



## **Independent Monitoring Group:**

## **HSEC Monitoring Review**

Africa Oil Corporation

26 January 2016

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## FINAL REPORT

## Africa Oil Corporation

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## **HSEC Monitoring Review**

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For and on behalf of

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Date: 26 January 2016

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| LIST OF ABE | BREVIATIONS  |  |  |
| AOC         | Africa Oil Corporation                                   |  |  |
| AoI         | Area of Influence  |  |  |
| CIA         | Cumulative Impact assessment                             |  |  |
| CLO         | Community Liaison Officer                                |  |  |
| EHS         | Environment, Health and Safety                           |  |  |
| EHS MS      | Environment, Health and Safety Management System         |  |  |
| EHS MP      | Environment, Health and Safety Management Plan           |  |  |
| ERM         | Environmental Resources Management Ltd                   |  |  |
| ESAP        | Environmental and Social Action Plan                     |  |  |
| ESIA        | Environmental and Social Impact Assessment               |  |  |
| ESMP        | Environmental and Social Management Plan                 |  |  |
| FPIC        | Free Prior Informed Consent                              |  |  |
| GIIP        | Good International Industry Practice                     |  |  |
| GHG         | Green House Gases  |  |  |
| HR          | Huma Resources   |  |  |
| HSEC        | Health, Safety, Environment and Communities              |  |  |
| ICP         | Informed Consultation and Participation                  |  |  |
| IR          | Industrial Relations                                     |  |  |
| IFC         | International Finance Corporation                        |  |  |
| IMG         | Independent Monitoring Group                             |  |  |
| LALR        | Land Acquisition and Livelihood Restoration              |  |  |
| MOC         | Management of Change                                     |  |  |
| NMK         | National Museums of Kenya                                |  |  |
| NEMA        | National Environmental Management Authority              |  |  |
| NGO         | Non-Governmental Organisation                            |  |  |
| SEA         | Strategic Environmental Assessment                       |  |  |
| SEP         | Stakeholder Engagement Plan                              |  |  |
| SSA         | Site Specific Assessment                                 |  |  |
| TBI         | Turkana Basin Institute                                  |  |  |
| SNNP        | Southern Nations, Nationalities and Peoples              |  |  |

Village Socialisation Officer

VSO

#### **EXECUTIVE SUMMARY**

Africa Oil Corporation (AOC) is a Canada based oil and gas exploration and development company. AOC has been active in Kenya and Ethiopia since 2009 when it acquired an interest in blocks in Kenya and Ethiopia. AOC's current interests include both operated assets (Rift Basin Area Block in Ethiopia and Block 9 in Kenya) and non-operated assets (Blocks 13T, 10BA, 10BB and 12A in Kenya and South Omo Block in Ethiopia). AOC's Joint Venture (JV) partner, Tullow Kenya BV (Tullow) is operator of the non-operated blocks in Kenya.

AOC entered into an Equity Subscription Agreement with the International Finance Corporation (IFC) to finance its oil and gas exploration, appraisal and development activities in Kenya and Ethiopia. The agreement requires AOC (and its Joint Venture partners) to comply with the IFC Performance Standards and undertake specific actions detailed in an Environmental and Social Action Plan (ESAP).

AOC's exploration, appraisal and development activities have been classified by the IFC as Category A. Category A projects require independent review with respect to the requirements of national environmental and social laws and regulations and the IFC Performance Standards on Environmental and Social Sustainability (2012). Environmental Resources Management (ERM) was commissioned to act as the Independent Monitoring Group (IMG) to carry out this independent monitoring.

The review led by ERM included desk-top based document review and a site visit to AOC operations. The site visit was conducted from 8 December to 10 December 2015. The country visit included visits to a range of operations and interviews with staff from AOC and Tullow.

In summary, the review found that AOC and Tullow have the policies, plans and procedures in place to manage the risks and impacts of the on-going and proposed activities. Overall, AOC and Tullow is performing in conformance with lender environmental and social requirements. No non-conformances were identified.

With respect to the requirements of the IFC ESAP, a number of commitments remain in progress (11 items) with two items substantially completed. Further information on ESAP commitments and compliance can be found in *Section 4* of the report.

The review identified areas for improvements including the following.

 Improvements are recommended in the application of the Environmental Management Systems primarily around document control, training and community engagement. Improvements in the application of site specific assessments would also improve the management of risks and compliance.

