

THE CAYMAN ISLANDS' SYSTEM OF NATIONAL ACCOUNTS REPORT 2013

NOVEMBER 2014



THE ECONOMICS AND STATISTICS OFFICE



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ABBREVIATIONS AND ACRONYMS

AAC: Aggregate Advisory Committee

ANA: Annual National Accounts

ANAS: Annual National Accounts Survey

BEC: Classification by Broad Economic Categories

BR: Business Register

CARTAC: Caribbean Regional Technical Assistance Centre

CIDOT: Cayman Islands Department of Tourism

CIF: Cost, Insurance, Freight

CIMA: Cayman Islands Monetary Authority

CISNA: Cayman Islands System of National Accounts

CI\$: Cayman Islands Dollars
CPI: Consumer Price Index

CRE: Central Register of Establishments

ECLAC: Economic Commission for Latin America and the Caribbean

ESO: Economics and Statistics Office

FISIM: Financial Intermediation Services Indirectly Measured

FOB: Free On Board

GDP: Gross Domestic Product

GO: Gross Output

GVA: Gross Value Added

HBS: Household Budget Survey
IMF: International Monetary Fund

ISIC: International Standard Industrial Classification of Economic Activity

LFS: Labour Force Survey
NEC: Not Elsewhere Classified

NPISG: Non-Profit Institutions Serving Government NPISH: Non-Profit Institutions Serving Household

PSPB: Public Sector Pension Board

ROW: Rest of the World SBU: Simple Blow Up

SITC: Standard International Trade Classification

SNA: System of National Accounts

SR: Sample Ratio

UNSD: United Nation Statistics Division



1. EXECUTIVE SUMMARY

- 1.1 The Cayman Islands' System of National Accounts Report 2013 presents the gross domestic product (GDP) estimates for the period 2009–2013. The estimates were calculated using both the production and income approaches. The production approach to estimating GDP is obtained by summing the value added of all industries within the economy (i.e. the gross value of outputs minus the value of intermediate consumption). The income approach is obtained by summing the income earned by the factors of production, i.e. compensation of employees, consumption of fixed capital, taxes less subsidies on production and imports and operating surplus/mixed income. The income approach estimates GDP in current purchasers' prices.
- 1.2 The overall GDP estimate comprises the value added of 18 industries as classified using the International Standard Industrial Classification (ISIC) Revision 4. The data shown are the most recent estimates of GDP and include any revisions (to previously published data) due to revised figures obtained from businesses during the most recent Annual National Accounts Survey. In general, figures for the most recent year (2013) are to be regarded as preliminary.
- 1.3 GDP estimates in this report are presented in both basic prices and purchaser's (market) prices. The main difference between basic and purchasers' price is the taxes less subsidies (net taxes) on product. A tax on a product is a tax that is payable per unit of some good or service. The tax may be a specific amount of money per unit or a specified percentage of the value of the goods or services. In the Cayman Islands, taxes on product are primarily taxes and duties on imports, and other taxes on product excluding taxes and duties on import (e.g. hotel occupancy tax).
- 1.4 For 2013, nominal (current) basic price GDP for the Cayman Islands stood at CI\$2,651.5 million which resulted in an estimated per capita GDP of CI\$47,170.15.
- 1.5 Basic price real GDP (i.e. GDP at constant 2007 prices or GDP adjusted for inflation) stood at CI\$2,492.9 million in 2013. The corresponding per capita GDP for 2013 was estimated at CI\$44,347.74.
- 1.6 The local economy registered the third consecutive year of expansion in 2013 registering growth in real GDP of 1.4 percent when compared to 2012. This continued on the 1.2 percent growth recorded in 2011 and 2012. The five industries that recorded the highest rates of expansion in 2013 are: (i) Hotels & Restaurants (5.9%), (ii) Transport & Storage (2.6%); (iii) Public Administration & Defense (1.9%) (iv) Administrative & Support Services Activities which consists mainly of security



and car rental services (1.7%); (v) Wholesale & Retail Trade (1.6%); and (vi) Human Health & Social Work (1.6%). The Financial & Insurance Services industry posted growth of 1.3 percent in 2013, marginally lower than the 1.4 percent growth posted in 2012.

- 1.7 The expansion in the domestic economy in 2013 was dampened by declines in the following industries: (i) Agriculture & Fishing (-2.9%); (ii) Mining & Quarrying (-1.4%); (iii) Water Supply, Sewerage & Waste Management (-1.2%) and (iv) Real Estate Activities (-0.3%).
- 1.8 Financial and Insurance Services maintained its position as the largest single direct contributor to real GDP in 2013 accounting for 42.1 percent of total GDP. This is a marginal decline from the 42.2 percent recorded for 2012. The other industries making up the top six contributors include: (i) Professional, Scientific & Technical Activities, which includes legal and accounting services (14.0%); (ii) Real Estate Activities (8.5%); (iii) Wholesale & Retail Trade (8.4%); (iv) Public Administration & Defense which consists primarily of central government operations (7.6%); and (v) Hotels and Restaurants (6.0%). 2013 saw no change in the relative ranking of the industries within the Cayman Islands' economy.
- 1.9 The GDP broken down by income components showed mixed results for 2013 when compared to the previous period with two components showing increases and two declining. There were increases in Taxes (less subsidies) on Production and Imports (18.1%) and Compensation of Employees¹ (2.2%) while declines were recorded for Operating Surplus/Mixed Income (-3.5%) and Consumption of Fixed Capital² (-0.3%). In 2013, total compensation of employees increased to CI\$1,444.4 million or 50.6 percent of GDP, while total taxes on production and imports (less subsidies) reached CI\$466.2 million or 18.1 percent of GDP. On the other hand, total operating surplus/mixed income declined to CI\$771.4 million or 27.0 percent of GDP and total consumption of fixed capital reached CI\$173.4 million or 6.1 percent of GDP.

¹ Compensation of employees is defined as the total remuneration, in cash or in kind, payable by an enterprise to an employee in return for work done by the latter during the accounting period.

² Consumption of fixed capital is the decline, during the course of the accounting period, in the current value of the stock of fixed and intangible assets owned and used by a producer as a result of physical deterioration, normal obsolescence or normal accidental damage.



2. INTRODUCTION

2.1 Importance of the SNA

The SNA is a system of accounts that is used globally to measure the economic performance of countries and jurisdictions using accepted international standards issued by the United Nations and the International Monetary Fund (among others). In the context of the Cayman Islands, its main uses are to:

- a. Comply with the Public Management & Finance Law (2013 Revision) which requires the reporting of gross domestic product in the Strategic Policy Statement. Governments in general use the SNA statistics as key indicators for evaluating the potential and actual macro-economic impact and sustainability of fiscal policies.
- b. Comply with data requirements of foreign investors and creditors. For example, data from the SNA are required for inclusion in official borrowing documents (i.e., Offering Memorandum or Private Placement Memorandum). These statistics are necessary to making an assessment of the worthiness of the jurisdiction as an investment site and/or the worthiness of its entities as borrowers.
- c. Comply with data requirements of international credit rating agencies which provide credit ratings for the Cayman Islands Government and private entities who borrow from the global financial market.
- d. Provide necessary data for the conduct of economic impact assessments of hurricanes and other disasters, which are required by funding and other donor agencies. As pointed out by previous teams from the Economics Commission for Latin America and the Caribbean (ECLAC), the GDP statistics by sector for Cayman are necessary in calculating the economic impact of disasters in each sector and therefore, the approximate amount of resources required for the reconstruction of these sectors.
- e. Provide data necessary for government departments and business associations to monitor the economic performance and contribution of their respective sectors; and
- f. Provide data that can assist government departments, local businesses and non-government organizations in preparing business plans or determining the level of assistance to businesses. These statistics help determine the "buying power" or the size of the local market, the potential growth of the market, and alternative sectors for investment.



2.2 Key Data Sources

The SNA estimates contained in this report are based on the Annual National Accounts Survey (ANAS) conducted among all businesses and establishments included in the ESO Business Register. The survey was conducted during the period March to May 2014. Information from the survey is supplemented by secondary data provided by various government ministries, departments and statutory authorities including the Cayman Islands Monetary Authority (CIMA), Department of Agriculture, and other informal interviews with industry sources.

As in any survey, the response rate to the ANAS is mainly a function of the appreciation and understanding of the respondents on how the data will be used. It is hoped that this report will be an instrument in demonstrating the potential uses of the SNA to the business sector, business associations and those providing services to the businesses in the Cayman Islands.

2.3 Valuation of Gross Domestic Product (GDP)

Some tables are presented at both basic and purchasers' (i.e. market) price. The main difference between basic and purchasers' price is the taxes less subsidies (net taxes) on products. Taxes on products are taxes on goods and services that become payable when the goods are produced, sold, imported or otherwise disposed of by their producer. The tax may be a specific amount of money per unit or a specified percentage of the value of the goods or services. The following are the categories of this type of tax:

- a. Taxes and duties on imports
- b. Other taxes on product excluding taxes and duties on import (e.g. hotel occupancy tax).



3. GROSS DOMESTIC PRODUCT ESTIMATES-PRODUCTION APPROACH

3.1 Overview of GDP at basic and purchasers' prices

The Cayman Islands' System of National Accounts Report 2013 presents the gross domestic product (GDP) estimates for the period 2009-2013.³ The estimates were calculated using both the production and income approaches. The production approach to estimating GDP is obtained by summing the value added of all industries within the economy (i.e. the gross value of outputs minus the value of intermediate consumption). The income approach is obtained by summing the income earned by the factors of production - compensation of employees, consumption of fixed capital, taxes less subsidies on production and imports, and operating surplus.

This section presents a series of tables and figures showing various presentations of the preliminary 2013 estimates of GDP by industry as follows:

- Main aggregates of GDP and the per capita indicators (Table 1);
- GDP by industrial origin (Table 2);
- Goods and service-producing industries' contribution to GDP at constant basic prices (Table 3);
- Industry ranking by contribution to GDP at constant (2007) basic prices (Table 4);
- GDP rate of growth at constant prices (Table 5);
- GDP at current basic prices (Table 6); and
- Detailed value added by industries (Table 7).

The recovery of Cayman Islands' economy continued in 2013 as it recorded the strongest annual expansion since 2007 with growth in total value of goods and services produced (as reflected by the GDP) of 1.4 percent. This represents a higher rate of increase than the 1.2 percent registered in 2012. The economic expansion was fuelled by a 1.5 percent increase in the services industries, outweighing the -0.2 percent decline in the goods-producing industries. The growth in the services industries emanated mainly from the growth in the Hotels & Restaurant Services and Transport & Storage Services industries.

Table 1 below shows the total value of domestic output for the years 2009 to 2013. Domestic output relates to all entities that have a physical presence in the Cayman Islands; therefore, they exclude entities registered in the Cayman Islands but have no physical presence in the country. Table 1 show the current and constant (i.e. inflation adjusted) price estimates of GDP valued in both basic and purchasers' prices. The table also show the per capita indicator relating to the respective GDP aggregates.

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³ GDP by income components is provided for the period 2008-2013.



The 1.4 percent increase in the overall real GDP⁴, translated into a 1.3 percent increase in the real GDP per capita as there was a slight increase in the estimated mid-year population. The inflation-adjusted per capita GDP (at basic prices) increased to CI\$44,347.74 in 2013 from CI\$43,793.81 in 2012.

