

# **Core ICT Business Indicators**

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#### **Presentation outline**

- >Availability of ICT business data
- Core ICT business indicators
- Indicators and definitions
- >UNCTAD e-business data collection Results

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Observations

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#### International business data collection

- > OECD: ICT business data for OECD member countries
- Eurostat: ICT business data for EU
- > UNCTAD: ICT business data for developing countries

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 Others (WB, UIS, other regional bodies, private providers)

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#### ICT business indicators – stocktaking recap

- Overall, ICT business data is limited in most developing countries. However, 50 countries (59 per cert of respondents) did collect some type of ICT business indicator.
- High percentages of countries across all regions collect "basic access to ICT" indicators.
- The information is collected frequently through manufacturing and services establishment surveys, which most NSOs already have in place.
- All regions, except for Western Asia, collect one or more of the second group of indicators on "advanced ICT access and usage", usually through specific ICT business surveys.
- Few countries collected the indicators on "Internet activities and ecommerce" across all regions, also through specific ICT business surveys.

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#### · Notes to Previous slide:

Since the stocktaking, and as result of our direct contact with some NSOs in order to request the actual data, it appears that the number might be lower. For example, we recently had one African country that reported collection of several ICT in business indicators, but it turns out that they had rather sent us a wish list, and not what they actually collected already.

Through the stocktaking, it was unclear to what extent the collection of certain ICT business indicators is related to the level of demand in countries, and to hat extent it is related to the level of resources available to NSOs. The type of data collected officially by countries may also respond to the real or perceived usefulness of such data to policy makers. For example, countries with explicit ICT-related development policies or with active ICT sectors would need more specific indicators for policy evaluation or benchmarking.

In addition, the stocktaking did not provide much information on the

comparability of ICT business indicators. This issue would show up in our two business surveys, which I will mention later on.

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However, specific ICT business surveys tend not to be carried out on a regular basis. The amount of ICT-related data that can be collected through manufacturing surveys is limited, since they are not explicitly aimed at investigating ICT use in enterprises.

#### ESCWA: Most recent date of ICT collection (business)

Country	Type of statistical operation(1)	Number of collected ICT variables	Most recent collection
Egypt	Number of Establishments	6	1996-1986
	Personal Computers Statistics	4	2000
Oman	Census	3	December 2003
Palestine	Series of economical census	2	2001-2004 (Annual)
	Administrative records	8	2000-2004 (Annual)
Qatar	Number of Establishments	2	2004, 1997, 1986
Syria	Industrial Query	n.a.	1999-2003 (annual)



- Notes to previous slide:
- It did appear to us that there is still much to be done in raising awareness at the policy level about the need for and relevance of more ICT statistical data in order to strengthen their collection, and more specifically, ICT in the business sector as part of the Information Society.

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#### ICT business indicators

#### **Basic core**

- B-1 Proportion of businesses using computers
- B-2 Proportion of employees using computers
- A computer includes a personal computer, laptop, personal digital assistant/handheld, minicomputer, and mainframe. All employed persons and actual computer use, rather than simply computer access.
- B-3 Proportion of businesses using the Internet B-4 Proportion of employees using the Internet
- Internet refers to Internet Protocol (IP) based networks, WWW, extranet over the Internet, EDI over the Internet, Internet accessed by mobile phones, Internet email.
- B-5 Proportion of businesses with a website Web presence includes your own Website/homepage as well as presence on a third party's site (including a related entity) where your business has substantial control over the content of the site/page

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#### **ICT** business indicators

#### Basic core

### B-6 Proportion of businesses with an intranet

- A network using the same protocol as the Internet and allowing communication within an organization. It is typically set up behind a firewall to control access
- B-7 Proportion of businesses receiving orders over the
- Internet

Includes orders received via Website, specialized Internet marketplaces, extranets, EDI over the Internet, Internet-enable mobile phones, email, Orders received on behalf of other organizations and orders received by other organizations on behalf of your organization, Orders placed via the Internet Whether or not payment was made on-line. Excludes orders which were cancelled or not completed.

#### B-8 Proportion of businesses placing orders over the Internet

Includes orders placed via Websites, specialized Internet marketplaces, extranets, EDI over the Internet, Internet-enabled mobile phones, email, Orders placed via the Internet whether or not payment was made on-line. Excludes orders which were cancelled or not completed.

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#### ICT business indicators (cont.)

#### Extended core

B-9 Proportion of businesses accessing the Internet by modes of access

Broadband refers to fixed network broadband access technologies and wireless broadband services, including Digital Subscriber Line (DSL), Cable Modem services, Satellite broadband Internet, Fibre-to-the-home Internet access, Ethernet LANs, fixed wireless subscribers, public wireless LANs, WIMAX, Fixed wireless access (FWA) and some forms of 3G cellular network but excludes 3G subscribers.

## B-10 Proportion of businesses with a Local Area Network (LAN)

Local area network is a network connecting computers within a localized area such as a single building, department or site; may be wireless.

#### B-11 Proportion of businesses with an extranet

A private, secure extension of the intranet running on Internet protocol that allows external users to access some parts of an organization's intrane

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#### ICT business indicators (cont.)

#### Extended core

B-12 Proportion of businesses using the Internet by type of activity

- Internet e-mail (Electronic transmission of messages, including text and attachments, from one computer to another by the Internet, excludes use of web based email applications) Getting information
- · About goods or services
  - From government organisations/public authorities via websites or e-mail
  - · Other information searches or research activities

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- Performing Internet banking or accessing other financial services
   Dealing with government organisations/public authorities (includes downloading/requesting forms, completing/lodging forms on-line, making on-line payments or purchasing from, selling to, government organizations)
   Providing customer services (includes providing on-line or emailed product catalogues or price lists, product specification or configuration on-line, after sales support, order tracking online, etc.)