- Training and contractual arrangements with contractors should be reviewed in order to reduce risks and improve performance.
   Formalisation of grievance mechanisms and internal communication procedures will improve worker engagement.
- Development of site-specific management plans for operations is recommended to identify site-specific risks so they can be managed. Adoption of measurable health safety and environmental control mechanisms will also improve the demonstration of compliance. Sediment and erosion control mechanisms should be adopted to assist in preserving soil resources and protecting assets.
- Involving the community in planning for emergency responses is recommended to assist in building better community relationships and improve community awareness if an emergency occurs.
- The Free, Prior and Informed Consent framework should be finalised and incorporated in the Community Stakeholder Engagement Plan and existing Land Access Procedures.
- The assessments of biodiversity ecosystem services as part of the current Development ESIA process for the project should be completed. This should include applying the mitigation hierarchy and identifying appropriate mitigation measures to reduce impact on biodiversity values, including natural and critical habitats.
- The training and supervision of cultural heritage assessment and management should be improved.

The next IMG review will be done in approximately six months. Between now and then no site-based activities are planned for Block 9 in Kenya and the Rift Basin Area Block and South Omo Block in Ethiopia. The focus of the next review will continue to be on the South Lokichar Basin and Block 12A activities (depending on activities being undertaken at that time).

As the South Lokichar Development Project ESIA progresses and the operator develops, finalises and implements new ESMPs, procedures and guidance then the next IMG review will look more closely at the detail of systems, plans, procedures and guidance to assess the applicability and effectiveness of the measures and the corrective actions taken. This will include an assessment of progress against the recommendations presented in this first IMG review with items being closed, left open or amended, depending of the project activities and schedule.

#### 1 INTRODUCTION

#### 1.1 BACKGROUND

In August 2015 *Africa Oil Corporation (AOC)* entered into an Equity Subscription Agreement with the International Finance Corporation (IFC) for financing to support its oil and gas exploration, appraisal and development activities in Kenya and Ethiopia. The agreement included a requirement for AOC to comply with IFC's environmental and social standards (the Performance Standards) and to undertake specific actions detailed in an Environmental and Social Action Plan (ESAP) developed by IFC following the IFC's initial review of AOC's activities.

AOC's exploration, appraisal and development activities have been classified by the IFC as a Category A (defined as 'projects expected to have significant adverse social and/or environmental impacts that are diverse, irreversible, or unprecedented'). As such, there is a requirement for an independent monitoring of performance with respect to IFC's environmental and social standards.

Environmental Resources Management (ERM) was commissioned by AOC and the IFC to act as the Independent Monitoring Group (IMG) and carry out a review of Health, Safety, Environment and Community (HSEC) aspects associated with AOC's activities related to oil and gas exploration, appraisal and development in Kenya and Ethiopia. The IMG reviews will be conducted every six months during the exploration and development activities and annually during the production phases. This report presents the findings of the first review undertaken in December 2015.

#### 1.2 Scope of the Review

AOC's current interests in Kenya and Ethiopia include both 'operated' assets (Block 9 in Kenya and Rift Lakes Area Block in Ethiopia) and non-operated assets following farm-out transaction with Tullow Kenya BV in 2011 (Blocks 13T, 10BA 10BB and 12A in Kenya and South Omo Block in Ethiopia).

At the time of this review, there were no activities in AOC operated assets in Ethiopia and Kenya. For the purposes of evaluating operational performance the focus of the review was therefore directed at activities in assets in the South Lokichar Basin in Kenya (covering Block 10BB and Block 13T) where Tullow Kenya is the operator.

#### 1.2.1 Objectives

The overall objective of the review was to identify areas of non-conformance <sup>(1)</sup> within the review framework and make recommendation for corrective actions. The review covered the following.

- Progress against the ESAP requirements agreed with the IFC in August 2015.
- AOC corporate-level HSEC management systems in the way of policies and plans.
- Tullow Kenya operational-level HSEC management plans and procedures.
- Tullow Kenya operational performance where Tullow is the operator.

## 1.2.2 Approach

The approach taken for the review was as follows.

- Conduct a desk-top review of documentation on the social and environmental risk and impact assessments, HSEC policies, plans and procedures, stakeholder engagement plans, land access plans, third party studies and reports, and monitoring data.
- Conduct a site visit to representative operations, interview the operator staff and affected communities, visually assess operations, and review additional documentation.
- Prepare a report of the review findings.

## 1.2.3 Review Period

This review covered activities in progress at the time of the review in December 2015. This would include activities that have occurred from the time of IFC's last review in June 2015.

Reference is made in this report to the 'next review period', which would cover the approximately six month period from this December 2015 to the next review.

<sup>(1)</sup> The term 'conformance' is used to acknowledge that the range of environmental and social requirements includes specific legal and regulatory measures where compliance can be measured as well as performance standards that are outcome-based.

#### 1.3 REVIEW TEAM

The ERM IMG comprised four consultants.

- Mark Irvine: Team Leader and Environmental Specialist.
- Henry Camp: Environmental, Social and Regulatory Specialist.
- David Nicolson: Biodiversity Specialist.
- Nomsa Fulbrook-Kagwe: Social Specialist.