Table 1: System of National Accounts Main Aggregates and Per Capita Indicators

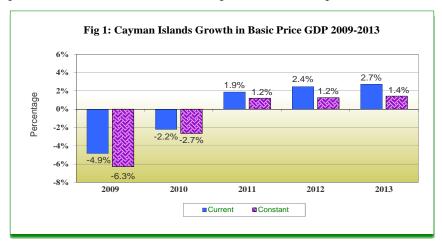
Main Aggregates (CI\$'000)	2009	2010	2011 ^R	2012 ^R	2013
GDP (Current Basic Prices)	2,528,864.0	2,472,720.0	2,519,255.6	2,580,948.7	2,651,528.5
GDP (Constant Basic Prices)	2,464,824.3	2,398,999.7	2,427,776.4	2,457,927.9	2,492,875.0
GDP (Current Purchasers' Prices)	2,703,056.2	2,646,332.0	2,712,661.6	2,781,951.9	2,855,352.2
GDP (Constant Purchasers' Prices)	2,633,465.6	2,561,951.6	2,591,901.3	2,623,474.4	2,656,121.4
Mean Population ('000)	56.5	55.5	55.3	56.1	56.2
Per Capita Indicators (CI\$)	2009	2010	2011 ^R	2012 ^R	2013
GDP (Current Basic Prices)	44,752.3	44,536.7	45,575.1	45,985.7	47,170.2
GDP (Constant Basic Prices)	43,619.0	43,208.9	43,920.2	43,793.8	44,347.7
GDP (Current Purchasers' Prices)	47,834.9	47,663.6	49,074.0	49,567.1	50,796.1
GDP (Constant Purchasers' Prices)	46,603.4	46,143.8	46,889.3	46,743.4	47,251.9

Notes:

- 1. GDP at basic price excludes net taxes on goods and services
- 2. GDP at purchasers' price includes net taxes on goods and services
- 3. Mean Population refers to the mid-year population

R-revised

Figure 1 shows the comparative growth rates of GDP at current and constant basic prices. As is shown in the chart below, GDP at constant prices grew by 1.4 percent in 2013 following on the 1.2 percent expansion registered in 2012. GDP at current prices grew by 2.7 percent in 2013, an increase compared to the 2.4 percent in 2012.



⁴ Real GDP refers to GDP at constant (2007) prices, i.e. the inflation-adjusted GDP



3.2 GDP by industrial origin

Estimated real GDP for the Cayman Islands increased to CI\$2,492.9 million in 2013 from the CI\$2,457.9 million recorded for 2012. There was expansion in the economic activity of fourteen (14) of the eighteen (18) industries led by the growth in the activities of hotels and restaurants. Table 2 below provides a breakdown of real GDP by industrial sectors in basic prices.⁵ The table also shows the real GDP in purchasers' prices.

CAYMAN ISLANI	OS GDP BY I	NDUSTRIAL	ORIGIN		
TABLE 2: GDP AT CONSTANT B	ASIC & PURCI	HASERS' PRIC	CES, 2007=10	0 (CI\$'000)	
INDUSTRIAL SECTORS	2009	2010	2011 ^R	2012 ^R	2013
01 Agriculture & Fishing	8,893.8	8,763.3	9,081.7	9,307.1	9,036.7
02 Mining & Quarrying	20,321.2	18,263.6	17,826.9	19,297.2	19,017.5
03 Manufacture	24,566.4	22,053.8	21,632.4	22,402.3	22,542.9
04 Electricity, Gas & Air Conditioning Supply	59,694.6	59,252.8	59,463.3	58,811.4	59,625.2
05 Water Supply, Sewerage & Waste Management	36,394.9	34,994.0	34,209.4	34,616.7	34,197.1
06 Construction	100,666.8	77,500.3	75,256.9	76,443.1	76,554.1
07 Wholesale & Retail Trade	216,449.0	198,458.0	202,236.4	204,935.8	208,236.1
08 Transport & Storage	95,959.8	94,595.2	95,672.9	97,698.6	100,255.7
09 Hotels & Restaurants	120,845.9	128,813.2	136,316.3	140,528.9	148,789.6
10 Information & Communication	118,966.3	113,883.3	113,804.3	115,379.3	115,870.3
11 Financial & Insurance Services	1,053,303.5	1,017,164.7	1,023,138.1	1,037,323.9	1,050,633.0
12 Real Estate Activities	218,554.2	214,577.8	213,330.3	212,855.1	212,245.8
13 Professional, Scientific & Technical Activities	323,027.9	327,583.3	334,150.6	342,871.1	348,108.1
14 Administrative & Support Service Activities	51,251.0	50,298.8	51,158.2	54,018.0	54,960.8
15 Public Administration & Defense	187,197.1	181,368.5	181,715.0	185,903.6	189,366.3
16 Education Services	67,230.6	65,652.1	65,127.2	65,668.1	66,430.2
17 Human Health & Social Work	74,839.9	75,319.2	76,589.7	77,022.8	78,251.9
18 Other Services	75,889.5	75,790.0	76,343.4	78,448.5	79,088.0
Total	2,854,052.3	2,764,331.8	2,787,053.0	2,833,531.4	2,873,209.3
Less: Financial Services Indirectly Measured (FISIM)	389,228.0	365,332.1	359,276.6	375,603.6	380,334.2
GDP at Constant Basic Prices	2,464,824.3	2,398,999.7	2,427,776.4	2,457,927.9	2,492,875.0
Add: Taxes Less Subsidies on Products	168,641.2	162,951.9	164,124.9	165,546.5	163,246.4
GDP at Constant Purchasers' Prices	2,633,465.6	2,561,951.6	2,591,901.3	2,623,474.4	2,656,121.4

R-revised

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⁵ The classification of the industrial sectors is according to the International Standard Industrial Classification of all Economic Activities (ISIC) Revision 4 which is an activity based classification. The detailed ISIC Rev. 4 classification is presented in Appendix 3.



3.3 Contribution to GDP by industry

Table 3 shows the industries classified as goods-producing and service-producing. There was a marginal increase in the combined share of service producing industries in 2013, moving to 94.9 percent from 94.8 in 2012. This is a continuation of the increasing importance of services to the health of the local economy. These industries have increased their contribution every year over the review period except for 2012 when they posted a marginal decline.

CAYMAN ISLANDS GI	OP BY IND	USTRIAL (ORIGIN		
TABLE 3: INDUSTRY CONTRIBUTION TO	GDP AT CO	ONSTANT B	ASIC PRICE	S, 2007=100)
INDUSTRY	2009	2010	20 11 ^R	2012 ^R	2013
Goods Producing Industries	6.3%	5.3%	5.1%	5.2%	5.1%
01 Agriculture & Fishing	0.4%	0.4%	0.4%	0.4%	0.4%
02 Mining & Quarrying	0.8%	0.8%	0.7%	0.8%	0.8%
03 Manufacture	1.0%	0.9%	0.9%	0.9%	0.9%
06 Construction	4.1%	3.2%	3.1%	3.1%	3.1%
Service Producing Industries	93.7%	94.7%	94.9%	94.8%	94.9%
04 Electricity, Gas & Air Conditioning Supply	2.4%	2.5%	2.4%	2.4%	2.4%
05 Water Supply, Sewerage & Waste Management	1.5%	1.5%	1.4%	1.4%	1.4%
07 Wholesale & Retail Trade	8.8%	8.3%	8.3%	8.3%	8.4%
08 Transport & Storage	3.9%	3.9%	3.9%	4.0%	4.0%
09 Hotels & Restaurants	4.9%	5.4%	5.6%	5.7%	6.0%
10 Information & Communication	4.8%	4.7%	4.7%	4.7%	4.6%
11 Financial & Insurance Services	42.7%	42.4%	42.1%	42.2%	42.1%
12 Real Estate Activities	8.9%	8.9%	8.8%	8.7%	8.5%
13 Professional, Scientific & Technical Activities	13.1%	13.7%	13.8%	13.9%	14.0%
14 Administrative & Support Service Activities	2.1%	2.1%	2.1%	2.2%	2.2%
15 Public Administration & Defense	7.6%	7.6%	7.5%	7.6%	7.6%
16 Education Services	2.7%	2.7%	2.7%	2.7%	2.7%
17 Human Health & Social Work	3.0%	3.1%	3.2%	3.1%	3.1%
18 Other Services	3.1%	3.2%	3.1%	3.2%	3.2%
Less: Financial Services Indirectly Measured (FISIM)	15.8%	15.2%	14.8%	15.3%	15.3%
GDP at Constant Basic Prices	100.0%	100.0%	100.0%	100.0%	100.0%

R-revised

An examination of the contribution of the various industries to the domestic economy is useful in discerning their relative ranking. Table 4 below shows the contribution of the eighteen (18) industries as well as their ranking over the period under review. The rankings reflect the relative importance of an industry (as it pertains to contribution to GDP) to the Cayman Islands' economy. The relative ranking of the industries remained



unchanged in 2013 when compared to 2012 despite changes in the individual contribution of six (6) of the eighteen (18) industrial sectors. Of the six industries registering a change in their contribution, three registered increases while three registered declines.

		TAE	BLE 4: I	NDUST	RY CONTRIBUTION TO GDP AT CONSTANT BASIC	PRICES	, 2007=	100				
	i	Ranking	9		INDUSTRY	% Contribution to GDP						
2009	2010	2011	2012	2013	INDUSTRI	2009	2010	2011	2012	2013		
1	1	1	1	1	Financial & Insurance Services	42.7	42.4	42.1	42.2	42.1		
2	2	2	2	2	Professional, Scientific & Technical Activities	13.1	13.7	13.8	13.9	14.0		
3	3	3	3	3	Real Estate Activities	8.9	8.9	8.8	8.7	8.5		
4	4	4	4	4	Wholesale & Retail Trade	8.8	8.3	8.3	8.3	8.4		
5	5	5	5	5	Public Administration & Defense	7.6	7.6	7.5	7.6	7.6		
6	6	6	6	6	Hotels & Restaurants	4.9	5.4	5.6	5.7	6.0		
7	7	7	7	7	Information & Communication	4.8	4.7	4.7	4.7	4.6		
9	8	8	8	8	Transport & Storage	3.9	3.9	3.9	4.0	4.0		
10	10	10	9	9	Other Services	3.1	3.2	3.1	3.2	3.2		
11	11	9	10	10	Human Health & Social Work	3.0	3.1	3.2	3.1	3.1		
8	9	11	11	11	Construction	4.1	3.2	3.1	3.1	3.1		
12	12	12	12	12	Education Services	2.7	2.7	2.7	2.7	2.7		
13	13	13	13	13	Electricity, Gas & Air Conditioning Supply	2.4	2.5	2.4	2.4	2.4		
14	14	14	14	14	Administrative & Support Service Activities	2.1	2.1	2.1	2.2	2.2		
15	15	15	15	15	Water Supply, Sewerage & Waste Management	1.5	1.5	1.4	1.4	1.4		
16	16	16	16	16	Manufacture	1.0	0.9	0.9	0.9	0.9		
17	17	17	17	17	Mining & Quarrying	0.8	0.8	0.7	0.8	0.8		
18	18	18	18	18	Agriculture & Fishing	0.4	0.4	0.4	0.4	0.4		
					Less: Financial Services Indirectly Measured (FISIM)	15.8	15.2	14.8	15.3	15.3		
					GDP at Constant Basic Prices	100.0	100.0	100.0	100.0	100.0		

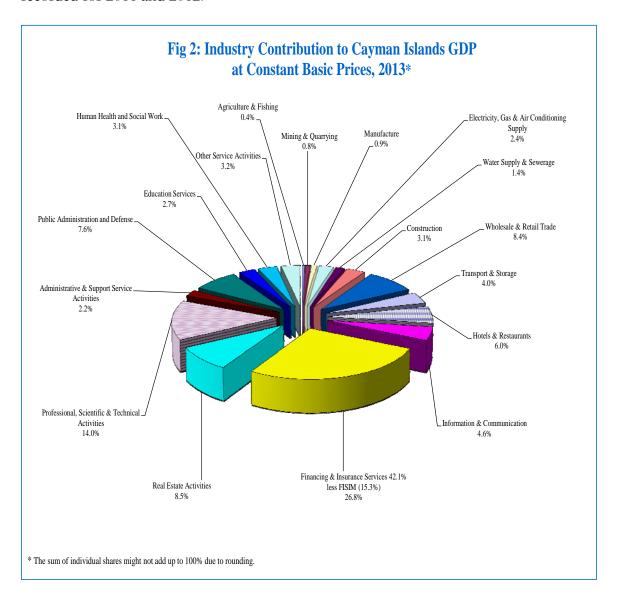
Financial and Insurance Activities maintained its dominance as the largest single direct contributor to the real GDP of the Cayman Islands accounting for 42.1 percent in 2013. In 2012, the industry seems to have arrested the gradual decline posted over the review period but marginally declined in 2013.

