Leaving Certificate Economics Worksheet

Taxation & The Budgetary Framework (Chapter 12)

Name		Date	

Instructions:

– Answer all questions in **Section A** and **Section C**.

– In **Section B**, answer **3** questions.

– In **Section D**, answer **1** question.

– Show all workings in calculations and use correct terms: **VAT, excise duty, PAYE, USC, PRSI, DIRT, progressive/regressive, incidence, fiscal policy, deficit/surplus, fiscal drag, crowding out, national debt, EU rules**.

– Questions are written in an **exam style**: define precisely, use diagrams correctly, and justify claims with economic reasoning.

Section A – Short questions

Answer briefly. (15 × 2 marks)

A1. Define **Value Added Tax (VAT)**.

A2. State **one** economic reason why the government might **lower** VAT during a downturn.

A3. Define **excise duty** and name **two** goods commonly taxed by excise.

A4. Distinguish between a **direct tax** and an **indirect tax**.

A5. Define a **progressive tax**.

A6. Define a **regressive tax**.

A7. What is meant by the **incidence of taxation**?

A8. State **two** of Adam Smith's **canons of taxation**.

A9. Distinguish between **tax avoidance** and **tax evasion**.

A10. Define **PAYE**.

A11. Define **USC**.

A12. Define **PRSI** and state its **purpose**.

A13. Define **DIRT** and state the **current rate** in the notes.

A14. Define a **budget deficit** and a **budget surplus**.

A15. What is meant by **fiscal drag**?

Section B – Calculations & interpretation (Answer 3 of 5)

Each question: 12 marks (Workings + final answer + brief interpretation where asked.)

B1. VAT calculations and policy interpretation

The VAT rates shown in the notes include a temporary fall in the standard rate:

Date effective	Standard	Reduced	2nd reduced	Livestock
1 Jan 2025	23%	13.5%	9%	4.8%
1 Sept 2020	21%	13.5%	9%	4.8%

A consumer buys a household appliance with a **pre-VAT price** of €820.

(i) Calculate the **VAT paid** and the **final price** at the **2025 standard rate**.

(ii) Calculate the VAT paid and final price if the standard rate is **21%**.

(iii) Explain, using **aggregate demand**, why a government might reduce VAT during a recession.

B2. Income tax: PAYE and USC (2025)

PAYE bands (2025): First €44,000 @ 20%, balance @ 40%.
USC bands: First €12,012 @ 0.5%; €12,013–€15,370 @ 2%; €15,371–€42,662 @ 3%; above €42,662 @ 8%.

(i) A worker earns €72,000 in 2025. Calculate **PAYE**.

(ii) Calculate **USC**.

(iii) Calculate the **average tax rate** based on PAYE+USC only.

B3. DIRT and incentives to save

The notes state that DIRT is charged on interest earned and the rate is 33%.

(i) A person has €2,500 in a savings account earning 0.5% annually. Calculate the **annual interest**.

(ii) Calculate the **DIRT paid** on that interest.

(iii) Explain how **higher DIRT** could affect consumption and economic growth.

B4. Carbon tax path and trend reasoning

The notes state:

- Carbon tax introduced in Budget 2010 at €15 per tonne of CO_2.
- It rose to €20 the following year.
- The 2024 rate is €56 per tonne of CO_2.
- Planned increases aim for €100 by 2030.

(i) Calculate the **increase** in the carbon tax rate between 2010 and 2024.

(ii) Calculate the **remaining increase** needed from 2024 to reach €100 by 2030.

(iii) Explain **two** reasons why a carbon tax may be criticised as **regressive**.

B5. Budget balance and policy trade-offs

A simplified budget (hypothetical) shows:

$$\text{Revenue} = €98\text{bn}, \qquad \text{Expenditure} = €104\text{bn}.$$

(i) Calculate the **budget balance** (surplus/deficit) and its size.

(ii) State one method of reducing the deficit via **revenue** and one via **spending**.

