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Information and Communication Technology satellite account for South Africa, 2012

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Information and Communication Technology satellite account for South Africa, 2012

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Pali Lehohla Statistician-General Information and Communication Technology satellite account for South Africa, 2012

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Abbreviations

AFS Annual Financial Statistics
CPC Central Product Classification
GFCF Gross fixed capital formation
GDP Gross domestic product

GHS General Household Survey

GVA Gross value added
HS Harmonised System

HFCE Household Final Consumption Expenditure

ICT Information and Communication Technology

IES Income and Expenditure Survey

ISIC International Standard Industrial Classification of all Economic Activities

IT Information Technology
LSS Large Sample Survey

OECD Organisation for Economic Cooperation and Development

SARB South African Reserve Bank
SARS South African Revenue Service

SIC Standard Industrial Classification of all Economic Activities

SNA System of National Accounts

Stats SA Statistics South Africa
SU-tables Supply and Use tables

Preface

The Information and Communication Technology (ICT) satellite account covers the reference year 2012. It provides an overview of the role that ICT plays in the South African economy and provides information on the ICT sector's contribution to the South African economy both in terms of expenditure and output. The ICT satellite account for 2012 was compiled using the new rebased and benchmarked National Accounts (according to the 2008 System of National Accounts) that was released in November 2014. This constitutes a break in time series from the previously published ICT satellite accounts (2005 to 2011). Stats SA will compile a new full time series for the ICT satellite account (2005 to 2014) to be released in March 2016.

The ICT satellite account for South Africa is compiled and published by Statistics South Africa (Stats SA) according to a framework based on recommendations from the Organisation for Economic Cooperation and Development (OECD) and after examining other countries' experiences. The ICT satellite account is, together with various ICT indicators, one element of a planned compendium of ICT statistics. These will provide for the understanding and monitoring of the impact of ICT and the ICT sector on the South African economy over time.

PJ Lehohla Statistician-General Pretoria

March 2015

Key findings

Key findings of the Information and Communication Technology satellite account for South Africa for 2012 are:

	2012
Information and Communication Technology (ICT) contribution to gross domestic product (GDP) (R million)	94 715
ICT contribution to gross domestic product (GDP) (%)	2,9
ICT contribution to gross value added (GVA) (R million)	85 878
Total domestic output at basic prices of the ICT sector (R million)	241 318
Estimated ICT taxes (R million)	8 836
ICT imports (R million)	105 679
ICT exports (R million)	26 829
ICT trade balance (deficit/surplus) (R million)	-78 850
Compensation of employees paid by the ICT sector (R million)	33 498
Household final consumption expenditure (HFCE) on ICT products (R million)	91 648
HFCE on ICT products compared with total spend (%)	4,6

Please note that 2012 ICT data were compiled using the new rebased and benchmarked National Accounts data that were released in November 2014.

The direct contribution of the Information and Communication Technology (ICT) sector to the gross domestic product (GDP) of South Africa was R94 715 million (or 2,9% of total GDP) in 2012.

In 2012, telecommunication services was estimated to have contributed 2,0 percentage points toward the total ICT sector contribution to GDP (2,9% of total GDP), followed by computer services and activities, manufacturing, related industries, and content and media (each contributing 0,2 of a percentage point) and trade (contributing 0,1 of a percentage point) (please refer to Table 1).

Figure 1 shows the changes in the key variables for the ICT satellite account for 2012.

12,0 10,4 10.0 8,0 6,0 47 4.6 4,0 2.9 2,8 2,0 0,0 2012 ■ICT direct contribution to GDP ■ICT household final consumption expenditure ■ICT capital formation ■ICT imports

Figure 1: Key ICT variables as a percentage of corresponding totals, 2012

Source: Statistics South Africa

Total domestic output at basic prices¹ of the ICT sector in 2012 was R241 318 million (with telecommunication services making the largest contribution, namely R160 784 million or 66,6%).

The ICT sector paid taxes of R8 836 million in 2012 (2,7% of total tax for the economy).

¹ Excludes trade margins, transport margins and net taxes and subsidies on products.

South Africa imported a total of R105 679 million worth of ICT products² in 2012 (which was 10,4% of the total imports³ for South Africa for 2012). The ICT trade deficit was R78 850 million for 2012. ICT products exported in 2012 were worth R26 829 million (or 2,8% of total exports⁴).

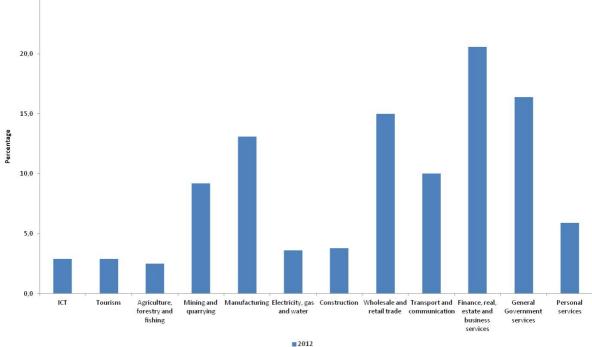
The compensation of employees paid by the ICT sector in 2012 totalled R33 498 million, with making the largest contribution to compensation of employees telecommunication services (R18 677 million).

Household final consumption expenditure (HFCE) on ICT products was R91 648 million in 2012 (or 4,6% of total HFCE for 2012). Telecommunications, broadcasting and information supply services was the major expenditure item (R57 068 million or 62,3% of total ICT HFCE).

Figure 2 shows the contribution of the ICT sector to gross value added compared with other industries.

25,0 20,0

Figure 2: ICT sector contribution to gross value added compared with other industries, 2012



Source: Statistics South Africa

 $^{^{2}}$ Includes both goods and services.

³ Includes both goods and services.

 $^{^{\}rm 4}$ Includes both $\bar{\rm goods}$ and services.

Chapter 1: Introduction

Information and Communication Technology (ICT) is at the forefront of the modern economy. Computer processing power is increasing exponentially, with technology giving rise to a cultural, social and productivity shock. Communication has been completely transformed. Cellular telephones and other mobile devices connect individuals and businesses in a way that is not only fast, but also accessible. Data are transferred between individuals and businesses seamlessly⁵. Businesses, countries and people are connected like never before, and communication has been totally reshaped with email systems and online messaging that deliver instant responses.

The ICT sector in South Africa is an important component of the national economy. Technology is involved in almost every facet of the economy – from telecommunications to increasing productivity in manufacturing with robots, and more efficient computer hardware and software. Despite the economic importance of the ICT sector in South Africa and the world economy, it is not a clearly defined industry, as classified by the International Standard Industrial Classification of all Economic Activities (ISIC). Instead ICT is a component of multiple industries throughout the economy, including manufacturing, business services, trade and telecommunications.