Professional, Scientific & Technical Activities continued on its upward trajectory increasing its share of real GDP and maintaining its position as the second largest contributor. The review period saw the industry's contribution further increasing to 14.0 percent in 2013 from the 13.1 percent recorded in 2009. The performance of this industry is primarily influenced by legal and accounting services which continue to experience increased activity with the recovery of the financial services industry.



Other significant contributions to GDP in 2013 came from Real Estate Activities (8.5 %) notwithstanding its continued decline from the 8.7 percent in 2012 and 8.8 percent registered in 2011. Wholesale & Retail Trade experienced a bump in its contribution, moving to 8.4 percent in 2013, compared to 8.3 percent in 2012. The contribution of Public Administration and Defense remained unchanged in 2013 at 7.6 percent. Hotel & Restaurant Activities continued to increase its contribution to 6.0 percent in 2013 from 5.7 percent in 2012 and 5.6 percent in 2011. This represents the largest increase in individual industry contribution in 2013. This reflected continued vibrancy in the stay-over segment of tourism activity.

Construction maintained its eleventh place in 2013 stemming its slide down the ranking from sixth place in 2008. It posted a contribution of 3.1 percent in 2013, similar to that recorded for 2011 and 2012.





3.4 GDP rates of growth by industry

Table 5 shows the growth rate of real GDP broken down by industry. In 2013, there was economic growth in fourteen (14) of the eighteen (18) industries led by a 5.9 percent increase in the activities of hotels and restaurants. The other main contributors to the overall growth are Transport & Storage (2.6%), Public Administration & Defense (1.9%), and Administrative & Support Services Activities – which consists mainly of security and car rental services (1.7%). There were declines in four (4) industries: Agriculture & Fishing (-2.9%), Mining & Quarrying (-1.4%), Water Supply, Sewerage & Waste Management (-1.2%), and Real Estate Activities (-0.3%).

The expansion in the domestic economy was due to increased activity in the service industries as the goods-producing industries contracted in 2013. The services industries (which accounted for 94.9 percent of GDP in 2013) grew by 1.5 percent fuelled mainly by the growth in the activities of hotels and restaurants. The contraction in the goods producing industries in 2013 reversed the expansion recorded in 2012. These industries declined overall by 0.2 percent led by agriculture and fishing activities which contracted by 2.9 percent.

CAYMAN ISLAND	S GDP BY II	NDUSTRIAL (ORIGIN		
TABLE 5: RATE OF GROWTH OF GDP AT	CONSTANT	BASIC & PUR	CHASERS' PR	RICES, 2007=1	00
INDUSTRY	2009	2010	20 11 ^R	2012 ^R	2013
Goods Producing Industries	-22.1%	-18.0%	-2.2%	2.9%	-0.2%
01 Agriculture & Fishing	10.2%	-1.5%	3.6%	2.5%	-2.9%
02 Mining & Quarrying	-4.8%	-10.1%	-2.4%	8.2%	-1.4%
03 Manufacture	-7.4%	-10.2%	-1.9%	3.6%	0.6%
06 Construction	-29.3%	-23.0%	-2.9%	1.6%	0.1%
Service Producing Industries	-7.6%	-2.3%	1.0%	1.6%	1.5%
04 Electricity, Gas & Air Conditioning Supply	1.6%	-0.7%	0.4%	-1.1%	1.4%
05 Water Supply, Sewerage & Waste Management	6.1%	-3.8%	-2.2%	1.2%	-1.2%
07 Wholesale & Retail Trade	-11.5%	-8.3%	1.9%	1.3%	1.6%
08 Transport & Storage	-7.4%	-1.4%	1.1%	2.1%	2.6%
09 Hotels & Restaurants	-10.1%	6.6%	5.8%	3.1%	5.9%
10 Information & Communication	3.3%	-4.3%	-0.1%	1.4%	0.4%
11 Financial & Insurance Services	-14.1%	-3.4%	0.6%	1.4%	1.3%
12 Real Estate Activities	-1.7%	-1.8%	-0.6%	-0.2%	-0.3%
13 Professional, Scientific & Technical Activities	1.8%	1.4%	2.0%	2.6%	1.5%
14 Administrative & Support Service Activities	-5.4%	-1.9%	1.7%	5.6%	1.7%
15 Public Administration & Defense	-3.9%	-3.1%	0.2%	2.3%	1.9%
16 Education Services	0.9%	-2.3%	-0.8%	0.8%	1.2%
17 Human Health & Social Work	0.0%	0.6%	1.7%	0.6%	1.6%
18 Other Services	0.8%	-0.1%	0.7%	2.8%	0.8%
Total	-8.5%	-3.1%	0.8%	1.7%	1.4%
Financial Services Indirectly Measured (FISIM)	-20.6%	-6.1%	-1.7%	4.5%	1.3%
GDP at Constant Basic Prices	-6.3%	-2.7%	1.2%	1.2%	1.4%
Taxes Less Subsidies on Products	-18.6%	-3.4%	0.7%	0.9%	-1.4%
GDP at Constant Purchasers' Prices	-7.2%	-2.7%	1.2%	1.2%	1.2%

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3.4.1 Goods-producing industries

The decline in output for goods-producing industries in 2013 reversed the growth in 2012 after five (5) consecutive years of decline.

Agriculture and Fishing declined by 2.9 percent in 2013 reversing the 2.5 percent expansion in 2012. The contraction in output resulted from declines in the production of flowers and ornamental plants (-1.6%) and fishing activities (-9.0%).

The Mining and Quarrying industry declined in 2013 as it did in prior years during the review period (except for 2012). The industry declined by 1.4 percent in 2013 after posting growth of 8.2 percent in 2012 following declines of 2.4 percent, 10.1 percent and 4.8 percent in 2011, 2010 and 2009 respectively. This is attributed to the decline in demand for stone, fill and marl associated with the contraction in the Building Construction sub-industry of 0.2 percent.

The Manufacturing industry posted a second year of growth in 2013, increasing marginally by 0.6 percent. This follows the 3.6 percent expansion 2012. This occurred on the back of increases in output of food and beverage products and structural metal products.

The Construction industry registered marginal growth in 2013, continuing on the recovery started in 2012. The industry grew by 0.1 percent in 2013 following growth of 1.6 percent in 2012. The industry experienced declines of 2.9 percent in 2011, 23.0 percent in 2010, and 29.3 percent in 2009.

3.4.2 Service-producing industries

In 2013, the service-producing industries grew for the third successive year, posting growth of 1.5 percent. This follows on the 1.6 percent and 1.0 percent increases registered for 2012 and 2011 respectively which is a recovery from two years of decline in 2010 (-2.3%) and 2009 (-7.6%). Most industries recorded growth in 2013, albeit marginally, relative to the growth rates in 2012.

The Electricity, Gas & Air Conditioning Supply industry recorded a turn-around in 2013 with growth of 1.4 percent from a decline of 1.1 percent in 2012. This occurred on the back of a rise in electricity consumption in Grand Cayman, which moved from 547,809 megawatt hours (Mwhrs) in 2012 to 555,712 megawatt hours (Mwhrs) in 2013. The increase is attributed to higher commercial and residential electricity consumption.

The Water Supply, Sewerage and Waste Management industry contracted in 2013 by 1.2 percent, reversing the increase in 2012 of 1.2 percent. The decline in the industry is



mainly associated with the decline in water consumption which moved from 1,754.0 million US gallons in 2012 to 1,630.9 million US gallons in 2013.

Wholesale & Retail trade grew in 2013 by 1.6 percent which represented the third consecutive year of positive outturn, with 2012 and 2011 increasing by 1.3 percent and 1.9 respectively. The increase in output resulted from the growth in average domestic demand (with contribution from the increase in stay-over visitors) despite the decrease in the resident population in 2013. The increase in demand is reflected in the growth in total imports.

The expansion in the Transport and Storage industry occurred at a faster rate in 2013 with growth of 2.6 percent compared to 2.1 percent in 2012. This continues on the 1.1 percent growth experienced in 2011. The Transport Services sub-industry grew by 2.5 percent; the main contributors were cargo transportation (1.8%) and air transportation (3.8%). There was also positive performance for supporting transport activities (including the statutory authorities in this sub-industry) which posted growth of 3.2 percent in 2013.

The Hotels and Restaurants industry posted its fourth consecutive year of growth, increasing by 5.9 percent in 2013. This represents the highest individual industry growth in 2013. Contributing to a large extent was the 7.4 percent increase in the number of stay-over visitors in 2013, moving from 321.7 thousands in 2012 to 345.4 thousands in 2013.

Information and Communication activities grew by 0.4 percent in 2013, representing the second consecutive year of growth, albeit at a diminishing rate. This follows a growth of 1.4 percent in 2012 compared to two periods of decline in 2011 (-0.1%) and 2010 (-4.3%). The slow-down of the industry in 2013 is attributed to a 0.6 percent decline in the Telecommunications sub-industry.

The Financial and Insurance Services industry maintained its positive outturn in 2013, registering a growth of 1.3 percent adding to the expansion of 1.4 percent in 2012. The increase in the industry was attributed to improved performances in all but one sub-industry. There were increases in Monetary Institutions (2.2%), Insurance Services (1.4%), and Other Financial Institutions (1.2%) with Financial Services declining by 1.2 percent.⁶

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⁶ The Financial Services sub-industry consists mainly of investment advisory services, administered, licenced and registered funds, and trusts companies.



Real Estate Activities continued its contraction in 2013, declining by 0.3 percent adding to four previous years of decline. There were declines in three of the four sub-industries: Operations of Owner-Occupied Dwellings (-0.9%), Renting of Residential Buildings (-0.5%) and Renting of Commercial Buildings (-0.7%). In contrast, the Other Real Estate Activities (mainly real estate agents and brokers) sub-industry grew by 3.1 percent.

The Professional, Scientific & Technical Activities industry continued its expansion in 2013, recording growth of 1.5 percent following the 2.6 percent growth posted in 2012. This expansion was due mainly to the performance of legal services (1.0%) and accounting services (0.6%).

Administrative & Support Service Activities grew by 1.7 percent in 2013, lower than the 5.6 percent increase in 2012. As in prior years, the growth in the industry was dominated by increases in car rental services (2.9%) and security activities (1.6%).

Public Administration and Defense posted its third successive year of growth, growing by 1.9 percent in 2013 adding to the improved performances in 2012 and 2011 of 2.3 percent and 0.2 percent respectively. The increase in 2013 was fuelled by the 4.1 percent increase in personnel cost of core government which moved from CI\$226.5 million in 2012 to CI\$235.7 million in 2013.

Education Services grew for the second year in a row, posting a 1.2 percent increase in 2013 adding to the expansion of 0.8 percent in 2012. Contributing to this was the positive outturn in both the Public and Private Education sub-industries of 0.9 percent and 1.6 percent respectively.

Human Health and Social Work continued its expansion, accelerating its rate of growth to 1.6 percent in 2013 following growth of 0.6 percent in 2012. The Private Health & Social Work sub-industry was the main driver of the expansion, growing by 3.8 percent, while Public Health & Social Service also contributed with a growth of 0.7 percent.