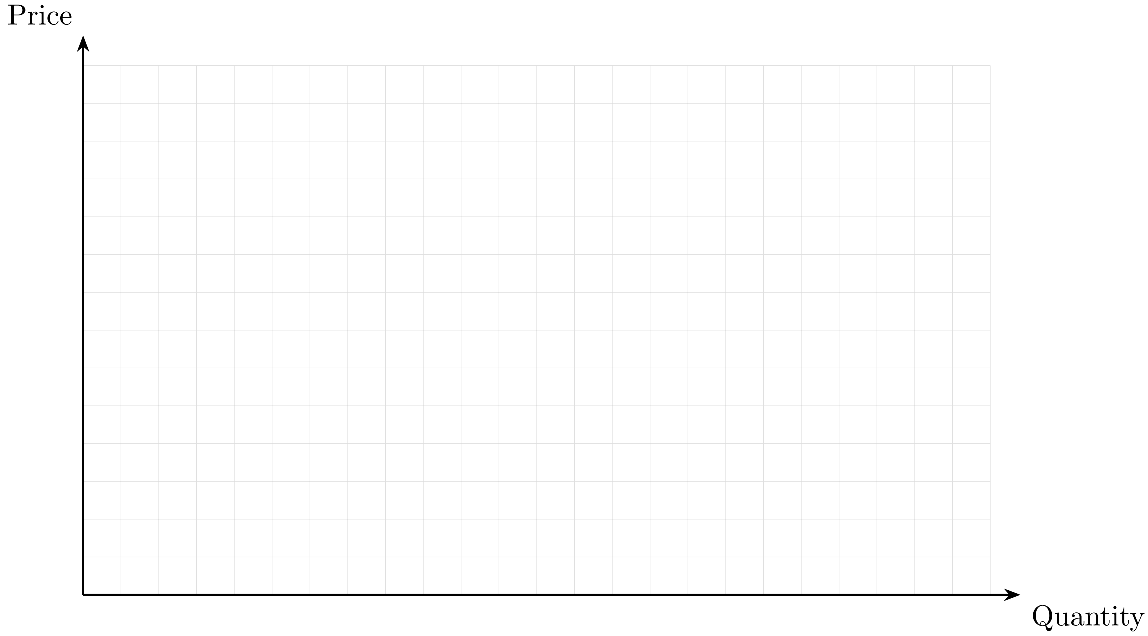
(iii) For **one** method chosen above, explain **two** likely economic side-effects.

Section C – Data & visual interpretation

C1. Tax incidence, PED/PES and excise duties

The notes emphasise that **who actually pays the tax** depends on **PED** and **PES** (incidence of taxation).

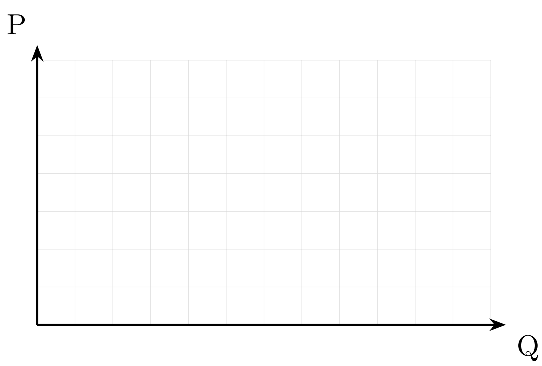
C1.1 Using a demand and supply diagram, show an **excise tax** that creates a wedge between: **(i)** the price paid by consumers and **(ii)** the price received by producers. Label the wedge clearly.

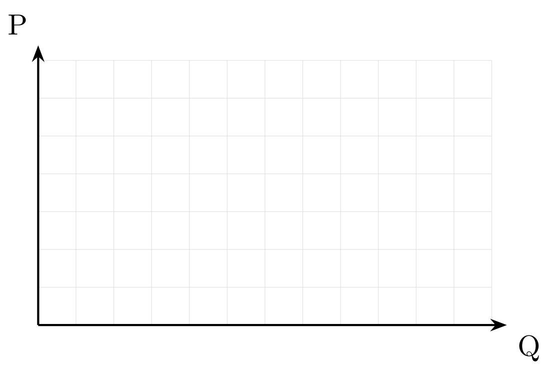


C1.2 Draw **two** small diagrams to show how incidence changes when:

- demand is **inelastic** (short-run petrol),
- demand is **elastic** (luxury good).

In each case, state **who bears most of the burden** and why.

