

Item 5: Statistical Units in the National Accounts

Measurement challenge posed by MNEs - Profiling in the UK

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Conference of European Statisticians
Group of Experts on National Accounts**

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Measurement challenge posed by MNEs – Profiling in the UK

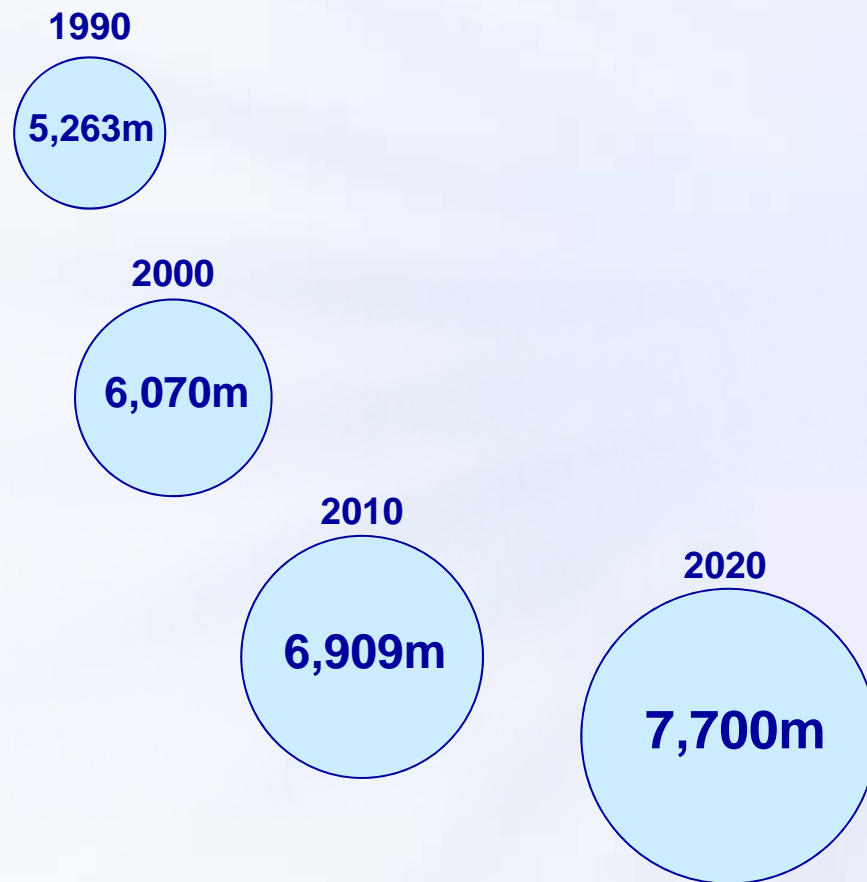
An overview

- How quickly is the world changing?
- Importance of the statistical unit
- Profiling - international and national
- Profiling techniques
- European profiling- recent few years
- UK profiling process
 - Sequence of steps
 - Iterative nature and regular review
 - Impact of profiling
 - Better understanding of MNEs - their structures and flows
- Experience to date - is profiling worthwhile?
- Way forward with MNEs
- Any questions?

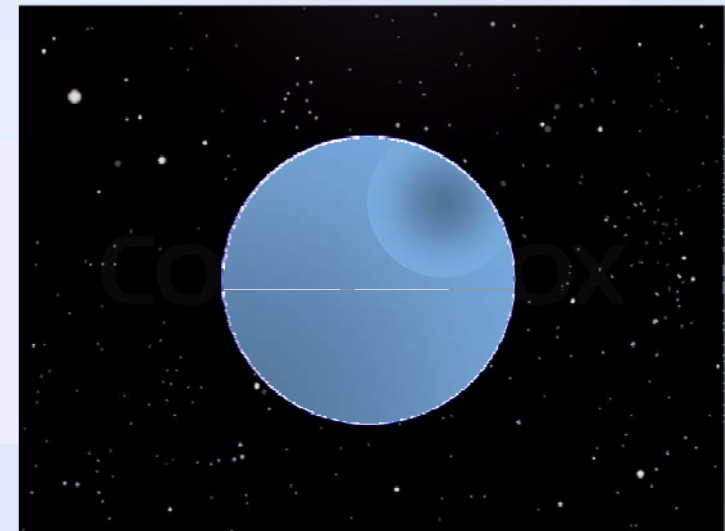
Measurement challenge posed by MNEs – Profiling in the UK

How quickly is the world changing?

