

PUBLIC INTEREST AND ACCOUNTABILITY COMMITTEE



ANNUAL REPORT ON
MANAGEMENT OF
PETROLEUM REVENUES FOR
THE PERIOD JANUARY –
JUNE 2019

PIAC

ABOUT THIS REPORT

The 2019 Semi-Annual Report is in fulfilment of PIAC's statutory obligation under the Petroleum Revenue Management Act, 2011 (Act 815), as amended by Act 893, to publish Semi-Annual and Annual Reports. This Report is a reconciliation of data supplied by stakeholder institutions, and an independent assessment of the collection and management of the country's petroleum revenues for the period January – June 2019.



Foreword

Since its establishment in September 2011, the Public Interest and Accountability Committee, (PIAC), has been monitoring and evaluating the management of Ghana' s petroleum revenues by the Government and institutions of state, in accordance with its statutory mandate encapsulated in Section 52 of the Petroleum Revenue Management Act, 2011 (Act 815).

The Committee' s Reports aim at keeping Ghanaians and other interested stakeholders constantly informed on how the country' s petroleum revenues are being managed and used, as well as providing platforms for the citizens' feedback to be collated and shared with policymakers. Since its inception, the Committee has published a total of 16 reports – 8 Annual and 8 Semi-Annual - covering the period 2011 to June 2019. The keen interest with which the Ghanaian citizenry receive the reports has served as a great source of motivation to the Committee as it pursues its obligation of ensuring strict compliance with the provisions of the Petroleum Revenue Management Act.

The 2019 Semi-Annual Report covers the period January to June, and encompasses a broad range of issues associated with the management and use of petroleum revenues such as information on production, liftings, total revenues accrued, total revenue received, allocation and utilisation of these revenues by government, and the management of the funds set aside in the Ghana Petroleum Funds (Ghana Stabilisation Fund and the Ghana Heritage Fund). The Report also examines other issues and findings pertinent to the performance of various institutions charged with responsibilities in the Petroleum Revenue Management Act, 2011 (Act 815) as amended by the Petroleum Revenue Management (Amendment) Act, 2015 (Act 893).

The preparation of this Report was supported with information and data from the Ministry of Finance, Bank of Ghana, Ghana National Petroleum Corporation, Ghana Revenue Authority, Petroleum Commission, Ghana Infrastructure

Investment Fund, Ghana National Gas Company, Kosmos Energy, Eni Ghana Limited, and Tullow Ghana Limited.

It is the expectation of the Committee that the public will find time to read the Report and provide feedback during public engagements following its launch, or send comments via email to secretariat@piacghana.org or call +233 (0) 302 242 006.

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List of Abbreviations

ABFA	Annual Budget Funding Amount
AG	Associated Gas
BBLs	Barrels
BoG	Bank of Ghana
BRENT	Broom, Rannoch, Etive, Ness and Tarbert
CAPEX	Capital Expenditure
CAPI	Carried and Participating Interest
CIT	Corporate Income Tax
COLA	Crude Oil Lifting Agreement
CSI	Corporate Social Investment(s)
CSO	Civil Society Organisation(s)
CSR	Corporate Social Responsibility
CTP	Cape Three Points
DFPVI	Drainage, Flushing, Purging, Venting, and Isolation
DWT/CTP	Deepwater Tano Cape Three Points
EC	Energy Commission
ECG	Electricity Company of Ghana
EFC	Equity Financing Cost
EIA	Energy Information Administration
ENI	Ente Nazionale Idrocarburi
FPSO	Floating Production Storage and Offloading Unit
GHF	Ghana Heritage Fund

GIIF	Ghana Infrastructure Investment Fund
GNGC	Ghana National Gas Company
GNPC	Ghana National Petroleum Corporation
GoG	Government of Ghana
GPFs	Ghana Petroleum Funds
GRA	Ghana Revenue Authority
GSF	Ghana Stabilisation Fund
ICT	Information and Communications Technology
IMO	International Maritime Organisation
IOC	International Oil Company
IPP	Independent Power Producers
LCF	Low Carbon Fuel
LPG	Liquefied Petroleum Gas
LTE	Land Termination End
MMBtu	Million British Thermal Units
MMSCFD	Million Standard Cubic Feet per Day
MoEn	Ministry of Energy
MoF	Ministry of Finance
MT	Metric Tonne(s)
NAG	Non-Associated Gas
NPA	National Petroleum Authority
OCTP	Offshore Cape Three Points
OECD	Organisation for Economic Co-operation and Development

OOSys	Oil Offloading System
OPEC	Organization of Petroleum Exporting Countries
OPEX	Operating Expenditure
ORF	Onshore Receiving Facility
OWC	Oil Water Contact
P&A	Plugging and Abandonment
PC	Petroleum Commission
PDS	Power Distribution Services
PHF	Petroleum Holding Fund
PIAC	Public Interest and Accountability Committee
PNDCL	Provisional National Defence Council Law
PoD	Plan of Development
PRMA	Petroleum Revenue Management Act
PSM	Permanent Spread Mooring
PURC	Public Utilities Regulatory Commission
RMS	Regulating and Metering Station
SDWT	South Deepwater Tano
SGN	Sankofa Gye Nyame
SOIP	Shipboard Offloading Interface Package
SOPCL	Saltpond Offshore Producing Company Limited
STEM	Science, Technology, Engineering and Mathematics
STMA	Sekondi-Takoradi Municipal Assembly
TEN	Tweneboa-Enyenra-Ntomme

TCP	Tubing Conveyed Perforation
TGL	Tullow Ghana Limited
TRP	Turret Remediation Project
TTIP	Takoradi –Tema Interconnection Project
WAGP	West African Gas Pipeline
WAPCo	West African Gas Pipeline Company Limited
WTI	West Texas Intermediate
Y-o-Y	Year-on-Year
YTD	Year-To-Date

Executive Summary

This Report is the eighth in the series of Semi-Annual reports by PIAC. The Report is based on the collection, collation, reconciliation, and analysis of production and revenue data from relevant stakeholder institutions. Key findings and recommendations for action are as follows:

Findings

Petroleum Production and Sales

1. A total of 34,309,685.53 barrels (bbls) of oil was produced from Ghana's three offshore producing Fields - Jubilee, TEN, and SGN - from January to June, 2019, representing an increase of 18.38 percent over that achieved in the 2018 half-year.
2. The increased half-year output, the highest since inception of production, was driven largely by production from the Jubilee and SGN Fields.
3. Production on the TEN Field was affected by shut-down activities over a 14-day period from 22nd April to 5th May 2019, during which major maintenance works and inspections, affecting the average daily production and output of the Field, were undertaken.
4. Overall, raw gas exports from the Jubilee and TEN Fields witnessed a 54.32 percent decline for the reporting period from 14,694.27 MMscf in the first half of 2018 to 7,981.90 MMscf.

5. For four (4) months, beginning February to May 2019, there was no gas export from the TEN Field even though the produced volume for the period was 13,577.09 MMscf.
6. Raw gas exports from the TEN Field reduced by about 900 percent compared with the half-year 2018 exports.
7. For the second time, there was no lifting by GNPC in respect of Carried and Participating Interest (CAPI) on the SGN Field due to the Corporation' s inability to honour outstanding payments (plus interest) in respect of its equity participation in the Field. The SGN Partners lifted seven (7) parcels of crude totalling 6,612,967 bbls.
8. Lifting in the form of royalty on the SGN Field yielded US\$70.22/bbl, US\$3.065 more than the highest achieved price from the Jubilee and TEN Fields.

Revenue Collection and Management

9. Total petroleum receipts into the Petroleum Holding Fund (PHF) for the first half of 2019 was US\$363,736,223.63 compared with US\$463,569,064.38 for the same period in 2018, representing a decrease of 21.54 percent.
10. Out of the total receipts, CAPI contributed 48.46 percent, Royalty 17.86 percent and CIT 33.35 percent, with CIT exceeding royalties for the first time since 2014. Revenue yet to be realised and paid into the PHF during the period amounted to US\$199,458,924.00. This represents proceeds from liftings made in May and June from the three producing fields.

11. There was a difference of US\$27,511.50 in the total surface rental receipts between GRA and the BoG, and this according to the two institutions, would be reconciled in the second half of the year.
12. Tullow Ghana wrongfully paid US\$75 million into GRA' s accounts at BoG instead of the PHF, during the period. An interest of US\$219,041.81 was charged for delay in the transfer of the US\$75 million into the PHF.
13. There was no payment from GNPC into the PHF in respect of gas revenue during the period, even though 8,458,153.40 MMBtu of raw gas was supplied to the National Gas Company from the Jubilee and TEN Fields.
14. As at 30th June, 2019, GNGC's indebtedness to GNPC amounted to US\$263,949,220.40, comprising US\$4,229,076.70 for the period, and an opening balance of US\$259,720,143.70.

Performance of the Ghana Petroleum Funds

15. In line with the distribution rule in the PRMA, the Ghana Heritage Fund received US\$29.94 million, and the Ghana Stabilisation Fund, US\$69.85 million for the period.
16. The GSF and GHF receipts in the first half of 2019 represented a 115.85 percent and 115.93 percent increase respectively over their respective first half of 2018 receipts.
17. The total balances in the Ghana Petroleum Funds as at the end of the first half of 2019 was US\$977.36 million, comprising US\$521.83 million in the Ghana Heritage Fund, and US\$455.53 million in the Ghana Stabilisation Fund.

18. The accumulated net profit on investment of the GPFs since November 2011 to the end of first half of 2019 was US\$55.16 million. The returns have so far been modest, due to the requirement to invest in conservative instruments.
19. An amount of US\$155.53 million, being the excess over the cap of US\$300 million placed in the GSF, was not transferred into the Sinking and/or Contingency Funds during the period.
20. Even though the actual ABFA receipt for the period fell short of the target of US\$236.52 million by 29.96 percent, the Government did not exercise the option of making a withdrawal from the GSF to shore up expenditure.

Distribution of Petroleum Revenues

21. The total revenue distributed from the PHF during the period was US\$363.74 million, leaving a balance of US\$70.74 million. This total distribution is 23.56 percent lower than the figure for the same period in 2018.
22. Total petroleum funds distributed since inception in 2010 till end of June 2019 is US\$5.32 billion of which 38 percent went to the ABFA, 31 percent to GNPC, 22 percent to the GSF, and 9 percent to the GHF.

Allocation and Utilisation of GNPC Share of Petroleum Revenue

23. There was no expenditure in respect of the Petroleum Hub in the Western Region during the reporting period.

24. A major concern about the persistent non-payment of gas revenue is the deprivation of the funds to the ABFA, GPFs and GNGC. As of June 2019, Ghana Gas' indebtedness to GNPC stood at US\$97,790,620.12 and ECG' s, at US\$12,156,787.06.
25. An amount of US\$1 million has been budgeted towards the establishment of a fertilizer plant. GNPC reports that the project is still at a desktop study stage, to be undertaken with the Ministry of Agriculture, Ghana Gas, and other stakeholders.
26. Given the expenditure on the fertiliser plant, roads, schools, etc., GNPC appears to be over stretching its mandate by moving into areas that are extraneous to the Corporation' s core mandate.

Operations of GNGC

27. The gas commercialisation phase of the Ghana Gas Infrastructure project has continued and progressed well, with gas transportation infrastructure extended to the mining enclave of Tarkwa, Damang, and Prestea, and offtakers secured for gas supplies.
28. Two major shutdowns lasting a total of 35 days - firstly due to a faulty gas export HP compressor, and secondly to enable tie-in works at the Takoradi Regulating and Metering Station (TRMS) - affected gas evacuation from Jubilee and accounted for the low volume of gas exports for the first half of 2019.
29. The volume of LPG produced over the period declined by as much as 45 percent, while condensates declined by 28 percent compared to the 2018 figures.

30. The production of lean gas increased by 34 percent in 2019 compared to 2018 production figures.

31. While the processed gas was sold to VRA at US\$7.29 per MMBtu, the same gas was sold to Wangkang and Keda(Twyford) at US\$6.50 per MMBtu under a special dispensation to encourage gas-fueled industrialisation and to enhance the competitiveness of Ghanaian industrial products.

Recommendations

1. PIAC recommends that the Petroleum Commission works with the Partners to put in place a well-coordinated framework for routine shutdown and maintenance, to minimize disruption to production and gas exports.
2. The Committee recommends the review of the Ghana National Petroleum Corporation Act, 1983 (PNDCL 64) to better define the mandate of GNPC and further, by virtue of the fact that, by the enactment of Act 919, certain functions performed by GNPC in the past, such as serving as a data repository and providing technical advice to the Minister have now been assigned to the Petroleum Commission.
3. The Committee reiterates its call for the Corporation to proactively plan to respond to cash calls when they are made in order to avoid the cost of borrowing.
4. PIAC reiterates its call for GNGC to discontinue the practice of retaining gas revenues. Receipts from the sale of gas must be applied to defray the cost of raw gas supplied by GNPC, for lodgement in the PHF in accordance with Sections 2 & 3 of the PRMA, and in line with sound business practice.

5. To improve on returns on the GPF' s investments, the Committee recommends a review and diversification of their qualifying instruments.
6. Given the existence of an excess of US\$155.53 million over the GSF cap of US\$300 million, the Committee recommends the transfer of the excess into the Sinking and /or Contingency Funds in accordance with Section 23(4) of the PRMA, or a re-adjustment of the cap to accommodate the excess.
7. The decision to grant concessionary tariffs to industries bodes well for government' s industrialisation program as it has the tendency to reduce the cost of production.
8. To forestall the recurring wrongful lodgements and differences in reported payments by IOCs, the Committee recommends to BoG and GRA to institutionalise quarterly meetings to share and reconcile petroleum receipts.

CHAPTER 1

1.0 INTRODUCTION

Background

The Public Interest and Accountability Committee (PIAC) is a body established under Section 51 of the Petroleum Revenue Management Act, 2011 (Act 815) to ensure transparency in the generation and use of petroleum revenues.

The Committee is mandated under Section 52 of the Petroleum Revenue Management Act (PRMA) to:

- Monitor and evaluate compliance with the Act by Government and other relevant institutions in the management and use of the petroleum revenues and investments
- Provide space and platform for the public to debate whether spending prospects and management and use of revenues conform to development priorities as provided under Section 21(3); and
- Provide independent assessments on the management and use of petroleum revenues to assist Parliament and the Executive in the oversight and performance of related functions respectively.

Scope

This Report:

- Analyses oil and gas production and liftings over the period;
- Verifies the accuracy of oil and gas revenues declared by state institutions;
- Confirms revenues allocated to Ghana National Petroleum Corporation (GNPC), Annual Budget Funding Amount (ABFA) and the Ghana Petroleum Funds (GPFs);
- Discusses how petroleum receipts were allocated and utilised;

- Analyses the performance of the Ghana Petroleum Funds from January to June 2019; and
- Assesses the roles and functions of reporting entities under this Act and their compliance.

Methodology

The following methods were employed for this Report:

- Analysis and reconciliation of data collected from relevant stakeholder institutions;
- Interviews;
- Independent verification of source documents from stakeholders.

In communicating the findings and outcomes, the Report relies heavily on tables, charts and graphs.

The key stakeholder institutions consulted include:

- Ministry of Finance (MoF)
- Ministry of Energy (MoEn)
- Bank of Ghana (BoG)
- Petroleum Commission (PC)
- Ghana Revenue Authority (GRA)
- Ghana National Petroleum Corporation (GNPC)
- Ghana National Gas Company (GNGC)
- Energy Commission
- Ghana Infrastructure Investment Fund (GIIF)
- International Oil companies (IOCs) - Tullow, Kosmos, Anadarko and ENI

Outline of Report

- Chapters One and Two provide introduction and current developments in the petroleum sector;
- Chapter Three analyses production and sales data;
- Chapters Four, Five and Six discuss petroleum revenue collection, distribution of petroleum revenues, and distribution of ABFA;
- Chapter Seven discusses performance and management of the Ghana Petroleum Funds;
- Chapters Eight and Nine analyse utilisation of GNPC' s share of petroleum revenues and operations of the Ghana National Gas Company; and
- Chapters Ten and Eleven discuss petroleum revenue outlook, draw conclusions, and proffer recommendations.

CHAPTER 2

2.0 DEVELOPMENTS IN THE UPSTREAM OIL AND GAS SECTOR

During the first half of 2019, Ghana sustained its efforts at managing its hydrocarbon resources efficiently and transparently. Having put in place the full complement of laws required to manage the hydrocarbon industry, the country continued to promote investment in the sector, and took steps to execute its first international bid and licensing round, announced in the last quarter of 2018. Activities geared towards maximising yields of producing areas also continued in all earnestness.

Jubilee Field Operations

Tullow Ghana Limited (TGL) and its Partners continued their drilling and completion campaign on Jubilee at the beginning of the year. The Maersk Venturer Drillship was contracted to undertake the completion activities on J52-WI, and this was completed on 25th May 2019. By the end of June, the drillship had moved on to J23-P to undertake completion works.

Turret Remediation Project (TRP)

Remediation works on the faulty Turret of the FPSO Kwame Nkrumah also continued during the period. The installation of the Permanent Spread Mooring (PSM) estimated to be completed in January 2020, the Shipboard Offloading Interface Package (SOIP) and Oil Offloading System (OOSys), both expected to be completed in the second quarter of 2020, will bring the remedial works to a closure.

TEN Field Operations

Drilling and Completion activities on TEN Field continued from January 2019, with EN14-P and EN16-WI wells drilled using the Stena Forth Drillship. The Completion campaign followed afterwards using the Maersk Venturer Drillship to complete EN 10-P and EN09-WI. The completion activities on EN14-P was suspended due

to prolonged illegal fishing activities within the Tubing Conveyed Perforation (TCP) gun sub-assemblies, which set back completion timelines.

The TEN FPSO had its first planned shut-down for fourteen days from 22nd April to 5th May, 2019 for major maintenance works and inspections. Oil-to-oil shut-down was eleven days, comprising seven days' tool time, two days' facility preparation (Drainage, Flushing, Purging, Venting and Isolation (DFPVI) and two days for production start-up. Internal inspection was conducted on three pressure vessels. The pressure vessels inspection programme originally comprised some 18 pressure vessels, 15 of which were deferred until 2021. The shut-down was successfully completed within time and budget, according to the Petroleum Commission.

Offshore Cape Three Points (OCTP) Project

Eni Ghana Exploration and Production Limited, Operator of the OCTP Field, requested for approval from the Minister of Energy to amend the OCTP Plan of Development (PoD) to use a portion of the produced gas of SNKE-2A (Campanian level) for injection into the Cenomanian level, for the purpose of production optimisation. This amendment follows a previous amendment requesting for drilling of infill wells (OP-9 and OP-10) and debottleneck of the FPSO and Onshore Receiving Facility (ORF).

All wells to produce oil and Non-Associated Gas (NAG) were drilled and completed, including OP-9 and OP-10 in line with the amended PoD. Drilling operations for OP-9 and OP-10 ended on 10th March 2019 and 22nd January 2019 respectively, while completion activities ended on 28th March 2019 and 23rd May 2019.

Cape Three Points (CTP) Block 4

The Cape Three Points Block 4 (CTP Block 4) licence was awarded, and the relevant Petroleum Agreement (PA) ratified by the Parliament of the Republic of Ghana on 11th March 2016, to the following joint venture partners:

- Eni Ghana Exploration & Production Ltd. – Operator
- Vitol Upstream Tano Ltd
- Woodfields Upstream Ghana Ltd
- Ghana National Petroleum Corporation
- GNPC Exploration and Production Company (Explorco)

Exploratory drilling activities commenced with the drilling of Akoma-1X well from 29th March 2019 to 2nd May 2019 by the Maersk Voyager drillship. Eni discovered gas and condensate on the Akoma-1X prospect in CTP-Block 4. The discovery is however, yet to be appraised to determine its volume and extent.

Deep Water Tano Cape Three Points (DWT/CTP)

Aker Energy Ghana Limited (Aker), the Operator of the DWT/CTP Block, undertook appraisal drilling activities during the first half of the year. The Pecan 4A, Pecan South 1A and Pecan South East 1A were drilled.

The primary objective of the Pecan-4 was to test the position of the Oil Water Contact (OWC) in the Pecan TU-1 reservoir. Pecan-4A well was spudded on 19th November 2018 by the Maersk Viking Drillship and operations ended on 20th January 2019.