All four ERM specialists conducted review of documentation and attended the site visit. The ERM specialists were supported by other ERM subject matter experts on a consultative basis as required.

A site visit to Tullow-operated assets in Kenya was conducted in December 2015. In addition to the ERM specialists, the site visit was attended by the following people.

- Moses Manuel, Jacques Cikurel, Rosa Orellana, Frederick Giovannetti, Conrad Eddie Savy representing IFC.
- Tim Tillson representing Helios Investment Partners LLP.
- Alex Budden, Mark Dingley, Linda Were representing AOC.
- Rob Gerrits, Gordon Scott representing Tullow.

#### 1.4 REPORT STRUCTURE

The remainder of this review report is structured as follows.

- *Section* 2 describes the key project components, the site environmental and social context, land requirements and status of activities.
- Section 3 outlines the assessment framework including national law,
   AOC and Tullow standards, international conventions and treaties and
   IFC Performance Standards.
- Section 4 presents an assessment of the progress against the ESAP.
- Section 5 presents the findings of the review with respect to the IFC Performance Standards.
- *Section 6:* presents the conclusions.

The review is supported by the following annexes.

*Annex A*: IMG Site Visit Programme.

Annex B: List of Documents Provided Relevant to the South Lokichar Development Project.

## 2 COMPANY AND PROJECT DESCRIPTION

#### 2.1 COMPANY OVERVIEW AND ASSETS

AOC is a Canada-based oil and gas exploration and development company. AOC has been active in Kenya and Ethiopia since 2009 when it acquired an interest in a number of blocks in Kenya and Ethiopia.

As described previously, AOC's current interests include both operated assets and non-operated assets. A summary of the operated and non-operated assets are presented below. There is currently no physical activity in the operated assets at this time while previously collected exploration-phase data is being processed and evaluated.

## 2.1.1 Operated Assets

#### Kenya

In Block 9 in Kenya AOC conducted exploration activities that included seismic survey over approximately 1,500 km of survey lines and drilling of three exploration wells. The exploration sites including cleared survey lines, well pads and worker camps are being decommissioned and rehabilitated. Following restoration, some of the well sites and infrastructure are being transferred back to the local communities. AOC's licence for Block 9 has been extended by the Government of Kenya until mid-2017 to allow for further data evaluation.

#### Ethiopia

The Rift Basin Area Block is located in Southern Ethiopia and crosses parts of the Oromia Region and Southern Nations, Nationalities and Peoples (SNNP) Region. AOC has conducted airborne gravity gradient surveys and has completed a 2D seismic survey covering approximately 1,500 km of survey lines within the 42,519 square km of the Block. The survey covered onshore and lake areas. The Environmental and Social Impact Assessment (ESIA) (1) and Environmental and Social Management Plan (ESMP) for the survey were completed in 2013. The Government of Ethiopia granted an extension of the license until February 2017 to allow AOC to evaluate exploration data and make a decision on further activities.

<sup>(1)</sup> For the purposes of this report the terms EIA and ESIA are interchangeable. The term EIA complies with the Kenyan legislation whereas the term ESIA is more commonly used with reference to the IFC Performance Standards.

#### 2.1.2 Non-Operated Assets

Kenya

Non-operated assets in Kenya include Blocks 10BA, 13 T and 10BB in the region of Turkana County and Block 12A encompassing Baringo and Elgeyo Marakewet Counties. The assets are operated as a JV with Tullow Kenya as the operator.

The JV has drilled 35 exploration and appraisal wells since 2012, primarily within the South Lokichar Basin covering Block 10BB and Block 13T (including Etuko, Ewoi, Ekunyuk, Amosing, Ngamia, Etom, Agete, Twiga and Ekales Fields) as shown in *Figure 2.1*.

Extended well tests have been completed at Amosing and Ngamia. Demobilisation and rehabilitation of a number of camps and well pads have been completed whist some well pads have been maintained pending final decision on the development phase requirements.

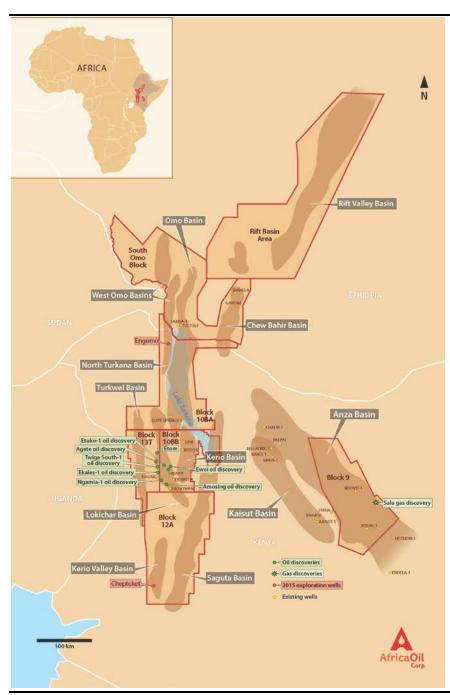
The discoveries in the South Lokichar Basin indicate oil reserves over 600 million barrels and the JV is proposing to further develop the discoveries. Further details of the project are provided in *Section 2.2* below.