World population



Demographic and social change



Measurement challenge posed by MNEs – Profiling in the UK

How quickly is the world changing?

Process of globalisation continues at pace traditional boundaries are becoming unclear



Globalisation and the impact of MNEs pose the single largest 'measurement' challenge to National Accounts and Balance of Payments

Measurement challenge posed by MNEs – Profiling in the UK

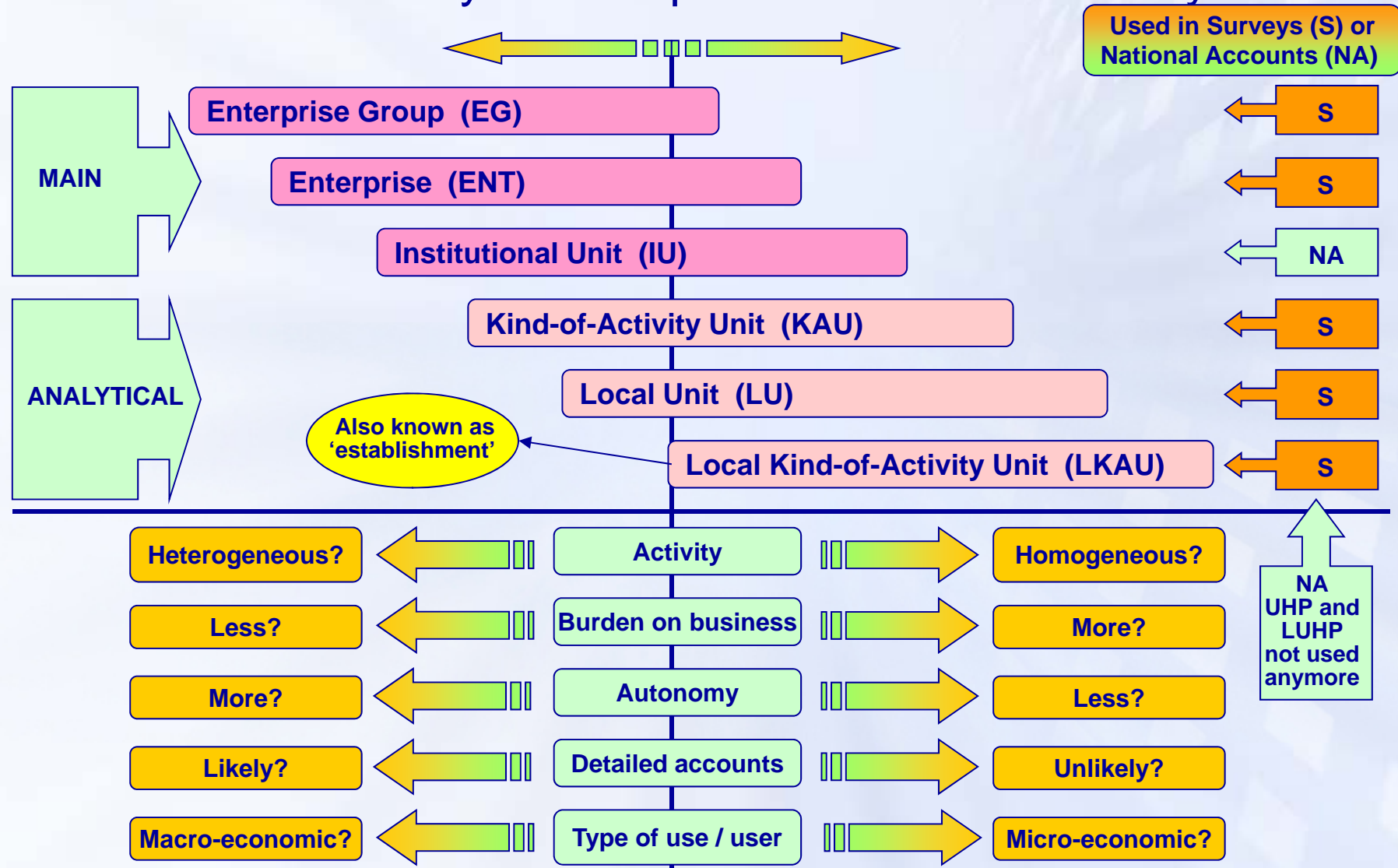
Importance of the statistical unit

Choice of the statistical unit is key

- Choice and the structure of the statistical unit will be key to various aspects of the business register population and sample frame:
 - Classification by type of activity, e.g. use of NACE rules.
 - Classification by region, e.g. use of NUTS rules.
 - Classification by employment size bands.
 - Completeness (exhaustiveness) and coverage.
 - Allocation by type of legal status, preferably by type of institutional sector or a clear link to the institutional sector.
 - Consistency over time.
- Business data collected will depend on the choice of the statistical unit:
 - Type of activity about which data are being sought.
 - Burden on business.
 - Autonomy of the business.
 - Type of use of data.
 - User needs.
 - Ultimately, the availability of the data and can it be collected.

Range of units – Characteristics of the Main Units and Analytical Units

Statistical Unit is key to all aspects of the statistical system



Measurement challenge posed by MNEs – Profiling in the UK

Profiling - international and national

What is profiling?

“Profiling is a method of analysing the legal, operational and accounting structure of an enterprise group at national and world level, in order to establish the statistical units within that group, their links, and the most efficient structures for the collection of statistical data.”

Business Registers Recommendation Manual 2010, annex 3.1, paragraph 19.9

International profiling

- International groups
 - MNEs of all sizes, all businesses on the Euro-Groups Register.
 - In the UK - done on a case by case basis, over 25+ done.

National profiling

- National groups
 - Small and large complex groups.
 - In the UK - undertaken on a regular on-going basis.



Measurement challenge posed by MNEs – Profiling in the UK

Profiling techniques

Distinction in terms of their intensities

- Manual "intensive" profiling
 - Covers the activity of sending staff to the headquarters of a large business (group) to discuss the delineation of statistical, reporting and observation units on the basis of the operating structure of the business.
- “Manual “light” (or “desk”) profiling
 - No visit is carried out to the business and just public information (annual reports, business’ website, etc.) plus survey information is used.
- Automatic profiling
 - Procedures run by nationally defined automated rules by making use of data from national business registers and EGR on enterprise groups that operate on administrative units or legal units in order to delineate enterprise groups.
- Best practice for delineating enterprises in enterprise groups for large and complex MNEs is of course the intensive profiling.