Pecan South-1A was an appraisal well, designed to test the hydrocarbon potential of the Turonian sands in the Pecan Field within the Deepwater Cape Three Points licence area. The primary objective of this well was to verify the expected presence of hydrocarbons while confirming the depth of the OWC in the Pecan TU-2 sands.

The Pecan South-1A is the main wellbore to Pecan South-1A ST-1. The primary objective of the side-track was to verify the presence of hydrocarbons in the TU-

2 reservoir, and to determine the position of the Turonian OWC. The side-track was spudded on 2nd March 2019 and completed on 22nd March 2019. The well was plugged and abandoned.

Pecan South East-1A is an appraisal well in the Deepwater Tano Cape Three Points Block. The primary objective of the well is to further appraise the Pecan Turonian reservoir and explore the potential for hydrocarbons within the Cenomanian sands.

Submission of Plan of Development and Operation for DWT/CTP

Aker Energy Ghana Limited (Aker) on 28th March 2019 submitted its Plan of Development (PoD) in respect of the Deep Water Tano Cape Three Points (DWT/CTP) for the development and production of the petroleum resources in the Pecan Field. The Petroleum Commission reviewed the PoD and issued an advisory paper to the Minister for Energy in April 2019 pursuant to Section 3(j) of the Petroleum Commission Act, 2011 (Act 821).

The Minister, based on the advice of the Commission, responded to Aker Energy with a list of concerns to be addressed regarding the PoD, and consequently directed Aker to re-submit a revised PoD.

South Deepwater Tano Block

Exploratory drilling activities commenced in the South Deepwater Tano (SDWT) block with the drilling of the Kyenkyen-1X and Nyankom-1X wells. Kyenkyen-1X was spudded on 15th May 2019 by the Maersk Viking Drillship at a water depth of 2,031.5m and drilled to a total depth of 4,333.3m. Drilling operations ended on 15th June 2019 after the well was plugged and abandoned.

Nyankom-1X was drilled on 10th May 2019 as a slim bore vertical penetration at a water depth of 3,086m. The well was suspended after the top-hole section was drilled on 14th May 2019. Drilling operations resumed on 15th June 2019 at a total depth of 4,739m and ended on 3rd July 2019, with a decision to drill a side-track to acquire bypass cores as required, and this was approved by the Commission.

Decommissioning of Saltpond Field

The Saltpond Field was commissioned in 1970. Production operations ceased on 23rd December 2015 due to the Field' s inability to remain commercially viable. On the recommendation of an inter-agency committee constituted to review the state of the Saltpond Field, the Minister terminated the Saltpond Field Petroleum Contract and directed the installation to be decommissioned in accordance with industry best practices.

As indicated in PIAC' s 2018 Annual Report, the decommissioning plan has, as at the end of that year, been completed and was being subjected to GNPC' s internal approval process, after which, it was to be submitted to the Minister for Energy for approval in accordance with Sections 43 to 49 of the Petroleum (Exploration and Production) Act, 2016 (Act 919).

Meanwhile, the Petroleum Commission has engaged GNPC on the overall implementation strategy as well as preliminary budget estimates for the project execution and to provide advice in accordance with Section 3(d)(i) of the Petroleum Commission Act, 2011 (Act 821).

The execution phase of the project has been categorised into three (3) stages as follows:

- Well Plugging & Abandonment (P&A), ending with removal of conductor pipes
- Topside removal of the Mr Louie Platform, dismantling and waste management
- Installation of surveillance and marine lights

Voltaian Basin Project

The Voltaian Basin covers over 104,000 sq. km or approximately 40 percent of the land area of Ghana. It is located within the Northern, North East, Savanna, (formerly part of Northern Region), Bono, Bono-East, Ahafo, (formerly part of Brong Ahafo), Ashanti, Eastern, Volta and Oti (formerly part of the Volta) Regions.

GNPC completed seismic operations in the Basin on 13th February 2019. As at June 2019, data acquisition on the 13 regional seismic lines summing up to 1871.2 km had been completed. All teams were demobilised from the Field by 24th February 2019, officially closing out the first phase of the project.

Data for all 13 lines has been shipped to the Contractor's processing centre in China. Currently, the in-house team at GNPC has received the fast track PSTM data from BGP China, to enable each carry out its independent interpretation as part of the contractual provisions. GNPC and the contractor are interpreting the data and integrating all results obtained for a decision to be made by GNPC's Management, for the next phase of the project.

The GNPC Geoscience team has finished interpreting the Northern lines and is currently integrating the geochemistry data which was acquired last year (2018) with the 2D seismic data.

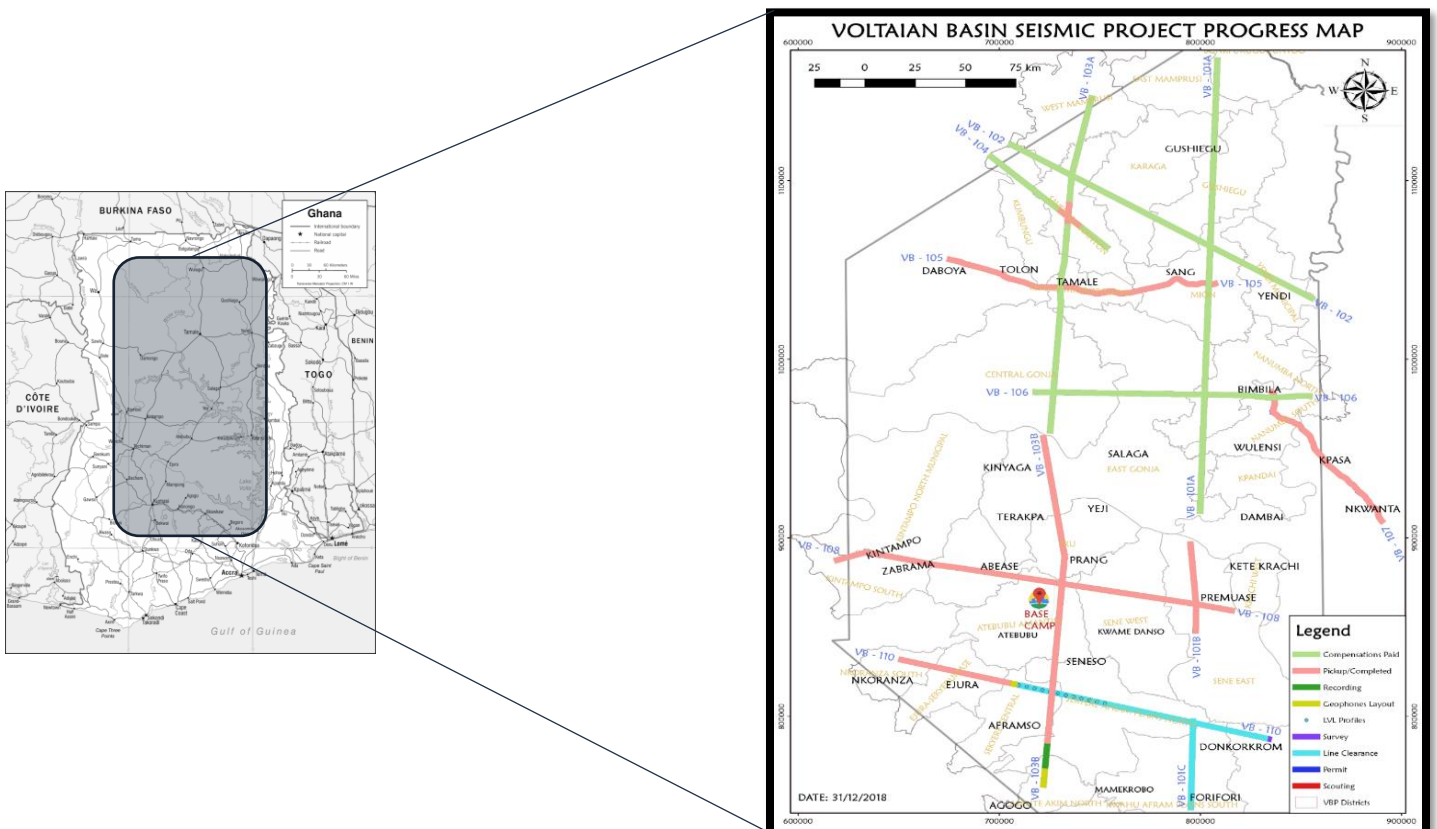


Figure 1: Seismic Activity of the Voltaian Basin

Open Licensing Round

The Government, during the first half of 2019, took a bold and a major step towards the implementation of the contract transparency provisions in its Petroleum (Exploration and Production) Act, 2016 (Act 919). Having launched the country's first ever open bid and licensing round in October 2018 and established the Licensing Bid Rounds and Negotiation (LBRN) Committee¹ made up of 23 members, the Ministry invited Expression of Interest from interested IOCs.

For the 2018/2019 licensing round, six blocks were planned to be awarded. Three of the blocks were set aside for the open, competitive bidding process, two to be awarded through direct negotiations, and one solely for the national oil company, GNPC.

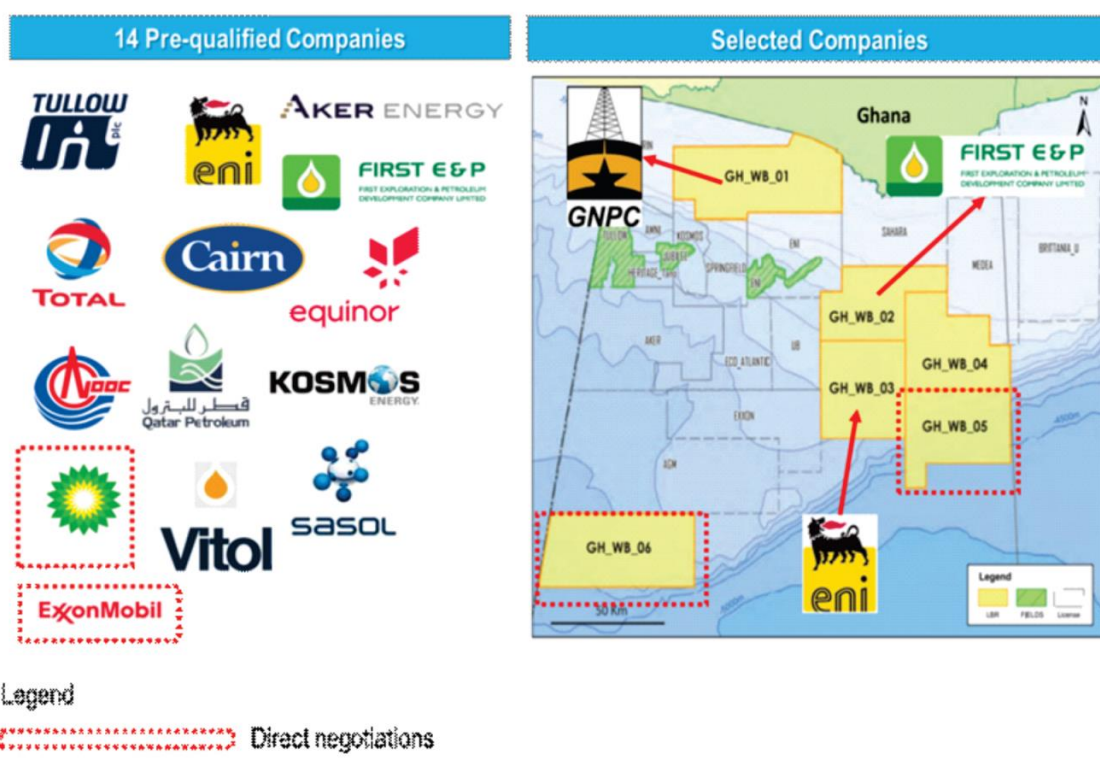


Figure 2: Pre-Qualified Companies and Allocated Blocks

¹ Ministry of Energy, GNPC, EPA, GRA, Ministry of Finance, Attorney General's Department, Petroleum Commission, and the Ghana Maritime Authority.

The outcome of the bid round has been described as below expectation. The Ministry of Energy has explained the low level of interest in the country's first ever bidding round as having been occasioned by inadequate, and low quality of data. Another reason cited as accounting for the low level of interest is the small sizes of the blocks offered. However, the CSOs Licensing Working Group coordinated by NREGI and GOGIG, which monitored the licensing round for its compliance with international best practices, has blamed the Ministry's decision to undertake the pre-qualification for both the bid round and direct negotiations at the same time as reason for the seeming failure of the bid round. According to the group, the approach gave cause for some companies to opt out of the bid round in favour of direct negotiations.

Update on the reimbursement of the Fifty Million Dollar loan to the Ministry of Finance

GNPC as at the end of June, has not received payment in respect of the US\$50 million advance to the Ministry of Finance. On 7th September, 2018, the Ministry wrote to inform the Independent Administrator preparing the Ghana 2016 EITI Report (with GNPC in copy) that, provision had been made in the 2019 Budget for the settlement of the loan to GNPC.

On 15th December 2018, the Corporation indicated that it received another letter from the Ministry directing that the amount be expunged from its books, on the ground that per the Earmarked Funds Capping and Realignment Act, 2017 (Act 947), the Minister for Finance is empowered to cap all earmarked funds at twenty-five percent of tax revenues. The Ministry indicated that the Government had not retained GNPC's flows thus far with the view to offsetting the US\$50 million loan...

GNPC' s position on the expungement of the debt by MoF in the letter referred to, is yet to be communicated to MoF. The Corporation plans to engage its sector Ministry and Select Committee on Mines & Energy to discuss the issue further.

CHAPTER 3

3.0 PETROLEUM PRODUCTION AND SALES

3.1 Crude Oil Production

Crude oil production continued to increase over levels obtained in 2017 and 2018. A total of 34,309,685.53 barrels (bbls) of oil was produced from Ghana's three offshore producing Fields - Jubilee, TEN, and SGN - from January to June, 2019. This represents an 18.38 percent increase over the first half of 2018 production volume of 28,982,050 bbls, and the highest half-year crude oil production since inception, as shown in Figure 3.

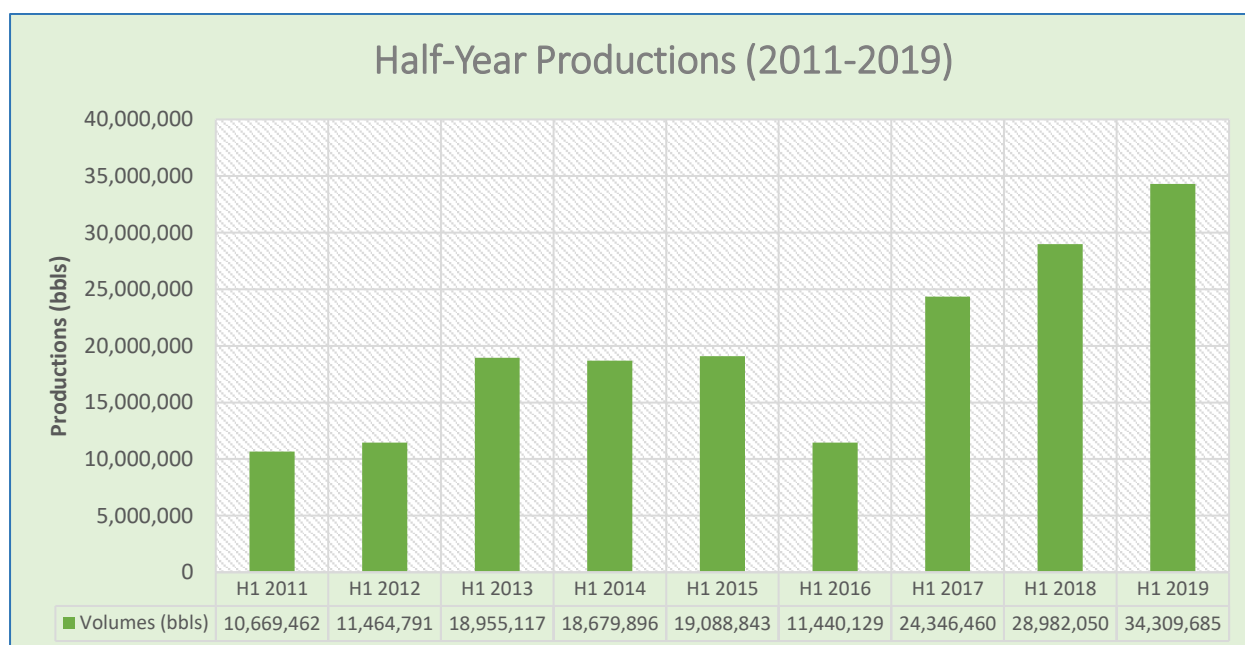


Figure 3: Half-year (H1) Crude Oil Production (2011- 2019)

The increase in production for the first half of 2019 over that of 2018 is a result of improved production on the Jubilee and SGN Fields. Production on the Jubilee Field was 16,035,225 bbls for the first half of 2019, compared with 11,923,286 bbls for the same period in 2018. The SGN Field witnessed an increase of 35.33 percent, with 7,154,334.53 bbls in 2019 and 5,286,497 bbls in 2018.

Table 1 shows the monthly production figures for Jubilee, TEN and SGN Fields for half-year 2019.

Table 1: Breakdown of Total Crude Production

	Jubilee		TEN		SGN		Production Days
	Daily Av. Prod (bbls)	Qty Produced (bbls)	Daily Av. Prod (bbls)	Qty Produced (bbls)	Daily Av. Prod (bbls)	Qty Produced (bbls)	
January	74,760	2,317,569	62,886	1,949,481	33,793.24	1,047,590.50	31
February	64,900	1,817,186	60,859	1,704,038	37,833.45	1,059,336.69	28
March	99,087	3,071,693	67,388	2,089,030	33,305.82	1,032,480.43	31
April	97,507	2,925,200	49,397	1,481,899	32,073.55	962,206.56	30
May	96,594	2,994,424	59,656	1,849,322	46,744.70	1,449,085.61	31
Jun	96,972	2,909,153	68,212	2,046,356	53,454.49	1,603,634.74	30
Total		16,035,225		11,120,126		7,150,743.40	

Source: GNPC, June 2019

Average daily production on the Jubilee Field in 2019 half-year was 88,303 bbls compared to 65,875 bbls in the first half of 2018, representing an increase of 57.27 percent. While the turret remediation works led to two shutdowns of the FPSO Kwame Nkrumah in February and June 2018, this was resolved, making possible production above the 2018 levels.

Average daily production of 65,040 bbls on the TEN Field which had inched closer to that of Jubilee (65,875 bbls) in the half-year 2018, witnessed a reduction to 61,400 bbls in the first half of 2019. This was mainly as a result of decreased production in April due to shutdown activities over a 14-day period from 22nd April to 5th May 2019, to undertake major maintenance works and inspections.

After witnessing continuous half-year production on the SGN Field in 2018, adding a total of 5,286,497 bbls to total crude oil output, the 2019 half-year production went up to 7,154,335 bbls. As a result, average daily production

increased to 39,534 bbls in the first half of 2019 from 29,207 bbls for the same period in 2018. Production in April fell significantly below the monthly average, being the only month that recorded a production less than a million barrels compared with a high of 1.6 million barrels in June. This could be attributed to a 10-day shutdown from 1st to 11th April 2019 to allow for the tie-in of OP-9 and OP-10.

Cumulatively, the volume of crude oil produced in Ghana since first oil in November 2010, totals 349,330,993.53 bbls as at the end of June 2019, as shown in Figure 4.