The first well in Block 12A in the Kerio Valley Basin (named Cheptuket-1) will be drilled in early 2016.

#### Ethiopia

The non-operated asset in Ethiopia is the Tullow-operated South Omo Block located in the Southern Rift Basin in the southwest of the country. The block falls within the SNNP and covers a surface area of 29,465 square km. ESIAs were conducted for seismic and drilling operations. Seismic surveys have been completed in the block and four wells have been drilled. Drilling activities have been completed and the well pads and worker camps sites have been rehabilitated. There are currently no activities in the South Omo Block. The Government of Ethiopia has extended the licence until the end of 2017 to allow for further evaluation of geological data.

Figure 2.1 Licence Blocks and Discovery Wells in Ethiopia and Kenya



Source: Africa Oil Corporation (website accessed 18 December 2015)

#### 2.2 SOUTH LOKICHAR DEVELOPMENT

## 2.2.1 Proposed Infrastructure

As stated in *Section 1*, the focus of the first IMG review was the current appraisal activities and the proposed development of discovered oil and gas resources in the South Lokichar Basin. The review covers the previous work undertaken for exploratory and appraisal drilling, in as far as these activities affect the existing situation. The proposed field development project is described below.

The JV is planning to develop the discoveries in phases to allow early production and ongoing exploration and appraisal activities to run in parallel. The Phase 1 Project is likely to encompass the Block 10BB and 13T discoveries. The Phase 1 Project is currently undergoing pre-Front End Engineering Design (pre-FEED) concept studies to determine the location and design of the various project components.

The project is at the concept design stage therefor details of the project footprint, location and numbers of wells, and required supporting infrastructure are not yet available. The project is likely to comprise the following main elements.

- Well pads in several different fields within the South Lokichar Basin.
- Interconnecting flowlines.
- A Central Processing Facility (CPF).
- Support facilities and infrastructure (*eg* roads, logistics base/storage areas, and power and water supply).

An ESIA for the Phase 1 development will need to be approved by the Kenyan National Environmental Management Authority (NEMA). An ESIA has been commissioned for the Phase 1 Project and a draft Report and Terms of Reference were submitted to NEMA on 30 December 2015. Some initial baseline studies have also commenced.

The midstream components of the development project will comprise an export pipeline from the CPF to a marine export terminal. The downstream development is likely to comprise an onshore terminal, offshore pipeline and single point mooring for tanker export. These project components are currently subject to various pipeline route selection and pipeline and export terminal siting studies and scoping studies. It is noted that the midstream and downstream project components may be progressed/operated by other parties and no full ESIAs have been completed at this stage. A Strategic Environmental Assessment (SEA) for the full Lake Turkana Development Plan

was undertaken to support the decision-making process (RSK 2014) <sup>(1)</sup>. Additional pipelines may connect with other fields in Uganda and South Sudan in the future. *Figure* 2.2 shows potential pipeline routes.

Figure 2.2 Licence Blocks and Indicative Pipeline Routes



Source: Africa Oil Corporation website accessed on 18 December 2015

#### 2.2.2 Environmental and Social Context

The environmental and social context for the Phase 1 Project has been described in detail in various project reports including the SEA (RSK 2014) <sup>(2)</sup>and an early internal draft of the upstream ESIA scoping report (Golder Associates 2015) <sup>(3)</sup>. The summary provided here is drawn from these reports and is intended to provide a context for this review.

The project area is located in the Rift Valley to the south and west of Lake Turkana. It is located in a remote, unindustrialised and semi-arid environment. The landscape is predominantly flat and low lying but with

<sup>(1)</sup> RSK (2014). Lake Turkana Development Plan Strategic Environmental Assessment. SEA Report 80488 (Final). Submitted to Tullow Kenya BV June 2014.

<sup>(2)</sup> Op cit

<sup>(3)</sup> Golder Associates (2015). South Lokichar Basin Stage 1 Upstream component ESIA Project Report (Internal Draft). Report number 1451460360.516/B.1. Submitted to Tullow Kenya BV.

isolated steep-sided hills and ridges associated with Rift Valley geomorphology.

There is an extensive network of wide shallow ephemeral streams as well as seasonal wetlands located along the Kerio, Turkwell and Lokichar rivers, tributaries of which are located within the project area. There are two rainy seasons, between April and June and between October and December. Rainfall can be sporadic and unpredictable and can result in flash-flooding.