Measurement challenge posed by MNEs – Profiling in the UK

European profiling – recent few years

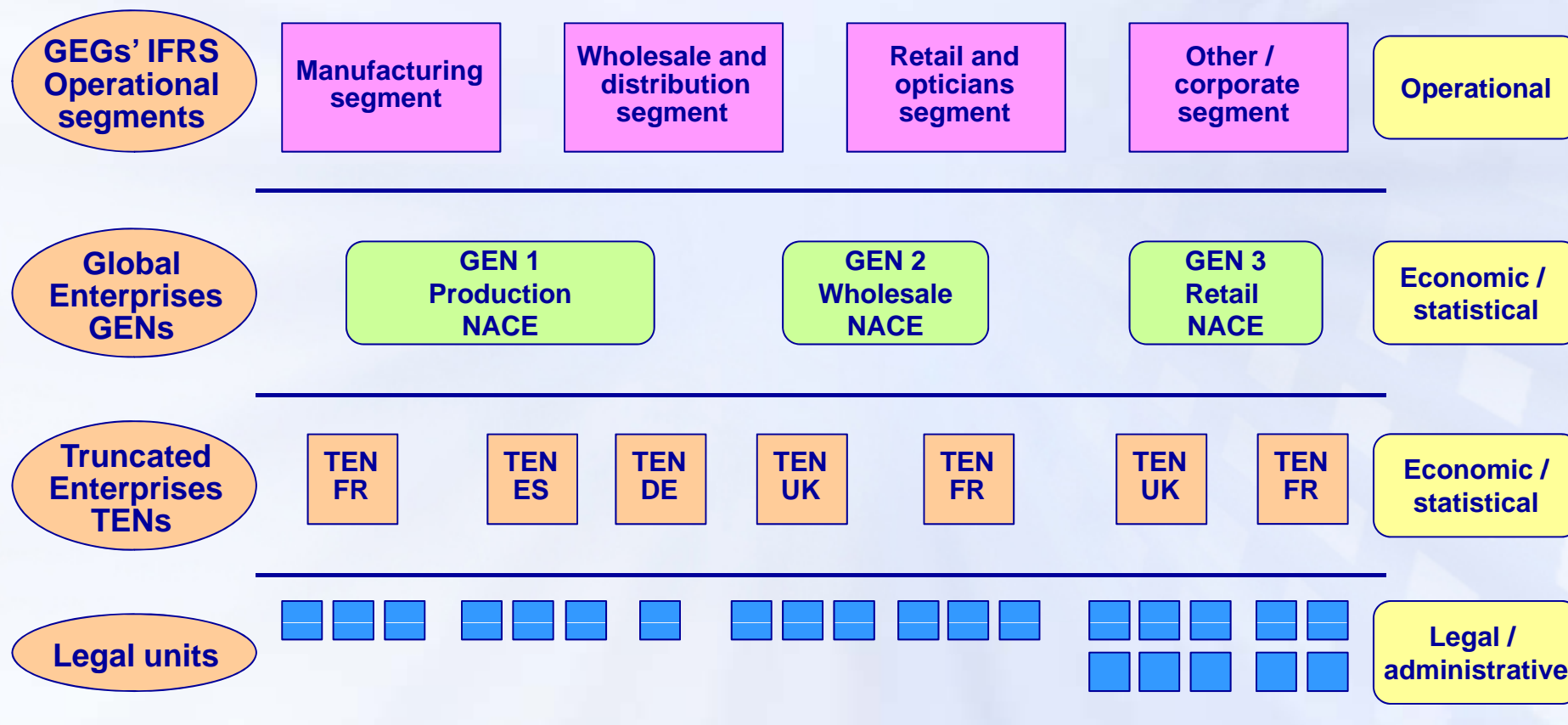


- European profiling is not an isolated activity of one NSO.
- Country of residence of Ultimate Controlling Institution (UCI) of the Global Enterprise Group (GEG) - assuming within the EU - is responsible for the first profiling proposal.
- New “Top-Down” approach to Profiling developed and tested through ESSnet on Profiling – can have a significant impact on classification.
- Top-down profiling sub-divides activities at GEG level resulting in the delineation of Global Enterprises called GENs.
- All Legal Units controlled by the group in the countries in which it operates checked to ensure are included in the group’s perimeter on Euro-Groups Register (EGR).
- Once all the countries are identified where there is activity, national parts of GENs are created to form Truncated Enterprises called TENs.
- Progress has been good but way forward is unclear.