The value added of the Other Services industry grew by 0.8 percent in 2013, lower than the growth recorded in 2012 of 2.8 percent. The growth was against the background of a 0.1 percent increase in the activities of private households with employed persons and a 2.2 percent increase in the Arts, Entertainment and Recreation sub-industry. Diving and related activity (which is directly impacted by the growth in stay-over visitors) continue to be the main driver in the Arts, Entertainment and Recreation sub-industry, growing by 3.2 percent.

In summary, the Cayman Islands' economy posted its third successive year of expansion in 2013, at a marginally higher rate than that recorded for 2012. The economy continued



to experience (at varying degrees) the impact of the global economic environment. However, the continued growth in stay-over visitors and increased activity in financial services augur well for further expansion in domestic economic activity.

3.5 Industrial Sector GDP at Current Prices

CAYMAN ISLAN	NDS GDP BY	INDUSTRIAL	. ORIGIN		
TABLE 6: GDP AT CURR	ENT BASIC & F	PURCHASERS'	PRICES (CI\$'00	00)	
INDUSTRIAL SECTORS	2009	2010	2011 ^R	2012 ^R	2013
01 Agriculture & Fishing	8,943.5	8,814.0	9,226.4	9,544.5	9,367.4
02 Mining & Quarrying	22,344.4	20,295.6	18,624.3	19,991.1	19,894.3
03 Manufacturing	24,875.7	23,216.3	23,281.9	24,619.8	25,095.2
04 Electricity, Gas & Air Conditioning Supply	51,705.8	54,574.6	55,235.1	55,729.2	59,297.2
05 Water Supply, Sewerage & Waste Management	34,681.1	35,867.8	33,414.7	35,696.2	34,172.1
06 Construction	106,589.2	85,115.9	83,860.4	86,196.6	88,175.0
07 Wholesale & Retail Trade	220,612.0	203,302.9	211,591.2	218,529.9	226,309.9
08 Transport & Storage	98,524.4	98,800.9	100,699.4	104,133.5	108,870.4
09 Hotels & Restaurants	129,983.2	137,431.1	147,805.7	156,076.8	167,451.4
10 Information & Communication	110,105.3	101,917.3	101,676.9	102,244.8	101,341.7
11 Financial & Insurance Services	1,096,258.8	1,056,103.6	1,067,176.9	1,082,590.3	1,114,941.3
12 Real Estate Activities	223,492.9	218,323.2	220,588.8	223,220.3	223,404.5
13 Professional, Scientific & Technical Activities	332,927.4	338,810.6	346,434.6	361,287.0	373,084.9
14 Administrative & Support Service Activities	52,802.7	52,524.5	53,540.0	56,126.0	57,954.7
15 Public Administration & Defense	189,231.9	180,483.8	179,069.2	186,827.6	187,705.1
16 Education Services	69,768.2	68,235.7	67,132.3	68,379.7	69,939.9
17 Human Health & Social Work	72,764.4	75,572.1	79,917.5	83,839.4	84,973.2
18 Other Services	78,827.7	79,346.0	80,105.2	83,836.3	87,803.0
Total	2,924,438.5	2,838,735.8	2,879,380.4	2,958,868.9	3,039,781.3
Less: Financial Services Indirectly Measured (FISIM)	395,574.6	366,015.8	360,124.8	377,920.3	388,252.9
GDP at Current Basic Prices	2,528,864.0	2,472,720.0	2,519,255.6	2,580,948.6	2,651,528.5
Add: Taxes Less Subsidies on Products	174,192.3	173,612.0	193,406.0	201,003.2	203,823.7
GDP at Current Purchasers' Prices	2,703,056.2	2,646,332.0	2,712,661.6	2,781,951.8	2,855,352.2

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3.6 Detailed Value Added by Industry

Table 7: DETAILED VALUE ADDED BY INDUSTRY		CU	RRENT (CI\$'0	000)			CON	ISTANT (CI\$'	000)	
INDUSTRIAL SECTOR	2009	2010	2011 ^R	2012 ^R	2013	2009	2010	2011 ^R	2012 ^R	2013
AGRICULTURE & FISHING	8,943.5	8,814.0	9,226.4	9,544.5	9,367.4	8,893.8	8,763.3	9,081.7	9,307.1	9,036.7
Growing of Agricultural Crops	5,303.2	5,074.3	5,385.1	5,636.3	5,723.5	5,369.7	5,139.1	5,382.8	5,567.7	5,551.8
Farming of Animals	1,051.4	1,019.0	1,114.0	1,004.7	1,002.0	935.1	903.6	971.7	901.8	902.8
Capture Fishing	2,589.0	2,720.7	2,727.3	2,903.4	2,642.0	2,589.0	2,720.7	2,727.3	2,837.7	2,582.2
MINING & QUARRYING	22,344.4	20,295.6	18,624.3	19,991.1	19,894.3	20,321.2	18,263.6	17,826.9	19,297.2	19,017.5
Quarrying incl. Stone, Sand and Gravel	22,344.4	20,295.6	18,624.3	19,991.1	19,894.3	20,321.2	18,263.6	17,826.9	19,297.2	19,017.5
MANUFACTURE	24,875.7	23,216.3	23,281.9	24,619.9	25,095.2	24,566.4	22,053.8	21,632.4	22,402.3	22,542.9
Food Products, Beverages and Tobacco Products	10,949.3	11,022.5	11,754.7	12,537.1	12,680.5	10,876.6	10,065.2	10,421.7	10,811.5	10,890.1
Builders' Carpentry and Joinery, incl. Furniture and Rubber and	,	ŕ	ŕ	ŕ	,		,	,	,	ŕ
Plastic Product	3,252.4	2,934.4	2,238.3	2,443.8	2,472.9	3,202.4	2,895.5	2,184.8	2,361.4	2,367.0
Non-Metallic Mineral Products (incl. Glass and Glass										
Products, Concrete, Cement)	2,986.3	2,200.6	2,185.4	2,412.4	2,530.0	2,917.3	2,145.6	2,103.1	2,292.8	2,330.1
Basic Metals, Fabricated Metal Products, Machinery &	4 700 0	0.045.0	0.705.0	0 700 5	0.004.5	4.054.0	0.000.4	0.040.7	0.000.0	0.070.4
Equipment	4,723.9	3,915.3	3,705.0	3,729.5	3,881.5	4,651.2	3,863.4	3,616.7	3,603.3	3,678.1
Other Manufacturing Goods n.e.c.	2,963.8	3,143.6	3,398.5	3,497.1	3,530.4	2,918.9	3,084.1	3,306.1	3,333.3	3,277.7
ELECTRICITY, GAS & AIR CONDITIONING SUPPLY	51,705.8	54,574.6	55,235.1	55,729.2	59,297.2	59,694.6	59,252.8	59,463.3	58,811.4	59,625.2
Production, Collection and Distribution of Electricity and the										
Manufacture of Ice	51,705.8	54,574.6	55,235.1	55,729.2	59,297.2	59,694.6	59,252.8	59,463.3	58,811.4	59,625.2
WATER SUPPLY, SEWERAGE & WASTE MANAGEMENT	34,681.1	35,867.8	33,414.7	35,696.2	34,172.1	36,394.9	34,994.0	34,209.4	34,616.7	34,197.1
Water Collection, Treatment and Distribution, Sewerage and										
Waste Collection	34,681.1	35,867.8	33,414.7	35,696.2	34,172.1	36,394.9	34,994.0	34,209.4	34,616.7	34,197.1
CONSTRUCTION	106,589.2	85,115.9	83,860.4	86,196.6	88,175.0	100,666.8	77,500.3	75,256.9	76,443.1	76,554.1
Construction (incl building installation, building completion, etc.)	106,589.2	85,115.9	83,860.4	86,196.6	88,175.0	100,666.8	77,500.3	75,256.9	76,443.1	76,554.1
WHOLESALE AND RETAIL TRADE & REPAIRS	220,612.0	203,302.9	211,591.2	218,529.9	226,309.9	216,449.0	198,458.0	202,236.4	204,935.8	208,236.1
Wholesale & Retail Trade	220,612.0	203,302.9	211,591.2	218,529.9	226,309.9	216,449.0	198,458.0	202,236.4	204,935.8	208,236.1
TRANSPORT AND STORAGE	98,524.4	98,800.9	100,699.4	104.133.5	108,870.4	95,959.8	94,595.2	95.672.9	97,698.6	100,255.7
Transport	38,833.2	40,090.0	40,188.6	42,338.1	44,144.9	39,331.9	40,933.2	41,212.3	42,405.0	43,473.3
Supporting Activities for Transport (incl Cargo)	52,478.2	52,229.4	53,781.7	54,948.2	57,895.4	49,982.2	47,672.6	48,401.5	49,260.7	50,843.5
Post and Courier Activities	7,213.0	6,481.5	6,729.2	6,847.2	6,830.2	6,645.6	5,989.3	6,059.1	6,032.8	5,938.8
HOTELS & RESTAURANTS	129,983.2	137,431.1	147,805.7	156,076.9	167,451.4	120,845.9	128,813.2	136,316.3	140,528.9	148,789.6
Hotels and Restaurants (incl Bars)	129,983.2	137,431.1	147,805.7	156,076.9	167,451.4	120,845.9	128,813.2	136,316.3	140,528.9	148,789.6
INFORMATION AND COMMUNICATION	110,105.3	101,917.3	101,676.9	102,244.8	101,341.7	118,966.3	113,883.3	113,804.3	115,379.3	115,870.3
Motion Picture Projection, Radio & TV Programming and	, 100.0	,	101,01010		191,97111		. 10,00010	110,00710		. 10,01010
Broadcasting and Telecommunications Activities	88,382.5	78,165.2	77,323.3	77,214.3	75,823.3	97,480.6	90,433.1	89,818.8	90,519.7	90,148.9
Publishing, Printing and Computer & Data Processing Services	21,722.9	23,752.1	24,353.6	25,030.4	25,518.4	21,485.7	23,450.2	23,985.5	24,859.6	25,721.4
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Table 7 cont'd: DETAILED VALUE ADDED BY INDUSTRY		CURRENT	(CI\$'000)			CONSTANT (CI\$'000)				
INDUSTRIAL SECTOR	2009	2010	2011 ^R	2012 ^R	2013	2009	2010	2011 ^R	2012 ^R	2013
FINANCIAL & INSURANCE SERVICES	1,096,258.8	1,056,103.6	1,067,176.9	1,082,590.3	1,114,941.3	1,053,303.5	1,017,164.7	1,023,138.1	1,037,323.9	1,050,633.0
Monetary Institutions (incl. CIMA)	649,181.3	616,462.2	623,720.3	622,587.8	644,898.7	588,908.0	561,429.9	562,951.8	564,783.6	577,284.1
Other Financial Institutions & Financial Services	246,892.1	240,824.8		247,589.5	248,609.0	258,796.1	250,915.0	253,371.3	257,075.4	254,959.6
Insurance, Pension Funding (incl. Auxiliary Activities)	200,185.4	198,816.6	200,565.9	212,412.9	221,433.6	205,599.4	204,819.8	206,814.9	215,464.9	218,389.3
REAL ESTATE ACTIVITIES	223,492.9	218,323.2	220,588.8	223,220.3	223,404.5	218,554.2	214,577.8	213,330.3	212,855.1	212,245.8
Operating of Owner-Occupied Dwellings	83,387.3	78,798.9	81,283.6	81,805.6	83,140.6	82,839.4	79,764.7	80,105.7	79,841.5	79,125.3
Renting of Residential Buildings	61,013.4	60,583.9	58,607.3	59,959.7	57,689.0	60,332.8	59,726.3	57,628.7	57,763.1	57,479.5
Renting of Commercial Buildings	57,052.5	57,025.1	58,431.5	58,059.8	58,566.4	53,413.8	52,791.0	53,073.8	51,995.0	51,655.5
Other Real Estate Activities	22,039.7	21,915.4	22,266.4	23,395.3	24,008.5	21,968.3	22,295.9	22,522.2	23,255.6	23,985.5
PROFESSIONAL, SCIENTIFIC AND TECHNICAL ACTIVITIES	332,927.4	338,810.6	346,434.6	361,287.0	373,084.9	323,027.9	327,583.3	334,150.6	342,871.1	348,108.1
Business Activities (incl. Legal & Accounting Services)	332,927.4	338,810.6	346,434.6	361,287.0	373,084.9	323,027.9	327,583.3	334,150.6	342,871.1	348,108.1
ADMINISTRATIVE AND SUPPORT SERVICE ACTIVITIES	52,802.7	52,524.5	53,540.0	56,126.0	57,954.7	51,251.0	50,298.8	51,158.2	54,018.0	54,960.8
Administrative and Support Service to Businesses (incl.	,	,	,	,	,	,	,	,	,	,
Renting of Machinery & Equipment)	52,802.7	52,524.5	53,540.0	56,126.0	57,954.7	51,251.0	50,298.8	51,158.2	54,018.0	54,960.8
PUBLIC ADMINISTRATION AND DEFENSE	189,231.9	180,483.8	179,069.2	186,827.6	187,705.1	187,197.1	181,368.5	181,715.0	185,903.6	189,366.3
Public Administration and Defense	189,231.9	180,483.8	179,069.2	186,827.6	187,705.1	187,197.1	181,368.5	181,715.0	185,903.6	189,366.3
EDUCATION SERVICES	69,768.2	68,235.7	67,132.3	68,379.7	69,939.9	67,230.6	65,652.1	65,127.2	65,668.1	66,430.2
Public Education	45,652.9	44,523.0	43,299.4	43,365.5	43,814.3	44,249.9	43,231.8	42,883.5	42,980.9	43,378.8
Private Education	24,115.3	23,712.7	23,832.9	25,014.2	26,125.6	22,980.7	22,420.3	22,243.7	22,687.2	23,051.4
HEALTH AND SOCIAL WORK	72,764.4	75,572.1	79,917.5	83,839.4	84,973.2	74,839.9	75,319.2	76,589.7	77,022.8	78,251.9
Public Health and Social Services	50,277.6	52,894.9	56,769.3	59,213.2	59,488.4	53,069.2	53,475.1	54,248.2	53,781.6	54,133.5
Private Health & Social Services	22,486.9	22,677.2	23,148.2	24,626.2	25,484.9	21,770.7	21,844.1	22,341.6	23,241.2	24,118.4
OTHER SERVICES	78,827.7	79,346.0	80,105.2	83,836.3	87,803.0	75,889.5	75,790.0	76,343.4	78,448.5	79,088.0
Private Arts, Entertainment & Recreation	27,178.4	27,480.9	27,884.5	29,657.5	31,380.1	25,582.6	25,309.4	25,513.7	26,763.1	27,362.0
Personal & Household Services (incl. Activities of Membership	21,110.4	21,400.9	21,004.0	20,001.0	J 1,300. I	20,002.0	20,000.4	20,010.1	20,703.1	L1,302.U
Organization)	29,913.0	30,479.1	30,589.3	31,221.2	31,697.7	28,682.5	29,204.6	29,309.6	29,126.8	29,143.5
Private Households with Employed Persons	21,736.3	21,386.0	1	22,957.6	24,725.2	21,624.4	29,204.0	29,509.0	22,558.6	23,143.3
Timate Households with Employed Felsons	21,700.0	21,000.0	21,001.0	22,001.0	27,120.2	21,024.4	21,210.0	21,020.0	22,000.0	22,002.0
FINANCIAL SERVICES Indirectly Measured (FISIM)	395,574.6	366,015.8	360,124.8	377,920.3	388,252.9	389,228.0	365,332.1	359,276.6	375,603.6	380,334.2
VALUE ADDED AT BASIC PRICES	2,528,864.0	2,472,720.0	2,519,255.6	2,580,948.7	2,651,528.5	2,464,824.3	2,398,999.7	2,427,776.4	2,457,927.9	2,492,875.0
TAXES LESS SUBSIDIES ON PRODUCTS	174,192.3	173,612.0	193,406.0	201,003.2	203,823.7	168,641.2	162,951.9	164,124.9	165,546.5	163,246.4
GROSS DOMESTIC PRODUCTS AT PURCHASERS' PRICES	2,703,056.3	2,646,332.0	2,712,661.6	2,781,951.9	2,855,352.2	2,633,465.6	2,561,951.6	2,591,901.3	2,623,474.4	2,656,121.4

