

Session 3: Estimating Revenue Foregone Under The Corporate Income Tax

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Introduction

- Estimations and Uncertainty
- Focus on modelling / estimating revenue foregone under the **Corporate Income Tax**
 - Zoom in on two important issues (faced in Ugandan context but relevant elsewhere!):
 1. A firm's profitability
 2. Timing effects

Introduction

- Important to remember that revenue foregone is an **estimate**.
- Many of the calculations bring together data from different parts of government etc., and at times we must rely on assumptions
 - This is the case wherever TE reporting is carried out
- For some, the requisite data does not exist, or it is not captured in an appropriate manner.
- Or modelling might suffer from some limitations
 - Again, this is commonplace.

But can be communicated to readers:

Estimations under uncertainty

- From United Kingdom Tax Reliefs report:

Uncertainty	Data and modelling approach
Low	High quality, targeted and comprehensive data from administrative or external sources. Assumptions have strong underlying rationale and can be verified using good quality independent data.
Medium	Basic data, incomplete in a few instances, which may be from external sources. Some assumptions are used and can be verified only to a limited extent.
High	Very little, incomplete or poor quality data. Largely assumption-based and difficult to verify.

Estimating TE under the Income Tax

- Often area where most interest lies – e.g., CIT holidays.
- Calculation methods differ from provision to provision
 - No one-size-fits-all model for calculating revenue foregone
 - But some basic principles are useful and can be applied in most cases

Revenue foregone under the Corporate Income Tax (CIT)

Utilizing data from CIT administrative returns; broadly:

- Step 1: Estimate the size of the base on which to estimate revenue foregone **[difficult]**
- Step 2: Multiply by Statutory CIT rate **[easy]**

Income Tax: CIT Holiday

E.g. (i) a tax holiday:

- Assume TaxDev Industries received a CIT holiday to set up manufacturing plant
- Data required: CIT returns

- For example, CIT return shows that **Chargeable income in FY21/22 was \$100m.**
 - Revenue foregone in FY21/22 = \$30m. [$\$100\text{m} * 30\% \text{ CIT rate}$]

CIT: Initial Capital Allowances

- Consider that a firm receives a 50% initial capital deduction on any investment into plant and machinery
 - (E.g. Section 27A Uganda Income Tax Act)
 - Assume no other deductions / depreciation allowances available for that investment in the year it is placed into service
- There's a few ways of thinking about estimating revenue foregone here, increasing in complexity.
- Focus here on issues of **(i) timing** and **(ii) firm's profitability over time**.
- Let's assume the firm makes an investment of \$200m in FY18/19.
 - 50% of \$200m is \$100m.

Initial allowance calculations: Loss-making firms

- If TaxDev Industries were in a tax loss position (including the deduction) of (e.g.) -\$200 million, then the removal of the deduction would bring the firm's tax liability to -\$100 million. There would be no revenue foregone in FY18/19 (since there is still no taxable income).
- If TaxDev Industries were in a tax loss position (including the deduction) of (e.g.) -\$50 million, then the removal of the deduction would bring the firm's tax liability to +\$50 million. The revenue foregone would be \$15 million ($\$50 \text{ million} * 30\%$) in FY18/19.
- If TaxDev Industries were in a positive taxable income position of (e.g.) +\$50 million, then the removal of the deduction would bring the firm's tax liability to +\$150 million. The revenue foregone would be the difference between ($\$150 \text{ million} * 30\%$) and ($\$50 \text{ million} * 30\%$), = \$30 million in FY18/19.

Timing issues and loss carried forward

- The ability to carry forward losses is a fairly standard feature of income tax systems and not (normally) considered as a TE.
- But when calculating the revenue foregone from *other* provisions (deductions) under the income tax, then an understanding of a firms' loss position is crucial.
- Consider a simple four-period set-up:
 - TaxDev Industries invests \$200m into new machinery in the year FY18/19 and receives a 50% deduction on the cost, \$UShs.100m.
 - For this, and each of the subsequent years, it makes a positive taxable profit of +\$25m but makes no further investments in plant and machinery.

Timing issues and loss carried forward

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[1] Financial Year	[2] Loss from previous year	[3] Plant and Machinery Deduction	[4] Taxable profit	[5] Taxable profit after deduction	[6] CIT paid	[7] Taxable income if no capital deduction in FY18/19	[8] Revenue Foregone (30% of Taxable Y)	[9] Loss carried forward
FY18/19		-100m	+25m	-75m	0	+25m	7.5m	-75m
FY19/20								
FY20/21								
FY21/22								

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FY20/21								
FY21/22								

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FY20/21	-50m	0	+25m	-25m	0	+25m	7.5m	-25m
FY21/22	-25m	0	+25m	0	0	+25m	7.5m	/

Timing issues and loss carried forward

- In this hypothetical scenario, revenue foregone from a deduction taken in FY18/19 is spread across four financial years.
- The net amount is still \$30m, **but only \$7.5m in each year.**
- Thus, both issues of a firm's profitability and loss-making position can affect how much – and when – revenue foregone is reported.
- It might not be possible to fully incorporate!
 - In Uganda, for example, modelling doesn't currently fully account for timing, but will in future iterations of TE report.



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