There are multiple components to the ICT sector; but they are measured through either ICT indicators (which measure the educational part and the socio-economic part) or the ICT satellite account (which measures the economic activity through National Accounts data). Statistics South Africa (Stats SA), along with other governmental stakeholders, is working towards creating a compendium of ICT statistics which will include both ICT indicators and the ICT satellite account.

Please consult the discussion document: `Draft Information and Technology satellite account for South Africa, 2005' (discussion document no: D0405.3.1) for the draft ICT satellite account for South Africa, 2005.

 5 Organisation for Economic Cooperation and Development – Guide to Measuring the Information Society (DSTI/ICCP/IIS(2005)6)

Information and Communication Technology satellite account for South Africa, 2012

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1.1 Why a satellite account?

In order to measure the ICT sector in an economy from National Accounts data, a satellite account is required. The System of National Accounts (SNA) recommends the development of satellite accounts for the measurement of economic phenomena that are not explicitly shown in the core set of accounts. A satellite account is an extension of the SNA that allows a component of the national framework to be examined with greater flexibility than the framework of the National Accounts typically allows. The advantage of a satellite account is that it can isolate the ICT supply and demand in various industries. It defines which industries and products⁶ are ICT specific and related, and which industries and products are not.

Another feature of an ICT satellite account is that it combines monetary aggregates with non-monetary data while still conforming to the SNA standards for monetary aggregates. There are no recommended guidelines and framework for an ICT satellite account. The Organisation for Economic Cooperation and Development (OECD) released guidelines proposing a conceptual model for the information economy⁷. Those guidlines form the basis of the recommended ICT industries and ICT products used in the draft ICT satellite account for South Africa.

The advantage of a completed ICT satellite account is that ICT data included within the National Accounts framework are explicitly estimated. The production, output, gross value added (GVA) and taxes paid by the ICT sector, the GDP contribution of the ICT sector, ICT employment, imports and exports of ICT products, household consumption of ICT products, and investment in ICT products within the economy are attainable values from an ICT satellite account. These values are important to policy-makers, investors and line ministries.

1.2 Information and Communication Technology satellite account methodology

The ICT satellite account framework forms the foundation of the ICT satellite account. The ICT framework allows for the compilation of the ICT satellite account by confronting supply and demand. It is highly recommended that the previous discussion documents and report are read in conjunction with this report (consult the following discussion documents⁸ and report⁹: `The status of the Information and Communication Technology satellite account for South Africa', discussion document number: D0407; `Draft Information and Technology satellite account for South Africa, 2005', discussion document number: D0405.3.1; and Information and Communication Technology satellite account for South Africa, 2006-2011: Report number: 04-07-01. These are available online at www.statssa.gov.za).

⁷ Organisation for Economic Cooperation and Development – Guide to Measuring the Information Society (DSTI/ICCP/IIS(2005)6).

⁶ Products include both goods and services.

⁸ There have been three discussion documents published (March 2011, 2012 and 2013) detailing the progress and development of the Information and Communication satellite account.

⁹ Information and Communication Technology satellite account for South Africa, 2006-2011: Report-04-07-01.

The identification of the ICT sector was a fundamental step in developing the ICT satellite account. The ICT sector definitions and classifications adopted by Stats SA conform to the OECD international standards and thus maintain international comparability. The ICT definitions used for the ICT satellite account are as follows¹⁰:

- ICT products must primarily be intended to fulfil or enable the function of information processing and communication by electronic means, including transmission and display;
- For the ICT sector, the production (goods and services) of a candidate industry must primarily be
 intended to fulfil or enable the function of information processing and communication by electronic
 means, including transmission and display;
- For the 'content and media' sector, the production (goods and services) of a candidate industry must primarily be intended to inform, educate and/or entertain humans through mass communication media. These industries are engaged in the production, publishing, and/or the distribution of content (information, cultural and entertainment products), where content corresponds to an organised message intended for human beings; and
- 'Content' corresponds to an organised message intended for human beings published in mass communication media and related media activities. The value of such a product to the consumer does not lie in its tangible qualities but rather in its information, educational, cultural or entertainment content.

The supply and use tables (SU-tables), which form the foundation of the ICT satellite account, are classified according to the Central Product Classification (CPC) (version 2) and the Standard Industrial Classification of all economic activities, 5th edition (SIC). While the SIC has not yet been updated to conform to the ISIC (4th revision), the CPC used within the SU-tables allows a direct link to OECD ICT product recommendations. There are industries classified under the SIC which are no longer directly linked to the latest version ISIC (4th revision).

Research was undertaken to identify these industries, based on whether they comply with the ICT sector definition or not. The identification of ICT-specific industries consisted of two stages. Firstly, the ICT products were identified within the SU-tables (any industry producing more than 50,0%¹¹ of ICT products was regarded as an ICT-specific industry). The second stage was a filtering process, and this examined each identified industry and determined whether it met with the OECD definition of an ICT industry. If the industry did not, it was excluded from the ICT sector. The same process was undertaken for the content and media¹² sector.

¹⁰ Organisation for Economic Cooperation and Development – Guide to measuring the Information Society, 2009.

¹¹ Please see previous discussion documents no (D0407) for how this percentage was derived.

 $^{^{12}}$ Content and media is included as a single line item within the ICT satellite account for South Africa.

The SU-tables are classified according to the CPC (version 2), mostly at a two-digit level. The OECD guidelines¹³ classify all ICT products at a five-digit level (this implies that products on the SU-tables are substantially aggregated when compared with the classifications put forward by the OECD; this is mainly due to product data limitations for South Africa, and is a phenomenon not confined to the ICT sector). The implication of this is that certain non-ICT products are classified within the same CPC product code as ICT products (due to the aggregation).

In order to extract ICT products from the aggregated data, certain assumptions are made in the treatment of ICT products:

- It is assumed that ICT products are only produced (in volume) within identified ICT industries that make
 up the ICT sector. There might be production of ICT products outside the ICT sector, produced as
 secondary output in other industries. This production is assumed to be very small in volume, and at this
 stage¹⁴ it cannot be accurately calculated;
- Certain industries meet the OECD ICT sector definition but the volume of ICT products produced is less
 than 50,0% of total output. These industries are regarded as ICT related, and while they fall outside the
 ICT sector, they are however included within the GDP calculation. An example of such an industry is
 trade services;
- In calculating ICT GDP and ICT GVA for the related industries, it is assumed they have a fixed-cost structure, and this implies their cost of output is the same regardless of the product mix produced; and
- In calculating the net taxes and subsidies and margins, it is assumed that the taxes are distributed
 evenly within an aggregated CPC code and, as a result of this, ICT and non-ICT products are taxed at
 the same rate.

In order to calculate the estimates of ICT products that were imported and exported, data supplied by the South African Revenue Service (SARS) were used to generate ratios that allowed the extraction of import and export data from the aggregated CPC product codes. The same import ratios were used in estimating ICT capital formation¹⁵ (these ratios were chosen because it was assumed that investment formed part of gross fixed capital formation (GFCF), and as such, most capital goods are imported into South Africa). This is in line with South Africa being a net technology importer and until more detailed data are available, this assumption will be used to estimate ICT capital formation.