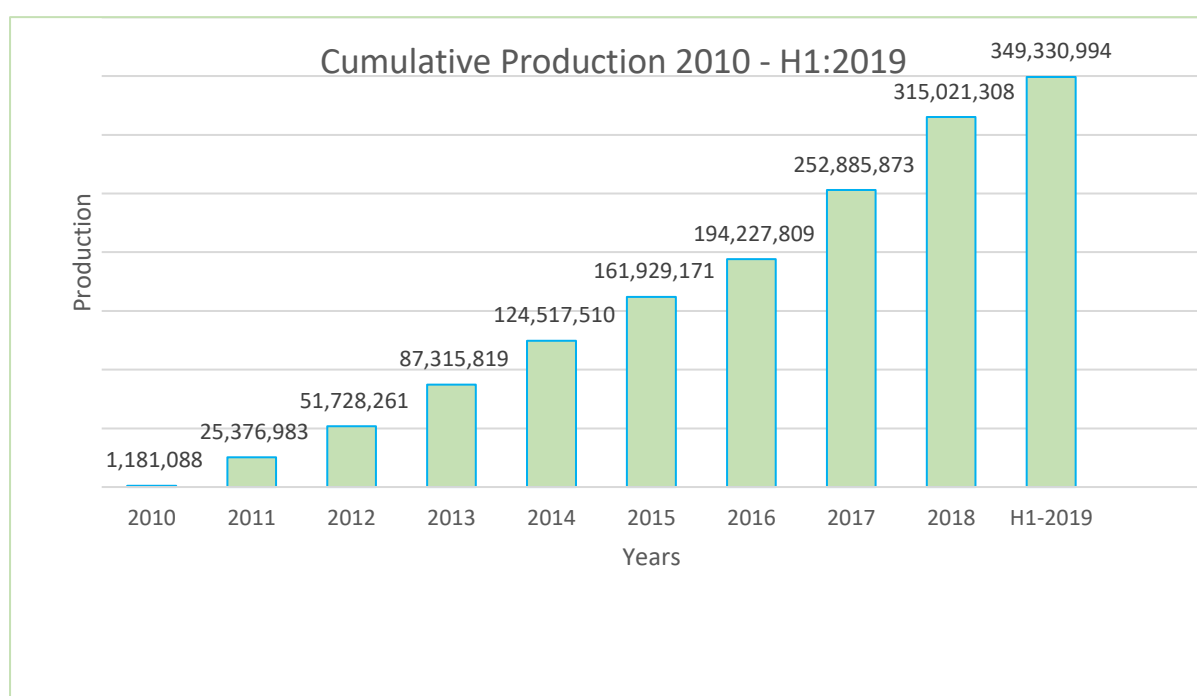


Figure 4: Cumulative Production 2010 - Half-Year 2019

Source: PIAC Construct based on GNPC Data, June 2019

3.2 Gas Production

The cumulative raw gas production (Associated Gas-AG and Non - Associated Gas-NAG) for the first half of 2019 was 70,401.51 MMscf. This represents a 57 percent increase over the volume of raw gas (44,797.21 MMscf) produced for the first half of 2018, and the highest recorded half-year volume of gas produced since 2010. While relatively marginal increases were recorded from the Jubilee

and TEN Fields, the SGN Field recorded a significant increase of about 200 percent from a volume of 8,727.76 MMscf in the 2018 half-year to 25,009.76 MMscf for the same period in 2019. This is mainly attributable to the addition of two (2) new producing wells (OP-9 and OP-10) on 27th April and 6th June 2019 respectively, to eight (8) already producing wells on the SGN Field.

Table 2: Gas Production from Jubilee, TEN, and SGN

DESCRIPTION	MONTH	JUBILEE	TEN	OCTP		TOTAL
		AG	AG	AG	NAG	AG/NAG
ASSOCIATED GAS (AG) & NON- ASSOCIATED GAS (NAG) PRODUCTION (MMSCF)	January	3,478.47	3,678.07	1,446.49	2,011.74	10,614.77
	February	2,429.40	3,270.56	1,794.63	3,132.34	10,626.93
	March	4,317.11	3,956.02	1,669.87	1,956.38	11,899.38
	April	4,413.05	2,784.30	1,663.71	1,716.25	10,577.31
	May	4,828.65	3,566.21	2,301.05	2,268.78	12,964.69
	June	4,482.45	4,187.46	2,602.41	2,446.11	13,718.43
TOTAL		23,949.13	21,442.62	11,478.16	13,531.60	70,401.51

Source: PC, June 2018

Raw gas exported to Ghana National Gas Company (GNGC) from the Jubilee Field witnessed a reduction from 9,332.75 MMscf for the 2018 half-year to 7,401.12 MMscf during the period under consideration, despite a substantial increase in gas production from 17,607.80 MMscf in the first half of 2018 to 23,949.13 MMscf for the same period in 2019. The exported gas represents 30.89 percent of produced gas compared to re-injected gas of 11,903.80 MMscf, constituting 50.23 percent of produced gas.

The Petroleum Commission and GNGC reported that gas export was mainly curtailed by the unavailability of gas export compressors for a 24-day period from 8th February to 3rd March 2019, as repairs were being carried out on the gas export HP compressor of the Jubilee FPSO. According to the Commission, on 12th and 15th March 2019, a volume of 7.21 MMscf of gas produced on the Jubilee Field was exported to the FPSO John Evans Atta Mills on the TEN Field, owing to the fact that GNGC's plant tripped.

Table 3: Raw Gas Exports from Jubilee

2019	Gas Production (MMscf)	Gas Export (MMscf)	Gas Injection (MMscf)	Fuel Gas (MMscf)	Flared Gas (MMscf)
JANUARY	3,478.47	1,478.93	1184.66	227	587.88
FEBRUARY	2,429.4	361.82	561	226.01	1280.57
MARCH	4,317.11	1,060.43	2,591.97	313.82	343.69
APRIL	4,413.05	906.33	2,994.92	343.16	168.63
MAY	4,828.65	1,773.45	2,555.71	338.8	160.7
JUNE	4,482.45	1,820.164	2,015.54	306.06	343.21
Total	23,949.13	7,401.12	11,903.80	1,754.85	2,884.68
(Average)	3,991.52	1,233.52	1,983.97	292.48	480.78

Source: GNPC, June 2019

As shown in Table 4, gas exports for the TEN Field reduced by about 900 percent from a high of 5,361.52 MMscf in the first half of 2018 to 580.78 MMscf for the same period in 2019. Although the TEN gas export manifold was in place within the period, 2.71 percent of produced gas was exported and 85.73 percent re-injected. GNPC reports that in the month of June, 2.52 MMscf from the TEN Field was supplied under the TEN-Jubilee Substitution Agreement.

Table 4: Raw Gas Exports from TEN

2019	Gas Production (MMscf)	Gas Export (MMscf)	Gas Injection (MMscf)	Fuel Gas (MMscf)	Flared Gas (MMscf)
JANUARY	3,678.07	578.26	2,736.99	336.78	26.04
FEBRUARY	3,270.56	0	2,908.72	301.74	60.1
MARCH	3,956.02	0	3,523.25	327.01	112.96
APRIL	2,784.30	0	2,483.46	223.77	84.02
MAY	3,566.21	0	2,915.29	257.16	394.32
JUNE	4,187.46	2.52	3,815.42	310.03	59.49
Total	21,442.62	580.78	18,383.13	1,756.49	736.93
(Average)	3,573.77	96.8	3,063.86	292.75	122.82

Source: GNPC, June 2019

Overall, raw gas exports from the Jubilee and TEN Fields witnessed a 54.32 percent decline for the reporting period from 14,694.27 MMscf in the first half of 2018 to 7,981.90 MMscf.

Table 5: Associated and Non-Associated Gas Exports to the Offshore Receiving Facility

Annual 2019	Associated Gas (MMSCF)		NAG (MMSCF)		Export to ORF
	Monthly Total	Daily Average	Monthly Total	Daily Average	
JANUARY	1,446.49	46.72	2,011.74	53.76	1,893.44
FEBRUARY	1,794.63	64.19	3,132.34	111.87	2,993.34
MARCH	1,669.87	53.95	1,956.38	63.26	1,507.25
APRIL	1,663.71	55.46	1,716.25	57.21	1,278.17
MAY	2,301.05	74.23	2,268.78	73.19	1,766.64
JUNE	2,602.41	86.87	2,446.11	81.65	2,232.92
Total	11,478.16	381.42	13,531.60	440.94	11,671.76

Source: GNPC, June 2019

Out of the cumulative Associated and Non-Associated Gas of 25,435.40 MMscf produced on the SGN Field, 11,671.76 MMscf (45.89%) was exported through the

Onshore Receiving Facilities (ORF) to the Volta River Authority (VRA) Power Generation Plants in Aboadze during the review period. Average daily gas exported was 64.48 MMscf, 50.40 percent below the annualised target of 130 MMscf. Total gas flared for the period was 154.85 MMscf.

3.3 Crude Oil Liftings

Lifting of crude is done in accordance with the terms of the Petroleum Agreement and the Crude Oil Lifting Agreement (COLA) for each field.

3.3.1 Jubilee Field

The Republic of Ghana and GNPC (Ghana Group) have a total entitlement of 17.9588 percent in the Jubilee Field. A total of 16 liftings were made by the Jubilee Partners for the first half of 2019 compared to 13 liftings for the same period in 2018. The increase resulted from revamped production following the turret remediation works in 2018.

The Ghana Group lifted three parcels of crude totalling 2,936,014 bbls compared with two parcels of 1,969,891 bbls for the same period in 2018. The other Partners lifted 12,411,127 bbls in line with the Jubilee Field Crude Oil Lifting Agreement as shown in Table 6.

Table 6: Crude Oil Liftings by the Ghana Group and other Jubilee Partners – Half-Year 2019

COMPANY	VOLUME LIFTED (BBL)	No. OF LIFTINGS	PERCENTAGE
TULLOW GHANA	5,678,811.00	6	37.00%
GHANA GROUP	2,936,014.00	3	19.13%
KOSMOS ENGERGY	2,935,785.00	3	19.13%
ANADARKO & PETRO SA	3,796,531.00	4	24.74%
TOTAL	15,347,141.00	16	100%

Source: PC, June 2019

3.3.2 TEN Field

In respect of the TEN Field, 12 parcels of crude totalling 11,633,004 bbls were lifted by the Partners from January to June 2019. This represents a slight reduction from the total liftings of 11,711,943 bbls recorded in the 2018 half-year, attributable to the 14-day shutdown of the TEN FPSO.

Liftings by the other TEN Partners totalled 8,647,583 bbls during the period under review, a reduction from 9,722,135 bbls of lifting for the same period in 2018.

Table 7: Crude Oil Liftings by the Ghana Group and other TEN Partners – Half-Year 2019

COMPANY	VOLUME (BBLS)	No. OF LIFTINGS	PERCENTAGE
TULLOW	4,763,591.00	5	40.95
GHANA GROUP	2,985,421.00	3	25.66
KOSMOS	1,941,465.00	2	16.69
ANADARKO/PETRO SA	1,942,527.00	2	16.70
TOTAL	11,633,004.00	12	100

Source: PC, June 2019

3.3.3 Sankofa Gye-Nyame Field

For the first half of 2019, the Sankofa Gye Nyame (SGN) Partners lifted seven (7) parcels of crude, totalling 6,612,967 bbls compared with six (6) parcels amounting to 5,840,411 bbls for the same period in 2018. As with the 2018 half-year, the Ghana Group lifted one parcel (996,223 bbls) as royalty.

There was no lifting by GNPC in respect of Carried and Participating Interest (CAPI). As reported in the half-year 2018, this was as a result of the Corporation' s

inability to honour outstanding payments (plus interest) in respect of its equity participation in the Field. Consequently, the SGN partners invoked Article 10.1(d) of the OCTP Petroleum Agreement, which permits the contractor to apply GNPC' s crude oil entitlement to liquidate the Corporation' s share of development costs (plus interest). An over-lifting of one (1) parcel worth 996,878 bbls was made by the Contractor in February 2019.

Table 8: Crude Oil Liftings by the Ghana Group and other SGN Partners – Half-Year 2019

COMPANY	VOLUME (BBLS)	No. OF LIFTINGS	PERCENTAGE
GHANA GROUP	996,223.00	1 (Royalty)	15.06
ENI GHANA E&P LTD	3,673,100.00	4	55.54
VITOL UPSTREAM	1,943,644.00	2	29.40
TOTAL	6,612,967.00	7	100.00

Source: GNPC, June 2018

3.4 Upstream Petroleum Expenditure

The total expenditure incurred in respect of upstream petroleum projects for the first half of 2019 was US\$1.2 billion, made up of US\$137.4 million for exploration activities, US\$805.9 million for development of the various fields, and US\$257.2 million for production operations.

Exploration expenditure was mainly driven by the Deepwater Cape Three Points Block operated by Aker Energy, with a total cost of US\$103.7 million towards exploration and appraisal activities during the period.

The development expenditure of the SGN Field amounted to US\$417.8 million, representing about 52 percent of the total development cost of US\$805.9 million.

This is largely on account of the drilling of two additional wells, increasing average daily oil production from 33,677.40 barrels of oil per day (bopd) in January to 53,454.49 barrels per day in June 2019.

3.4.1 Sankofa Gye-Nyame Expenditure

GNPC' s share of the SGN costs payable for the first half of 2019 was US\$74.6 million comprising Capital Expenditure (CAPEX) of US\$22.4 million, Operating Expenditure (OPEX) of US\$11 million, and opening balance of US\$41.2 million.

Total payment made for the first half of 2019 was US\$70.4 million, out of which US\$51.8 million was recovered from oil entitlement while US\$18.6 million was recovered through gas. The balance of US\$4.2 million represents OPEX for June 2019 which will become due in July 2019.

3.5 Crude Oil Pricing

3.5.1 Jubilee, SGN, and TEN Achieved Crude Prices

The average unit price achieved by the Ghana Group for Jubilee Crude for the period under review was US\$64.01/bbl compared with US\$70.78/bbl for the same period in 2018 and a Government estimated benchmark price of US\$66.76/bbl. The achieved unit price for the Jubilee Field was slightly lower than the estimated benchmark price, but higher than the average Dated BRENT price of US\$63.23/bbl at the time of the liftings.

The Ghana Group' s three cargoes lifted from the TEN Field also achieved an average unit price of US\$61.02/bbl compared with US\$67.58/bbl for the same period in 2018, significantly lower than the estimated benchmark price and slightly lower than the average Dated BRENT price of US\$61.87/bbl at the time of the liftings.

Lifting in the form of royalty on the SGN Field yielded US\$70.22/bbl.

Figure 5 compares the achieved prices of Jubilee, TEN and SGN Fields with the Dated BRENT price for the period.

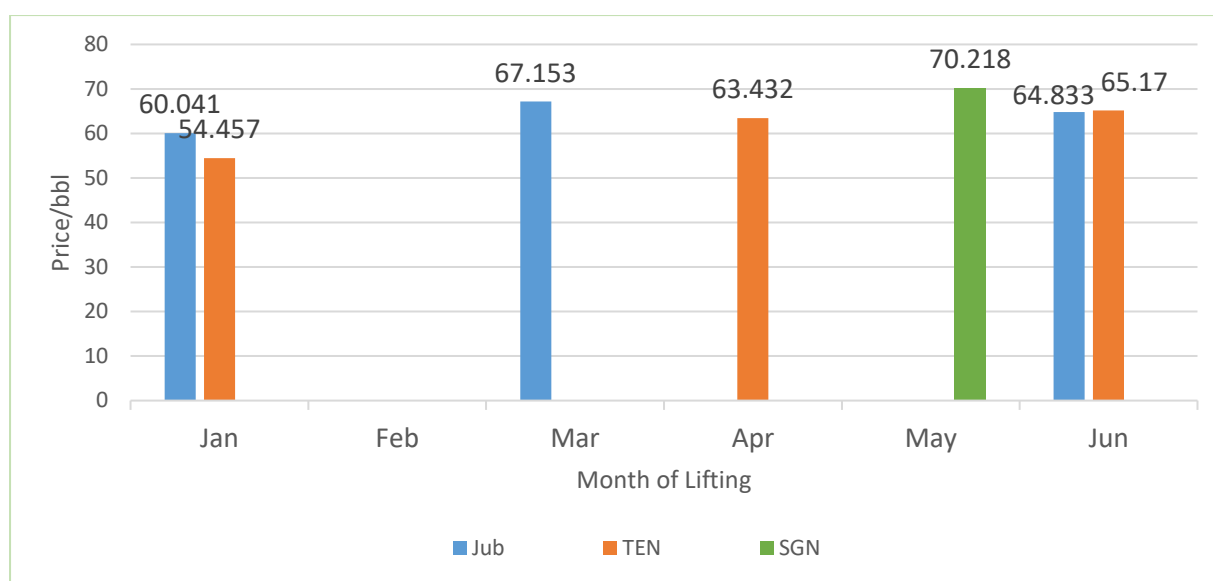


Figure 5: Achieved Prices – Jubilee, TEN and SGN

Source: PIAC Construct based on GNPC Data, June 2019

As depicted in Figure 5, the prices vary widely reflecting the fragile crude oil price regime during the period under review.

3.5.2 Achieved Prices by Ghana Group versus BRENT for Jubilee, TEN, and SGN Fields

A comparison of the achieved prices for the Jubilee Crude by the Ghana Group versus BRENT indicates that the prices achieved by the Ghana Group were competitively higher by US\$0.78/bbl. However, average achieved price by Kosmos for its Jubilee crude was significantly higher than that of the Ghana Group by US\$4.52/bbl for the period.

Average Achieved price for TEN crude by the Ghana Group was US\$0.85/bbl lower than the Average Dated BRENT and US\$2.26/bbl lower than that of Kosmos, as shown in Figure 6.

For the SGN Field, the Ghana Group obtained US\$0.90/bbl lower than the Average Dated Brent and significantly higher (US\$6.098/bbl) than the average price obtained by ENI for the period.

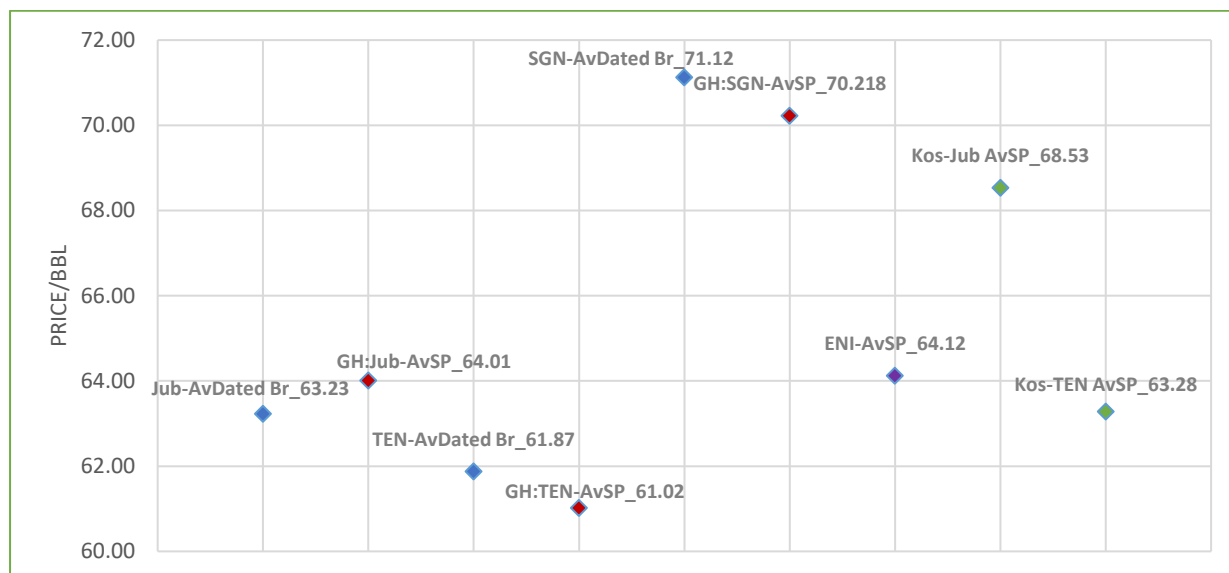


Figure 6: Comparison of Average Achieved Prices and Dated Brent of Jubilee, TEN and SGN Partners

Source: PIAC's construct based on data from Partners, June 2019

The prices of lean gas as determined by the Public Utilities Regulatory Commission (PURC) varied depending on the offtaker. While gas supplied to VRA and Genser was US\$7.29/MMBtu, that of Wankang and Keda (Twyford) was priced at US\$6.50/MMBtu.

Findings

1. A total of 34,309,685.53 barrels (bbls) of oil was produced from Ghana's three offshore producing Fields - Jubilee, TEN, and SGN - from January to June, 2019, representing an increase of 18.38 percent over that achieved in the 2018 half-year.
2. The increased half-year output, the highest since inception of production, was driven largely by production from the Jubilee and SGN Fields.