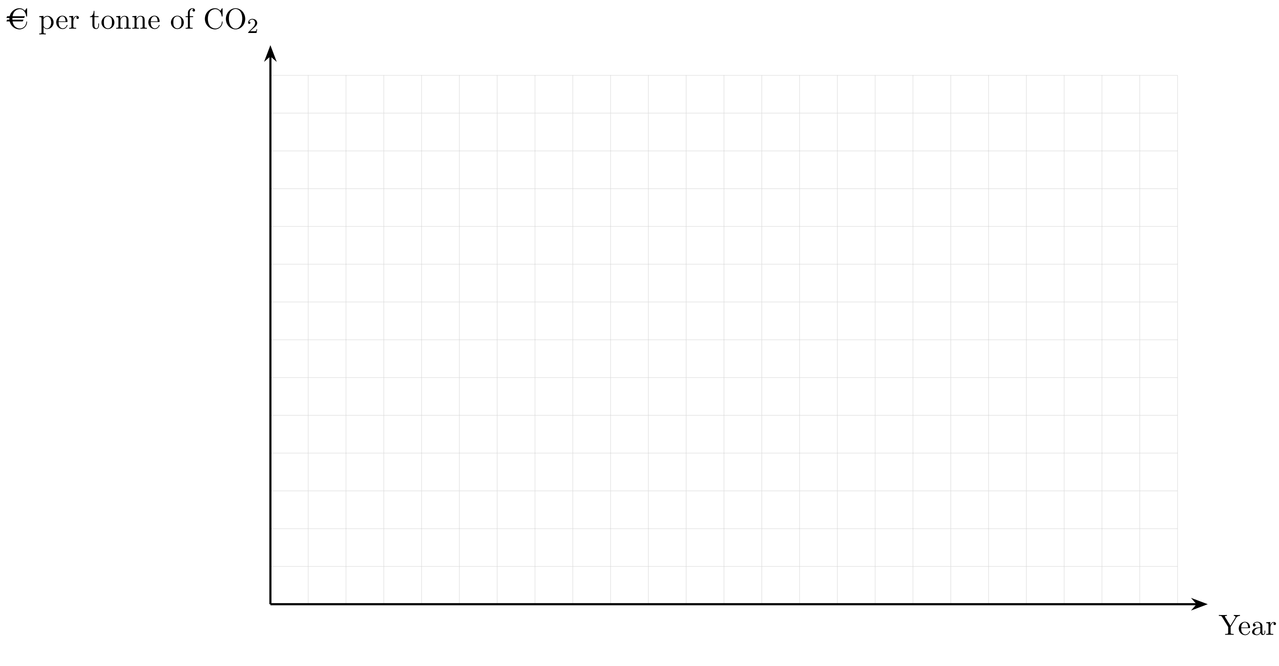




C2. Carbon tax and everyday life decisions

Use the carbon tax data points from the notes: 2010 (€15), 2011 (€20), 2024 (€56), 2030 (€100).

C2.1 Plot a **line graph** of carbon tax (€ per tonne of CO_2) against time using the 4 points above. Label axes and points clearly.



C2.2 Explain how a rising carbon tax could change **two** household decisions (e.g. heating, commuting, car choice, insulation).

C3. Revenue buoyancy and fiscal drag (stimulus table)

Stimulus: A government plans the following for the year, but actual outcomes differ.

	Planned	**Actual**
Revenue (€bn)	96	101
Expenditure (€bn)	100	99

C3.1 Calculate the **planned** budget balance and the **actual** budget balance.

C3.2 Using your results, explain what is meant by **revenue buoyancy**.

C3.3 Explain why **fiscal drag** is described as **deflationary**.

C4. National debt, EU rules and credibility

The notes state: EU rules include **deficit $\leq$ 3% of GDP** and **debt $\leq$ 60% of GDP**. One example given is Ireland's debt/GDP at **108.2% in 2011**.

C4.1 By how many **percentage points** did 108.2% exceed the 60% benchmark?

C4.2 Explain **two** economic risks of a high national debt (use terms like **debt servicing** and **crowding out**).

C4.3 Explain how persistent deficits could damage a country's **international reputation** and raise borrowing costs.

Section D – Evaluation & discussion

HL style: balanced argument, correct definitions, relevant Irish context, clear judgement.

D1. You are Economic Advisor to the Minister for Finance.
Outline the economic arguments **in favour of lowering income tax rates**. In your answer:

- explain how lower income tax affects **disposable income** and **aggregate demand**,
- discuss possible effects on **employment** and **competitiveness**,
- include **one counterargument** (e.g. inflation, imports, equity, revenue loss),
- finish with a clear judgement.

D2. "A government should run a deficit whenever growth is weak."
Discuss this statement. In your answer:

- define **budget deficit** and explain how it can raise **aggregate demand**,
- outline **two positive effects** (growth/employment/services/redistribution),
- outline **two negative effects** (inflation/borrowing/crowding out/imports/unsustainability),
- refer to **EU fiscal rules** and credibility.