Household final consumption expenditure (HFCE) on ICT products was calculated using a weighted ratio between ICT imports and ICT product outputs from the ICT sector. This ratio was then used to extract the ICT products from aggregated CPC codes. It was assumed that most households purchase a mix of locally produced and imported ICT products. The weighted ratio attempts to estimate this mix of products. Unfortunately at this stage¹⁶ there are insufficient data at a disaggregated level to link household expenditure to the individual ICT products and their origin of production.

The cornerstone of the ICT framework is the production account. The production account is used to confront supply and demand data. It identifies the ICT sector and isolates it from the rest of the economy, allowing for the calculations of ICT domestic output, ICT GDP, ICT GVA and ICT taxes and subsidies. The production account supplies the data to populate the ICT tables (excluding the employment, imports and exports, and

¹³ Organisation for Economic Cooperation and Development – Guide to measuring the Information Society, 2009.

¹⁴ As of September 2013.

¹⁵ Equivalent to gross fixed capital formation.

¹⁶ As of September 2013.

final household consumption expenditure tables). The condensed production account is available as Annexure A (refer to the Excel sheets for the detailed production accounts).

The ICT products included within the draft ICT satellite account, along with the identified industries making up the ICT sector, are included in Annexure B. These ICT products and industries were identified and examined in the previous published discussion documents (discussion document no.: D0407).

Chapter 2: The Information and Communication Technology satellite account for South Africa, 2012

This section includes the ICT satellite account for South Africa for the reference year 2012.

This section provides the nine tables within the ICT satellite account for South Africa for the year 2012. The individual tables will be supplied in Microsoft Excel¹⁷ format (Share of GDP, Domestic output, Imports and Exports, Income components, Supply and Use, Investment in ICT, HFCE in ICT and Production accounts) for more detailed analysis, which is available at www.statssa.gov.za.

The SU-tables form the basis of the ICT satellite account. Additional data sources that have been used in the compilation of the ICT satellite account are:

- Large Sample Survey (LSS);
- Annual Financial Statistics (AFS);
- General Household Survey (GHS); and
- Income and Expenditure Survey (IES).

2.1 Information and Communication Technology Table 1: Information and Communication Technology share of gross domestic product

The headline table of the ICT satellite account for South Africa is given in ICT Table 1. This table shows the ICT share of GDP for both ICT specific and related activities for South Africa. It contains the calculated values for the ICT contribution to the economy in terms of contribution to the GDP and the ICT GVA. The primary data source is the ICT SU-tables. Table 1 shows the GDP and GVA at an aggregated level of the ICT sector for 2012.

The ICT GVA and the GDP are the two economic aggregates that are important for explaining ICT in the economy. The SNA defines GVA as the value of output less the value of intermediate consumption. It measures the value created by production and is measured before the deduction of consumption of fixed capital¹⁸.

ICT GVA is therefore the value of output of ICT products minus the value of intermediate consumption used while producing ICT products¹⁹. ICT GVA can be directly compared with other industries, for example agriculture. ICT GDP measures ICT GVA at purchasers' prices, as opposed to basic prices for ICT GVA. It allows for comparing with the national GDP as well as a comparison with other countries' ICT GDP figures.

¹⁸ System of National Accounts.

¹⁷ Microsoft Excel 2007.

¹⁹ Australian Bureau of Statistics – Information and Communication Technology satellite account, 2002.

Table 1: Information and Communication Technology share of gross domestic product by Information and Communication related activity, 2012

	ICT industry output	ICT gross value added	Share of ICT gross value added	Share of total gross value added	ICT GDP	Share of ICT GDP	Share of GDP
A ativities	(Dand n	a:ll:an\	(0/ \		(Rand		(0/)
Activities	(Rand n	nillion)	(%)		million)		(%)
ICT-specific activities							
Manufacturing Telecommunication	23 249	6 219	7,2	0,2	6 618	7,0	0,2
services	160 784	60 898	70,9	2,1	64 806	68,4	2,0
Computer services and activities	26 648	6 898	8,0	0,2	7 340	7,7	0,2
Content and media	17 099	5 513	6,4	0,2	5 867	6,2	0,2
ICT-related activities							
Trade	453	409	0,5	0,0	3 227	3,4	0,1
Related industries	13 086	5 941	6,9	0,2	6 855	7,2	0,2
Total	241 318	85 878	100,0	2,9	94 715	100,0	2,9

Data in this table are considered experimental in nature.

Individual figures may not add up to stated totals due to rounding.

In 2012, the contribution to the economy (GDP) from the ICT sector²⁰ was R94 715 million (or 2,9% of total GDP in 2012). Telecommunication services contributed the most to the ICT share of GDP (2,0 percentage points). This makes telecommunication services the largest ICT industry by some margin.

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²⁰ Including related industries.

2.2 Information and Communication Technology Tables 2 and 3: Domestic output of Information and Communication Technology products

The domestic output of ICT products provides a supply perspective. ICT Table 2 shows domestic output of ICT by industry for 2012. Industries are grouped at an aggregated level.

Table 2: Domestic output of Information and Communication Technology products by industry, 2012

Activities	(Rand million)
ICT-specific activities	
Manufacturing	23 249
Telecommunication services	160 784
Computer services and activities	26 648
Content and media	17 099
Total ICT-specific activities	227 779
ICT-related activities	
ICT wholesale trade	353
ICT retail trade	100
Other manufacturing	7 205
Related content and media	5 881
Total ICT-related activities	13 539
Total ICT domestic output	241 318

Trade data are an estimate based on National Accounts data.

Data in this table are considered experimental in nature.

Individual figures may not add up to stated totals due to rounding.

Total ICT domestic output of the ICT sector at basic prices was R241 318 million in 2012. ICT-specific industries produced domestic output of R227 779 million and ICT-related industries (including trade) contributed R13 539 million. The largest industry was telecommunication services (domestic output of R160 784 million). The domestic output of trade services is an estimated ICT output²¹.

ICT Table 3 offers an alternative format of ICT domestic output which is grouped by producing industry for 2012. The largest ICT product is telecommunications, broadcasting and information supply services, produced exclusively within the telecommunication services industry.

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²¹ This is applicable to all domestic output tables.