3. Production on the TEN Field was affected by shut-down activities over a 14-day period from 22nd April to 5th May 2019 to undertake major maintenance works and inspections, affecting the average daily production and output of the Field.
4. The period under review recorded the highest half-year gas production volume of 70,401.51 MMscf since 2010, an increase of 57 percent over the first half of 2018 volume, owed largely to SGN production.
5. Overall, raw gas exports from the Jubilee and TEN Fields witnessed a 54.32 percent decline for the reporting period from 14,694.27 MMscf in the first half of 2018 to 7,981.90 MMscf.
6. For four (4) months, beginning February to May 2019, there was no gas export from the TEN Field even though the produced volume for the period was 13,577.09 MMscf.
7. Raw gas exports from the TEN Field reduced by about 900 percent compared with the half-year 2018 exports.
8. For the second time, there was no lifting by GNPC in respect of Carried and Participating Interest (CAPI) on the SGN Field due to the Corporation' s inability to honour outstanding payments (plus interest) in respect of its equity participation in the Field. The SGN Partners lifted seven (7) parcels of crude totalling 6,612,967 bbls.
9. Lifting in the form of royalty on the SGN Field yielded US\$70.22/bbl, US\$3.065 more than the highest achieved price from the Jubilee and TEN Fields.

CHAPTER 4

4.0 REVENUE COLLECTION AND MANAGEMENT

Sections 6 and 7 of the Petroleum Revenue Management Act, 2011 (Act 815) outlines revenue streams including Royalty, Initial (Carried) and Participating Interest (CAPI), Corporate Income Tax (CIT), Additional Oil Entitlement, and Surface Rentals as gross receipts into the Petroleum Holding Fund (PHF) held at the Bank of Ghana. The Act mandates the Ghana Revenue Authority (GRA) to assess, collect, and account for petroleum revenue from these sources.

4.1 Payment into the Petroleum Holding Fund – Half-Year 2019

Total petroleum receipt of US\$363,736,223.63 was paid into the Petroleum Holding Fund (PHF) for the first half of the year compared with US\$463,569,064.38 for the same period in 2018. This amount was realised from the various sources that constitute petroleum revenues.

4.2 Receipts from Crude Oil Liftings

Of the total receipts, CAPI contributed US\$176,251,928.71 (48.46 percent), Royalty yielded US\$64,967,167.39 (17.86 percent), while CIT proceeds were US\$121,308,147.60 (33.35 percent). Interest earned on the PHF and Surface Rentals contributed 0.18 percent and 0.15 percent to the half-year receipts respectively as shown in Figure 7.

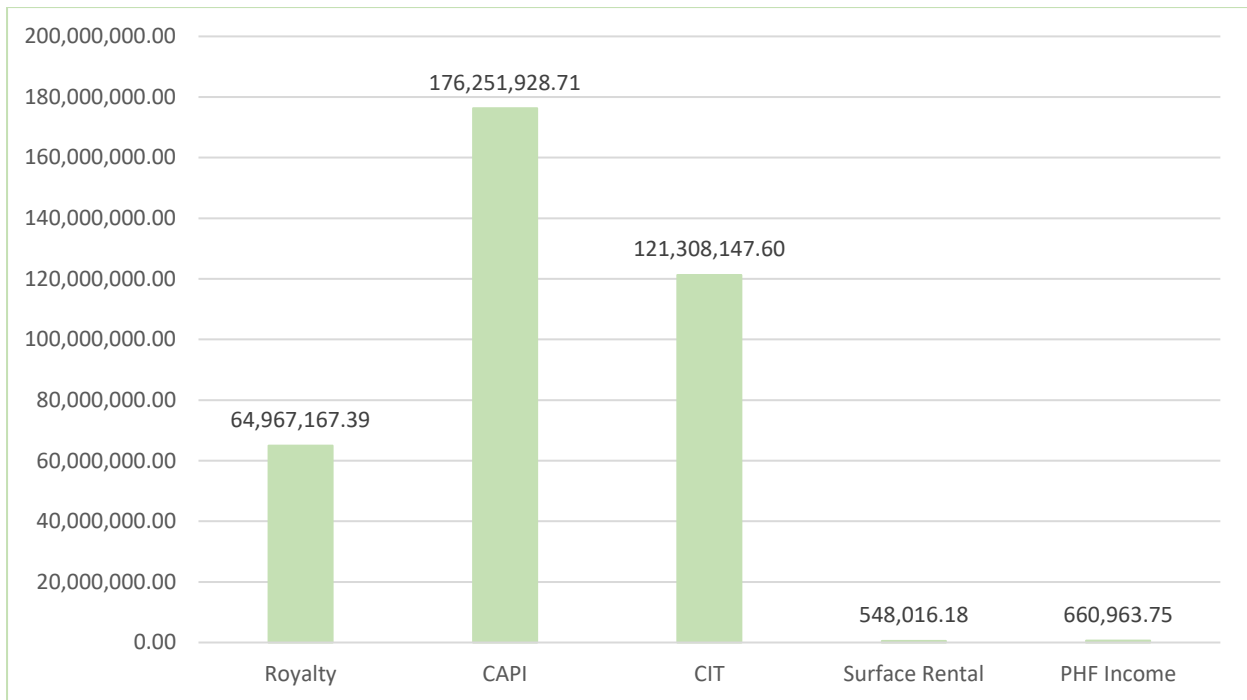


Figure 7: Contribution of Revenue Streams to Total Petroleum Receipts

Source: PIAC construct from MoF and BoG Data, June 2019

Revenue from liftings made in May and June yet to be realised and paid into the PHF during the period, amounted to US\$199,458,924.00. This is made up of 993,641 bbls and 995,956 bbls worth US\$64,500,218.23 and US\$64,956,250.32 respectively, and SGN royalty of 996,223 bbls valued at US\$70,002,455.45. Undistributed funds in the PHF earned an interest of US\$757,855.51.

4.2.1 Revenue from Jubilee Field Crude Liftings

An amount of US\$123,848,520 was paid into the PHF in the first half of 2019 compared to US\$203,102,174.08 for the same period in 2018. This was made up of US\$34,481,303.54 of royalties and US\$89,367,216.71 in CAPI. The third lifting of 993,641 bbls worth US\$64,500,218.23 was yet to be deposited into the PHF.

Table 9: Crude Oil Liftings from Jubilee by the Ghana Group and the Associated Revenue – Half-Year 2019

Date of Lifting	Lifting No.	Parcel Qty (bbl)	Selling Price	Pricing Option fee	Revenue
24-Jan-19	0047	948,122	60.041	75,849.76	57,002,042.76
25-Mar-19	0048	994,251	67.153	79,540.08	66,845,477.48
7-Jun-19	0049	993,641	64.833	79,491.28	64,500,218.23
Total		2,936,014			188,347,738.47

Source: GNPC & BoG, June 2019

As shown in Figure 8, a total of US\$170,860,336.69 was realised from five revenue streams – CAPI, royalty, CIT, surface rentals and PHF interest. Out of this, 53 percent (US\$ 89,367,216.71) of revenues from the Jubilee Field was derived from Carried and Participating Interest. Royalty from the Field amounted to US\$34,481,303.54, representing 20 percent, while CIT recorded US\$ 46,308,147.60, accounting for 27 percent of the total revenue.

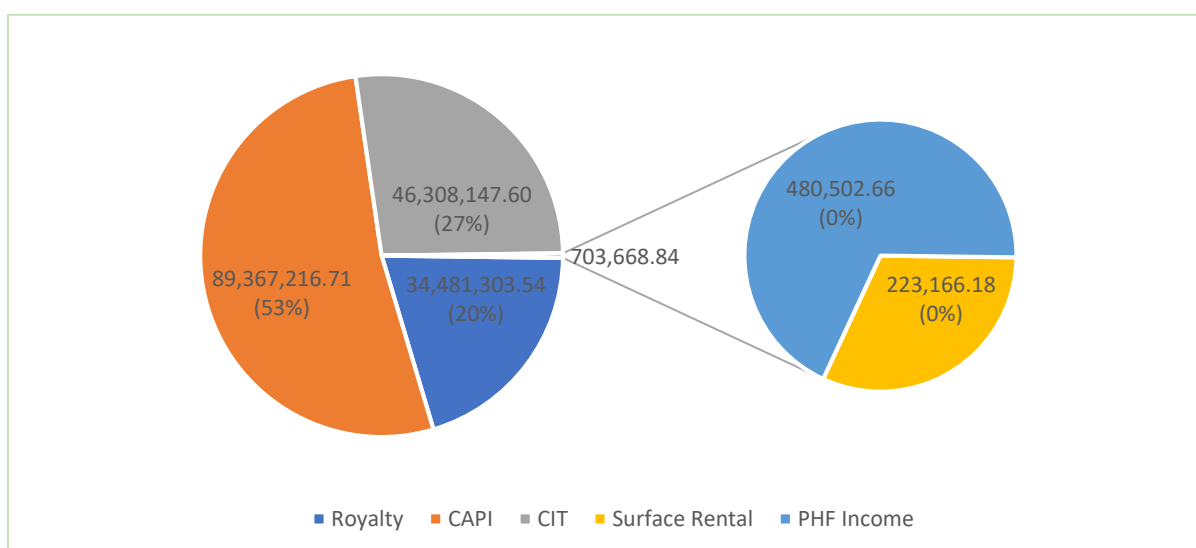


Figure 8: Distribution of Revenues from the Jubilee Field

Source: PIAC' s construct based on MoF and BoG Data, June 2019

4.2.2 Revenue from TEN Field Oil Liftings

In the first half of 2019, the Ghana Group lifted three parcels (10th-12th) of 2,985,421 bbls from the TEN Field, valued at US\$182,326,826.17. However, the 12th lifting of 995,956 bbls valued at US\$64,956,250.32 was yet to be paid into the PHF as at the end of the period.

Table 10: Revenue from TEN Field Oil Liftings

Date of Lifting	Lifting No.	Parcel Qty (bbl)	Selling Price	Pricing Option fee	Revenue
18-Jan-19	0010	994,389	55.307	49,719.45	54,201,161.22
2-Apr-19	0011	995,076	64.282	49,753.80	63,169,414.63
24-Jun-19	0012	995,956	66.020	49,797.80	64,956,250.32
Total		2,985,421			182,326,826.17

Source: GNPC & BOG, June 2019

As at June 2019, a total of US\$192,875,886.94 million had been lodged into the PHF. Carried and Participating Interest (CAPI) constituted US\$86,884,712.00 (45 percent), Royalty - US\$30,485,863.85 (16 percent), and Corporate Income Tax (CIT) - US\$75,000,000.00 (39 percent).

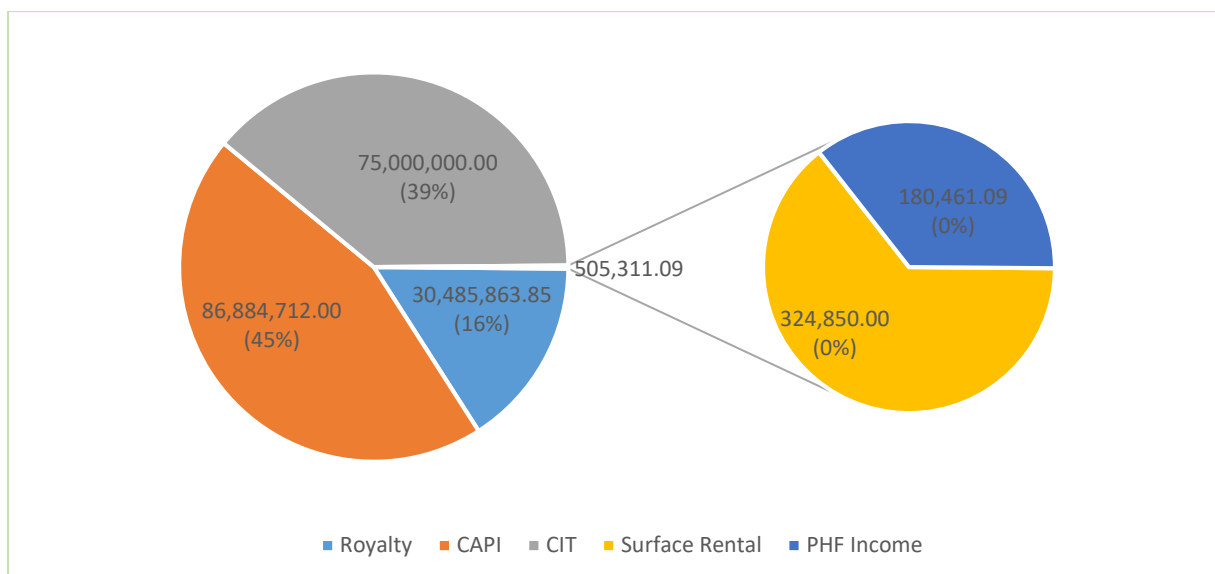


Figure 9: Distribution of Revenues from TEN Field

Source: PIAC' s construct based on MoF and BoG Data, June 2019

4.2.3 Revenue from Sankofa Gye-Nyame (SGN) Field Oil Liftings

In March 2019, the Ghana Group lifted its first parcel of 990,351 barrels of crude oil from the Sankofa Gye-Nyame Field in the form of Royalty, generating an amount of US\$70,002,455.45.

The Ghana Group' s production entitlement for the period under review was used to offset the Operating Expenditure (OPEX) and Capital Expenditure (CAPEX) in relation to GNPC' s equity participation. The offset is done on a monthly basis.

Table 11: Crude Oil Liftings from SGN by the Ghana Group and the Associated Revenue – Half-Year 2019

Date of Lifting	Lifting No.	Parcel Qty (bb)	Selling Price	Pricing Option fee	Revenue
3-May-19	N/A	996,223	71.12	49,811.15	70,002,455.45

Source: GNPC & BOG, June 2019

4.2.4 Breakdown of Corporate Taxes and Surface Rental Payments

In the first half of the year, total receipt of surface rentals on cash basis from seven (7) out of thirteen (13) companies was US\$595,246.18. However, an amount of US\$27,511.50 was received on the 28th of June, 2019 from Blue Star Exploration GH. Ltd (US\$13,537.50) and AMNI International Petroleum Dev. Co. Ltd (US\$13,974.00) as surface rentals for 2019. According to the GRA, the two payments were recognised as part of 2019 first half receipts. However, BoG indicated that the funds hit the PHF in July, and would be accounted for in the second half of the year.

An amount of US\$121,527,189.41 was received for Corporate Income Tax (CIT) as shown in Table 12.

Table 12: Breakdown of Corporate Taxes and Surface Rental Payments

Date	Payments	Company	Amount (USD)
11-Feb-19	Surface Rental Arrears	UB Group	37,799.92
13-Feb-19	Surface Rental	ENI Ghana EP Ltd	22,600.00
13-Feb-19	Surface Rental	ENI Ghana EP Ltd	29,796.03
25-Feb-19	Surface Rental	Aker	150,750.00
27-Feb-19	Surface Rental	AGM Petroleum	174,100.00
21-Mar-19	Surface Rental	Tullow	53,093.43
21-Mar-19	Surface Rental	Tullow	24,631.80
2-May-19	Surface Rental	Exxon Mobil Exp	55,245.00
6-May-19	Surface Rental	PetroGulf Ltd	47,230.00

Sub-total			595,246.18
	Corporate Tax		
4-Jan-19	Corporate Tax	Tullow	75,000,000.00
4-Apr-19	Interest on late Payment	Tullow	219,041.81
29-Jan-19	Corporate Tax	Anadarko	19,105,858.00
30-Jan-19	Corporate Tax	Kosmos	8,936,450.00
30-Jan-19	Corporate Tax	Petro S.A. Ghana	3,040,716.00
29-Mar-19	Corporate Tax	Petro S.A. Ghana	1,302,645.00
26-Apr-19	Corporate Tax	Anadarko	9,870,269.00
29-Apr-19	Corporate Tax	Petro S.A. Ghana	140,196.60
30-Apr-19	Corporate Tax	Kosmos	3,912,013.00
Sub-total			121,527,189.41
Total			122,122,435.59

Source: BOG and GRA, June 2019

The Ghana Revenue Authority (GRA) describes as encouraging, the payment of corporate taxes by IOCs in the first half of 2019. Indeed, PIAC' s analyses reveals that CIT payments during the period exceeded proceeds from royalty for the first time since 2014. This implies that some companies that started operating in the initial years are exhausting their capital allowances and are coming into a full tax-paying position. The GRA reports that it has begun an audit of upstream

companies to ensure tax compliance with the laws and regulations governing the upstream petroleum industry.

However, Tullow Ghana Ltd paid US\$75 million into the Ghana Revenue Authority accounts at BoG instead of the PHF during the period. An amount of US\$219,041.81 was charged as interest for delay in the transfer of the US\$75 million into the PHF. The interest charged was recorded as part of corporate tax receipts by BoG for the first half of the year without the knowledge of GRA.

GRA is also collaborating with the Petroleum Commission on the collection of the surface rental arrears, which stood at US\$1,426,083.56 as at June 2019. Outstanding surface rentals in respect of full-year 2019, was US\$664,500 as shown in Table 13.

The analysis of Surface Rental payments reveals a discrepancy that is largely attributable to lack of inter-agency collaboration. While the Bank of Ghana reported on actual cash received, GRA reported on monies remitted, some of which may be in transit. This gave rise to a difference of US\$13,974.00 between the two institutions.

In another instance, an amount of US\$13,537.50 was wrongfully lodged in GRA' s account, giving rise to a discrepancy between the Bank of Ghana and GRA recordings. According to GRA, the wrongful payments have been reversed, and the monies lodged with the Bank of Ghana, to be credited to the PHF.

Table 13: Surface Rental Arrears and 2019 Outstanding Payments

Company	Contract Area	Arrears (US\$)	2019 Outstanding Payments (US\$)
Erin Energy	Expanded Shallow Water Tano Block Offshore	75,800.00	75,400.00
Gosco/Heritage Exploration	East Keta Ultra Deepwater	223,900.00	111,950.00
Sahara Energy Fields Ghana Ltd	Shallow Water Cape Three Points	334,315.07	75,000.00

Medea Development International	East Cape Three Points		78,250.00
Brittania-U	South-West Saltpond	354,397.26	102,500.00
UB Resources Gh. Ltd	Offshore Cape Three Points South Block		37,750.00
Swiss African Oil Co. Ltd	Onshore/Offshore Keta Delta Block	437,671.23	150,000.00
Springfield E&P Ltd	West Cape Three Points Block 2		33,650.00
Total		1,426,083.56	664,500.00

Source: GRA, June 2019

4.4 Gas Revenue

There were no payments from GNPC into the PHF in respect of gas revenue during the period under review even though 8,458,153.40 MMBtu of raw gas was supplied to GNGC from the Jubilee and TEN Fields. As at 30th June, 2019, GNGC's indebtedness to GNPC amounted to US\$263,949,220.40 made up of US\$4,229,076.70 for the period and an opening balance of US\$259,720,143.70.

Table 14: Raw Gas Receipts and Outstanding Payments

Month	Volume (MMBtu)	Price (US\$)	Payment	Amount Payable
Opening Balance				259,720,143.70
January	2,180,626.70	0.50		1,090,313.35
February	383,524.96	0.50		191,762.48
March	1,124,051.56	0.50		562,025.78
April	960,716.16	0.50		480,358.08
May	1,879,860.18	0.50		939,930.09

June	1,929,373.84	0.50		964,686.92
Total	8,458,153.40			4,229,076.70
Year-To-Date Total				263,949,220.40

Source: GNGC, June 2019

4.5 Comparison of Gross Revenues from Producing Fields by Partners

Table 15: Gross Revenue from Lifting by Jubilee, TEN and SGN Partners

	Jubilee (US\$)	TEN (US\$)	SGN(US\$)	Total (US\$)
Ghana Group	188,347,738.47	182,326,826.17	70,002,455.45	440,677,020.09
Tullow				
Kosmos	201,201,456.88	122,958,991.59		324,160,448.47
Anadarko				
Petro S.A.				
ENI			235,341,614.09	235,341,614.09
VITOL			136,924,787.28	136,924,787.28
Total	389,549,195.35	305,285,817.76	442,268,856.82	1,137,103,869.93

Source: PIAC construct from Partners' Data, June 2019

NB: PIAC is unable to report on revenue data for Tullow Ghana, Petro S.A and Anadarko because these entities did not report on their achieved prices.