R-revised



4. GROSS DOMESTIC PRODUCT ESTIMATES-THE INCOME APPROACH

4.1 GDP and Rate of Growth of GDP at Purchasers' Prices by Income

The Cayman Islands' Gross Domestic Product (GDP) at current purchasers' prices for 2013 stood at CI\$2,855.4 million. The components of GDP by type of income and their rates of growth are shown in Tables 7a and 7b below.

Table 7a: GROSS DOMESTIC PRODUCT (GDP) BY INCOME AT CURRENT PRICES (CI\$'000)										
Type of Income	2008	2009	2010	20 11 ^R	2012 ^R	2013				
Compensation of Employees	1,458,640.8	1,396,727.0	1,358,148.3	1,378,493.5	1,413,911.5	1,444,384.1				
Operating Surplus\Mixed Income	861,575.7	793,494.0	760,284.0	777,408.3	799,228.1	771,352.3				
Consumption of Fixed Capital	173,708.1	174,170.9	174,355.6	172,184.2	174,004.3	173,428.0				
Taxes less Subsidies on Production and Imports	379,712.1	338,664.4	353,544.3	384,575.6	394,808.2	466,187.7				
Gross Domestic Product at Purchasers' Prices	2,873,636.7	2,703,056.2	2,646,332.1	2,712,661.7	2,781,952.1	2,855,352.2				

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Table 7b: PERCENTAGE GROWTH of GDP BY INCOME AT CURRENT PURCHASERS' PRICES										
Time of Income	Percentage Growth									
Type of Income	2008	2009	2010	20 11 ^R	2012 ^R	2013				
Compensation of Employees	4.2	(4.2)	(2.8)	1.5	2.6	2.2				
Operating Surplus\Mixed Income	(5.6)	(7.9)	(4.2)	2.3	2.8	(3.5)				
Consumption of Fixed Capital	0.2	0.3	0.1	(1.2)	1.1	(0.3)				
Taxes less Subsidies on Production and Imports	5.1	(10.8)	4.4	8.8	2.7	18.1				
Gross Domestic Product at Purchasers' Prices	0.9	(5.9)	(2.1)	2.5	2.6	2.6				

R-revised

Total GDP at current purchasers' prices grew by 2.6 percent in 2013 when compared to 2012 (see Table 7b above). The growth was due to the increase in compensation of employees (2.2%) and taxes less subsidies (net taxes) on production and imports (18.1%). There were declines in operating surplus/mixed income (-3.5%) and consumption of fixed capital (-0.3).

Total compensation of employees amounted to CI\$1,444.4 million in 2013, an increase of 2.2 percent when compared to 2012. This represents a slowing of the 2.6 percent growth rate for 2012 as the labour market contracted during the review period.

Operating surplus/mixed income declined by 3.5 percent in 2013 after two consecutive years of growth, 2.3 percent in 2011 and 2.8 percent in 2012. This resulted as businesses adjusted to the changes in fees in 2013.



Taxes (less subsidies) on production and imports continued on its upward trend, increasing by 18.1 percent in 2013 following a 2.7 percent increase in 2012. The increase in the net taxes component is due to the implementation of higher fees during the year coupled with the growth in the number of registered companies. This performance is consistent with the higher revenue intake of the central government in 2013.

4.2 Contribution to GDP at Purchasers' Prices

Table 8: PERCENTAGE CONTRIB	JTION to G	DP BY INC	OME AT CU	IRRENT PR	ICES	
Type of Income	2008	2009	2010	2011 ^R	2012 ^R	2013
Compensation of Employees	50.8	51.7	51.3	50.8	50.8	50.6
Operating Surplus\Mixed Income	30.0	29.4	28.7	28.7	28.7	27.0
Consumption of Fixed Capital	6.0	6.4	6.6	6.3	6.3	6.1
Taxes less Subsidies on Production and Imports	13.2	12.5	13.4	14.2	14.2	16.3
Gross Domestic Product at Purchasers' Prices	100.0	100.0	100.0	100.0	100.0	100.0

R-revised

Compensation of employees is the largest component of GDP by income accounting for 50.6 percent of GDP in 2013, a marginal decline from the 50.8 percent recorded for 2012.

The second largest contribution (27.0%) came from operating surplus/mixed income with a total value of CI\$771.4 million in 2013. There was a decrease in its share in the period despite the overall growth in the economy.

The share of net taxes increased in 2013 to 16.3 percent after levelling off at 14.2 percent in 2012 and 2011.

The share of fixed capital consumption declined to 6.1 percent in 2013, from 6.3 percent in 2012. This reflects the decrease in the value of this component from CI\$174.0 million in 2012 to CI\$173.4 million in 2013.



4.3 Income Components of GDP at Purchasers' Prices

4.3.1 Compensation of employees (COE)

Table 9 below shows the breakdown of total compensation by industry in the Cayman Islands for the period 2008-2013.

Table 9: C	OMPENSATIO	N OF EMPLO	YEES (CI\$'00	0)		
Industry	2008	2009	2010	20 11 ^R	2012 ^R	2013
Agriculture & Fishing	4,776.5	4,046.4	3,916.3	4,127.2	4,117.4	3,939.0
Mining & Quarrying	10,809.7	13,104.9	12,171.6	11,390.7	11,899.7	11,776.7
Manufacture	13,030.3	11,647.1	11,002.6	10,755.1	11,227.6	11,261.7
Electricity, Gas & Air Conditioning Supply	13,291.1	13,555.7	12,732.6	12,731.5	12,808.7	12,752.2
Water Supply, Sewerage & Waste Management	16,056.1	15,563.0	15,701.3	15,888.0	16,735.6	17,856.1
Construction	93,801.2	62,514.3	50,431.2	53,464.1	54,597.6	55,538.0
Wholesale & Retail Trade	122,029.9	118,125.5	110,572.8	110,799.3	110,387.9	111,650.6
Transport & Storage	72,099.5	68,808.1	66,449.6	67,329.8	68,571.1	68,901.7
Hotels & Restaurants	73,378.5	68,579.8	70,517.7	82,021.6	83,355.8	85,186.3
Information & Communication	46,434.8	44,825.5	44,909.9	46,434.7	46,912.1	46,433.4
Financial & Insurance Services	361,045.8	351,066.9	344,424.5	341,896.8	348,224.8	354,473.3
Real Estate Activities	35,618.8	34,347.3	32,712.3	32,017.2	32,068.9	31,826.5
Professional, Scientific & Technical Activities	199,156.3	200,464.0	203,190.8	206,426.7	217,892.4	232,891.6
Administrative & Support Service Activities	40,953.7	41,034.4	41,294.2	42,171.4	44,195.2	46,020.1
Public Administration and Defense	178,940.8	170,675.9	160,222.3	160,562.5	166,654.8	166,872.8
Education Services	62,847.9	62,956.6	61,125.8	59,764.2	59,431.9	59,867.7
Health and Social Work	63,396.3	63,740.5	65,544.5	69,438.7	72,543.2	73,757.9
Other Services	50,973.8	51,671.1	51,228.5	51,273.8	52,286.8	53,378.6
TOTAL	1,458,640.8	1,396,727.0	1,358,148.3	1,378,493.5	1,413,911.5	1,444,384.1

R-revised

The distribution of total compensation in the Cayman Islands was dominated by the following three industries in 2013:

- The Financial and Insurance Services industry with CI\$354.5 million in compensation or 24.5 percent of the total compensation;
- Professional, Scientific and Technical Activities (including legal and accounting services) with CI\$232.9 million or 16.1 percent of total compensation; and
- Public Administration and Defense with CI\$166.9 million or 11.6 percent of total compensation.