No legally protected areas are within the project area with the nearest being the South Turkana National Reserve (IUCN II) which is located 7 km to south of the southern boundary of the Development Project area and is 1,091 square kilometres in size. Lake Turkana itself is an important ecosystem supporting large populations of Nile crocodile, hippopotamus and fish, and unique flora and fauna assemblages.

It should be noted that the exploration blocks that are located outside of the current development area are in or near to several protected areas. These include:

(to the south and west)

- Amudat Community Wildlife Management Area;
- Plan Upe Wildlife Reserve;
- Nasalot National Reserve:
- Sekerr Forest Reserve;
- Kipkunurr Forest Reserve;
- Kumatra Forest Reserve;
- Lelan Forest Reserve;
- the Mount Elgon UNESCO Biosphere Reserve;

(to the north and east)

- Siiloi National Park;
- South Island National Park; and
- Mount Kulal UNESCO Biosphere Reserve.

Several Protected areas to the West of the project area in Uganda include:

- Matheniko Wildlife Reserve;
- Bokora Corridor Wildlife Reserve;
- Iriri Community Wildlife Management Area;
- Lake Opeta Wetland System (Ramsar site);
- Amudat Community Wildlife Management Area and
- Plan Upe Wildlife Reserve.

The Rift Valley zone is known for its archaeological and anthropological importance with respect to early hominid fossils and artefacts and Lake Turkana itself and adjoining national parks have been declared World Heritage sites.

The population of the area is characterised by tribal pastoralists. The low productivity of the rangelands means that livestock (typically a collection of cattle, goats, sheep and camels) are moved frequently so that the animals can gain access to fresh pasturelands. Central government in partnership with non-governmental organisations (NGOs) provide food relief throughout the region, which has created widespread dependency on the regular provision of food supplies. Literacy and educational levels across the entire region are low.

In the project area there are no large-scale agricultural initiatives (*eg*, commercial farming) primarily due to limited water being available. Tourism infrastructure is not extensively developed and it remains difficult to travel to the area due to poor-quality roads and a lack of supporting tourism infrastructure.

The region supports a number of tribal groups, amongst whom there has historically been antagonism, which has periodically escalated into episodes of localised conflict. The conflict is often violent and is driven by a complex combination of the increasing availability of small arms, competition over pastoral grazing lands and livestock, tribal claim to lands based upon their grazing value, and the socio-cultural importance of keeping large quantities of livestock for socio-economic status.

#### 3 APPROACH AND METHODOLOGY

#### 3.1 ASSESSMENT FRAMEWORK

The IMG review was undertaken through a combination of document reviews, presentations, interviews and a site visit. A summary of the activities undertaken are provided below with details of the site visit and documents provided for review provided in *Annex A* and *Annex B* respectively.

An evaluation of the AOC's and Tullow's plans and activities was undertaken against agreed environmental and social standards. For this assessment, the framework is comprised of the following.

- Environmental and social laws and regulations of Kenya in force at the time of the assessment.
- AOC's agreed ESAP (disclosed by IFC on 31 August 2015).
- IFC Performance Standards on Environmental and Social Sustainability (2012) (Performance Standards) and related policies including:
  - Performance Standard 1: Assessment and Management of Environmental and Social Risks and Impacts;
  - Performance Standard 2: Labour and Working Conditions;
  - Performance Standard 3: Resource Efficiency and Pollution Prevention;
  - Performance Standard 4: Community Health, Safety and Security;
  - Performance Standard 5: Land Acquisition and Involuntary Resettlement;
  - Performance Standard 6: Biodiversity Conservation and Sustainable;
     Management of Living Natural Resources;
  - Performance Standard 7: Indigenous Peoples; and
  - Performance Standard 8: Cultural Heritage.

The review considered the sector-specific guidelines of the World Bank Group as referenced in the Performance Standards including:

- General Environmental, Health and Safety General Guidelines (April 2007); and
- Environmental, Health, and Safety Guidelines for Onshore Oil and Gas Development (April 2007).

#### 3.1.1 Kenyan Laws and Regulations

The key laws and regulations that apply to the oil and gas development activities in Kenya have been referenced in the various EIAs, SEA and Scoping Reports undertaken for the current operations and proposed South Lokichar Development Project. These are summarised in *Table 3.1*.

#### Table 3.1 Relevant Kenyan Legislation

### The Environment Management and Coordination Act (1999)

This Act entitles every person in Kenya to a clean and healthy environment and aims to safeguard and enhance the environment. Though there are other sectorial laws on environmental conservation, this is the supreme Parliamentary Act.