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Delivering products online (Includes products delivered over the Internet in digitized form such as music, videos, computer games, software, and on-line services including information, booking and financial services)

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#### ICT business indicators (cont.)

- Economy-wide, disaggregated by size, urban/rural, industrial classification
- Employees can be disaggregated by gender
- Industrial Classification:
  - Manufacturing (ISIC D)
  - Construction (ISIC F)
  - Wholesale and retail trade (including repair of motor vehicles, motorcycles and personal
  - and household goods) (ISIC G)
  - Hotels and restaurants (ISIC H)
  - Transport, storage and communications (ISIC I)
  - Real estate, renting and business services (ISIC K).
  - Size (number of employees): 0, 1-4, 5-9, 10-49, 50-249, 250 or more

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#### **UNCTAD e-business survey**

> Annual survey with developing country NSOs

2004: 23 countries 2005: 39 countries

- > Indicators on ICT access and use in enterprises
- > Core list of ICT business indicators
- Results are published in annual UNCTAD Information Economy Report (previous E-Commerce and Development Report)

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Note: Not model questionnaire

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#### UNCTAD e-business survey

2004		23	23 countries			20 replies		10 comparable results			
Indicator	Arge	ntina	Chile	Colombia	Morocco	Peru	Philippines	Romania	Russian Federation	Singapore	Thailand
Businesses with PC	s .		62.7	76.6		80.0	87.8	16.1	81.1	83.3	67.7
Employees using PC	às -		-	19.7				11.6	27.5	-	
Businesses with an intranet	35	.6	-	14.4	7.0	25.4	22.0	-	41.6	32.1	
Businesses with an extranet	11	.0	-	9.7		19.8	7.5	-	7.2	15.6	
Businesses with Internet access	86	.9	46.9	53.7	42.0	64.2	62.4	7.5	37.7	78.3	38.3
Employees using the Internet	• .		10.3	9.0	-	25.4	-	5.9	6.4	-	
Businesses with a website	56	.5	12.6	25.7	11.0	22.6	-	2.0	11.6	-	14.3
Businesses receivin orders over the Inter (Internet sales)		.6	-	6.5	-		1.9	0.5	9.0	-	9.9
Businesses placing orders over the Inter (Internet purchases)			-		8.0		2.5	0.4	10.1	-	

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#### · Notes to previous slide:

- We are still receiving the 2005 questionnaires. The draft should be able over the Summer and the IER with the information should be launched at WSIS Tunis.
- Tunis. I tried to present the information we already have in a table, so as to give you an idea of data in individual countries. Unfortunately, when I left Geneva we still had not put it together in a pretty or reader-friendly way. Of the 16 replies, only 14 contained straight forward data, the other two require clarifications, since they did not fill up the questionnaire, but rather provided other documents that contained data; this is being followed up directly.

## **UNCTAD e-business survey**

2004	2004 23 countries		10 comparable results				
2005	39 countries	ountries 16 replies ? comparable results					
Core Indicators in the survey Number of enterprises							
Businesses using computers / 13							
Employees using computers / 7							

- Businesses using the Internet / 13
- Employees using the Internet / 5
- Businesses with a website / 11
- Businesses with an intranet / 7
- Businesses receiving orders over the Internet / 10

Businesses placing orders over the Internet / 10

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#### **UNCTAD e-business survey**

#### Extended core indicators in the survey

Internet modes of access:	Type of activity:				
- Analogue modem / 10	- Internet e-mail / 8				
- ISDN / 5	- Getting information about goods or services / 4				
<ul> <li>Fixed line connection under 2 Mbps / 4</li> </ul>	<ul> <li>Getting information from Government organisations/public authorities / 3</li> </ul>				
<ul> <li>Fixed line connection of 2 Mbps</li> </ul>	- Other information searches and research / 2				
or more / 4	- Internet banking or accessing other financial				
- Other / 7	services / 3				
<ul> <li>Businesses with a Local Area Network (LAN) / 9</li> </ul>	<ul> <li>Transacting with Government organisations/public authorities / 2</li> </ul>				
Businesses with an extranet / 7	<ul> <li>Providing customer services / 3</li> </ul>				
	- Delivering products online / 2				
	- Other / 5				
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#### • Notes to previous slide:

Modes of access: Under « Other », countries variously reported Wi-Fi, XDSL, Broadband, dedicated communication lines.

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Type of activity: Under « Other », for ex. Trinidad & Tobago reported software download

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## What we have learned

Comparability:

Lack of continuity in data collection

> Differences in types of surveys, sampling units, frames, sizes.

>Differences in response categories (modes of access and activities the Internet is used for)

Not yet ready for true international comparability

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#### Availability:

Coordination might be lacking between Government entities

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#### · Notes to previous slide

- Lack of continuity in data collection: This seems to confirm what the stocktaking The order of the second again.
- A survey focused on ICT in the manufacturing industry can not be compared to a A survey focused on ICT in the manufacturing industry can not be compared to a survey focused on SMEs. Even when surveys have a similar focus, the samples can differ: one might include both rural and urban areas, and another might be eschewed towards an urban sample, for whatever reasons. Definitions of enterprise size (or provision of data according to): 1-9, 10-49, 50-249; under or over 20 (Philippines); others can be according to revenue (Argentina). In Thailand, a nationwide survey covered over 800,000 enterprises (?), most of which were small. On the other end of the spectrum, Madagascar surveyed 190 enterprises

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# Thank You

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