The three above-mentioned industries accounted for 52.2 percent of the total compensation generated in the Cayman Islands in 2013. This represents an increase on the 51.8 percent recorded in 2012.



4.3.2 Operating surplus/mixed income⁷

Table 10: OPERA	TING SURPL	US AND MIXE	ED INCOME (C	CI\$'000)		
Industry	2008	2009	2010	2011 ^R	2012 ^R	2013
Agriculture & Fishing	2,387.5	3,992.3	3,989.5	4,162.6	4,441.1	4,500.0
Mining & Quarrying	9,467.6	6,655.6	5,558.3	4,639.5	5,282.6	5,483.4
Manufacture	12,878.9	11,711.1	10,684.7	10,962.3	11,837.7	12,277.1
Electricity, Gas & Air Conditioning Supply	17,492.6	20,474.2	23,028.8	22,615.7	20,879.2	22,871.6
Water Supply, Sewerage & Waste Management	10,026.4	13,247.4	13,090.8	11,393.5	12,419.9	10,175.4
Construction	46,573.8	38,260.8	30,397.9	26,282.3	27,572.8	28,115.1
Wholesale & Retail Trade	91,673.0	75,773.8	68,296.9	75,446.3	82,472.9	88,903.9
Transport & Storage	23,396.0	18,623.6	22,044.3	23,550.9	25,214.0	29,266.0
Hotels & Restaurants	60,821.9	55,449.9	59,486.4	58,322.0	65,049.8	74,759.3
Information & Communication	41,808.7	39,059.0	31,227.2	28,126.4	28,382.3	28,512.0
Financial & Insurance Services	726,852.9	590,576.4	540,327.0	546,690.5	556,440.1	521,466.0
Real Estate Activities	161,784.9	155,927.4	155,069.7	158,201.0	161,124.2	159,513.3
Professional, Scientific & Technical Activities	110,237.6	116,673.1	119,024.9	121,827.9	123,961.7	117,730.3
Administrative & Support Service Activities	8,247.4	5,210.1	4,805.6	5,041.4	6,036.3	5,632.4
Public Administration and Defense	-	-	-	-	-	-
Education Services	2,233.0	2,634.5	3,084.3	2,961.5	3,378.6	4,320.8
Health and Social Work	5,411.9	5,561.3	6,096.6	6,374.8	7,120.6	7,323.5
Other Services	30,418.5	29,238.1	30,087.0	30,934.5	35,534.5	38,755.1
Sub-Total	1,361,712.7	1,189,068.6	1,126,299.8	1,137,533.2	1,177,148.4	1,159,605.2
Less Financial Services Indirectly Measured (FISIM)	500,137.0	395,574.6	366,015.8	360,124.8	377,920.3	388,252.9
TOTAL	861,575.7	793,494.0	760,284.0	777,408.3	799,228.1	771,352.3

R-revised

The three largest contributors to operating surplus/mixed income in 2013 were Financial and Insurance Services, Real Estate Activities and Professional, Scientific and Technical Activities, accounting for 68.9 percent of the total. This represents a decline from the 71.5 percent recorded in 2012.

The largest share of operating surplus/mixed income was recorded by the Financial and Insurance Services industry at CI\$521.5 million in 2013. The second largest share was recorded for the Real Estate Activities industry (CI\$159.5 million). This is followed by the Professional, Scientific and Technical Activities industry, with CI\$117.7 million.

⁷ As shown in Table 10, the total amount of this income type comprises two parts:

⁽a) The amount before deducting interest expense across industries, equivalent to CI\$1,159.6 million in 2013; and

⁽b) The total amount after deducting overall interest expense (CI\$771.4 million). Overall interest expense is equivalent to the line "Financial Services Indirectly Measured" (FISIM). Ideally, FISIM should be apportioned across the various spending industries. However the currently available data does not permit this exercise.



4.3.3 Consumption of fixed capital

Table 11: Co	ONSUMPTION	OF FIXED C	APITAL (CI\$'	000)		
Industry	2008	2009	2010	20 11 ^R	2012 ^R	2013
Agriculturo 9 Eighing	697.3	634.9	650.1	662.4	700.5	642.9
Agriculture & Fishing						
Mining & Quarrying	1,995.0	2,398.7	2,388.9	2,408.6	2,613.7	2,427.6
Manufacture	942.3	1,195.8	1,207.0	1,245.6	1,214.5	1,213.6
Electricity, Gas & Air Conditioning Supply	15,278.9	16,623.9	17,589.1	18,017.9	19,957.7	21,353.7
Water Supply, Sewerage & Waste Management	6,209.4	5,734.4	6,931.6	5,985.5	6,376.4	5,966.1
Construction	5,511.2	4,125.5	2,773.9	2,525.2	2,517.4	2,699.0
Wholesale & Retail Trade	22,991.0	20,207.0	19,867.8	20,618.8	20,762.7	19,827.6
Transport & Storage	11,448.8	10,470.8	9,709.3	9,245.9	9,769.6	10,088.9
Hotels & Restaurants	3,953.5	5,084.7	6,509.9	6,516.2	6,677.1	6,492.5
Information & Communication	16,482.9	19,731.6	19,056.0	20,040.3	19,409.4	18,231.8
Financial & Insurance Services	28,320.9	28,114.9	28,142.7	27,214.6	26,357.5	27,402.5
Real Estate Activities	23,677.5	23,152.4	21,212.3	20,894.5	19,987.3	19,754.8
Professional, Scientific & Technical Activities	7,590.6	7,299.5	6,982.6	7,180.5	7,503.8	6,961.6
Administrative & Support Service Activities	4,988.3	5,772.7	5,599.1	5,301.5	4,782.0	4,824.6
Public Administration and Defense	11,193.6	10,177.4	11,726.4	9,739.3	10,474.9	10,223.8
Education Services	3,718.3	4,132.4	3,969.6	4,359.1	5,518.1	5,699.5
Health and Social Work	3,247.4	3,351.1	3,812.7	3,949.1	4,033.0	3,718.1
Other Services	5,461.4	5,963.3	6,226.6	6,279.3	5,348.6	5,899.7
TOTAL	173,708.1	174,170.9	174,355.6	172,184.2	174,004.3	173,428.0

R-revised

Consumption of fixed capital or the depreciation cost of capital represented only 6.1 percent of the GDP in 2013 (see Table 8). This is consistent with the economic structure of the Cayman Islands which is driven by services rather than by manufacturing.

As presented in Table 11, the largest amounts of depreciation in 2013 occurred in the Financing and Insurance Services industry (CI\$27.4 million), followed by Electricity, Gas & Air Conditioning Supply (CI\$21.4 million), Wholesale and Retail Trade (CI\$19.8 million), Real Estate Activities (CI\$19.8 million), and Information & Communication (CI\$18.2 million). Though the Electricity, Gas & Air Conditioning Supply and Information & Communication industries are relatively small in terms of their contribution to GDP, they have significant depreciation because of the capital intensive nature of the industries.



4.3.4 Taxes less subsidies on production and imports

Table 12: TAXES less S	UBSIDIES ON	N PRODUCTIO	ON AND IMPO	RTS (CI\$'000)	
Industry	2008	2009	2010	2011	2012	2013
Other Taxes less Subsidies on Production	163,975.9	164,472.1	179,932.3	191,169.6	193,805.0	262,364.1
Agriculture & Fishing	251.5	270.0	258.0	274.1	285.4	285.6
Mining & Quarrying	186.6	185.1	176.9	185.5	195.1	206.6
Manufacture	354.9	321.7	322.0	318.9	340.0	342.9
Electricity, Gas & Air Conditioning Supply	1,084.8	1,052.1	1,224.0	1,870.0	2,083.6	2,319.8
Water Supply, Sewerage & Waste Management	144.9	136.2	144.3	147.6	164.4	174.5
Construction	1,980.4	1,688.6	1,513.0	1,588.7	1,508.8	1,822.9
Wholesale & Retail Trade	6,232.1	6,505.7	4,565.3	4,726.9	4,906.4	5,927.8
Transport & Storage	758.7	621.8	597.8	572.9	578.8	613.8
Hotels & Restaurants	1,338.3	868.8	917.1	946.0	994.2	1,013.3
Information & Communication	7,063.9	6,489.3	6,724.2	7,075.5	7,541.1	8,164.8
Financial & Insurance Services	123,892.6	126,500.6	143,209.5	151,375.0	151,567.8	211,599.4
Real Estate Activities	9,873.2	10,065.8	9,329.0	9,476.0	10,039.9	12,309.9
Professional, Scientific & Technical Activities	8,755.3	8,490.8	9,612.3	10,999.4	11,929.1	15,501.4
Administrative & Support Service Activities	1,273.5	785.5	825.6	1,025.8	1,112.5	1,477.7
Public Administration and Defense	103.9	9.8	11.0	8.2	17.5	18.0
Education Services	39.3	44.7	56.0	47.5	51.0	51.9
Health and Social Work	219.5	111.5	118.3	154.9	142.6	173.8
Other Services	422.7	324.1	328.1	376.8	346.7	360.1
Taxes less Subsidies on Products	215,736.2	174,192.3	173,612.0	193,406.0	201,003.2	203,823.7
TOTAL	379,712.1	338,664.4	353,544.3	384,575.6	394,808.2	466,187.7

Table 12 shows two data sets:

- 1. Other taxes on production net of other subsidies on production charged to industries; and
- 2. Taxes net of subsidies charged to buyers of products and imports.

Net other taxes on production accounted for 56.3 percent in 2013 up from the 49.1 percent reported for 2012. This increase was due to the increased fees (particularly on the financial industry) implemented during the year.

The industrial breakdown of other taxes on production shows that the Financial and Insurance Services industry accounted for 80.7 percent of the total. This represents an increase from the 78.2 percent posted in 2013. The data shows the continued importance of the industry as a revenue earner.



APPENDIX 1: KEY CONCEPTS AND DEFINITIONS

A1.1 Classifications in the National Accounts

The main building blocks in the system of national accounts are classifications. These are used in different ways and situations throughout the system. The system of national accounts involves a large number of economic transactions in goods and services that are undertaken by a number of economic agents. The function of the national accounts is to organize and group the basic units of transactions to provide meaningful information. The classification system also guarantees comparability over time and internationally.

The Cayman Islands' national accounts use the International Standard Industrial Classification of all Economic Activities (ISIC) for the classifications of industries, as follows (see also Appendix 3):

- i. Agriculture, Forestry and Fishing
- ii. Mining and Quarrying
- iii. Manufacturing
- iv. Electricity, Gas, Steam and Air Conditioning Supply
- v. Water Supply; Sewerage, Waste Management and Remediation Activities
- vi. Construction
- vii. Wholesale and Retail Trade; Repair of Motor Vehicles and Motorcycles
- viii. Transport and Storage
- ix. Accommodation and Food Service Activities
- x. Information and Communication
- xi. Financial and Insurance Activities
- xii. Real Estate Activities
- xiii. Professional, scientific and Technical Activities
- xiv. Administrative and Support Service Activities
- xv. Public Administration and Defense; Compulsory Social Security
- xvi. Education
- xvii. Health and Social Work
- xviii. Other Services

It should be noted that establishments owned or controlled by government are excluded from the industry "Public Administration and Defense" using the following criteria:

- (a) if the prices they charge for the goods and services they produce are economically significant;
- (b) if they are operated and managed like a corporation; and
- (c) if they have a complete set of accounts such that their operating surplus, savings, assets and liabilities can be separately identified and measured. These



establishments are included in the industries in which their principal activity falls.

