective of the firm. Which Spotlight on momentary objective to be accomplished inside a year. It weighs on the proficient utilization of capital assets. So as to amplify benefit, the financial manager will execute activities that would bring about most extreme benefits without thinking about the outcome of his activities towards the organization's future execution.

For a business, it isn't important that benefit ought to be the main target; it might focus on different perspectives like expanding sales, catching more piece of the overall industry or capturing more market, return on capital and so on, which will deal with productivity. There are some drawbacks of profit maximization which are as follows:

* It is always a short term approach
* The cash flows, risk and timings of return are ignored
* It doesn’t consider the social responsibility as an important goal and that is one of the most important objectives of many firms.
* This method also cannot be discussed on market shares, greater sales and higher stability of the firm.

So in my opinion, I think that the ***ultimate goal*** of a firm should be to maximize shareholder’s wealth.

Wealth maximization is long haul process. It alludes the estimation of the organization by and large communicated in the value of the stock.

It also says that directors should settle on all choices in order to expand the total long run market value of the firm. Absolute worth is the entirety of the estimation of every budgetary case on the firm-including value, obligation, favored stock and warrants. Here, the administrators attempt putting resources into new undertakings, boosting benefits from existing items and administrations, controlling expense, and enhancing the organization through procedure, which reflects in the cost of the stock, yet consistently in the expansion in Net Resource Worth and equity per share.

There are few advantages of increasing stakeholder’s wealth over the profit maximization and these are as follows:

* It’s always a long term approach while profit maximization is always a short term approach and it always refers to the company’s value.
* As in profit maximization the cash flows, risk and timing of return are always being ignored, while in wealth maximization, these are the important key factors variables.
* And last but not least, the profit maximization is a subset of the wealth maximization.
1. **Why do agency problems arise? How can they be avoided? (5 marks)**

At the point when a principle recruits a specialist to do explicit undertakings, the employing is named as "principle agent relationship," or basically an "agency relationship." When an irreconcilable situation between the necessities of the principles and those of the agent emerges, the contention is called an "agency problem." In financial markets, agency issues happen between the stockholder (principle) and corporate managers (agents). While the stockholder approach the managers to deal with the organization, the managers may look to their own needs first.

These problems can be avoided by the following methods:

* **Keeping restrictions on agents capabilities**

Giving the agent a lot of capacity to follow up for your benefit opens the entryway for future difficulties and can lead the money related guide to maybe settle on poor decisions. Best governments practice balanced governance since it tempers the intensity of any one individual or substance, keeping corruption level very low. You can rehearse similar principles in your business by restricting the intensity of the agent.

* **By commission and bonus structures**

Maybe the least complex technique for dispensing with the agency problem is to expel financial incentives motivating forces that support irreconcilable situations. Coming back to the financial advisor model, the agency problem exists in that situation on the grounds that the advisor's compensation is attached to the particular financial items he offers us.

The items that pay the most elevated commissions aren't generally the best decisions for us, or the customer. Regularly the advisor is compelled to pick between doing directly by his customer and augmenting his check. In the event that the advisor gets a set compensation or gains commission dependent on complete resources under administration instead of explicit item deals, the agency problem vanishes.