Høgskolen i Østfold

EXAMINATION

Course code: SFB13114	Course: Global Markets and Institutions
Date: 8.12.16	**Time:** 4 hours
Permitted sources: Mother tongue – English and English – mother tongue dictionaries Ordinary calculator (not financial calculator)	**Lecturer:** Trond Arne Borgersen

The examination:

The examination papers consist of 3 pages inclusive this page. Please check that the examination papers are complete before you start answering the questions.

Answer all 4 (four) questions.

Date of announcement of the examination results: 6.1.2017

The examination results are available on the Studentweb no later than two workdays after the announcement of the examination results (www.hiof.no/studentweb).

Exam –SFB 13114 Global Markets and Institutions

December 2016

Question 1

Consider a small open economy with flexible exchange rates and perfect capital mobility. Assume that the economy can be characterized by the following relations for the currency market (The FE-curve), the money market (The LM curve) and the real side (The IS-urve) (- where notation is standard)

FE-curve: $i = i_f$

LM-curve: $m^s = \alpha y - \beta i$

IS-curve: $y = \alpha_0(s - p + p_f) - \alpha_1 i + \alpha_2 y + u$

The economy is frequently exposed to global shocks.

Discuss policy measures to prevent global shocks from impacting the domestic economy.

Question 2

The government in Ireland is going to build a new port. To finance the cost of the port the government has to borrow, and it has therefore issued three coupon-bonds named A, B and C.

The characteristics of the three bonds are:

	Face value	Coupon-rate	n (maturity)
A	2000	2	2
B	2000	3	3
C	2000	4	3

The spot rates in Ireland are:

	Year 1	Year 2	Year 3
Spot-rates	1	1	1

a) At what prices are the bonds traded today?

b) Give a verbal explanation of the market prices on A, B and C relative to the face value of the bonds.

Due to higher economic growth the spot rates change to

	Year 1	Year 2	Year 3
Spot-rates	5	5	5

c) At what prices are the bonds now traded?

d) If you are a risk-averse investor worried about interest rate risk, which type of bond(s) would you choose to invest in?

Question 3

Consider the valuation of a stock in the firm Statoil that has an earnings per share (EPS) of 5 dollars this year. The firm has a dividend policy where it pays 30 percent dividend every year, and the rate of equity accumulation is therefore 70 percent. The expected profitability on future investments is 12 percent. The investor's required rate of return is 15 percent. The current market price of the Statoil stock is 24,636 dollars.

a) What is the current price of a stock in Statoil according to the Gordon Growth model? Is the stock correctly priced according to the Gordon model?

b) What price would you forecast for the Statoil stock 1 year from now?

Assume that EPS increase to 8 dollars due to that the economy is entering a boom.

c) How will the higher EPS impact the forecast for the stock price 1 year from now?

The economic boom is also increasing the expected profitability on future investments to 13 percent.

d) How does higher expected profitability impact the forecast for the stock price 1 year from now?

Question 4

Strong house price growth and low mortgage rates characterized the period preceding the financial crisis in most of the western hemisphere.

A) Describe the incentives for increasing LTV-ratios that might develop among households in a situation where house price growth exceeds the mortgage rate.

B) Show how a higher LTV-ratio increases the funding risk of owner-occupied housing.

C) Highlight some of the measures implemented by governments after the financial crisis to prevent financial instability to arise in situations where house price growth exceeds the mortgage rate.