Measurement challenge posed by MNEs – Profiling in the UK

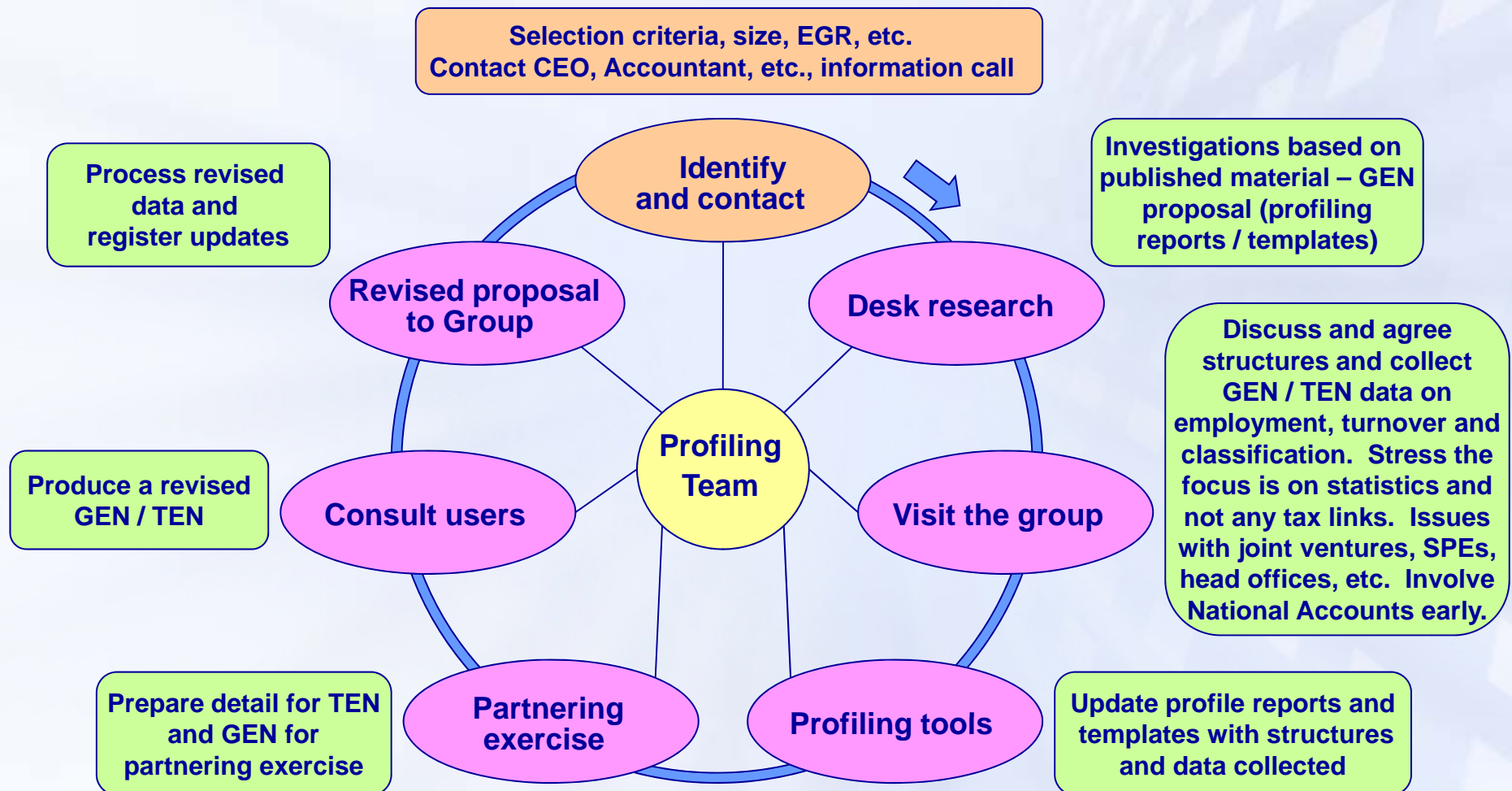
European approach to GEN / TEN delineation of a GEG

Real example of a UK pharmaceutical GEG



Measurement challenge posed by MNEs – Profiling in the UK

UK Profiling process - Sequence of steps



Measurement challenge posed by MNEs – Profiling in the UK

UK Profiling process - Iterative nature and regular review

Initial GEN proposal based on annual accounts (3 GEGs) (with NACE codes)		Existing structure on the Business Register for UK surveys (> £1m turnover)		Revised GEN structure and partnering exercise		Revised GEN proposal minimising impact on result / users	
Exploration and production	0610	Exploration	0610	Exploration and production (upstream)	0610	Exploration and production (upstream)	0610
Refining and marketing	4730	Lubricants	1920	Refining (downstream)	1920	Refining (downstream)	1920
Other business and corporate	7010 7110	Chemicals	2014			Chemical production (downstream)	2014
		Hydro energy	3511	Marketing (downstream)	4730	Retail (downstream)	4730
		International	4671			Wholesale (downstream)	4671
		Oil	4730	Other business and corporate	7010 7110	Other business and corporate	7010 7110
		Shipping	5020				



Measurement challenge posed by MNEs – Profiling in the UK

Impact of profiling a major international oil company

- Improvement in quality.
- Reconciliation of Top-Down and Bottom-Up approaches.
- Agreement on data provision and reduction in burden for respondent.
- Revised structure of the TEN on the Business Register.
- Revised industrial classification of units of the TEN.
- Reconciled and revised dataset representing the TEN.
 - 2,000 employment added.
 - £42bn turnover added.
 - £2.3bn of double-counting eliminated.
- Resource intensive and several iterations before finalising.
- All of the above affected business surveys, National Accounts and beyond.