Findings

1. Total petroleum receipts into the Petroleum Holding Fund (PHF) for the first half of 2019 was US\$363,736,223.63 compared with US\$463,569,064.38 for the same period in 2018, representing a decrease of 21.54 percent.
2. Out of the total receipts, CAPI contributed 48.46 percent, Royalty 17.86 percent, and CIT 33.35 percent, exceeding royalties for the first time since 2014.
3. There was a difference of US\$27,511.50 in the total surface rental receipts between GRA and the BoG, and this according to the two institutions, would be reconciled in the second half of the year.
4. Tullow Ghana wrongfully paid US\$75 million into GRA' s accounts at BoG instead of the PHF, during the period. An interest of US\$219,041.81 was charged for delay in the transfer of the US\$75 million into the PHF.
5. Revenue realised but yet to be paid into the PHF during the period amounted to US\$199,458,924.00. This represents proceeds from liftings made in May and June from the three producing fields.
6. There was no payment from GNPC into the PHF in respect of gas revenue during the period, even though 8,458,153.40 MMBtu of raw gas was supplied to the National Gas Company from the Jubilee and TEN Fields.

7. As at 30th June, 2019, GNGC's indebtedness to GNPC amounted to US\$263,949,220.40 made up of US\$4,229,076.70 for the period, and an opening balance of US\$259,720,143.70.

CHAPTER 5

5.0 DISTRIBUTION OF PETROLEUM REVENUES

The Petroleum Revenue Management Act, 2011 (Act 815) as amended by the Petroleum Revenue Management (Amendment) Act, 2015 (Act 893) provides that Ghana's petroleum revenues must first be paid into the Petroleum Holding Fund (PHF) before disbursement. The provisions for this disbursement are presented below:

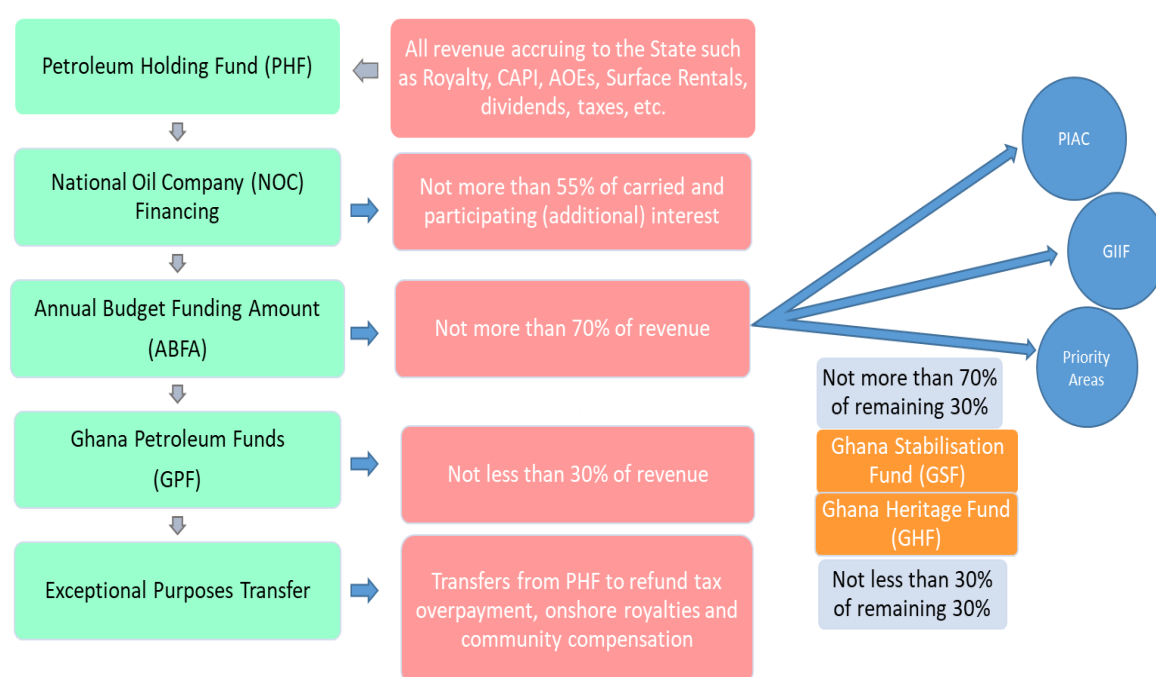


Figure 10: Distribution of Petroleum Revenues from the Petroleum Holding Fund

The Bank of Ghana reports that the total amount available for distribution from the PHF for the period under consideration was US\$434.48 million, of which lifting proceeds was US\$311.22 million while other incomes comprising surface rental, corporate income tax, and interest accrued on the PHF amounted to US\$123.26 million.

6.1 Allocations from the Petroleum Holding Fund

The total distribution of US\$363.74 million from the Petroleum Holding Fund for the period is 23.56 percent lower than the figure for the same period in 2018. This was because of lower crude oil prices in 2019 coupled with the fact that proceeds from the 12th TEN Lifting and the 49th Jubilee Lifting were not received in the first half of 2019, while GoG lifting in respect of royalty from the SGN Field of US\$70 million were not distributed.

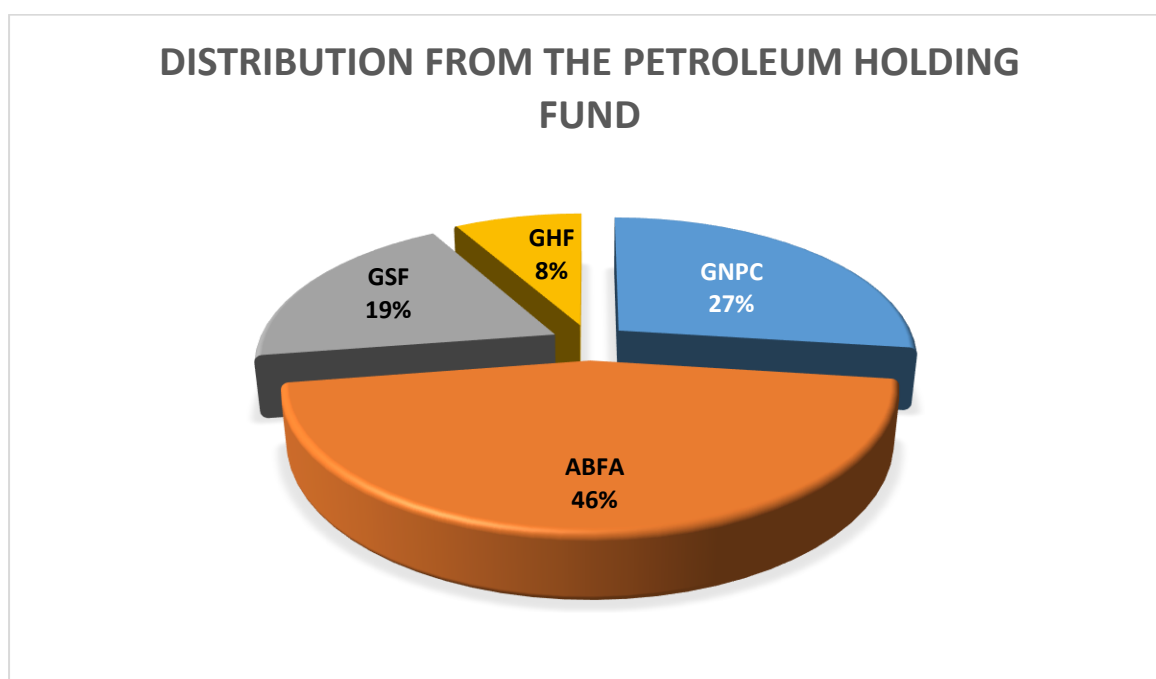


Figure 11: Distribution of Petroleum Revenues as Stipulated by the PRMA

Table 16 compares allocations for the first half of years 2018 and 2019. While GNPC received an amount of US\$142.82 million in the first half of 2018, it received US\$98.29 million for the same period in 2019, a reduction of 31.18 percent.

The Ghana Stabilisation Fund (GSF) and the Ghana Heritage Fund (GHF) received US\$69.85 million and US\$29.94 million respectively for the period, compared to US\$150.84 million and US\$64.65 million respectively for the same period in 2018.

Table 16: PHF Allocations for Jan – June 2018 and 2019 Compared

	Jan – June 2018	Jan – June 2019	% Change
	US\$ million	US\$ million	
GNPC	142,822,504.82	98,287,868.48	31.18
ABFA	117,551,658.10	165,663,980.64	-40.93
GSF	150,841,316.89	69,849,062.15	53.69
GHF	64,646,278.66	29,935,312.36	53.69
TOTAL	475,861,758.47	363,736,223.63	23.56

Source: PIAC Construct based on Bank of Ghana data

6.2 Allocation to Ghana National Petroleum Corporation

Ghana National Petroleum Corporation (GNPC) received an amount of US\$98,287,868.48 from Carried and Participating Interest (CAPI) and for Equity Financing Cost for the half-year, representing 27.02 percent of total allocations from the PHF. The 2019 half-year allocation to GNPC is 31.18 percent less than the allocation of US\$142,822,504.82 for the same period in 2018.

6.3 Annual Budget Funding Amount

The Annual Budget Funding Amount (ABFA) received US\$165,663,980.64 for the first half of 2019, representing 62.41 percent of net Government of Ghana receipts for disbursement to the approved priority areas. This is within the limit stipulated by the PRMA, which mandates that the ABFA shall not exceed 70 percent of the Benchmark Revenue.

The allocation to the ABFA for the first half of 2019 is 40.93 percent higher than that of the same period in 2018 of US\$117.55 million.

6.4 The Ghana Petroleum Funds

The Ghana Petroleum Funds (GPFs) consist of the Ghana Stabilisation Fund (GSF) and the Ghana Heritage Fund (GHF). The GPFs received an amount of US\$99,784,374.59 for the period, of which the GSF received US\$69,849,062.21

while the GHF received US\$29,935,312.38 representing 70 percent and 30 percent respectively. The increased transfer into the GPFs was due to the fact that the quarterly ABFA threshold in 2018 was exceeded by far, leading to the transfer of the excess into the GSF in accordance with Section 23(1)(a) of the PRMA.

6.4.1 Ghana Stabilisation Fund

The Ghana Stabilisation Fund received an amount of US\$69,849,062.21, constituting 70 percent of the GPFs, in compliance with the PRMA. The total receipt into the GSF in the first half of 2019 was 53.69 percent less than that of the receipt into the GSF for the same period in 2018.

6.4.2 Ghana Heritage Fund

The Ghana Heritage Fund (GHF) received for the first half of 2019 an amount of US\$29,935,312.38, representing 30 percent of the GPFs, as stipulated by the PRMA. The total receipt into the GHF for the period represents a 53.69 percent fall from the receipt into the GHF for the same period in 2018.

6.5 Cumulative Distribution of Petroleum Revenue since Inception

Figure 12 presents the distribution of petroleum funds since the commencement of production in 2010 (inception). According to the Bank of Ghana, total petroleum funds distributed since inception till end of June 2019 is US\$5.32 billion. Of this amount, US\$2.04 billion (38 percent) went to the ABFA, US\$1.64 billion (31 percent) to GNPC, US\$1.15 billion (22 percent) to the GSF, and US\$484.68 million (9 percent) to the GHF.

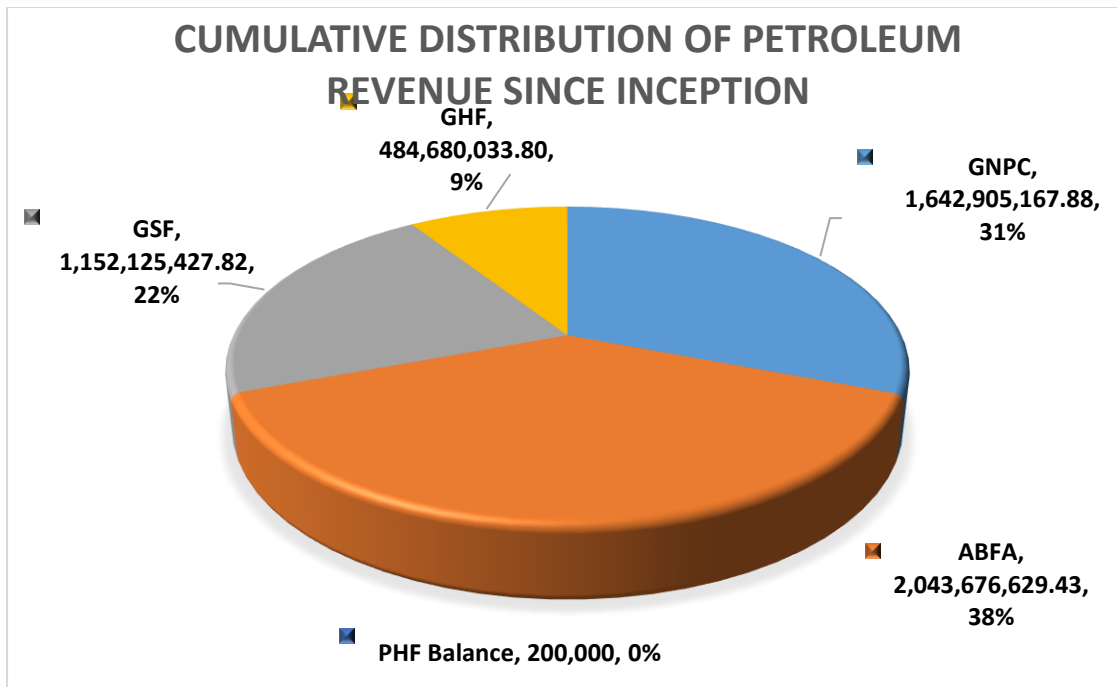


Figure 12: Cumulative Distribution of Petroleum Revenue since Inception

Findings

1. The total revenue distributed from the PHF during the period was US\$363.74 million, leaving a balance of US\$70.74 million. This total distribution is 23.56 percent lower than the figure for the same period in 2018.
2. Total petroleum funds distributed since inception in 2010 till end of June 2019 is US\$5.32 billion of which 38 percent went to the ABFA, 31 percent to GNPC, 22 percent to the GSF, and 9 percent to the GHF.

CHAPTER 6

6.0 ALLOCATION AND UTILISATION OF THE ANNUAL BUDGET FUNDING AMOUNT

For the third time since the production of its Reports, the Committee has had to compile this Report without the ABFA expenditure data. This is as a result of the persistent failure of the Ministry of Finance to meet the statutory requirement of providing data to the Committee in a timely manner, for inclusion in its analyses. The ABFA Expenditure data for the first half of 2019 report was received three months after the submission deadline, at which time the Report was ready for publication.

CHAPTER 7

7.0 MANAGEMENT AND PERFORMANCE OF THE GHANA PETROLEUM FUNDS

7.1 Receipts and Returns on Investments

An amount of US\$99.78 million was received by the Ghana Petroleum Funds (GPFs) from the Petroleum Holding Fund in the first half of 2019. The Ghana Stabilisation Fund (GSF) and Ghana Heritage Fund (GHF) received US\$69.85 million and US\$29.94 million respectively. The GSF and GHF receipts in the first half of 2019 represented a 115.85 percent and 115.93 percent increase over their respective first half of 2018 receipts.

For the period under review, the net profit on investments of the GPFs was US\$11.20 million compared to US\$6.49 million realised in the first half of 2018.

Of the net profit realised, the GSF contributed 40.01 percent (US\$4.48 million) as compared to 37.74 percent (US\$2.45 million) in the first half of 2018, while the GHF contributed 59.99 percent (US\$6.72 million) as compared to 62.26 percent (US\$4.04 million) in the first half of 2018, as illustrated in Figure 13 below.

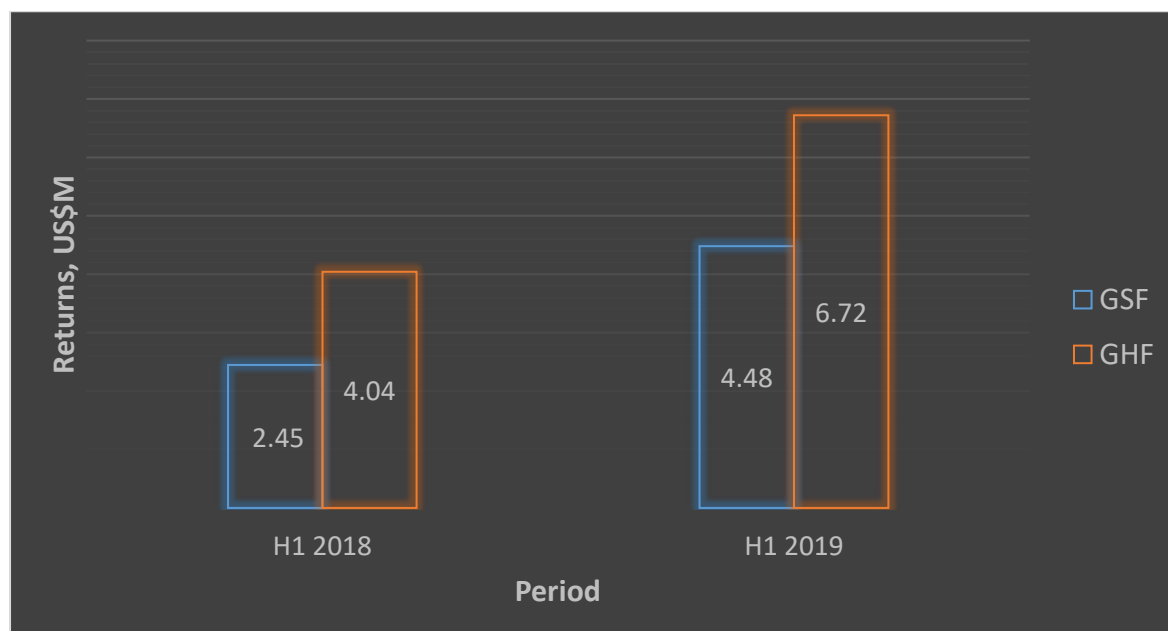


Figure 13: Returns on the Ghana Petroleum Funds in Half-year 2018 and Half-Year 2019
Source: PIAC's Construct from BoG Figures, June 2019.

The yield of the 10-year US Treasury note ended the 2019 half-year at 2 percent, compared to 2.68 percent in the first half of 2018. The yield of the 2-year note ended the half-year 2019 at 1.75 percent compared to 2.53 percent at the end of the first half of 2018.

The mark to market performance of the GHF for the period was impacted positively by the reduced yields of the US Treasury notes, with the Year-To-Date (YTD) yield of the GHF in the first half of 2019 being 4.71 percent compared with 0.90 percent in the first half of 2018.

The Year-To-Date (YTD) yield of 1.33 percent of the GSF in the first half of 2019 was higher than the first half of 2018 yield of 0.65 percent.

7.2 Accumulations and Reserves

The Ghana Petroleum Funds since November 2011 (inception) have accumulated a net profit on investment of US\$55.16 million, as shown in Figure 14 below. The GHF and GSF contributed 67 percent and 33 percent respectively.

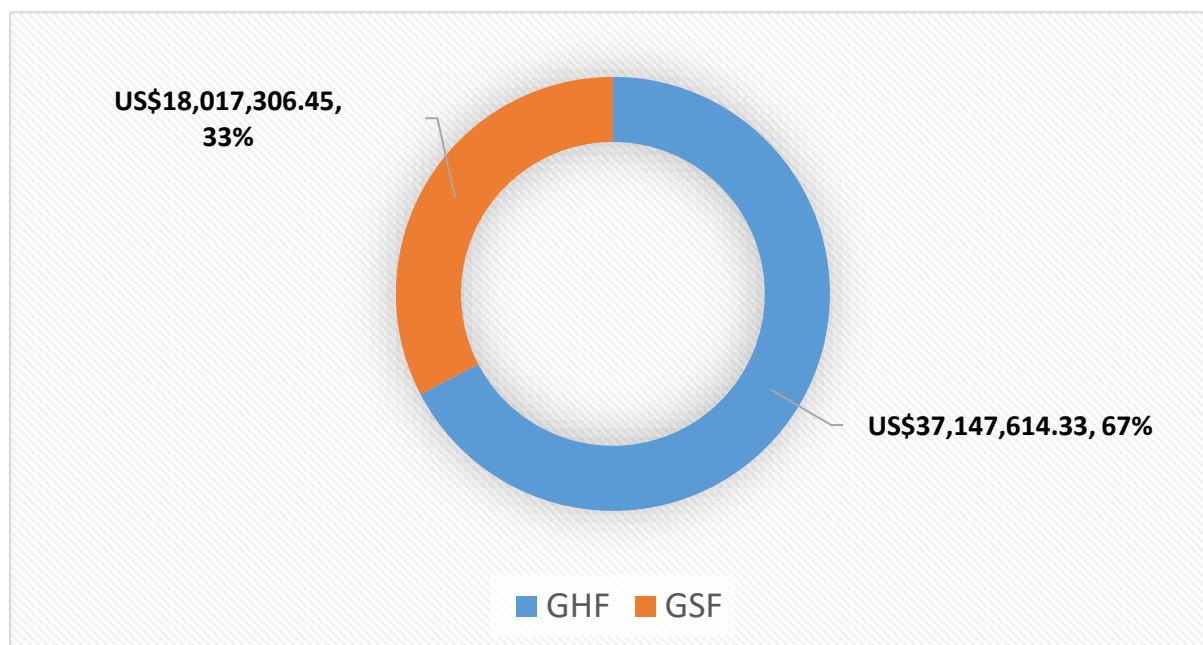


Figure 14: Net Realised Income on the Ghana Petroleum Funds since Inception
Source: PIAC's Construct from BoG Figures, June 2019.

