MACHAKOS UNIVERSITY

University Examinations for 2019/2020 Academic Year

SCHOOL OF BUSINESS AND ECONOMICS

DEPARTMENT OF ACCOUNTING BANKING AND FINANCE

SECOND YEAR SECOND SEMESTER EXAMINATION FOR

DIPLOMA IN ACCOUNTANCY

DACC 211: FINANCIAL MANAGEMENT II

DATE: 23/10/2020   **TIME: 8:30 – 10:30 AM**

INSTRUCTIONS:

Answer question one and any other two questions.

QUESTION ONE (30 MARKS)

a)   Discuss the three types of Capital Market Efficiency.   (9 marks)

b)   With the help of a diagram explain an Efficient Frontier   (8 marks)

c)   Consider two investments, P and Q each having the following investment characteristics;

Investment	Expected Return (%)	Proportion
P	10	2/3
Q	20	1/3

Required:

Compute the expected return of a portfolio of the two assets.   (8 marks)

d)   With the aid of a diagram, explain their attitudes towards risk.   (5 marks)

QUESTION TWO (20 MARKS)

a)   Discuss five assumptions of the Capital Asset Pricing Model   (10 marks)

b)   Consider two investments X & Y each having the following characteristics:

Investment	Expected Return (%)	Proportion
X	20	1/3
Y	40	2/3

Required:

Compute the portfolio standard deviation if the correlation coefficient between the assets is

i)   1

ii)   0

iii)   -1   (10 marks)

QUESTION THREE (20 MARKS)

Mr Mutunga invested 2/3 of his funds in shares of company M and 1/3 in shares of company N. The following probability distribution relates to the shares of the companies:

Economic state	Probability	Expected Return in Percentage	
		M	N
Boom	0.20	24	5
Steady growth	0.60	12	30
Slump	0.20	0	-5

Calculate the:

a)   Expected return of shares of companies M and N   (6 marks)

b)   Expected portfolio return   (4 marks)

c)   Standard deviation of returns of shares of companies M and N   (4 marks)

d)   Covariance between returns of shares of shares of companies M and N   (3 marks)

e)   Coefficient of correlation between returns on shares of M and N   (3 marks)

QUESTION FOUR (20 MARKS)

a)   Explain the meaning of "time value of money"   (4 marks)

b)   Mrs. Luke deposited kshs. 900,000 in a savings account that pays 12% interest compounded semi-annually. Calculate the amount that shall be in her account at the end of 10 years.   (6 marks)

c)   James intends to raise kshs. 990,000 in three years time. At the beginning of the first year, James deposited kshs. 350,000, and another kshs. 380,000 in the second year in Hekima bank that pays 10% interest on deposits. Calculate the amount that James need to deposit into the account in order to raise the required amount.   (10 marks)

QUESTION FIVE (20 MARKS)

a) Security returns depend on only three risk factors-inflation, industrial production and the aggregate degree of risk aversion. The risk free rate is 8%, the required rate of return on a portfolio with unit sensitivity to inflation and zero-sensitivity to other factors is 13.0%, the required rate of return on a portfolio with unit sensitivity to industrial production and zero sensitivity to inflation and other factors is 10% and the required return on a portfolio with unit sensitivity to the degree of risk aversion and zero sensitivity to other factors is 6%. Security i has betas of 0.9 with the inflation portfolio, 1.2 with the industrial production and-0.7 with risk bearing portfolio—(risk aversion)

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

Required

Compute security i's required rate of return using

   i)   CAPM

   ii) APT   (10 marks)

b) The Arbitrage Pricing Theory (APT) is much more robust than the capital asset pricing model for several reasons. Explain   (10 marks)