A1.2 Measuring Gross Domestic Product (GDP) using the Production Approach

This approach calculates GDP as the sum of the value added of all industries. This is the difference between gross output (essentially sales) of producers and the value of their intermediate inputs (that is purchases of commodities that are used up in the production of other commodities):

Gross Output – Intermediate Input = Value Added

The production account for industries allows for the compilation of GDP using the production approach. It records the production of goods and services as defined by the production boundary. Output generated from the production process is recorded as a resource on the left hand side of the 'T' account and the inputs used up in the production process is recorded as a use on the right hand side of the account. The value added is the balancing item for this account.

Production Account of a Producer

Uses (Debit)	Resources (Credit)
Intermediate consumption 30	Gross Output 100
	Market 95
	For own final use 5
	Other non-market 0
Gross Value Added 70	

A1.2.1 Valuation of output, intermediate consumption and value added

Output can be valued at either basic or producers' prices. The SNA93 recommends basic prices for the valuation of output; intermediate consumption should be valued at purchasers' price.

<u>Basic price</u> is defined as the amount receivable by the producer from the purchase of a unit of good or service less any tax payable, plus any subsidy receivable as a consequence of its production or sale. Separately invoiced transport charges by the producer are excluded.

<u>Producer's price</u> (net of all valued tax (VAT)) is the amount receivable by the producer from the purchase of a unit of good or service less any VAT invoiced to the purchaser. Separately invoiced transport charges by the producer are excluded.



<u>Purchaser's value</u> is the amount paid by the purchaser, excluding any deductible VAT but includes any transport charges paid separately by the purchaser for delivery of the goods.

The above three concepts are related as follows:

- Basic Price
 - plus taxes on product excluding VAT
 - less subsidies on product
- Equals Producer's Price
 - plus trade and transport margins
 - plus non- deductible VAT
- Equals Purchaser's Price

It should be noted that in the Cayman Islands, there is no VAT; hence, producers' prices is the same as purchasers' price if there are no trade and transport margins.

A1.3 Measuring Gross Domestic Product at Constant Prices

The change in GDP results from the contribution of (i) the quantity of goods and services produced and (ii) the price at which these goods and services are sold. GDP at current prices reflects both these contributions as the production of the period is measured at the prices at that period. GDP at constant prices, on the other hand, reflects only the change in quantities produced. This indicator measures the production of the period at the prices of another period referred to as the base year.

GDP at constant price is a measure of the real growth, which takes place within an economy. The rate of change of GDP at constant prices from period to period is often used to assess the economic performance of a country as it shows only the change in the volume of goods and services produced as the price effect is removed. In theory, correcting for inflation refers to the process of revaluing current production using the average prices prevailing in the base year as follows:

GDP at current prices =
$$Quantity_t \times Price_t$$

(Current quantities of goods and services produced multiplied by their current prices)

GDP at constant prices = $Quantity_t \times Price_0$

(Current quantities of goods and services produced multiplied by their prices in a year chosen as the base year)⁸.

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⁸ The base year chosen for the Cayman Islands System of National Accounts is 2007.



Movement in GDP at constant prices over time indicates whether the economy is growing or is in decline. An increase in GDP at constant prices means that output is growing faster than the rate of inflation and hence the economy is considered to be growing. The reverse would be true for a fall in GDP at constant prices.

The explanation given above is an oversimplification of the actual computation but is necessary to convey what the process is intended to accomplish. The final estimates of GDP contain different components which all have to be adjusted for inflation. Even though the process of deflation varies depending on the industry, the process always entails the compilation of indices. The deflation process can be effected by either directly deflating the current price estimates with a price index (usually the CPI) or by extrapolating the base year estimates by a volume index. The two approaches might also be used simultaneously.

The process recommended by the SNA to estimate GDP at constant prices is to deflate both gross output and intermediate consumption separately and then subtract the latter from the former. Basically, the recommendation is that estimations be made for both gross output and intermediate consumption at constant prices; taking the difference would yield GDP at consistent prices. This is referred to as double deflation and though intuitively appealing, it is difficult to apply in practice as it requires detailed data of good quality on price indicators for both gross output and intermediate inputs.

The alternative to double deflation is the use of a single indicator to extrapolate or deflate GDP at current prices. Although single indicators are generally unsuitable in industries where the relationship between value-added, gross output and intermediate consumption vary significantly from one year to the other, they are less sensitive to errors in other industries and hence extensively used. The single indicator method was the method of choice for the Cayman Islands and hence is discussed below in more details.

The single indicator method used in the Cayman Islands is the extrapolation of base year value added by a volume index of gross output. Where relevant quantity data were available, the volume index was calculated directly. In the absence of quantity data, the volume index was calculated indirectly by deflating gross output at current prices by the appropriate price index from the CPI. This approach tends to be the most frequently used single indicator and is based on the assumption that the ratio of value added to gross output in current prices remains unchanged at constant prices. This assumption

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⁹ In the base year the current and constant estimates are the same.

¹⁰ The agriculture industry is one such industry where the relationship between gross output, intermediate consumption and valued added vary significantly from one year to another due to disease, weather conditions, etc.



might hold in the short run but becomes progressively less relevant in the long run hence periodic rebasing of the constant price estimates is recommended.

Another single indicator approach is the deflation of current value added by a price index of gross output. SNA defines a price index as "an average of the proportionate changes in the prices of a specified set of goods or services between two periods of time." This approach is referred to as single deflation due to the fact that only the current value added is deflated and not the gross output and the intermediate consumption. The ideal price index for this approach would be one based on wholesale or producer prices. However, these types of indices are not always available; as a result indices based on retail or consumer prices (e.g. CPI) are used. The disadvantage with using the CPI in this case is that the CPI relates specifically to price movements of goods and services purchased by households for consumption and so should not be used as a deflator for gross output destined for non-household consumption.

Extrapolation of value added by a volume index of employment is another single indicator method employed in the Cayman Islands System of National Accounts. This method entails the use of proxy indicators of gross output, such as hours worked, or numbers employed to extrapolate gross value added in the base year. These proxy indicators are most often used in services industries where it is difficult to specify direct volume measures. The weakness of this method is that it assumes constant labour productivity between the base year and subsequent years. This assumption inevitably leads to mismatches between employment and gross output hence the necessity for frequent revisions. According to accepted convention, where this method is employed an explicit assumption should be made about growth in labour productivity of about 1% per year.

Material input is another proxy indicator that can be used to extrapolate base year gross value added. This volume index should comprise of the most important material inputs to the production process. This method is usually employed in industries with heterogeneous output (e.g. construction, garment manufacturing, manufacturing of bakery products, etc). This method also necessitates frequent rebasing to account for changes in the ratio of gross output to value added and inputs.

A1.4 Measuring Gross Domestic Product (GDP) using the Income Approach

The income approach measures GDP as the sum of all income accruing to the factors of production. With this approach, GDP is calculated as sum of the compensation of employees, operating surplus/mixed income, consumption of fixed capital and taxes on production and imports less subsidies on production and imports.



GDP = Compensation of Employees

- + Consumption of Fixed Capital
- + Operating Surplus
- + Taxes on production and imports
- Subsidies on production and imports

The definitions employed in the calculation of each of the above components are discussed below.

A1.4.1 Compensation of employees (COE)

This is defined as the total remuneration (in cash and kind) paid by employers to employees for work done during the accounting period. Compensation consists of two components:

- 1. Gross wages and salaries
- 2. Employers' social contributions

A1.4.1a Gross wages and salaries

This is defined to include all payments which employees receive in respect of their work. Included are:

- (a) Commissions, tips, bonuses and gratuities;
- (b) Allowances such as housing, uniform and travelling;
- (c) Wages paid during vacation and sick leave;
- (d) Overtime payments; and
- (e) Wages and salaries in kind.

The following items are among the consumption goods and services provided by the employer to the employee without charge or at a markedly reduced cost, which are of clear and direct benefit to the employees as consumers and are therefore included as part of wages and salaries:

- (a) Meal and drinks;
- (b) Housing services that can be used by all members of the household;
- (c) Uniforms that employees choose to wear frequently outside of the workplace as well as at work;
- (d) Sports, recreation and holiday facilities for employees and their families;
- (e) Transportation to and from work, car parking; and
- (f) Nurseries for the children of employees.



A1.4.1b Employers' social contribution

This includes contributions paid by employers on behalf of their employees to social security schemes, private pension funds and insurances schemes. These are geared towards providing benefits for the employees in the event that circumstances affect their ability to earn income, such as sickness, accidents, redundancy, retirement, etc. These social contributions may be actual or imputed.

- Employers' actual social contributions These consists of social contributions
 paid directly by employers for the benefit of their employees to social security
 funds, insurance enterprises or other instituted units responsible for the
 administration and management of social insurance schemes.
- Employers' imputed social contributions Some employers provide social benefits directly to their employees or dependents out of their resources without the use of an insurance enterprise or special pension fund. Remuneration should therefore be imputed equal in value to the amount of social contributions that would be needed to secure the entitlement.

A1.4.2 Consumption of Fixed Capital

This is the cost of production associated with the decline in the value of fixed assets used in the production process. It can be viewed in general terms as the replacement cost of the fixed assets used up in the process of production.

The SNA recommends that this be valued using the actual or estimated prices of fixed assets prevailing at the time the production takes place but not the prices at the time the fixed asset was originally acquired. However, in the case of the Cayman Islands depreciation is used as a proxy for consumption of fixed capital.

A1.4.3 Taxes on production and imports

Taxes are compulsory, unrequited payments made to the government by other institutional units. Taxes are said to be unrequited because the government does not directly provide a specific good or service in return for the payments made. There are two types of taxes on production and imports:

- 1. Taxes on products are taxes on goods and services that become payable when the goods are produced, sold, imported or otherwise disposed of by their producers. The following are categories of this type of tax:
 - a) Taxes and duties on import



- b) Other taxes on product excluding taxes and duties on import (e.g. hotel occupancy tax).
- 2. Other taxes on production are all taxes excluding taxes on products that establishments incur as a result of engaging in production (e.g. business and professional licences, property tax, stamp duties).

A1.4.4 Subsidies on production and imports

It should be noted that in the Cayman Islands, subsidies as defined by SNA are negligible.

Subsidies are current unrequited transfers that government makes to resident producers and importers. These transfers or payments are based on the levels of production and/or the quantity and value of goods and services produced, imported or sold. Subsidies are seen as negative taxation as producers receive them rather than pay them. There are two types of subsidies on production and imports:

- 1. Subsidies on products subsidies payable per unit of a good or service e.g. fertilizer sold to farmers;
- 2. Other subsidies on production subsidies excluding subsidies on products that are paid to resident establishments as a result of engaging in production.

A1.4.5 Operating surplus/mixed income

Operating surplus/mixed income is the income accruing to the production process before deducting interest charges, rent or property incomes payable. It is equivalent to the excess of the value added over the sum of the compensation of employers, net taxes on production, and allowances for the consumption of fixed capital, i.e.:

Operating Surplus = Gross Value Added – (Compensation of Employees + net Taxes on Production and Imports + allowance for the Consumption of Fixed Capital)



APPENDIX 2: IMPLEMENTATION OF THE CAYMAN ISLANDS' SNA

A2.1 Introduction

This section provides an overview of the work done in developing the System of National Accounts for the Cayman Islands. It examines the classification system employed in delineating institutional units into specific industries. This is fundamental to the measurement of output and value added by industry. The section also examines the main sources of data used in compiling the estimates. The Annual National Accounts Survey was the main data source and was supplemented by data from government accounts and other administrative sources. The section concludes by examining the estimation techniques employed in deriving gross value added by industry at current and constant prices.

A2.2 Coverage of Industries

As indicated in Appendix 1, all active business units were classified according to the International Standard Industrial Classification (ISIC) Revision 4, which is the industrial classification scheme recommended by SNA93 manual.¹¹ In accordance with SNA93 and ISIC guidelines, business units were assigned codes based on their principal economic activity.¹² The ISIC Revision 4 was adapted to accommodate a more detailed disaggregation of economic activity. For the most part, estimation and analysis were done at the product group level (5-digit ISIC code). However, some estimation had to be done at the class level (4-digit code) due to data constraints.