Table 3: Domestic output of Information and Communication Technology products by producing industry, 2012

			Computer			
		Telecom-	services	Content		
	Manu-	munication	and	and	ICT related	
	facturing	services	activities	media	industries	Total
Products			(Rand mi	llion)		
ICT products						
Office, accounting						
and computing	- 0.1-	•				
machinery	7 347	0	0	0	0	7 347
Radio, television and						
communication	12 605	10 541	0	43	0	23 189
equipment Miscellaneous ICT	12 003	10 041	Ü	40	· ·	20 107
components and						
goods	2 858	0	0	0	0	2 858
Leasing or rental						
services without						
operator	1	159	1 113	0	8 018	9 291
Other professional,						
technical and	0	1 445	23 831	0	2 127	27 403
business services	O	1 445	23 63 1	O	2 127	27 403
Telecommunication, broadcasting and						
information supply						
services	0	148 398	0	0	1 501	149 900
Content and media	266	144	2	17 052	1 893	19 357
Non-specific						
products	171	97	1 702	4	N/A	1 973
Total	23 249	160 784	26 648	17 099	13 539	241 318

Data in this table are considered experimental in nature. Individual figures may not add up to stated totals due to rounding.

2.3 Information and Communication Technology Table 4: Imports and exports of Information and Communication Technology products

Imports and exports of ICT products are reflected in ICT Table 4 for 2012. The data were sourced from the ICT SU-tables (supplemented with additional data from alternative sources including SARS). The import and export data are traditionally classified according to the Harmonised System (HS) classification, and the HS classification has been linked to CPC (version 2).

Table 4: Imports and exports of Information and Communication Technology products by type of product, 2012

Products	(Rand million)
Imports of ICT products	
Office, accounting and computing machinery	32 414
Radio, television and communication equipment	50 214
Miscellaneous ICT components and goods	476
Leasing or rental services without operator	0
Other professional, technical and business services	1 597
Telecommunications, broadcasting and information supply services	16 520
Content and media	4 459
Total Imports of ICT products	105 679
Percentage of ICT imports (against total imports) (%)	10,4
Exports of ICT products	
Office, accounting and computing machinery	3 168
Radio, television and communication equipment	4 213
Miscellaneous ICT components and goods	446
Leasing or rental services without operator	0
Other professional, technical and business services	1 785
Telecommunications, broadcasting and information supply services	15 994
Content and media	1 223
Total exports of ICT products	26 829
Percentage of ICT exports (against total exports) (%)	2,8
ICT trade surplus/deficit	-78 850

Data in this table are considered experimental in nature. Individual figures may not add up to stated totals due to rounding.

In 2012, South Africa was a net importer of ICT products and services with an estimated ICT trade deficit of R78 850 million. South Africa imported ICT products and services of R105 679 million and exported ICT products and services of R26 829 million. ICT imports contributed 10,4% of total imports into the economy, whilst ICT exports contributed only 2,8% of total exports. The largest imported ICT product was radio, television and communication equipment (R50 214 million). The largest exported ICT product was telecommunications, broadcasting and information supply services (R15 994 million).

2.4 Information and Communication Technology Table 5: Income components of Information and Communication Technology industries

ICT Table 5 shows the income components of the ICT industries for 2012. The data were sourced from the ICT SU-tables.

Table 5: Income components of Information and Communication Technology industries, 2012

	Compensation of employees	Gross operating surplus/Gross mixed income	Other net taxes on production	ICT gross value added				
Activities	(Rand million)							
ICT-specific activities								
Manufacturing	3 831	2 348	40	6 219				
Telecommunication services	18 677	42 205	16	60 898				
Computer services and								
activities	5 907	875	116	6 898				
Content and media	5 083	163	267	5 513				
Total ICT-specific activities	33 498	45 591	439	79 528				
ICT related activities								
Trade	N/A	N/A	N/A	409				
Related industries	N/A	N/A	N/A	5 941				
Total ICT activities				85 878				

Data in this table are considered experimental in nature. Individual figures may not add up to stated totals due to rounding.

In 2012, the total GVA of the ICT sector was R85 878 million (the bulk of this was from telecommunication services). The estimated net taxes on production for the ICT sector was R439 million. The estimated gross operating surplus for the ICT sector was R45 591 million. The compensation of employees for the ICT sector was R33 498 million, with the largest contributor being telecommunication services (R18 677 million).

2.5 Information and Communication Technology Table 6: Supply and use of Information and Communication Technology products

ICT Table 6 shows the supply and use of ICT products and the flow of ICT products through the economy for 2012. ICT Table 6 is derived from the SU-tables, but lacks the detail and disaggregation to calculate ICT value added and GDP. The major purpose of ICT Table 6 is to highlight the flow of ICT products, and this includes:

- Intermediate consumption;
- Capital formation;
- Household consumption;
- Domestic output; and
- Imports and exports.

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Table 6: Supply and use of Information and Communication Technology products, 2012

						Telecommuni-				
						cations,				
	Office,	Radio,			Other	broadcasting				
	accounting	television and	Miscellaneous	Leasing or	professional,	and				
	and	communi-	ICT	rental services	technical	information				
	computing	cation	components	without	and business	supply	Content and	Non-specific		
	machinery	equipment	and goods	operator	services	services	media	products	Margins	Total
Products	,	1 1		•	(Rand r	million)		•	J	
					ICT supply	,				
Domestic output	7 347	23 189	2 858	9 291	27 403	149 900	19 357	1 973	20 718	262 036
Imports	32 414	50 214	476	0	1 597	16 520	4 459	N/A		105 679
Margins	3 060	6 453	1 450				9 707	48	-20 718	0
Net taxes on										
products	1 237	1 678	762	208	587	2 736	1 437	193		8 836
Total supply	44 057	81 533	5 546	9 499	29 586	169 156	34 960	2 214		376 552
					ICT use					
Intermediate										
consumption	10 370	57 650	4 155	8 845	27 357	96 094	22 774	2 214 ²²		229 457
Household final										
consumption										
expenditure	5 841	16 631	418	654	445	57 068	10 590	N/A		91 648
Capital formation	24 679	3 038	528	0	0	0	373	N/A		28 618
Exports	3 168	4 213	446	0	1 785	15 994	1 223	N/A		26 829
Total use	44 057	81 533	5 546	9 499	29 586	169 156	34 960	2 214		376 552

Estimated intermediate consumption of ICT products.

Data in this table are considered experimental in nature.

Individual figures may not add up to stated totals due to rounding.

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²² There are no data on non-specific products produced within the ICT sector; a result of this is a discrepancy. This discrepancy is treated as intermediate consumption to allow for balancing, but in actuality no use data are available for non-specific products.

2.6 Information and Communication Technology Table 7: Capital formation in Information and Communication Technology products

ICT Table 7 shows capital formation (mainly investments) in ICT products for 2012. Capital formation within the ICT satellite account does not include changes in inventories and as such it is equivalent to GFCF. GFCF data are contained within the use side of the ICT SU-tables and are considered as mainly investments. The AFS provides business expenditure and investment data. At this stage²³ the disaggregated industry information only provides aggregated capital expenditure on new and existing capital per industry. Unfortunately, the AFS does not provide details regarding what that capital investment consisted of. The expansion of this table to include capital formation per industry is a planned future development.

Capital formation in ICT products is estimated using import ratios as it is assumed that the majority of GFCF is imported, in line with South Africa being a technology importer. Only the total ICT capital formation can be shown as there are currently no data to show the per industry capital formation of ICT products.

