

**Economics and Public Finance**  
ISEG - School of Economics and Management

Exam, 5 July 2018 - **Duration: 2h 30m**

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- 1. The exam has three groups. The points for each question are mentioned alongside.**
- 2. The answers to the questions of each group have to be made in different sheets.**
- 3. Only non-graphical calculators are allowed. It is not allowed the use of mobile phones or computers. Improper use will lead to cancellation of the exam.**
- 4. It is not possible to use any reading material. During the exam no clarifications can be made.**

## I

### Answer the following questions:

#### 1.

- a) Considering the functions of the Government in a mixed economy, as proposed by Musgrave, link each of the following public policies with the respective Musgravian function, and justify briefly: [1.50]
- (i) Active fiscal policy with the objective of ensuring surpluses for the primary budget balance in the next 4 years;
- (ii) More public investment in railway infrastructures to reinforce the connections between the coast line and the interior regions;
- b) Consider the canteen service for the staff of the Ministry of Environment, which is run by a private firm. The staff pays 1.25 EUR per meal, and the cost of each meal is 7.50 EUR. In the context of the concepts of production and provision of a good, how do you characterize this situation? Justify adequately. [1.50]
2. In general, in tax policies with redistribution purposes, the redistribution costs can be associated to a conflict between efficiency and equity. Discuss and provide an example. [2.00]

## II

### 3. Answer the following questions:

- a) From an efficiency perspective, distinguish between a *per capita* tax and a tax on tobacco. Justify. [1.25]
- b) In the context of the Portuguese tax system, identify a tax that fulfil each of the following objectives: i) High financial efficacy; ii) Equity improving; iii) Efficiency improving. [1.00]
- c) Consider a good with relatively elastic demand and supply curves. The government wants to introduce a tax of 6 EUR on producers. The (competitive) market equilibrium before the tax is given by:  $P_0=8$  EUR and  $Q_0=4$  units. With the introduction of the tax, it is expected that the traded quantity will decrease by 50% and the price for the consumers will increase in 2 EUR. Compute the economic incidence for the consumers and for the producers, and the tax revenue. [1.75]

#### 4. Answer the following questions:

- a) *Efficiency* is a desirable characteristic of a tax system. Explain briefly that characteristic. [1.00]
- c) Consider the Public Administrations' account below. Determine the share of current revenues of each subsector in the current spending of the Public Administrations, and comment the results. [1.25]
- c) Consider the Public Administrations' account is reported annually in two versions: with non-consolidated and with consolidated values. Identify two advantages of the first version. [1.25]

#### Revenues and Expenditures of Public Administrations (Public accounts – EUR Millions)

	Central Administration	Regional and Local Administration	Social Security	TOTAL
<b>CURRENT REVENUE</b>	<b>61033.1</b>	<b>7707.0</b>	<b>24023.0</b>	<b>67542.0</b>
Direct taxes	14214.0	3084.1	0.0	17298.1
Indirect taxes	20234.0	887.0	731.8	21852.8
Social security contributions	4764.8	11.3	14111.8	18887.9
Other current revenue	21820.3	3724.7	9179.4	9503.4
(of which: transfers from other sub-sectors)	16321.5	2012.2	6887.3	0.0
<b>CURRENT SPENDING</b>	<b>67532.9</b>	<b>7407.4</b>	<b>23426.9</b>	<b>73146.2</b>
Public consumption	23855.1	6301.4	478.8	30435.2
Subsidies	1339.5	230.9	872.2	2442.6
Interest payments	6315.7	217.1	7.4	6540.2
Current transfers	36222.6	658.0	22068.6	58949.2
(of which: transfers to other sub-sectors)	23732.3	67.6	1421.1	0.0
<b>CAPITAL REVENUE</b>	<b>25877</b>	<b>2303.8</b>	<b>42.4</b>	<b>2981.1</b>
(of which: transfers from other sub-sectors)	446.8	1499.2	6.6	0.0
<b>CAPITAL SPENDING</b>	<b>5679.0</b>	<b>2678.9</b>	<b>103.3</b>	<b>6 508.5</b>
Investment	1193.2	2296.8	36.1	3526.0
Capital transfers	4411.5	292.3	67.2	2818.4
(of which: transfers to other sub-sectors)	1943.9	8.8	0.0	0.0
Other capital spending	74.3	89.8	0.0	164.1

### III

- 5.
- a) Identify and explain briefly the two requisites for the preparation of the State Budget. [1.50]
- b) Considering the budget cycle, mention the stages in which intervene the Government and the Parliament. [1.50]

6. The following table presents data from the Stability Program para a given country, for the period 2018-2021

Public Administrations	2018	2019	2020	2021
Total primary spending (% of GDP), $g$	42.1	41.2	40.3	39.2
Total revenue (% of GDP), $\rho$	41.1	41.7	42.3	40.6
Cyclically adjusted primary budget balance (% of GDP)	-1.0	1.5	3.0	2.5
Government debt (% of GDP), $b$	105.3			
Real interest rate (%), $r$	2.0	1.0	1.0	1.0
Real GDP growth rate (%), $y$	2.0	2.5	2.5	3.0

a) Characterize the fiscal policy proposed in the Program regarding its cyclicity and its expansionist/contractionist nature. [1.50]

b) On the basis of the government budget constraint,  $b_t = [(1 + r_t)/(1 + y_t)]b_{t-1} + g_t - \rho_t$  compute the missing values in the previous table. [1.50]

c) Explain succinctly what is the Excessive Deficit Procedure in the context of the Stability and Froth Pact. [1.50]

**Draft sheet**