#### Environmental Impact Assessment and Audit Regulations (2003)

The Regulations require that listed projects or activities obtain an EIA License from NEMA (the authority as defined by the Regulation) as a prerequisite for licensing and approval by other authorities.

#### Petroleum Exploration and Production Act, Cap 308

This Act is the primary legislation that governs the exploration and production of oil in Kenya and its main objectives to regulate the negotiation and conclusion by the Government of petroleum agreements relating to the exploration for, development, production and transportation of petroleum. The Act stipulates measures for contractor access to private land.

#### Wildlife Conservation and Management Act, Cap 376

Forbids any activities in registered areas to secure the safety of Kenyan national biodiversity, the fauna and flora, the habitat and ecology of national parks, national reserves and sanctuaries. The Act also sets out important principles to encourage public participation in the management of wildlife resources, uses an ecosystem approach to wildlife management, and recognises and encourages wildlife conservation and management as a form of land use on public, community and private land.

#### The Forest Act (Act Number 7) (2005)

This Acts provides for the establishment, development and sustainable management of forest resources for the socioeconomic development of the country. Requires all indigenous forests and woodlands to be managed on a sustainable basis for the purposes of conservation of water, soil and biodiversity, riverline and shoreline protection, and sustainable production of wood and non-wood products.

## Kenya Environmental Management and Co-ordination (Waste Management) Regulations (2006)

These regulations streamline legislation relating to the handling, transportation and disposal of solid, industrial and hazardous wastes, in order to protect human health and the environment. Wastes considered to be hazardous are defined within the fourth schedule of the regulations. Under the regulations the National Environment Management Authority (NEMA) licenses transporters of waste and waste treatment/disposal facilities. The regulations also place emphasis on waste minimisation, cleaner production and segregation of wastes at source.

#### Kenyan Water Act (2002)

Concerns management, conservation, use and control of water resources and the acquisition and regulation of rights to use water, and the regulation and management of water supply and sewerage services. Under this Act the Water Authority may declare groundwater conservation areas, and may regulate or prohibit water use for the protection of the area and its groundwater.

#### Kenyan Water Quality Regulations (2006)

Requires that industrial project developers apply for an annual effluent discharge licence for discharging process wastewater into the environment, aquatic environment or public sewers. The regulation contains discharge limits for various environmental parameters into public sewers and the environment.

#### National Museums and Heritage Act, Cap 216

This Act may prohibit or restrict access or any development activities which may damage monuments or objects of archaeological or paleontological importance. A protected site is established if the site has a buried monument or if an object of archaeological or paleontological interest exists. The protected area may be placed under the control of the National Museum of Kenya. If private land is included in a protected area, the owner of the land is subject to compensation.

#### Public Health Act (Revised 1986)

This Act demands the adoption of practicable measures to prevent injurious and un-healthy conditions on a project site. The Act requires the proponent to enhance effective management of nuisances *ie* noxious matter or wastewater discharged from the project throughout the project lifecycle.

#### Occupational Safety and Health Act (2007)

OSHA 2007 is an Act of Parliament to provide for the safety, health and welfare of workers and all persons lawfully present at workplaces. This Act requires developers of facilities to notify the Director of OSH of their plans before development starts. This Act also sets minimum standards that are to be maintained in such work places to safeguard the health, safety and welfare of the workers.

#### Physical Planning Act, Cap 286

This is the principle Act governing land planning and requires the proponent to acquire a Certificate of Compliance or approval letter from the relevant institutions as set out in the Act. The main objective of the Act is to harmonise development. Section 30 states that "any person who carries development without permission from the local authority will be required to restore the land to its original condition".

#### The Agriculture Act (Cap 318)

This Act was created for the promotion and maintenance of a stable agriculture, to provide for the conservation of soil and its fertility, and to stimulate the development of agricultural land.

#### Land Act, No. 6 (2012)

This Act is for the management and usage of public land, trade private and community land as well as the easement of land. Section 111 (1) requires just and full compensation to be paid promptly. Section 125 states: (1) to obtain temporary occupation of land, full and just compensation shall be paid before taking possession. Section 134 (1) requires the Commission to implement settlement programmes to provide access to land for shelter and livelihood, on behalf of the national and county governments.

#### Kenya Trust Land Act Cap 288 (1939, revised 2012)

This Act bestows land upon county councils. This form of ownership ensures equitable distribution of resources for the community members who principally need the land for grazing. The community members do not have documents for individual parcels of land except in urban areas where they are given allotment letters as proof that they are occupying the land legitimately.

## Land Registration Act, No. 3 (2012)

Registration of the title of land and establishment of relevant governmental organization will be based on this act. The Ministry of Land has a role for management of the land registration.

#### National Land Commission Act (2012)

The National Land Commission Act makes further provision as to the functions and powers of the National Land Commission, qualifications and procedures for appointments to the Commission and gives effect to the objects and principles of devolved government in land management and administration.