Measurement challenge posed by MNEs – Profiling in the UK

Better understanding of MNEs - Structures and flows (1)

Major oil company - changes over time (occurred within four years)

- Old company structure
 - Extracted crude oil (some exported) and refined by the company within the UK
 - Refined petroleum distributed and sold across the UK and exported.
 - GFCF on ships.
- New company structure
 - Extracts crude oil and sends mostly outside the UK for refining.
 - Sells refined petroleum in the UK but undertakes no refining in the UK.
 - Processing fees paid to UK business (off-shoot of the old company) – change in economic ownership
 - Processing fees paid to the company's Netherlands unit – no change in economic ownership.
 - Ships are now registered in Asia.
- Significant impact on UK activity covering the oil and gas process chain:
 - Intermediate consumption, GVA and output.
 - GFCF, changes in inventories, imports and exports.
 - Taxes on products – VAT and excise duties.

Measurement challenge posed by MNEs – Profiling in the UK

Better understanding of MNEs - Structures and flows (2)

Amazon changes over time (occurred within five years)

- Amazon old:
 - Amazon was an online retailer in the UK.
- Amazon restructured to:
 - Head office, call centre (after sales service) and warehousing activity.
 - UK head office received a fee to cover costs from Amazon (Luxembourg).
 - Purchases on web-site paid to Amazon (Luxembourg).
 - Goods delivered from UK warehouse supplied by UK producers or imports.
 - Amazon is not a retailer in the UK.
 - Using Top-Down or Bottom-Up classification approaches.
- Amazon changing:
 - Same as above **plus:**
 - Will set up a new Amazon unit in the UK to record UK sales for tax purposes.
 - Will Amazon be recorded as a retailer in the UK? (to be determined)
 - Same arrangements will be applied to Germany, Spain and Italy.
- Range of impacts across the National Accounts and Balance of Payments.

Measurement challenge posed by MNEs – Profiling in the UK

Experience to date - is profiling worthwhile?



Benefits

- Improved quality of recording structures of businesses.
- Better understanding of businesses' activity and changes to businesses.
- Reconciliation of Top-Down and Bottom-Up approaches.
- Avoid missing activity and remove any double-counting.
- Improved data feeding into National Accounts and Balance of Payments.
- Central contact point and reduction in burden on MNEs.

Challenges

- International profiling can be time consuming and resource intensive on NSIs.
 - 600 cases at EU level, of which UK has a large proportion.
- Staff are needed with wide-ranging skill sets:
 - Company accounts, registers, legal units, statistical units, etc.
- Cooperation from respondents – agreement may not be achieved.
 - No legal obligation beyond national levels or the UCI is outside EU.
- **Micro data sharing is “essential”** for reconciliation and reducing respondent burden on MNEs amongst NSOs / NCBs across the world.

Measurement challenge posed by MNEs – Profiling in the UK

Way forward with MNEs

Two key aims for “large” entities

- **Speak to businesses and “understand” what they are doing!**
 - They are continually changing / restructuring rapidly.
 - Profiling of business structures (plus regular review)
 - Map out ownership, flow of monies, goods and services with the business.
- **Sharing of businesses’ data across countries is essential**
 - Need to develop data sharing (is key) and reconciliation processes across countries’ NSOs / NCBs covering MNEs.
 - International profiling of MNEs.



Three thoughts to take away

- Investment in profiling businesses (internationally and nationally) is essential for correctly recording large and small complex businesses including MNEs and keeping up to date.
- Are MNEs a ‘measurement challenge’? (yes)
- Are MNEs a ‘conceptual challenge’? (no)

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Any questions?

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