Table 7: Capital formation in Information and Communication Technology products, 2012

Products	(Rand million)
Office, accounting and computing machinery	24 679
Radio, television and communication equipment	3 038
Miscellaneous ICT components and goods	528
Leasing or rental services without operator	0
Other professional, technical and business services	0
Telecommunications, broadcasting and information supply services	0
Content and media	373
Total ICT capital formation	28 618
Total capital formation	614 505
ICT capital formation as a proportion of total capital formation (%)	4,7

Data in this table are considered experimental in nature. Individual figures may not add up to stated totals due to rounding.

In 2012, office, accounting and computing machinery was the largest contributor to ICT capital formation (R24 679 million). The total estimated ICT capital formation in the economy was R28 618 million (4,7% of total capital formation²⁴ in the economy).

²³ As of September 2013.

²⁴ Gross fixed capital formation.

2.7 Information and Communication Technology Table 8: Household final consumption expenditure²⁵ of Information and Communication Technology products

The consumption expenditure of households is an important value, as it allows for various trends to be explored within household expenditure. Table 8 below shows HFCE on ICT products and services for 2012.

Table 8: Household final consumption expenditure of Information and Communication Technology products, 2012

	ICT p	roduct expenditur	e
_		Percentage of	Percentage of
		ICT	total
	Value	expenditure	expenditure
Products	Rand million	%)
ICT products			
Office, accounting and computing machinery	5 841	6,4	0,3
Radio, television and communication equipment	16 631	18,1	0,8
Miscellaneous ICT components and goods	418	0,5	0,0
Leasing or rental services without operator	654	0,7	0,0
Other professional, technical and business services	445	0,5	0,0
Telecommunications, broadcasting and information supply			
services	57 068	62,3	2,9
Content and media products	10 590	11,6	0,5
Total ICT products	91 648	100,0	4,6
Total Household Final Consumption Expenditure	1 974 582		
ICT as a percentage of total HFCE (%)	4,6		

Data in this table are considered experimental in nature.

Individual figures may not add up to stated totals due to rounding.

In 2012, the estimated HFCE on ICT products was R91 648 million (4,6% of total HFCE). Telecommunications, broadcasting and information supply services had the largest HFCE of R57 068 million (62,3% of total ICT HFCE), followed by radio, television and communication equipment (R16 631 million or 18,1% of total ICT HFCE) and content and media products (R10 590 million or 11,6% of total ICT HFCE).

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²⁵ HFCE

Chapter 3: The future development of the Information and Communication Technology satellite account for South Africa

South Africa joins a small group of countries, which include Chile and Australia, which have compiled ICT satellite accounts for public scrutiny. While many countries have detailed ICT data, ICT satellite accounts, based on the National Accounts, are still quite rare despite the richness of data they provide.

The ICT satellite account for South Africa is aimed at being a component in a larger compendium of ICT statistics. The long-term goal is to produce a system of ICT statistics that contains two major components:

- 1. The ICT satellite account; and
- The ICT indicators.

The way forward in the financial year 2015/2016 for Stats SA in the development and improvement of the ICT satellite account for South Africa is as follows:

- 1. Address any comments and/or suggestions received from stakeholders;
- 2. Compile the ICT satellite account for South Africa for the reference year 2013;
- 3. Further research into a more detailed ICT capital formation table;
- 4. Improvement of data within the ICT framework and ensure the quality thereof;
- 5. Investigate a more accurate recording of software with the South African Reserve Bank (SARB); and
- Further investigation into labour/employment in the ICT sector as well as employment of ICT professionals.

Stats SA will continue to develop the ICT satellite account for South Africa, and during the process the organisation will continue to examine alternative data sources to improve any data weaknesses.

The next ICT satellite account report for South Africa will be based on the new full times series for the ICT satellite account for the reference years 2005 to 2014 and is scheduled to be published at the end of March 2016. Stats SA values your feedback on this document. If you have any comments and/or suggestions, please contact Robert Parry (robertp@statssa.gov.za) on or before 30 June 2015.

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Annexures

Annexure A: The condensed production accounts for the Information and Communication Technology satellite account for South Africa

Table 9 below shows the condensed production account for the ICT sector for South Africa for 2012.

Statistics South Africa 22

Table 9: A condensed production account for the Information and Communication Technology sector in South Africa, 2012

							Total output of
			Computer				domestic
		Telecommunication	services and	Content and	Total ICT	ICT related	producers (at
	Manufacturing	services	activities	media	sector	industries	basic prices)
Products			(Ra	nd million)	-		
A. Specific products	23 078	160 687	24 946	17 095	225 806	13 539	680 269
 Office, accounting and computing 							
machinery	7 347	0	0	0	7 347	0	7 353
2. Radio, television and communication							
equipment	12 605	10 541	0	43	23 189	0	28 647
3. Miscellaneous ICT components and goods	2 858	0	0	0	2 858	0	47 936
4. Leasing or rental services without operator	1	159	1 113	0	1 273	8 018	94 849
5. Other professional, technical and business							
services	0	1 445	23 831	0	25 276	2 127	188 363
6. Telecommunications, broadcasting and							
information supply services	0	148 398	0	0	148 398	1 501	149 979
7. Content and media	266	144	2	17 052	17 464	1 893	163 142
B. Non-specific products	171	97	1 702	4	1 973	110 477	5 780 815
Goods	156	0	0	1	156	0	2 359 112
Services	16	97	1 702	3	1 817	110 477	3 421 703
Total output (at basic prices)	23 249	160 784	26 648	17 099	227 779	124 016	6 461 084
Total intermediate consumption (at					_		
purchasers' prices)	17 030	99 886	19 750	11 585	148 251	65 848	3 521 443
Total gross value added of industries (at							
basic prices)	6 219	60 898	6 898	5 513	79 528	58 168	2 939 640
Compensation of employees	3 831	18 677	5 907	5 083	33 498	33 008	1 473 852
Other taxes less subsidies on production	40	16	116	267	439	939	46 078
Gross mixed income	0	0	0	0	0	0	0
Gross operating surplus	2 348	42 205	875	163	45 591	24 221	1 419 710

Individual figures may not add up to stated totals due to rounding.

Annexure B: List of Information and Communication Technology industries and products

Tables 10 and 11 show the ICT products recommended by the OECD. Tables 12 and 13 list the industries included within the ICT sector for South Africa.