#### Draft Kenyan Community Land Bill, 2013 [due 2016]

The law is intended to safeguard community land rights and provide for the recognition, registration and protection of community land, and seeks to establish an institutional framework through which community land will be owned, managed and administered (via a National Lands Commission).

#### The Environmental and Land Court Act (2011)

The Act enables the Parliament to establish a superior court to hear and determine disputes relating to the environment and the use and occupation of and title toland.

#### Draft Eviction and Resettlement Procedures Bill (2013)

According to the Draft Eviction and Resettlement Procedures Bill of 2013, the following aspects are stressed:

- The National Land Commission shall facilitate appropriate resettlement where evictions are deemed lawful and maintain a register of all persons subject to eviction.
- The National Land Commission shall undertake resettlement in a just and equitable manner and in accordance with international law standards.
- The National Land Commission shall take measures to ensure equal participation of women, persons with disabilities and other vulnerable groups and ensure their rights are protected.

#### 3.2 METHODOLOGY

#### 3.2.1 Overview

The scope of work entailed the independent assessment of environmental and social aspects of the Company's and Operator's assets and operation within the applicable regulatory and performance framework.

The assessment comprised the following.

- Relevant environmental and social documentation and information were reviewed. Presentations were made by AOC and Tullow functional heads in Nairobi and in the field and copies of presentations and related documents were provided.
- A site visit was conducted and visual observations were made of the areas directly and indirectly affected by the operator's activities. Individuals responsible for operator activities were interviewed in the field with regards to environmental and social issues and a small number of discussions with community members were held.
- Operator activities were evaluated against the reference framework to determine compliance with national laws and regulations, corporate requirements and conformance with lender requirements.
   Recommendations were made where applicable to address deficiencies or to improve performance.

#### 3.2.2 Document Review and Presentations

A large number of HSEC documents covering AOC's corporate management plans and Tullow Kenya's operational policies, procedures and plans were

provided prior to the visit. Additional information needs were identified over the course of the site visits and was subsequently provided. A full list of the Tullow documents provided is presented in *Annex B*. The key documents included the following.

- Block-wide Environmental Impact Assessment (EIA) reports for previous drilling operations and Scoping Reports for planned operations.
- Site Specific Assessment for drilling operations.
- Strategic Environmental Assessment for the Lake Turkana Development.
- EHS policy, guidance and procedures.
- Stakeholder Engagement Plans, community newsletters.
- Grievance Procedures and records of Grievances.
- Land Access Procedures and community agreements.
- Conflict Assessments.
- Contractor's procedures for local recruitment and employment summaries.

A series of presentations were delivered to the IMG by AOC and Tullow Kenya outlining operations and HSEC issues and management plans. These covered the following main areas.

- Overview of AOC and progress with ESAP.
- Overview of Tullow Kenya and Turkana Operations.
- Upstream ESIA and South Lokichar Development Project.
- Environment, Health and Safety.
- Security and Asset Protection.
- Social Performance.
- Stakeholder Engagement.
- Grievance Management.
- Land Access.
- National Content.
- Human Resources.

#### 3.2.3 Site Visit and Interviews

A site visit was conducted to verify the information provided in the documentation through interviews, direct observation and site-based document review. The site visit covered previous and on-going activities as well identifying environmental and social risks associated with planned operations.

The site visit was conducted over approximately two days (mid-morning on 8 December to lunchtime on the 10 December 2015) and included a tour of a number of the existing operational sites and the location of previous operational sites.

These included the following.

- Kapese main camp site and logistics base.
- Etom drill site.
- Ngamia Extended Well Test site.
- Previous Ekales seismic camp site (removed and site rehabilitated).
- Lokichar Tullow Oil Community Resource Centre (CRC) and Enterprise Development Centre (EDC).
- Three social investment/community projects (a clinic and two new classroom projects under construction).
- Attendance at a community outreach meeting.

During the site visit discussions were held with Tullow representatives with operational responsibilities for the environmental, health and safety and community management planning. In addition discussions were held with community representatives at the outreach meetings and at the Lokichar Tullow Oil CRC/EDC.

## 3.2.4 *Performance Evaluation*

In this review, performance was evaluated and rating according to the categories presented in *Table 3.2*. Where deficiencies were identified these were rated as Low, Medium and High, based on the level of risk posed and priority for corrective action.

