

**ZU/WI/7/EXM/6**

**ZETECH UNIVERSITY**

**ACADEMIC YEAR 2015/2016**

**EXAMINATION FOR THE BACHELOR OF BUSINESS MANAGEMENT AND ADMINISTRATION**

**FINA 321: INVESTMENT ANALYSIS AND PORTFOLIO MANAGEMENT**

**DATE: APRIL 2016 TIME: 2 HOURS**

**Instructions: Answer Question 1 and Any Other Two Questions.**

**QUESTION ONE (30MARKS**

1. a. Explain the semi-strong form efficiency. (4 marks)

b. How is the expected return from the portfolio measured? (4marks)

c What is an efficient portfolio (2mks)

d Explain the meaning of capital market line

ii Write short notes on the following as used in portfolio and investment management.

1. Efficient frontier (3mks)
2. The capital market line (3mks)
3. Risk free (3mks)
4. Portfolio (3mks)

Iii Security returns depend on only three risk factors – inflation, industrial production and the aggregate degree of risk aversion. The risk free rule is 8%. The required rate of return on portfolio with unit sensitivity to inflation and zero-sensitivity to other factors is 13%. The required rate of return in a portfolio with unit sensitivity to industrial production and factors is 10% and the required return on a portfolio; 1.2 with the industrial production and -0.7 with risk bearing portfolio: (risk aversion)

Assume also that required rate of return in the market is 15% and stock i has CAPM beta factor of 1.1

**Required**

Compute security is required rate of return using

1. CAPM (4mks)
2. APT (4mks)

**QUESTION TWO**

1. Exp ABC Company Ltd. Is considering investing either at home or overseas. The company evaluated the likely returns and attached probabilities based on economic factor as follows;

Probabilities (p) Home returns % Overseas returns (%)

0.3 25 35

0.4 15 15

0.3 20 20

The company is willing to divide the available funds between the two areas and is looking to achieve an overall return of 20% assuming zero correlation between the returns from each area.

**Required:**

1. What is expected return from home and overseas (4mks)
2. Calculate the variances hence the standard deviations of returns from home and overseas. (8mks)
3. What proportion of the funds should be invested in each area to give an expected return of 20% (8mks)
4. lain the limitation of portfolio theory (6mks)
5. )
6. Explain the factors which determines the risk of a portfolio (8mks)

**QUESTION THREE**

1. Using a diagram and examples explain the unsystematic and systematic risk (8mks)
2. The investment portfolio of. Matata consist of shares in five companies

**Company Amt invested Stock Beta factor**

A 160 0.5

B 120 2

C 80 4

D 80 1

E 60 2

The risk free rate is 8%.The market have the following distribution for the next period

Market return % probability

10 0.1

12 0.2

13 0.4

16 0.2

17 0.1

Required

1. Compute the expected return from market (2mks)
2. Calculate the beta coefficient for the portfolio (4mks)
3. Determine the equation for the security market (6mks)

**QUESTION FOUR**

1. Explain five features of convertible security (10mks
2. Explain any four financial derivatives used in hedging or risk transfer (10mks