Table 10: Information and Communication Technology products²⁶

CPC	ISIC	HS (2007			
(version 2)	(Rev. 4)	edition)	Product description (according to the CPC version 2)		
Computers and peripheral equipment					
45142	2620	8472.90	Point-of-sale terminals, ATMs and similar machines		
45221	2620	8471.30	Portable automatic data processing machines weighing not more than 10 kg, such as laptop and notebook computers		
45222	2620	8471.30	Personal digital assistants and similar computers		
45230	2620	8471.41	Automatic data processing machines, comprising in the same housing at least a central processing unit and an input and output unit, whether or not combined		
45240	2620	8471.49	Automatic data processing machines presented in the form of systems		
45250	2620	8471.50	Other automatic data processing machines whether or not containing in the same housing one or two of the following types of units: storage units, input units, output units		
45261	2620	8471.60	Input peripherals (keyboard, joystick, mouse etc.)		
45262	2620	8471.60	Scanners (except combination of printer, scanner, copier and/or fax)		
45263	2620	8443.32	Inkjet printers used with data processing machines		
45264	2620	8443.32	Laser printers used with data processing machines		
45265	2620	8443.32	Other printers used with data processing machines		
45266	2620	8443.31	Units performing two or more of the following functions: printing, scanning, copying, faxing		
45269	2620	8471.90	Other input or output peripheral devices		
45271	2620	8471.70	Fixed media storage units		
45272	2620	8471.70	Removable media storage units		
45289	2620	8471.90	Other units of automatic data processing machines		
45290	2620	8473.50	Parts and accessories of computing machines		
47315	2620	8528.61	Monitors and projectors, principally used in an automatic data processing system		
Communica	tion equipment	t			
46921	2630	8531.10	Burglar or fire alarms and similar apparatus		
47211	2630	8525.60	Transmission apparatus incorporating reception apparatus		
47212	2630	8525.50	Transmission apparatus not incorporating reception apparatus		
47213	2630	8525.80	Television cameras		
47221	2630	8517.11	Line telephone sets with cordless handsets		
47222	2630	8517.12	Telephones for cellular networks or for other wireless networks		
47223	2610, 2630	8517.69	Other telephone sets and apparatus for transmission or reception of voice, images or other data, including apparatus for communication in a wired or wireless network (such as a local or wide area network)		
47401	2630	8517.70	Parts for the goods of subclasses 47221 to 47223		
47550	2620	8523.51	Solid-state non-volatile storage devices		

²⁶ Not all CPC (version 2) classification codes can be directly linked to the ISIC or to the HS 2007 classifications; in such cases they are left blank.

Table 10: Information and Communication Technology products (continued)

CPC	ISIC	HS (2007		
(version 2)	(Rev. 4)	edition)	Product description (according to the CPC version 2)	
Consumer electronic equipment				
38581	2640	9504.10	Video game consoles	
47214	2640	8525.80	Video camera recorders	
47215	2670	8525.80	Digital cameras	
47311	2640	8527.99	Radio broadcast receivers (except of a kind used in motor vehicles), whether or not combined with sound recording or reproducing apparatus or a clock	
47312	2640	8527.29	Radio broadcast receivers not capable of operating without an external source of power, of a kind used in motor vehicles	
47313	2640	8528.73	Television receivers, whether or not combined with radio-broadcast receivers or sound or video recording or reproducing apparatus	
47314	2640	8528.69	Monitors and projectors, not incorporating television reception apparatus and not principally used in an automatic data processing system	
47321	2640	8519.89	Sound recording or reproducing apparatus	
47323	2640	8521.90	Video recording or reproducing apparatus	
47330	2640	8518.50	Microphones and stands therefore; loudspeakers; headphones, earphones and combined microphone/speaker sets; audio-frequency electric amplifiers; electric sound amplifier sets	
47402	2640	8522.90	Parts for the goods of subclasses 47321, 47323 and 47330	
Miscellaneou	s ICT compone	ents and goods		
45281	2610	8517.69	Sound, video, network and similar cards for automatic data processing machines	
47130	2610	8534.00	Printed circuits	
47140	2610	8540.89	Thermionic, cold cathode or photo-cathode valves and tubes (including cathod tubes)	
47150			Diodes, transistors and similar semi-conductor devices; photosensitive semi-conductor devices; light-emitting diodes; mounted piezo-electric crystals	
47160	2610	8542.39	Electronic integrated circuits	
47173	2610	8542.90	Parts for the goods of subclasses 47140 to 47160	
47403	2630, 2640, 2651	8529.90	Parts for the goods of subclasses 47211 to 47213, 47311 to 47315 and 48220	
47540	2680	8523.40	Optical media, not recorded	
47590	3290	8523.80	Other recording media, including matrices and masters for the production of disks	
47910	2680	8523.21	Cards with a magnetic stripe	
47920	2610	8523.52	'Smart cards'	
48315	2610, 2670	9013.80	Liquid crystal devices n.e.c.; lasers, except laser diodes; other optical appliances and instruments n.e.c.	
48354	2610, 2670	9013.90	Parts and accessories for the goods of subclass 48315	
Manufacturir	ng services for	ICT equipment		
88741	2610		Electronic component and board manufacturing services	
88742	2620		Computer and peripheral equipment manufacturing services	
88743	2630		Communication equipment manufacturing services	
88744	2640		Consumer electronics manufacturing services	
88749	2680		Magnetic and optical media manufacturing services	

Table 10: Information and Communication Technology products (continued)

CPC	ISIC	HS (2007			
(version 2)	(Rev. 4)	edition)	Product description (according to the CPC version 2)		
Business and	Business and productivity software and licensing services				
47811	5820 8523.40		Operating systems, packaged		
47812	5820	8523.40	Network software, packaged		
47813	5820	8523.40	Database management software, packaged		
47814	5820	8523.40	Development tools and programming languages software, packaged		
47821	5820	8523.40	General business productivity and home use applications, packaged		
47829	5820	8523.40	Other application software, packaged		
73311	5820		Licensing services for the right to use computer software		
83143	5820		Software originals		
84341	5820		System software downloads		
84342	5820		Application software downloads		
84392	5820		On-line software		
Information t	technology con	sultancy and s	ervices		
83117	7020	,	Business process management services		
83131	6202		IT consulting services		
83132	6202		IT support services		
83141	6201		IT design and development services for applications		
83142	6202		IT design and development services for networks and systems		
83151	6311		Website hosting services		
83152	6311		Application service provisioning		
83159					
83161	Other hosting and IT infrastructure provisioning services Network management services				
	ications service	ne .	Nework munagement services		
84110	6110, 6120	.5	Carrier services		
84121	,		Fixed telephony services – access and use		
84122	6110		Fixed telephony services – calling features		
84131	6120, 6130		Mobile telecommunications services – access and use		
84132	6120, 6130		Mobile telecommunications services – calling features		
84140	6110,		Private network services		
04140	6120,		THINGIC HOWOIK SCINCES		
	6130, 6190				
84150	6110,		Data transmission services		
	6120,				
	6130, 6190				
84190	6110,		Other telecommunications services		
	6120,				
0.4010	6130, 6190		laterant bandhara angèrra		
84210	6110		Internet backbone services		
84221	84221 6110, Narrowband Internet access services		Narrowband Internet access services		
	6120, 6130, 6190				
84222			Broadband Internet access services		
	6120,				
	6130, 6190				
84290 6110, Other Internet telecommunications services		Other Internet telecommunications services			
	6120,				
001/0	6130, 6190				
83162	6202		Computer systems management services		