A2.3 Data Sources

Gross value added at current and constant prices was compiled using data from a variety of primary and/or secondary sources. Primary sources relate to data collected and compiled by the Economics and Statistics Office (ESO). The main source of primary data was the Annual National Accounts Survey. Other primary data sources were the consumer price index (CPI), Labour Force Survey (LFS), Survey of Living Conditions (SLC) and the Household Budget Survey (HBS). Secondary data sources (i.e. sources external to the ESO) consist mostly of administrative records and data generated as by-

¹¹ The System of National Accounts Manual 1993 (SNA93) is the manual the guides the calculation of GDP estimates. It outlines the internationally accepted methodology and rules that govern the derivation of estimates of GDP. The SNA 2008 is now available and aspects have been incorporated in the Cayman Islands' National Accounts.

¹² The principal activity of a business is the activity whose value added exceeds that of any other activity carried out by the business.



products of the administrative process. Revenue and expenditure accounts of government and statutory agencies, merchandise trade data, and specified data from the Cayman Islands Monetary Authority (CIMA) comprised the main secondary data sources.

The Annual National Accounts Survey is designed primarily to collect information from active business units on their income and expenditure. Questionnaires are hand-delivered to business units on Grand Cayman (entities for whom a physical address was available) and mailed to those in Cayman Brac and Little Cayman. The survey was administered to all establishments in ESO's Business Register. Data on government ministries and departments were obtained from government accounting reports.

The consumer price index (CPI) was predominantly used in computing gross value added at constant 2007 prices. The CPI is used in two ways: (1) The gross output (at current prices) of a number of industries are deflated by a relevant price index of CPI items, or groups of items to derive the inflation-adjusted gross output (gross output at constant prices). The series of gross output constant is then used to formulate a volume index which is then used to deflate the gross valued (at current prices). (2) The gross value added (at current prices) of a number of industries are deflated directly by a relevant price index of CPI items, or groups of items to derive gross value added (at constant prices). The CPI was also used in estimating the current price gross value added of owner-occupied dwellings and some groups within the agriculture and fishing industries.

The government accounts comprise a voluminous amount of data that had to be classified, partitioned and adjusted to suit national accounts purposes. Revenue and expenditure data were gathered from the government database and then exported to Excel where it was adjusted for national accounts purposes. The database allows for the generation of reports based on cost centres. Through this process, public administration was identified. Additionally, revenue was classified into three groups: taxes (customs duties, property tax, hotel occupancy tax, cruise ship departure tax, stamp duty, etc.), sales of goods and services (work permits, departmental sales, etc.) and other revenue (interest, fines and forfeitures, etc.).

A2.4 Revision Policy

In order to improve the System of National Accounts, revisions are undertaken periodically. New and revised data from regular surveys, administrative records, audited financial statements from companies, public sector accounts, etc. are incorporated into the system as they become available. Previous year estimates are revised when current year estimates are being generated.



APPENDIX 3: INTERNATIONAL STANDARD INDUSTRIAL CLASSIFICATION OF ALL ECONOMIC ACTIVITIES (REVISION 4)

A - Agriculture, Forestry and Fishing

- 01-Crop and animal production, hunting and related service activities
- 02-Forestry and logging
- 03-Fishing and aquaculture

B - Mining and Quarrying

- 05-Mining of coal and ignite
- 06-Extraction of crude petroleum and natural gas
- 07-Mining of metal ores
- 08-Other mining and quarrying
- 09-Mining support service activities

C - Manufacturing

- 10-Manufacture of food products
- 11-Manufacture of beverages
- 12-Manufacture of tobacco products
- 13-Manufacture of textiles
- 14-Manufacture of wearing apparel
- 15-Manufacture of leather and related products
- 16-Manufacture of wood and of products of wood and cork, except furniture; manufacture of articles of straw and plaiting materials
- 17-Manufacture of paper and paper products
- 18-Printing and reproduction of recorded media
- 19-Manufacture of coke and refined petroleum products
- 20-Manufacture of chemicals and chemical products
- 21-Manufacture of pharmaceuticals, medicinal chemical and botanical products
- 22-Manufacture of rubber and plastics products
- 23-Manufacture of other non-metallic mineral products
- 24-Manufacture of basic metals
- 25-Manufacture of fabricated metal products, except machinery and equipment
- 26-Manufacture of computer, electronic and optical products
- 27-Manufacture of electrical equipment
- 28-Manufacture of machinery and equipment n.e.c.
- 29-Manufacture of motor vehicles, trailers and semi-trailers
- 30-Manufacture of other transport equipment
- 31-Manufacture of furniture
- 32-Other manufacturing
- 33-Repair and installation of machinery and equipment

D - Electricity, Gas, Steam and Air Conditioning Supply

35-Electricity, gas, steam and air conditioning supply

E - Water Supply; Sewerage, Waste Management and Remediation Activities

- 36-Water collection, treatment and supply
- 37-Sewerage
- 38-Waste collection, treatment and disposal activities; materials recovery
- 39-Remediation activities and other waste management services



F - Construction

- 41-Construction of buildings
- 42-Civil engineering
- 43-Specialized construction activities

G - Wholesale and Retail Trade; Repair of Motor Vehicles and Motorcycles

- 45-Wholesale and retail trade and repair of motor vehicles and motorcycles
- 46-Wholesale trade, except of motor vehicles and motorcycles
- 47-Retail trade, except of motor vehicles and motorcycles

H - Transportation and storage

- 49-Land transport and transport via pipelines
- 50-Water transport
- 51-Air transport
- 52-Warehousing and support activities for transportation
- 53-Postal and courier activities

I - Accommodation and Food Service Activities

- 55-Accommodation
- 56-Food and beverage service activities

J - Information and Communication

- 58-Publishing activities
- 59-Motion picture, video and television programme production, sound recording and music publishing activities
- 60-Programming and broadcasting activities
- 61-Telecommunications
- 62-Computer programming, consultancy and related activities
- 63-Information service activities

K - Financial and Insurance Activities

- 64-Financial service activities, except insurance and pension funding
- 65-Insurance, reinsurance and pension funding, except compulsory social security
- 66-Activities auxiliary to financial service and insurance activities

L - Real Estate Activities

68-Real estate activities



M - Professional, Scientific and Technical Activities

- 69-Legal and accounting activities
- 70-Activities of head offices; management consultancy activities
- 71-Architectural and engineering activities; technical testing and analysis
- 72-Scientific research and development
- 73-Advertising and market research
- 74-Other professional, scientific and technical activities
- 75-Veterinary activities

N - Administrative and Support Service Activities

- 77-Rental and leasing activities
- 78-Employment activities
- 79-Travel agency, tour operator, reservation service and related activities
- 80-Security and investigation activities
- 81-Services to buildings and landscape activities
- 82-Office administrative, office support and other business support activities

O - Public Administration and Defence; Compulsory Social Security

84-Public administration and defence; compulsory social security

P - Education

85-Education

Q - Human Health and Social Work Activities

- 86-Human health activities
- 87-Residential care activities
- 88-Social work activities without accommodation

R - Arts, Entertainment and Recreation

- 90-Creative, arts and entertainment activities
- 91-Libraries, archives, museums and other cultural activities
- 92-Gambling and betting activities
- 93-Sports activities and amusement and recreation activities

S - Other Service Activities

- 94-Activities of membership organizations
- 95-Repair of computers and personal and household goods
- 96-Other personal service activities

T - Activities of Households as Employers; Undifferentiated Goods-and Services-Producing Activities of Households for Own Use

- 97-Activities of households as employers of domestic personnel
- 98-Undifferentiated goods- and services-producing activities of private households for own use

U - Activities of Extraterritorial Organizations and Bodies

99-Activities of extraterritorial organizations and bodies



<u>APPENDIX 4: CENTRAL REGISTER OF ESTABLISHMENTS</u> <u>QUESTIONNAIRE</u>



P.O. Box 127, Government Administration Building George Town KY1-9000 Grand Cayman, Cayman Islands, B.W.I. www.eso.ky, email: infostats@gov.ky (1-345) 949-0940 Fax: (1-345) 949-8782



CENTRAL REGISTER OF ESTABLISHMENTS QUESTIONNAIRE

		4020110111112112		
1. 1	Legal Name:			
2.	Trading Name:			
3. 2	Address:			
	PO Box:	Postal C	ode:	
	Street Name and No:		District:	
	Telephone No.:	Fax No	o.:	
	Email address:		Vebsite:	
4. (Contact Person:			
	Name:	Posi	ition:	
	Telephone:	Email address	s:	
5. Y	What is the legal form of this busi	ness? (tick in the appropriate bo	x below)	
	☐ Corporation	 Sole proprietor 		
	☐ Joint Venture	☐ Partnership		
	☐ Cooperative	Other (please Specify	y)	
6. I	In what year did this establishmen	at begin operation? (Year of co	ommencement)	
7. \	What is the type of organization th	nat best describes this estab	lishment?	
	Single establishment (without o	or independent of any subsi	diary or branch)	(Go to 10)
	Holding company/Head office	with Branch or Subsidiary:	☐ Foreign	☐ Local
	Branch of another establishmen Name of main office		☐ Foreign	_
	Subsidiary:		☐ Foreign	☐ Local (Go to 9)
	Name of parent company			
8. 1	Number of Branches			
9. 1	Number of Subsidiaries			
				Page 1 of 2



0. What is this establishment	's form of ownership?		
☐ Private Enterprise	☐ Government enterprise	☐ Non- Pr	ofit Organisation
1. Is the establishment a franc	chisee of a foreign company?	□Yes	□No
	% Caymanian % Foreign (Please list na	tionalities):	
2 Taskin nakahlinkan nakan nama	6		□ No
3. Is this establishment opera	ting as an offshore company?	□ 1 es	
(Please be as detailed construction of reside	es of this Establishment (Produc as possible: e.g. retail of clothin ential buildings, renting of con development and sales, renting	ng, retail of ho istruction equ	ousehold appliances, ipment with/without
a.			
b			
c			
c			
5. How many persons are cur	rently employed at this establis	hment?	
5. How many persons are cur		hment?	rt:
5. How many persons are cur Full Time:	rently employed at this establis	hment? On contrac	et: Yes
5. How many persons are cur Full Time: 6. Does this establishment dir	rently employed at this establis	hment? On contract /to abroad?	□Yes □N
5. How many persons are cur Full Time: 6. Does this establishment di 7. Does this establishment se	rently employed at this establis Part Time: rectly import/export goods from	hment? On contract to abroad? tes from abroa	□Yes □N id? □Yes □N
5. How many persons are cur Full Time: 6. Does this establishment dir 7. Does this establishment set 8. Does this establishment rec	rently employed at this establish Part Time: rectly import/export goods from	hment? On contract to abroad? es from abroa	□Yes □N id? □Yes □N
5. How many persons are cur Full Time: 6. Does this establishment dir 7. Does this establishment set 8. Does this establishment rec	rently employed at this establish Part Time: rectly import/export goods from Il services to, or purchase services ceive financing/investment from	hment? On contract to abroad? es from abroa	□Yes □N d? □Yes □N Cayman Islands? □Yes □N
5. How many persons are cur Full Time: 6. Does this establishment dir 7. Does this establishment set 8. Does this establishment rec 9. Does this enterprise hold in	rently employed at this establish Part Time: rectly import/export goods from Il services to, or purchase services ceive financing/investment from	hment? On contract to abroad? es from abroad n outside the C	□Yes □N id? □Yes □N Cayman Islands? □Yes □N □Yes □N
For For	rently employed at this establish Part Time: rectly import/export goods from Il services to, or purchase service ceive financing/investment from nvestment outside the Cayman l	hment? On contract to abroad? tes from abroad n outside the C (slands? OPERATION	□Yes □N dd? □Yes □N Cayman Islands? □Yes □N □Yes □N