Shown in Figure 15 is the total reserves of the GPFs as at the end of June 2019 amounting to US\$977.36 million. This comprised GHF with an accumulation of US\$521.83 million, and GSF amounting to US\$455.53 million, representing a 16.06 percent increase over the reserves at the end of the first half of 2018 (US\$842.14 million).



Figure 15: Reserves of the Ghana Petroleum Funds as at June 2019

Source: PIAC's Construct from BoG Figures, June 2019.

Shown in Table 17 below, are details of the Funds.

Table 17: Net Accumulated Reserve of the Ghana Petroleum Funds in US\$

FUND NAME	ALLOCATIONS SINCE INCEPTION	REALISED INCOME (NOV. 2011 – JUNE. 2019)	TOTAL SINCE INCEPTION	WITHDR AWALS	CLOSING VALUE
GHF	484,680,033.80	37,147,614.33	521,827,648.13	-	521,827,648.13
GSF	1,152,125,427.82	18,017,306.45	1,170,142,734.27	(714,608,339.13)	455,534,395.14
Total	1,636,805,461.62	55,164,920.78	1,691,970,382.40	(714,608,339.13)	977,362,043.27

Source: BoG, June 2019.

7.3 Ghana Stabilisation Fund

In line with Section 23(4) of the Petroleum Revenue Management Act, 2011 (Act 815) and Section 9 of the Petroleum Revenue Management (Amendment) Act, 2015 (Act 893), the Ghana Stabilisation Fund (GSF) was capped at US\$300 million per the 2019 Budget Statement and Economic Policy.

The excess over the cap as at June 2019, which is yet to be transferred to the Sinking and/or Contingency Fund, as per Section 23(4) of the PRMA, stood at US\$155,534,395.21. Although the first quarter of the 2019 ABFA had a shortfall of US\$47.41 million, there was no withdrawal to shore up the budget.

The closing amount in the GSF as at the end of June 2019 was US\$455.53 million as shown in Figure 15 and the Statement of Account in Table 18

Table 18: GSF Statement of Account for Half-Year 2019

US\$	
Opening Book Value (2 Jan 2019)	381,203,231.15
Receipt During The Period	69,849,062.28
Bank Charges	(3,859.39)
Realised Income	4,485,961.31
Withdrawal	
Closing Book Value (28 June 2019)	455,534,395.35
Net Income for the Period Comprised:	
INCOME	
Investment Income	4,485,961.31
Less:	
Bank Charges	(3,859.39)
Net Return for the Period	4,482,101.92

Source: BoG, June 2019

7.4 Ghana Heritage Fund

As at the end of June 2019, the closing book value of the Ghana Heritage Fund was US\$521.83 million, as shown in Table 19.

Table 19: GHF Statement of Account for Half-Year 2019

US\$	
OPENING BOOK VALUE (2 JAN 2019)	485,172,436.04
RECEIPT DURING THE PERIOD	29,935,312.36
BANK CHARGES	(13,423.32)
REALISED INCOME	6,733,323.08
CLOSING BOOK VALUE (2 JUNE 2019)	521,827,648.16
NET INCOME FOR THE PERIOD COMPRISED THE FOLLOWING	
INCOME	
INVESTMENT INCOME	6,733,323.08
LESS:	
BANK CHARGES	(13,423.32))
NET RETURN FOR THE PERIOD	6,719,899.76

Source: BoG, June 2019.

7.5 The Petroleum Holding Fund (PHF)

The Petroleum Holding Fund (PHF) at the end of June 2019 held a balance of US\$70.89 million, which comprised interest on undistributed funds amounting to US\$740,000, a mandatory balance of US\$200,000, and second lifting proceeds from the Sankofa Gye-Nyame Field of US\$70 million.

Findings

1. In line with the distribution rule in the PRMA, the Ghana Heritage Fund received US\$29.94 million, and the Ghana Stabilisation Fund, US\$69.85 million for the period.
2. The GSF and GHF receipts in the first half of 2019 represented a 115.85 percent and 115.93 percent increase over their respective first half of 2018 receipts.

3. The total reserves of the Ghana Petroleum Funds as at the end of the first half of 2019 was US\$977.36 million, comprising the Ghana Heritage Fund with US\$521.83 million, and the Ghana Stabilisation Fund with US\$455.53 million.
4. The accumulated net profit on investment of the GPFs since November 2011 to the end of first half of 2019 was US\$55.16 million.
5. An amount of US\$155.53 million, being the excess over the cap of US\$300 million placed on the GSF, was not transferred into the Sinking and/or Contingency Funds during the period.
6. Even though the actual ABFA receipt for the period fell short of the target of US\$236.52 million by \$US47.41 million (29.96%), the Government did not exercise the option of making a withdrawal from the GSF to shore up expenditure.

CHAPTER 8

8.0 ALLOCATION AND UTILISATION OF GNPC SHARE OF PETROLEUM REVENUE

8.1 GNPC Allocation

GNPC' s allocation comes in two broad categories, Levels A and B. Level A is dependent on cash calls and is charged on gross revenues. Level B is charged on the Carried and Participating Interest and is currently capped at 30 percent. For 2019, the combined budget was US\$1.62 billion. However, Parliament approved an amount of US\$1.12 billion resulting in a funding gap of US\$493.59 million to be financed through borrowing. As at June 2019, GNPC had received a total amount of US\$116.96 million representing 10.44 percent of the approved budget.

Level A:

I. Jubilee Equity financing (share of development & production cost) – US\$39.53 million.

II. TEN Equity financing (share of development & production cost) – US\$34.75 million.

Level B:

III. 30 percent share of net proceeds of Jubilee crude revenue – US\$27.03 million.

IV. 30 percent share of net proceeds of TEN crude revenue – US\$15.64 million.

The Corporation' s activities financed under Level B are grouped under the following thematic areas:

1. Exploration and Appraisal
2. Development and Production
3. Midstream activities and other projects
4. Non-capital Projects
5. Works on Landed Properties
6. Digital Information
7. Maritime Boundary Secretariat

8. Corporate Social Responsibility

8.2 Expenditure

Cash balance brought forward from 2018 was US\$15.15 million, bringing the total cash available for the reporting period to US\$132.11 million.

Out of the total amount available, US\$127.96 million was utilised, leaving US\$4.15 million as cash balance earmarked towards pending projects and milestone disbursements, especially the Corporation's flagship onshore Voltaian Basin Project.

The expenditure components are grouped into Level A and Level B.

8.2.1 Level A Expenditure

(i) Jubilee Costs

An amount of US\$40.52 million, representing 35 percent of the total receipt, was spent on the Jubilee Field

(ii) TEN Costs

An amount of US\$37.99 million representing 33 percent of the receipt was spent on the TEN Field.

8.2.2 Level B Expenditure

This level of expenditure comprises development in support of petroleum production and the GNPC Foundation expenditures (Corporate Social Responsibility/Investment).

(i) Exploration & Development Projects

An amount of US\$18.24 million representing 16 percent of the receipt went into exploration & development of petroleum projects and funding of the Maritime Boundary Secretariat activities. This includes costs incurred on projects other than Jubilee and TEN such as OCTP, Voltaian Basin, and North & South Tano projects.

(ii) Saltpond Offshore Producing Company Limited

An amount of US\$572,424.35 constituting 0.5% percent of total receipts was spent on Saltpond Offshore Producing Company Limited (SOPCL). This project is currently at the pre-decommissioning stage with the procurement process for the award of consultant near completion (refer to appendices).

(iii) Staff and Administrative Costs

An amount of US\$11.28 million representing 10 percent of receipts went into remuneration for technical as well as Petro-business support staff. This represents an increase of US\$670,000 over that of the same period in 2018. An amount of US\$389,507.06 was expended on administrative capital expenditure, accounting for 0.3 percent. This expenditure area includes office equipment, furniture, fixtures & fittings, motor vehicles, etc.

(iv) Capital Projects

An amount of US\$2.58 million representing two percent (2%) of total receipts went into investment for the refurbishment of the Corporation' s landed properties in Accra, Tema and Sekondi-Takoradi, and ICT system upgrade in line with planned expenditure, as listed in the Appendices.

(v) General Operating Expenditure

An amount of US\$14.09 million, constituting 12 percent of receipts, went into Operating Expenditure. This expenditure category covers insurance, utilities, corporate social responsibility, corporate travels, communication expenses, professional services, ICT-related cost such as software maintenance, general repairs and maintenance, and vehicle repairs and maintenance.

(vi) Downstream Petroleum Projects

An amount of US\$2.30 million, accounting for two percent (2%) of receipts was expended on downstream petroleum projects. This covered expenditure on Gas Management Projects.

Table 20: GNPC Expenditure (Jan-June 2019)

RECEIPTS FROM JUBILEE & TEN PROCEEDS	AMOUNT (US\$)	EXPENDITURE
		AS % OF RECEIPTS
Level A Receipts (Equity Financing) – Jubilee	39,534,080.18	33.8
Level B Receipts (30% of Net Proceeds) – Jubilee	27,033,720.93	23.1
Level A (Equity Financing) – TEN	34,753,885	29.7
Level B (30% of Net Proceeds) – TEN	15,639,248.16	13.4
Total Amount Received: (A)	116,960,934.07	100%
USES OF AMOUNTS ALLOCATED:	-	-
Jubilee Equity Financing Cost	40,523,923.18	34.6
TEN Equity Financing Cost	37,985,447.73	32.5
Exploration and Development Projects	18,243,071.14	15.6
Staff Cost	11,277,616.35	9.6
Admin. Capital Expenditure	389,507.06	0.3
Capital Projects	2,576,288.18	2.2
General Operational Expenditure	14,089,511.84	12.0
Downstream Project	2,301,910.91	2.0
SOPCL	572,424.35	0.5
Total Expenditure:- (B)	127,959,700.73	109.4
Net Position:- (C=A-B)	-10,998,766.67	-9.4

Add: Cash B/Fwd (01.01.2019)		
(D)		15,148,797.75
Total Cash-Available (E = C + D)		4,150,031.09
<i>Exploration and Development Projects</i>	Amount (US\$)	
<i>OCTP ENI Project</i>	<i>3,838,584.41</i>	
<i>North & South Tano Petroleum Projects</i>	<i>149,152.39</i>	
<i>Voltaian Basin Petroleum Projects</i>	<i>11,598,584.55</i>	
<i>South Deepwater Tano Petroleum Projects</i>	<i>1,643,783.30</i>	
<i>Ultra Deep Water [Keta Heritage]</i>	<i>1,800.28</i>	
<i>Tano – Heritage</i>	<i>122,339.35</i>	
<i>A - Z Petroleum</i>	<i>78,928.62</i>	
<i>Springfield</i>	<i>70,947.08</i>	
<i>ENI Block 4</i>	<i>621,402.08</i>	
<i>Maritime Boundary Special Project</i>	<i>126,549.07</i>	
<i>Total Non-Jubilee & TEN Projects Expenditure</i>	<i>18,243,071.14</i>	

Source: GNPC, June 2019

(vii) GNPC Corporate Social Responsibility

A total of US\$43.05 million has been budgeted in 2019 to cater for the Corporation' s Corporate Social Responsibility (CSR) obligations under the GNPC Foundation. The Corporation undertook several initiatives as part of its CSR goals. The initiatives addressed two, out of four of the Foundation' s strategic goals.

These are:

- (1) Education and social infrastructure
- (2) Health, sanitary, and other facilities across the country

Presented in the table below and in the Appendices, are milestones achieved, classified as:

- (1) Tangible, referring to physical projects
- (2) Intangibles, referring to commitments, intended plans, or actions.

Table 21: GNPC Foundation Projects

PHYSICAL PROJECTS
<ul style="list-style-type: none"> • Completion and handing over of a 3-Unit classroom block with auxiliary facilities for Mion District Assembly, and awaiting commissioning
<ul style="list-style-type: none"> • Completion of seven (7) out of forty-five (45) 6-Unit classroom blocks and commissioning of one (1)
<ul style="list-style-type: none"> • Completion of construction of 24-seater toilet facility each for Bompeh, Asakea and Bibiani community markets, and awaiting commissioning
<ul style="list-style-type: none"> • Branding of forty boreholes, commissioning and official handing over to the community for use in Kanshiegu in the Savelugu District, Northern Region
<ul style="list-style-type: none"> • Commissioning of one borehole with hand pump and iron treatment facility for the Ellobankata community in the Ahanta West District
<ul style="list-style-type: none"> • Branding and Commissioning of ten (10) boreholes with hand pumps each in the Upper West and Upper East Regions
NON PHYSICAL PROJECTS
<ul style="list-style-type: none"> • Organisation of GNPC Digital Academy (in partnership with Accra Digital Centre) for one hundred (100) participants in the GNPC STEM Quiz.
<ul style="list-style-type: none"> • Extension of invitation by Aker Energy to GNPC and other educational stakeholders to discuss strategies to roll out the tertiary level scholarship

<ul style="list-style-type: none"> • Organisation of a clean-up exercise at the Ellembelle District
<ul style="list-style-type: none"> • Signing of MoU by GNPC with the Ministry of Health and the Ministry of Public Health of the Republic of Cuba to train two hundred (200) GNPC awardees in Cuba as medical and specialist doctors.
<ul style="list-style-type: none"> • Approving by the Board of Trustees of the Foundation of a total amount of four hundred and eighty-three thousand, five hundred and eighty-three Ghana cedis (GH¢ 483,583) for eye surgeries for two hundred and ten (210) selected patients identified in the 10 sub-districts in Ellembelle and Bibiani during the health screening exercise organised.
<ul style="list-style-type: none"> • Undertaking by the GNPC Foundation in collaboration with the Sekondi Takoradi Metropolitan Assembly (STMA), Ghana Fire Service, Power Distribution Services (PDS) and the Management of Market Circle, of a fire safety campaign for traders at the market. Old fire extinguishers were refurbished, and new ones were donated to augment the efforts of the market management.

Source: GNPC Foundation, June 2019

Findings

1. There was no expenditure in respect of the Petroleum Hub in the Western Region during the reporting period.
2. A major concern about the persistent non-payment of gas revenue is the deprivation of the funds to the ABFA, GPFs and GNGC. As at June 2019, Ghana Gas' indebtedness to GNPC stood at US\$97,790,620.12, and ECG' s at US\$12,156,787.06.
3. An amount of US\$1 million has been budgeted towards the establishment of a fertilizer plant. GNPC reports that the project is still at a

desktop study stage, to be undertaken with the Ministry of Agriculture, Ghana Gas, and other stakeholders.

4. Given the expenditure on the fertiliser plant, roads, schools, etc., GNPC appears to be over stretching its mandate by moving into areas that are extraneous to the Corporation' s core mandate.

CHAPTER 9

9.0 OPERATIONS OF GHANA NATIONAL GAS COMPANY

9.1 Technical Operations

The Ghana National Gas Company continued to play its midstream role of harvesting, processing, transporting and commercialising gas supply from the Jubilee and TEN Fields. In the case of SGN, the company continued to facilitate evacuation of processed gas to the western power enclave by availing its pipelines to convey gas from the Onshore Receiving Facility (ORF).

Between January and June 2019, the company carried out a number of construction and engineering activities, aimed at helping the country harness the full benefits of gas for its socio-economic development.

These included:

- An interconnection to the Onshore Receiving Facility
- Western Corridor Gas Infrastructure/ Takoradi-Tema Interconnection Project (TTIP)
- The Genser Pipeline Project comprising Prestea, Tarkwa and Damang Stations

Onshore Receiving Facility

The Onshore Receiving Facility (ORF), which is located at Sanzule in the Ellembelle District of Ghana, is an extension of the FPSO John Agyekum Kufour (OCTP project) from where Non – Associated Gas is received daily through a pipeline.

Currently, compressor facility, that is Train No. 1 and No. 3 are in operation, while Train No. 2 is on standby. Train No. 1 and No. 3 are running on OCTP and GNGC gas respectively. The project is scheduled to be completed this year. An exposed section of the pipeline at the Land Termination End (LTE) at the beach was reburied in January 2019, following its detection. The beach was revegetated with centrosema and coconut plantation. Permanent accommodation for staff is expected to be completed in July and ready for use in August 2019. The

interconnecting roads and restoration works are expected to be completed by July 2019.

Western Corridor Gas Infrastructure/ Takoradi-Tema Interconnection Project (TTIP)

The Western Corridor Gas Infrastructure/Takoradi-Tema Interconnection Project (TTIP) is to enable gas evacuation from the Western gas corridor (Sanzule) to the East (Tema). The scope of the project involves modifications to the following facilities to allow for increased flow of gas:

- GNGC' s Takoradi Regulating and Metering Station (RMS);
- WAPCo' s Takoradi Regulating and Metering Station (RMS);
- WAPCo' s Tema Regulating and Metering Station (RMS).

The contract for the completion of the TTIP was awarded to Saiwest. The GNGC Takoradi and WAPCo Takoradi stations achieved 96 percent completion during the first half of the year.

GNGC constructed a 1.5km pipeline to tie-in to the West African Gas Pipeline (WAGP) for a reverse flow to Tema in 2016, but the pipeline is yet to be put to use after almost three years. Following the completion of the Takoradi Regulating and Metering Station expansion and the subsequent interconnection and transmission agreements between West African Gas Pipeline Company (WAPCo) and GNGC on one hand, and WAPCo and GNPC on the other, GNGC proceeded to commission the 1.5km pipeline by hydrotesting it. The line leaked and had to be cut and replaced. Gas export from the west to the east commenced after commissioning, and it is now ready for start-up tests. Currently, gas is being exported from the ORF through Takoradi and to Tema. The exported gas is commingled with the gas from Nigeria and finally transported to Tema. Final documentation and close-out are ongoing for the GNGC Takoradi and WAPCo Takoradi stations, while engineering to optimise scope and HAZAP is ongoing for the WAPCo Tema Station.

The Genser Pipeline Project

The Energy Commission issued a construction permit to Genser Energy Ghana Limited to construct a 12 inch, 78.5 km natural gas pipeline in February 2019. The pipeline is to feed Genser' s thermal generating units installed at both Damang and Tarkwa. Genser is an Independent Power Producer (IPP), and an off-taker of GNGC' s gas in the western mining enclave.

Prestea Station

The Genser Prestea station ties into a 12-inch header after the filter/separator of GNGC. This then feeds the Genser pressure reduction and metering station at Prestea. There is also a 20-inch tie-in blind for future extension up north. Natural gas from Genser PRMS travels through Bepoase, where there is a block valve station, and continues towards Tarkwa through Huniso.

Tarkwa Station

The Tarkwa regulating and metering station is fed by a branch station at Huniso where the 12-inch pipeline traverses towards Damang. The station is located in the Goldfields mine where pressure is dropped through a 4-inch pipeline to a 20m³ gas drum for power generation.

Damang Station

The Damang pressure regulating and metering station is fed by a branch station located beside the Goldfields Golf Club in Damang. The branch station has two blinds² for future extension to Wassa. The 20-inch pipeline then extends a further 500m to the pressure regulating and metering station located close to the entrance of the mine where pressure is dropped through a 4-inch pipeline to a 20m³ gas drum for power generation. There is also another branch station called the Nsuta branch station located at Aboso Brigade. The station has two future blindsⁱ to extend gas to the Nsuta Manganese Mine and also the Aboso Glass Factory.