Table 10: Information and Communication Technology products (concluded)

CPC	ISIC	HS (2007	
(version 2)	(Rev. 4)	edition)	Product description (according to the CPC version 2)
Leasing or re	ental services for	ICT equipme	nt
73124	7730 Leasing or rental services concerning computers without operator		Leasing or rental services concerning computers without operator
73125	7730	7730 Leasing or rental services concerning telecommunications equipment without operator	
73210	7729 Leasing or rental services concerning televisions, radios, video cassette recorders related equipment and accessories		Leasing or rental services concerning televisions, radios, video cassette recorders and related equipment and accessories
Other ICT se	rvices		
83325	7110 Engineering services for telecommunications and broadcasting projects		
87130	9511	Maintenance and repair services of computers and peripheral equipment	
87153	9512	2 Maintenance and repair services of telecommunications equipment and apparatus	
87331	3320	Installation services of mainframe computers	
87332	6209	Installation services of personal computers and peripheral equipment	
87340	3320	20 Installation services of radio, television and communications equipment and apparatus	

Source: Organisation for Economic Cooperation and Development – Guide to measuring the Information Society, 2009.

Table 11 shows the ICT products that are defined according to the 'content and media' definition.

Table 11: Information and Communication Technology `content and media' products²⁷

CPC	ISIC	HS (2007		
(version 2)	(Rev. 4)	edition)	Product description (according to the CPC version 2)	
Printed and a	other text-base	d content on p	hysical media, and related services	
32210	5811	4901.99	Educational textbooks, in print	
32220	5811	4905.91	General reference books, in print	
32230	5812	4901.99	Directories, in print	
32291	5811	4901.99	Professional, technical and scholarly books, in print	
32292	5811	4903.00	Children's books, in print	
32299	5811	4901.99	Other books n.e.c., in print	
32300	5813	4902.10	Newspapers and periodicals, daily, in print	
32410	5813	4902.90	General interest newspapers and periodicals, other than daily, in print	
32420	5813	4902.90	Business, professional or academic newspapers and periodicals, other than daily, in print	
32490	5813	4902.90	Other newspapers and periodicals, other than daily, in print	
32511	5811	4905.99	Maps and hydrographic or similar charts (including wall maps, topographical plans and maps for globes), printed, other than in book-form	
32530	5819	4909.00	Printed or illustrated postcards; printed cards bearing personal greetings or messages, with or without envelopes or trimmings	
32540	5819	4911.91	Printed pictures, designs and photographs	
32620	5819	4911.10	Trade advertising material, commercial catalogues and the like	
32630	5819	4910.00	Transfers (decalcomanias) and printed calendars	
47691	5811	8523.40	Audio books on disk, tape or other physical media	
47692	5811, 5812, 5813	8523.40	Text-based disks, tapes or other physical media	
83631	5812, 5813		Sale of advertising space in print media (except on commission)	
38950	5911	3706.90	Motion picture film, exposed and developed, whether or not incorporating sound track or consisting only of sound track	
47620	5911	8523.40	Films and other video content on disks, tape or other physical media	
83632	6010, 6020		Sale of TV/radio advertising time (except on commission)	
84611	6010		Radio broadcast originals	
84612	6020		Television broadcast originals	
84621	6010		Radio channel programmes	
84622	6020		Television channel programmes	
84631	6010,		Broadcasting services	
	6020		·	
84632	6010, 6020		Home programme distribution services, basic programming package	

²⁷ Not all CPC (version 2) classification codes can be directly linked to the ISIC or to the HS 2007 classifications; in such cases they are left blank.

Table 11: Information and Communication Technology `content and media' products (continued)

	ISIC	HS (2007	
(version 2)	(Rev. 4)	edition)	Product description (according to the CPC version 2)
Motion picture	, video, televi	sion and radio	content, and related services
84633	6010, 6020		Home programme distribution services, discretionary programming package
84634	6010, 6020		Home programme distribution services, pay-per-view
96121	5911, 6020		Motion picture, videotape and television programme production services
96122	5920, 6010		Radio programme production services
96123	5911, 5920		Motion picture, videotape, television and radio programme originals
96131	5912		Audiovisual editing services
96132	5912		Transfers and duplication of masters services
96133	5912		Colour correction and digital restoration services
96134	5912		Visual effects services
96135	5912		Animation services
96136	5912		Captioning, titling and subtitling services
96137	5920		Sound editing and design services
96139	5912		Other post-production services
96140	5913		Motion picture, videotape and television programme distribution services
96150	5914		Motion picture projection services
Music content		ervices	
32520	5920	4904.00	Music, printed or in manuscript
47610	5920	8523.80	Musical audio disks, tapes or other physical media
96111	5920		Sound recording services
96112	5920		Live recording services
96113	5920		Sound recording originals
Games softwa			
38582	5820	9504.10	Software cartridges for video game consoles
47822	5820	8523.40	Computer game software, packaged
84391	5820		On-line games
73312	5812		Licensing services for the right to use databases
83633	5813, 5819,		Sale of Internet advertising space (except on commission)
	6311,		
0.421.1	6312		On line hands
84311 84312	5811 5813		On-line books
84313	5812		On-line newspapers and periodicals On-line directories and mailing lists
Online conten			On-line directories and maining lists
84321	5920	services	Musical audio downloads
84322	5920		Streamed audio content
84331	5911		Films and other video downloads
84332	5911		Streamed video content
84393	5819		On-line adult content
84394	6312		Web search portal content
84399	5819		Other on-line content n.e.c.

Table 11: Information and Communication Technology 'content and media' products (concluded)

CPC	ISIC	HS (2007	
(version 2)	(Rev. 4)	edition)	Product description (according to the CPC version 2)
Other conter	nt and related :	services	
47699	5920 8523.40		Other non-musical audio disks and tapes
73320	5811,		Licensing services for the right to use entertainment, literary or artistic originals
	5813,		
	5911,		
	5912,		
	5920,		
	9000		
83611	7310		Full service advertising
83620	7310		Purchase or sale of advertising space or time, on commission
83639	5811,		Sale of other advertising space or time (except on commission)
	5812,		
	7310		
83812	7420		Advertising and related photography services
83940	5812		Original compilations of facts/information
84410	6391		News agency services to newspapers and periodicals
84420	6391		News agency services to audiovisual media
85991	6399		Other information services
89110	5811,		Publishing, on a fee or contract basis
	5812,		
	5813,		
	5819,		
	5820,		
	5920		
96330	9000		Original works of authors, composers and other artists except performing artists, painters and sculptors

Source: Organisation for Economic Cooperation and Development – Guide to measuring the Information Society, 2009.

Table 12: Industries conforming to the Information and Communication Technology sector definition available in the benchmarked supply and use tables, 2005

ISIC	SIC	SIC grouping on	
(Rev. 4)	(5 th level)	the SU-tables	Description of industry grouping
	acturing industri		
5820	32600	SIC_3260	Reproduction of recorded media
2610	37100	SIC_3710	Manufacture of electronic components and boards
	37200	SIC_3720	Manufacture of television and radio transmitters and apparatus for
			line telephony and line telegraphy
2620	35900	SIC_3590	Manufacture of computers and peripheral equipment
2630	37420	SIC_3742	Manufacture of communication equipment
2640	37300	SIC_3730	Manufacture of consumer electronics
	39240	SIC_3924	Manufacture of games and toys (video games)
2680	33599	SIC_3359_60	Manufacture of magnetic and optical media ²⁸
ICT trade i	industries ²⁹		
4651	61501	SIC_6150	Wholesale of computers, computer peripheral equipment and software
4652	61509	SIC_6150	Wholesale of electronic and telecommunications equipment and parts
	62393	SIC_6239	Retail trade in sports goods and entertainment requisites
Telecomm	unications		
6110	75200	SIC_7520	Wired telecommunications activities
6120	75200	SIC_7520	Wireless telecommunications activities
6130	75200	SIC_7520	Satellite telecommunications activities
6190	75200	SIC_7520	Other telecommunications activities
Computer		onsultancy and related	
	85230	SIC_8523	Renting of office machinery and equipment
	86100	SIC_8610	Hardware consultancy
6201	86200	SIC_8620	Computer programming activities
6202	86300	SIC_8630	Computer consultancy and computer facilities
6209	86900	SIC_8690	Other information technology and computer service activities
	essing, hosting a	nd related activities, w	
6311		SIC_8630	Data processing, hosting and related activities
		SIC_8640	
6312			Web portals
		ommunication equipme	
9511	86500	SIC_8650	Repair of computers and peripheral equipment
9512	86500	SIC_8650	Repair of communication equipment

Source: Statistics South Africa – Supply and use tables, 2005.

²⁸ ICT-related ²⁹ ICT-related

Table 13: Industries conforming to the Information and Communication Technology `content and media' definition available in the benchmarked supply and use tables, 2005

ISIC	SIC	SIC grouping on	
(Rev. 4)	(5 th level)	the SU-tables	Description of industry grouping
Publishing of	of books, period	licals and other publish	ning activities
5811	32410	SIC_3241	Book publishing
5812			Publishing of directories and mailing lists
5813	32420	SIC 3242	Publishing of newspapers, journals and periodicals
	32430	SIC 3243	Publishing of recorded media
5819	32490	SIC_3249	Other publishing activities
	39220	SIC_3922	Manufacture of musical instruments
Motion pict	ure, video and t	elevision programme (activities
5911	96130	SIC_96	Motion picture, video and television programme production activities
5912			Motion picture, video and television programme post-production
			activities
5913	96112	SIC 96	Motion picture, video and television programme distribution activities
5914	96122	SIC_96	Motion picture projection activities
Sound reco	rding and music	publishing activities	
5920	96490	SIC_96	Sound recording and music publishing activities
Programmi	ng and broadca	sting activities	
6010	96130	SIC 96	Radio broadcasting
6020	96130	SIC_96	Television programming and broadcasting activities
Other infor	mation service o	activities	
6391	96200	SIC_96	News agency activities
6399			Other information service activities n.e.c.

Source: Statistics South Africa – Supply and use tables, 2005.

Glossary

Capital formation

Gross fixed capital formation in a particular category of fixed asset consists of the value of producers' acquisitions of new and existing products of this type less the value of their disposals of the fixed assets of the same type. Capital formation within the ICT satellite account does not include changes in inventories and as such capital formation is equivalent to gross fixed capital formation and not gross capital formation.

Central product classification

A classification based on the physical characteristics of goods or the nature of the services rendered. It covers products that are an output of economic activities, including transportable goods, non-transportable goods and services.

Gross domestic product

The total value of goods and services produced within the geographic boundaries of a country for a specified period.

Gross value added (at basic prices)

The output valued at basic prices less intermediate consumption valued at purchaser's prices.

Household final consumption expenditure

Includes all consumption expenditure made by households from their own cash resources (including all income in cash received), as well as all the counterpart of income in kind (except social transfers in kind) that those households might have received, such as remuneration in kind and other transfers in kind. Note: It also includes the value of all consumption of output for own final use, such as those provided by second homes on own account used for tourism purposes or what it can have received through barter transactions.

Industry

Groups of establishments engaged in the same or similar kinds of activity. Note: The definition of industries is based on the SNA and is in line with that contained in the Standard Industrial Classification of all Economic Activities, fifth edition, Report No. 09-90-02 of January 1993 (SIC).

Intermediate consumption

Intermediate consumption consists of the value of the goods and services consumed as inputs by a process of production, excluding fixed assets. Consumption of fixed assets is recorded as consumption of fixed capital.

International Standard Industrial Classification of all Economic Activities The United Nation's version of a classification system used to classify businesses according to their economic activity.

National accounts

Serves as a framework for statistical systems. It also serves as a point of reference in establishing standards for related statistics. The internationally agreed framework that guides the compilation of national accounts is contained in the SNA.

Production

A process, carried out under the responsibility, control and management of an institutional unit, in which labour and assets are used to transform inputs of goods and services into outputs of other goods and services. All goods and services produced as outputs must be such that they can be sold on markets, or at least be capable of being provided by one unit to another, with or without charge.

Standard Industrial Classification of all Economic Activities

A South African version of a classification coding system used to classify an enterprise according to its economic activity. Note: It is based on United Nations ISIC with a number of adaptations for local conditions.

Supply table

Consists of a rectangular matrix with the rows corresponding to the same groups of products as the matching use tables and columns corresponding to the supply from domestic production valued at basic prices plus columns for imports and the valuation adjustments necessary to have total supply of each.

System of national accounts

An internationally-agreed standard system for macro-economic accounts. The latest version is described in the System of National Accounts 2008.

Use table

Consists of a set of product balances covering all products available in an economy arranged in the form of a rectangular matrix with the products, valued at purchasers' prices, appearing in the rows and the columns indicating the disposition of the products to various types of uses.

Related Information and Communication Technology satellite account publications

Statistics South Africa, 2011. The status of the Information and Communication Technology satellite account for South Africa. Discussion document No: D0407. Pretoria.

Statistics South Africa, 2012. The status of the Information and Communication Technology satellite account for South Africa. Discussion document No: D0407. Pretoria.

Statistics South Africa, 2013. Draft Information and Communication Technology satellite account for South Africa, 2005. Discussion document No: D0405.3.1. Pretoria.

Statistics South Africa, 2014. Information and Communication Technology satellite account for South Africa, 2006 - 2011. Report No: 04-07-01. Pretoria.