² A pipeline isolation device

In line with its statutory mandate, the Energy Commission issued all the necessary permits, including siting and construction. It further undertook inspection and monitoring of the various gas infrastructure works to enforce technical compliance.

9.2 Commercial Operations

Ghana Gas' processing of raw gas into lean gas, LPG, and condensates continued throughout the first half of 2019. The supply of raw gas from Jubilee Field was curtailed for 24 days (8th February - 3rd March 2019) for repairs to be carried out on the gas export HP compressor on FPSO Kwame Nkrumah. The Jubilee outage however, did not affect power generation in the country, due to sustained gas supply from Sankofa during the period.

Again, there was a synchronised shutdown for both Sankofa and Jubilee Gas for 8 days (30th March - 6th April 2019) to complete expansion works at Ghana Gas' Takoradi Regulating & Metering Station (TRMS). Although flow of Sankofa gas commenced on 7th April, 2019, gas export from Jubilee was delayed for an extra three days due to start-up challenges with the Jubilee FPSO' s gas export system.

Having extended gas transport infrastructure to the Tarkwa – Prestea mining enclave, Ghana Gas provided some gas for the commissioning of Genser's Gas Receiving Facilities on 13th May 2019. Commissioning of the facilities are on-going.

9.3 Cost of Raw Gas and GNGC' s Indebtedness to GNPC

As at 30th June, 2019, GNGC's indebtedness to GNPC amounted to US\$263,949,220.40. The high debt is due to VRA's inability to meet its debt service obligation to GNGC. Below is a table indicating invoices received for the period:

Table 22: GNGC' s Indebtedness to GNPC – January to June 2019

	Volume (MMBtu)	Price (US\$)	Payment	Amount Payable
Opening Balance				259,720,143.70
January	2,180,626.70	0.50		1,090,313.35
February	383,524.96	0.50		191,762.48
March	1,124,051.56	0.50		562,025.78
April	960,716.16	0.50		480,358.08
May	1,879,860.18	0.50		939,930.09
June	1,929,373.84	0.50		964,686.92
Total				4,229,076.70
Year-To- Date Total				263,949,220.40

Source: GNGC, June 2019

9.4 Cost of Processed Derivatives

(i) Lean Gas

During the period under review, the bulk of income due GNGC from its value-added activities was derived from the sale of lean gas to VRA, WangKang, and Keda (Twyford). Substantial revenue also accrued from SGN' s use of GNGC' s gas transportation infrastructure to convey lean gas to the Aboadze Thermal Enclave and to Tema. A total of US\$82,847,938.46 accrued from these activities, with transportation fees alone amounting to US\$29,651,733.78. It is to be noted that, the cost of transporting Sankofa Gas is \$1.52/MMBtu. This consists of Transmission Cost of \$1.12/MMBtu and PURC Levy of \$0.40/MMBtu.

While the processed gas was sold to VRA at US\$7.29 per MMBtu, the same gas was sold to Wangkang and Keda(Twyford) at US\$6.50 per MMBtu under a special dispensation to encourage gas-fueled industrialisation and to enhance the competitiveness of Ghanaian industrial products.

The price of Lean Gas is determined by the Public Utilities Regulatory Commission.

The volume of lean gas produced between January and June 2019, compared to that of 2018, shows a positive variance. The total volume of lean gas for the 2019 half-year was 21,641,956.70 MMBtu, compared to the 2018 volume of 16,115,976.38 MMBtu. This translates into a 34 percent increase.

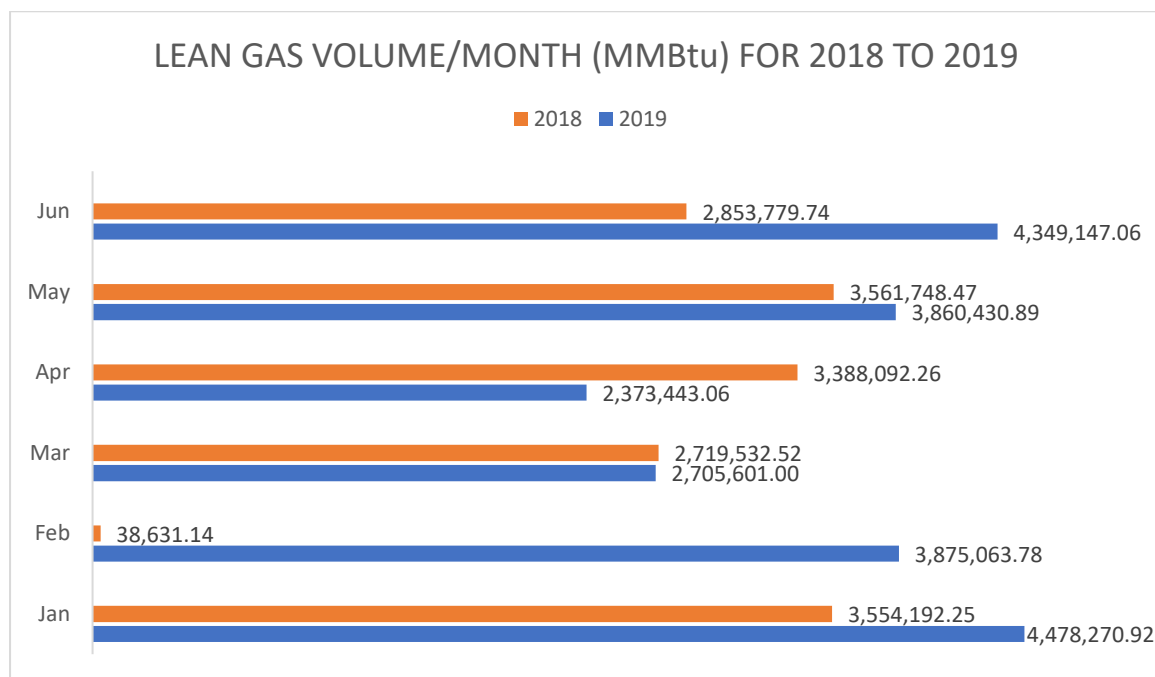


Figure 16: Lean Gas Volume

Source: PIAC's Construct, June 2019

Below is a table showing volumes and cost of lean gas delivered to off-takers.

Table 23: Lean Gas Statement, June 2019

Date	Company	Volume (MMscf)	Volume (MMBtu)	Price/MMBtu (US\$)	Value (US\$)	Total Volume (MMBtu)	Total Value (US\$)
Jan-19	Sankofa Gas Transported	1,893.44	2,082,361.9190	1.52	3,165,190.12	4,478,270.9178	20,439,126.06
	VRA	1,830.72	2,152,566.3978	7.29	15,692,209.04		
	Wangkang	158.65	158,652.8854	6.50	1,031,243.76		
	Keda (Twyford)	84.69	84,689.7156	6.50	550,483.15		
Feb-19	Sankofa Gas Transported	2,993.34	3,296,042.5840	1.52	5,009,984.73	3,875,063.7787	9,063,965.98
	VRA	306.72	367,523.3947	7.29	2,679,245.55		
	Wangkang	139.08	139,080.0000	6.50	904,020.00		
	Keda (Twyford)	72.42	72,417.8000	6.50	470,715.70		
Mar-19	Sankofa Gas Transported	1,507.25	1,655,711.8900	1.52	2,516,682.07	2,705,622.9950	10,170,534.03
	VRA	952.03	1,049,911.1050	7.29	7,653,851.96		

	Wangkang	-	-	6.50	-		
	Keda (Twyford)	-	-	6.50	-		
Apr-19	Sankofa Gas Transported	1,278.21	1,406,869.3650	1.52	2,138,441.43	2,373,443.0622	9,049,459.04
	VRA	696.16	795,301.9972	7.29	5,797,751.56		
	Wangkang	117.67	117,670.0000	6.50	764,855.00		
	Keda (Twyford)	53.60	53,601.7000	6.50	348,411.05		
May-19	Sankofa Gas Transported	1,766.65	1,945,684.6167	1.52	2,957,440.62	3,860,430.8892	16,727,973.24
	VRA	1,225.55	1,437,336.1487	7.29	10,478,180.52		
	Wangkang	160.93	160,932.0000	6.50	1,046,058.00		
	Keda (Twyford)	77.00	77,001.8000	6.50	500,511.70		
	Genser	209.94	239,476.3238	7.29	1,745,782.40		
Jun-19	Sankofa Gas Transported	2,232.93	2,447,355.6718	1.52	3,719,980.62	4,349,147.0567	17,396,880.11
	VRA	1,077.95	1,225,213.0139	7.29	8,931,802.87		
	Wangkang	161.71	161,709.1959	6.50	1,051,109.77		

	Keda (Twyford)	75.20	75,201.8275	6.50	488,811.88		
	Genser	389.63	439,667.3476	7.29	3,205,174.96		

(ii) Liquefied Petroleum Gas (LPG)

The price is based on the bi-weekly averages of the Argus Butane CIF ARA Large Cargoes³ price as determined by the National Petroleum Authority (NPA). The total volume of LPG produced for January to June, 2019 was 23,427.553MT, 19,018.36MT less than the volume of LPG produced for the same period in 2018 (42,445.92MT). This translates into a 45 percent decrease between 2018 and 2019.

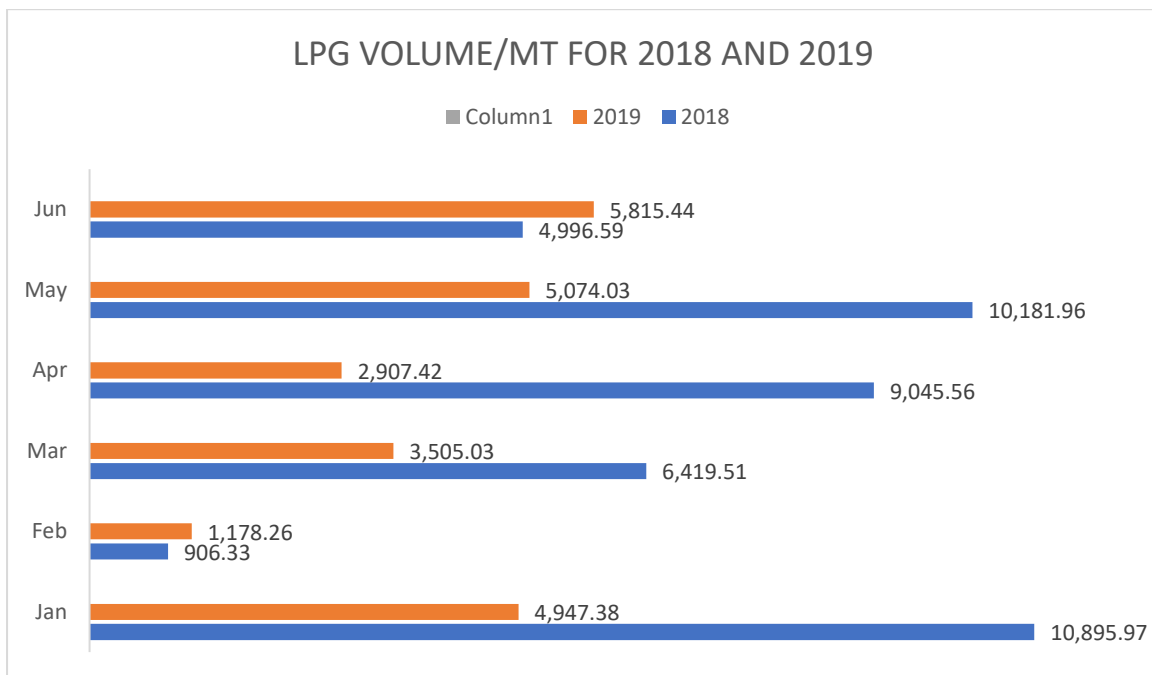


Figure 17: LPG Volume

Source: PIAC's Construct, 2019

On the revenue side, the total LPG net revenue (discounted) for the first half of 2018 was US\$19,299,182.190 compared to the 2019 half-year figure of US\$9,757,795.86. This shows a 49 percent decrease in half-year revenue from LPG between 2018 and 2019.

³ A market benchmark price

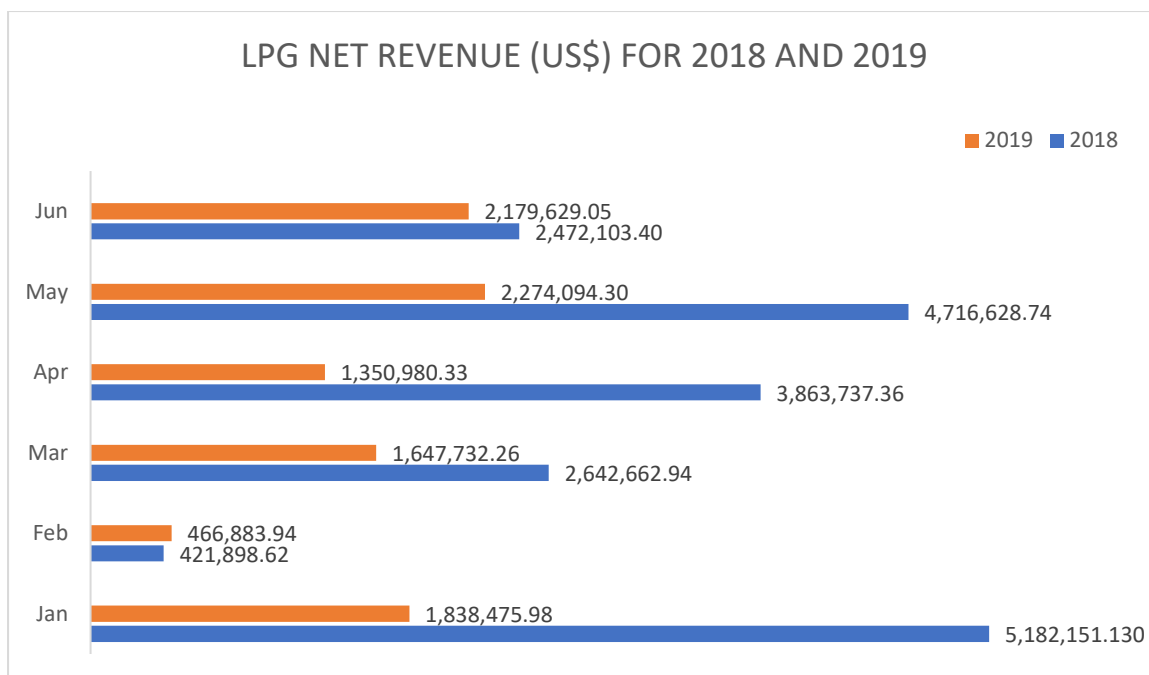


Figure 18: LPG Net Revenue

Source: PIAC's Construct, 2019

The table below sets out the volumes and cost of LPG produced within the period.

Table 24: Summary of LPG Product Statement - January to June 2019

LPG STATEMENT JANUARY - JUNE 2019							
Date	Volume (MT)	Price (US\$/MT)	Value (US\$)	Volume/Month (MT)	Gross Revenue (US\$)	Discount (US\$)	Net Revenue (US\$)
Jan-19	1,514.415	375.50	568,662.95	4,947.376	1,887,949.74	49,473.76	1,838,475.98
	3,432.961	384.30	1,319,286.80				
Feb-19	1,178.256	406.25	478,666.50	1,178.256	478,666.50	11,782.56	466,883.94
	-	427.09	0.00				

Mar-19	1,358.004	460.73	625,669.52	3,505.032	1,682,782.58	35,050.32	1,647,732.26
	2,147.028	492.36	1,057,113.07				
Apr-19	-	492.73	0.00	2,907.418	1,380,054.51	29,074.18	1,350,980.33
	2,907.418	474.67	1,380,054.51				
May-19	2,069.604	481.11	995,709.46	5,074.031	2,324,834.61	50,740.31	2,274,094.30
	3,004.427	442.39	1,329,125.16				
Jun-19	3,294.578	408.75	1,346,658.55	5,815.440	2,237,783.45	58,152.40	2,179,629.05
	2,520.863	353.50	891,124.89				

Source: GNGC, June 2019

(iii) Condensate

The price of Condensate is linked to PLATTS Gasoline Petroleum Unleaded⁴. The total volume of condensate produced from January to June, 2019 was 6,408.89 MT while that of the same period in 2018 was 8,928.86MT. This translates into a 28 percent decrease between 2018 and 2019.

⁴ A market benchmark price

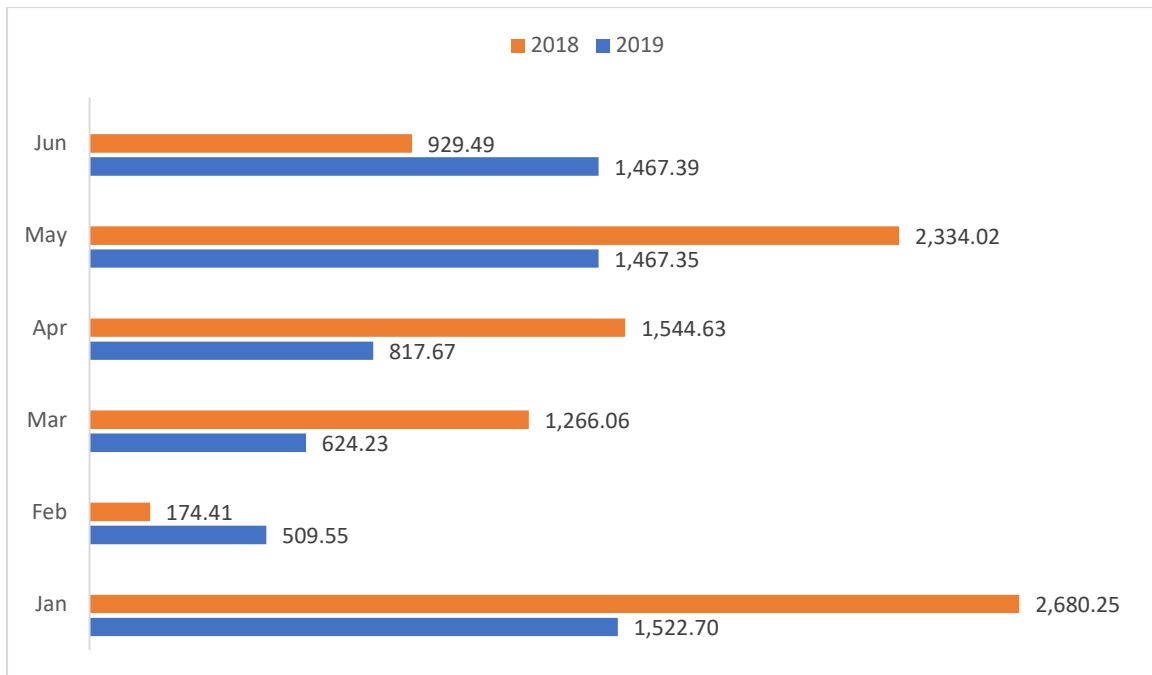


Figure 19: Condensate Product Volume/Month (MT) for 2018 and 2019

Source: PIAC's Construct, 2019

With regards to the realised value of condensates, the total first half-year value for 2019 was US\$2,207,595.65, while that of 2018 for the same period was US\$3,676,030.25. This represents a decrease of US\$1,468,434.60 (40%) in the 2019 value.

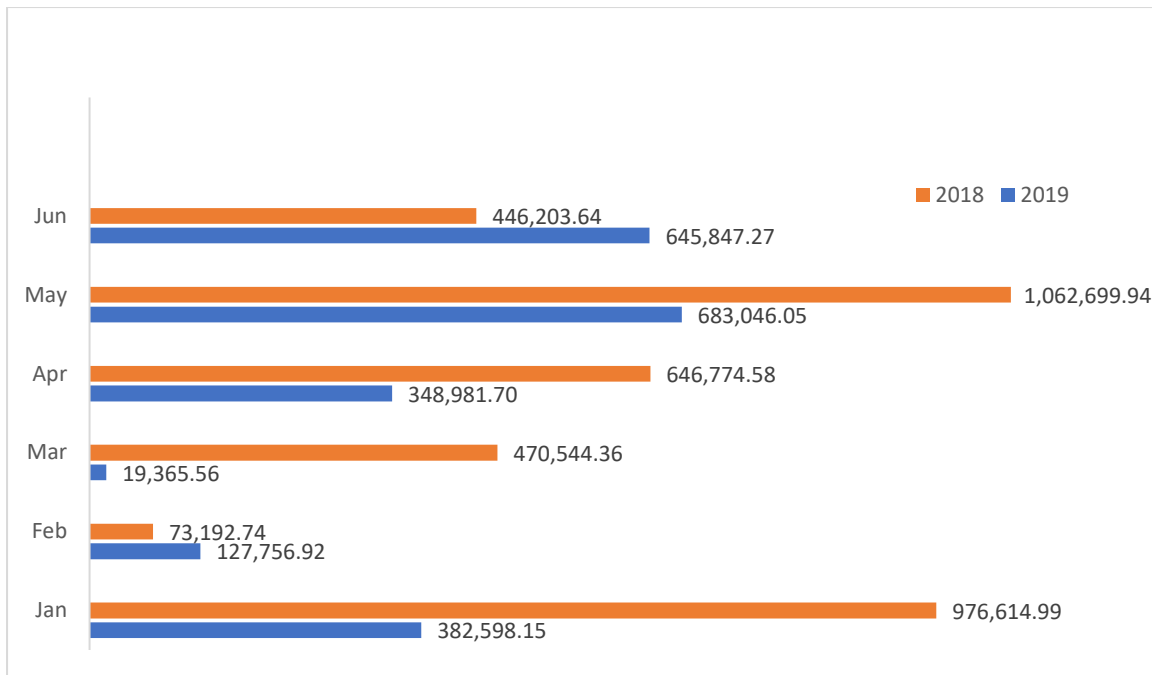


Figure 20: Condensate Product Monthly Value (US\$) for 2018 to 2019

Source: PIAC's Construct, June 2019

Table 25: Summary of Condensate Product Statement - January to June 2019

CONDENSATE PRODUCT STATEMENT, June 2019						
Date	Company	Volume (MT)	Price (US\$/MT)	Value (US\$)	Volume/Month (MT)	Monthly Value (US\$)
Jan-19	Globex	166.88	254.59	84,555.21	1,522.70	382,598.15
		169.12	248.75			
	Med Petroleum	64.06	254.59	32,162.12		
		63.73	248.75			
	Cirrus	63.43	254.59	39,633.37		
		94.41	248.75			
	Hask	107.45	254.59	67,675.99		
		162.09	248.75			
	OilTrade	63.47	254.59	39,531.62		
		93.96	248.75			
	Mimshach	63.82	254.59	39,956.54		
		95.31	248.75			
	Firm Energy	62.00	254.59	39,475.77		
		95.24	248.75			

	Imperial	63.69	254.59	39,607.53		
		94.04	248.75			
Feb-19	Globex	168.29	250.73	42,194.51	509.55	127,756.92
		-	258.36			
	Med Petroleum	63.16	250.73	15,835.79		
		-	258.36			
	Cirrus	63.35	250.73	15,883.43		
		-	258.36			
	Hask	56.61	250.73	14,193.54		
		-	258.36			
	OilTrade	63.19	250.73	15,843.31		
		-	258.36			
	Mimshach	31.65	250.73	7,935.45		
		-	258.36			
	Firm Energy	31.62	250.73	7,927.92		
		-	258.36			
Imperial	31.68	250.73	7,942.97			
	-	258.36				
Mar-19	Globex	-	303.11	53,174.67	624.23	19,365.56
		167.07	318.28			

	OilTrade	31.14	303.11	19,388.32					
		31.26	318.28						
	Hask	27.74	303.11	25,827.72					
		54.73	318.28						
	Mimshach	31.22	303.11	29,479.70					
		62.85	318.28						
	Firm Energy	31.22	303.11	29,466.97					
		62.88	318.28						
	Imperial	31.21	303.11	39,028.18					
		92.90	318.28						
	Apr-19	Globex	55.56	356.52			175,600.56	817.67	348,981.70
			358.04	435.13					
LHS		-	356.52	40,766.86					
		93.69	435.13						
Firm Energy		-	356.52	54,103.44					
		124.34	435.13						
OilTrade		31.04	356.52	64,926.24					
		123.78	435.13						
Maranatha Oil		-	356.52	13,584.60					
		31.22	435.13						

May-19	Globex	220.75	459.92	255,593.47	1,467.35	683,046.05
		328.54	468.94			
	LHS	62.14	459.92	72,538.07		
		93.79	468.94			
	Mobile Oil	26.12	459.92	65,392.92		
		113.83	468.94			
	Battop	30.87	459.92	57,818.80		
		93.02	468.94			
	Firm Energy	61.96	459.92	72,323.94		
		93.46	468.94			
	OilTrade	93.38	459.92	86,718.25		
		93.34	468.94			
Maranatha Oil	62.59	459.92	72,660.59			
	93.56	468.94				
Jun-19	Globex	137.09	500.18	164,092.16	1,467.39	645,847.27
		245.69	388.80			
	LHS	89.31	500.18	80,781.96		
		92.88	388.80			
	Mobile Oil	80.36	500.18	71,709.83		
		81.06	388.80			

	Battop	92.45	500.18	82,414.71		
		93.04	388.80			
	OilTrade	93.07	500.18	82,390.46		
		92.18	388.80			
	Firm Energy	91.31	500.18	81,545.14		
		92.27	388.80			
	Maranatha Oil	92.77	500.18	82,913.02		
		93.91	388.80			

Source: GNGC, June 2019

Findings

1. The gas commercialisation phase of the Ghana Gas Infrastructure project has continued and progressed well, with gas transportation infrastructure extended to the mining enclave of Tarkwa, Damang, and Prestea, and offtakers secured for gas supplies.
2. Two major shutdowns lasting a total of 35 days, firstly due to a faulty gas export HP compressor, and secondly to enable tie-in works at the Takoradi Regulating and Metering Station (TRMS), affected gas evacuation from Jubilee and accounted for the low volume of gas exports for the first half of 2019.
3. The volume of LPG produced over the period declined by as much as 45 percent, while condensates declined by 28 percent compared to the 2018 figures.
4. The production of lean gas increased by 34 percent in 2019 compared to 2018 production figures.
5. While the processed gas was sold to VRA at US\$7.29 per MMBtu, the same gas was sold to Wangkang and Keda(Twyford) at US\$6.50 per MMBtu under a special dispensation to encourage gas-fueled industrialisation and to enhance the competitiveness of Ghanaian industrial products.

CHAPTER 10

10.0 PETROLEUM REVENUE OUTLOOK

10.1 Economic Growth and Crude Oil Price Trends

Throughout the first half of 2019, ongoing global trade tensions between the United States of America and China continue to hamper economic growth as trade tariffs increase, causing trade tensions the world over. Likewise, the European economy continues to face fiscal challenges. The United Kingdom continues to hold firm to Brexit, and Germany's introduction of new automobile fuel emission standards demand stringent Low-Carbon Fuel (LCF) specifications. This has resulted in a slowdown in global economic activities, and weaker growth in global oil demand, compared to a year earlier.

These are part of the issues that will skew economic risks even further to the downside in late 2019. According to the Organisation for Economic Cooperation and Development (OECD), global economic growth is likely to slow to three percent in 2020, the weakest annual growth rate since the 2008 financial crisis. The anticipated growth rate for developed economies will be a drop from two percent in 2019 to 1.7 percent in 2020.

Prices of international benchmark Brent crude oil are expected to remain at \$64 per barrel (US\$/bbl) in the second half of 2019 and rise to US\$65/bbl. in 2020, according to the U.S. Energy Information Administration (EIA). Nonetheless, the enactment of Annex VI of the International Convention for the Prevention of Pollution from ships by the International Maritime Organisation (IMO) is set to apply modest upward pressure on crude oil prices in late 2019 and early 2020.

The expected price stability in crude oil prices is the result of expectations for a balanced global oil market. Global oil inventories are projected to rise by 100,000 barrels per day in 2019 and 300,000 barrels per day in 2020.

With regards to natural gas, the Henry Hub⁵ natural gas spot price is expected to average \$2.36 per MMBtu in the second half of 2019. Natural gas prices are projected to rise to \$2.75 per MMBtu in 2020.

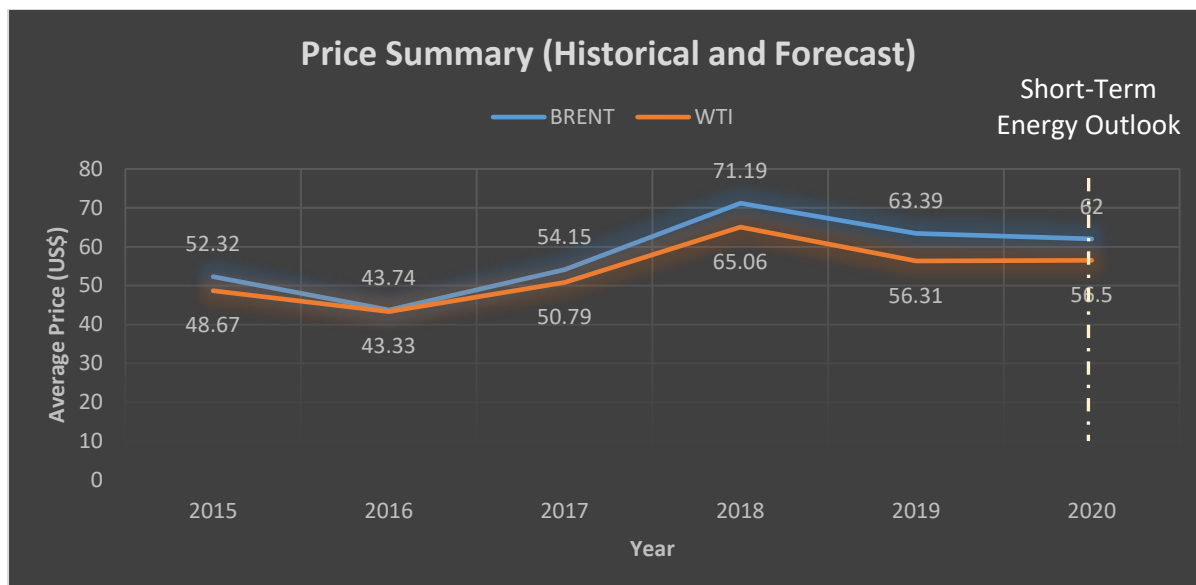


Figure 21: Average Annual BRENT and WTI Crude Prices from 2015-2020 (Achieved and Forecast) Data

Source: US Energy Information Administration, June 2019

10.2 Global Crude Oil Demand and Production

Global oil demand growth is projected to improve seasonally, from the sluggish performance seen in the first half of 2019, with growth in the second half of 2019 forecast at 1.2 million barrels per day (mb/d) year-on-year (y-o-y). As a result, total world oil demand is projected to reach 100.3 MMbbl/d in 2019, as compared to 102 MMbbl/d for the year 2020.

The Organisation for Economic Cooperation and Development (OECD) Region is forecast to increase by 0.2 mb/d y-o-y in the second half of 2019, on the back of growth in OECD Americas, driven by solid light distillate demand. In contrast, OECD Europe is forecast to contract due to slower economic momentum, while OECD Asia Pacific will decline on lower petrochemical feedstock demand.

⁵ A market benchmark price

In the non-OECD region, oil demand is projected to increase by 1 mb/d y-o-y in the second half of 2019, supported mainly by Other Asia, particularly India. Oil demand in China is expected to continue growing despite economic concerns and sharply lower vehicle sales. Growth in transportation fuels, particularly aviation fuels, as well as in petrochemical feedstock, should outweigh declines elsewhere in late 2019. However, significant downside risks from escalating trade disputes spilling over to global demand growth remain.

Non-OPEC oil supply in the second half of 2019 is forecast to increase by 1.8 mb/d compared to the first half of the year, and to increase by 2.1 mb/d y-o-y, which is less than growth seen over the same period a year earlier.

For July to December 2019, non-OPEC supply growth is anticipated to show further upside potential, with higher production expected in the US, as well as production ramp-ups in Brazil and possibly the start-up of Norway’s Johan Sverdrup Field in the North Sea, leading to a growth forecast of 2.14 mb/d for 2019.

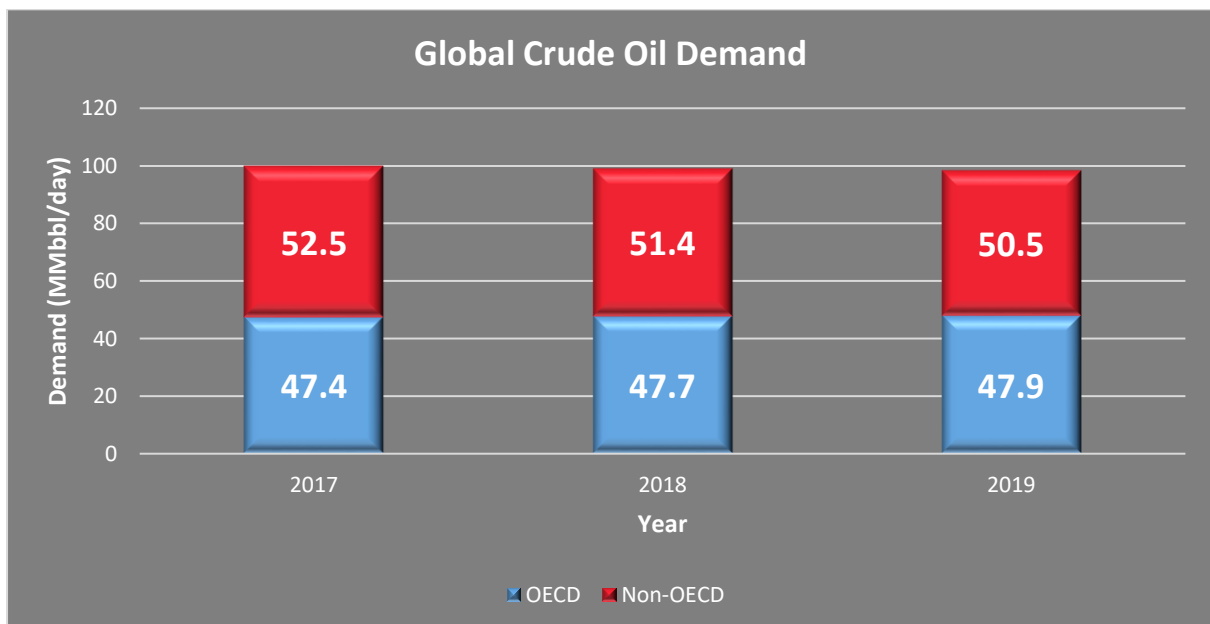


Figure 22: Comparison of Global Oil Demand – 2017 – 2019

Source: US Energy Information Administration, June 2019

10.3 Government' s Projections

A benchmark price of US\$66.76/bbl was projected for the year 2019, against an estimated US\$62.60/barrel in 2020 for crude oil as per the 2019 Budget Statement and Economic Policy. In terms of production, Government anticipated an annual average crude oil volume of 63.4 MMbbls in 2019, and a peaking 69.0 MMbbls in 2020 from the three producing fields of Jubilee, TEN, and SG

APPENDICES

ECG Debt to GNPC -SUMMARY: 19/7/2019

S/N	Date	Item	Details	Total Amount	Amount Paid	Outstanding Amount
				USD	USD	USD
1	02-Dec-2015 - 20-May-2018	Interest on Fixed Deposit	4% Stanbic fixed deposit interest on quarterly	4,966,027.40	-	4,966,027.40
2		Guarantee Issuance Fee	Quarterly issuance fee ICW guarantee 'A' for Karpowership	3,087,500.00	-	3,087,500.00
3		Guarantee Issuance Fee	Quarterly issuance fee ICW guarantee 'B' for Karpowership	4,493,125.00	-	4,493,125.00
5		Late Payment Interest (LPI)		1,110,134.66	-	1,110,134.66

6			Total	13,656,787.06	-	13,656,787.06
7		ECG Payment	Less Payment on Account [08/02/2019]		1,500,000.00	12,156,787.06
8			Balance Outstanding			12,156,787.06

Appendix A - Summary of ECG' s Debt to GNPC

Appendix B – SOPCL 2019 Half-Year Expenditure

	Jan'19	Feb'19	Mar'19	Apr'19	May'19	Jun'19	Total
	GHS	GHS	GHS	GHS	GHS	GHS	
Salaries, Allowances & Payroll Deductions	63,888.23	63,888.23	63,888.23	63,888.23	63,888.23	63,888.23	383,329.38
Food, Water and Fuel							-

Maintenance on Louise Platform	-	-	-	-	-	-	-
Operational Expenses & Crew Change	117,371.00			50,403.75	6,469.64	5,225.89	179,470.28
	181,259.23	63,888.23	63,888.23	114,291.98	70,357.87	69,114.12	562,799.66
RATE (USD/GHS)	4.9014	5.00747	5.18692	5.0887	5.10565	5.23977	
USD EQUIVALENT	36,981.11	12,758.58	12,317.18	22,459.96	13,780.39	13,190.30	\$111,487.53
		TOTAL HALF YEAR BUDGET					\$447,751.93

Appendix C – Payments to PAP Energy Limited for SOPCL Decommissioning Consultancy

Date	Receipt No.	Reference No.	Payee	Details (US\$)
19- Mar- 19	NIB/2019/057	PAP Energy	Payment ICW WP5	50,000.00
19- Mar- 19	NIB/2019/058	PAP Energy	Payment ICW WP11	60,000.00
19- Mar- 19	NIB/2019/059	PAP Energy	Payment ICW WP10	50,000.00
19- Mar- 19	NIB/2019/060	PAP Energy	Payment ICW reimbursements for business expenses (INV.# PAP 004)	6,264.40
16- Apr-19	NIB/2019/081	PAP Energy	Payment of consultancy services review of WP 7	60,000.00
16- Apr-19	NIB/2019/082	PAP Energy	Payment of consultancy services review of WP 7(INV.# PAP 014)	50,000.00
11- Jun-19	NIB/2019/107	PAP Energy	Payment of project management consultancy for phase 1 Saltpond Field decommissioning (PAP 008)	60,000.00
	Total			\$336,264.40

Appendix D - 2019 GNPC Foundation Projects and Status

	S/N	Contract Description	Place	Contract Amount	Paid %	Balance to be Paid	Stage of work
		Sanitary Facility					
A	1	Construction of 24 Unit Sanitary Facility at Market	Bibiani	230,668.35	90%	23,066.84	100%
	2	Construction of 12 Unit Sanitary Facility at Market	Asaakae	130,938.94	90%	13,093.89	100%
	3	Construction of 24 Unit Sanitary Facility	Bompeh SHS	228,638.85	90%	22,863.89	100%
		Sub-total		590,246.14		59,024.61	
		Six (6) Unit classroom block					
B	1	Construction of Six (6) Unit classroom block	Queens Girls' SHS	356,921.49	90%	35,692.15	100%
	2	Construction of Six (6) Unit classroom block	Sefwi Bekwai SHS	356,592.99	90%	35,659.30	100%
	3	Construction of Six (6) Unit classroom block	Dwemena Akenten SHS	338,162.44	90%	33,816.24	100%
	4	Construction of Six (6) Unit classroom block	Amaniampong SHS	337,113.27	90%	33,711.33	100%

	5	Construction of Six (6) Unit classroom block	Adugyama SHS	336,322.09	90%	33,632.21	100%
	6	Construction of Six (6) Unit classroom block	Mankranso SHS	338,298.41	90%	33,829.84	100%
	7	Construction of Six (6) Unit classroom block	Akontombra SHS	357,473.37	90%	35,747.34	100%
				2,420,884.06		242,088.41	
		Other Constructions					
C	1	Construction of 3 Unit Class room block	Mion District (Salakpang)	183,080.88	100%	-	100%
		Sub-total		183,080.88		-	
		Water Project					
D	1	40 Borehole - Water Project	Northern, UE& UW	960,000.00	100%	-	100%
	2	10 Borehole - Water Project	Upper East Region	240,000.00	100%	-	100%
	3	10 Borehole - Water Project	Upper West Region	240,000.00	100%	-	100%
		Sub-total		1,440,000.00		-	
		Non-Physical Project					
E	1	GNPC Digital Academy		-			
	2	Clean up exercise at Ellembelle		-			
	3	200 GNPC Awardees in Cuba		€359,760.17			

	4	Fire Safety campaign	Takoradi	12,465.00			