## Table 3.2 Assessment Criteria Used in the Review

| Assessment Rating                  | Criteria   |  |  |
|------------------------------------|--|--|--|
| CLOSED                             | Requirements have been fully met   |  |  |
| IN PROGRESS                        | Work to meet requirements is in progress. Some parts of the requirements may be closed and others are planned within the next monitoring period or some items stated to have been completed require verification.  |  |  |
| RECOMMENDATION                     | Issue or situation where performance could be improved to better meet good international industry practice.  |  |  |
| REQUIREMENT NOT<br>MET – LOW RISK  | Issue or situation not consistent with Applicable Standards or commitments but without an immediate risk of impact to resource or receptors.   |  |  |
| REQUIREMENT NOT MET - MEDIUM RISK  | Issue or situation not consistent with Applicable Standards or commitments with immediate risk of impact to resources or receptors and requiring corrective action.  Recurring issue or situation not consistent with Applicable Standards or commitments but without an immediate risk of impact to resource or receptors generally requiring systems-level corrective action.  |  |  |
| REQUIREMENT NOT<br>MET – HIGH RISK | Issue or situation not consistent with Applicable Standards or commitments that has resulted in significant impact to resources or receptors and requiring corrective action.  Action that indicates intentional disregard for Applicable Standards or commitments that has not necessarily resulted in significant impact, generally requiring systems-level corrective action. |  |  |

#### 3.3 LIMITATIONS

The findings of this review are based on the Scope of Work described above. ERM performed these services in a manner consistent with the normal level of care and expertise exercised by members of the planning and environmental consulting profession.

The work is based primarily upon documents produced and studies performed by third parties, and interviews, discussions and observations over the five day period of the country visit. With regard to information provided by AOC, Tullow Kenya and their representatives, ERM has used such information in good faith and with verification limited to the above visit and as detailed in this report. The assessment and recommendations made are based on professional judgement drawing from the available information and within the limits of the budget and schedule.

The information provided in this report should be considered as technical input and not as legal advice.

#### 4 ASSESSMENT AGAINST AOC STANDARDS AND COMMITMENTS

#### 4.1 Introduction

AOC presented the progress to date against the IFC ESAP at a meeting with the IMG on the 9 December 2015 and provided an update following a meeting with the IFC on 12 December 2015 in the way of an Environmental, Social and Governance Master Action Plan.

In addition the following set of draft AOC HSEC management plans and procedures were provided.

- Health, Safety and Environment Management System
- Hazard and Effect Management Process (HEMP)
- Stakeholder Engagement Plan
- Grievance Mechanism
- Security Framework
- Land Acquisition Framework
- Human Resources Framework
- Incident Reporting and Investigation Procedure
- Management of Change Process
- Indirect Emissions Calculation Spreadsheet
- Corporate Social Responsibility Process and Practices Manual Operating Guidelines

As AOC are not currently operators, it was agreed with the IFC that a number of management plans should be produced in the form of framework documents outlining the requirements that would apply to any operational plans to be produced at a later date. The final documents have been submitted to the IFC for completion within the next monitoring period and have therefore not been reviewed in detail by the IMG for this review.

## 4.2 CONFORMANCE WITH ESAP REQUIREMENTS

*Table 4.1* presents the tasks identified in the AOC Master Action Plan along with reference to the agreed IFC ESAP. An assessment of the conformance is provided along with an explanation for the rating.

 Table 4.1
 Evaluation of ESAP and Related Commitments

| Index     | Task Title & Description   | Anticipated<br>Completion Date | Rating      | Discussion  |
|-----------|--|--------------------------------|-------------|---|
| ESAP 1.1  | The Company will enhance HSE capacity through  | 12/31/15                       | IN PROGRESS | The initial task has been completed with AOC engaging a contractor in December 2015 to provide training to senior management and key staff.   |
|           | i) an IFC Performance Standard focused training for senior management and operational teams  |                                |             | The training will be delivered in early 2016. Final actions to close this task are expected to be completed in the next review period.  |
| ESAP 1.2  | (ii) hiring an Environmental, Social and Governance Manager.   | 12/31/15                       | CLOSED      | AOC has hired a qualified ESG Manager on a fulltime basis to lead Company HSE management. The ESG Manager commenced work on 9 November 2015.  |
| ESAP 2    | The Company will develop a Stakeholder<br>Engagement Plans (SEP), for its Kenya and<br>Ethiopia activities per the requirements of<br>Performance Standard 1.  | 3/31/16                        | IN PROGRESS | AOC and Tullow have prepared draft SEPs and submitted it to IFC for review. This action will be closed pending review and confirmation that it meets requirements of relevant IFC PS.   |
| ESAP 3    | The Company will complete the additional requirements for Free Prior Informed Consent (FPIC), per the circumstances listed in Performance Standard 7, and complete a mutually acceptable process between Company and affected community and provide evidence of an agreement between the two parties on the outcome of the negotiation | 03/31/16                       | IN PROGRESS | AOC is working with Tullow to develop a clear process to determine applicability of FPIC based on the definition of the project footprint and specific impacts. The procedure for determining and achieving FPIC will be outlined in the SEP. This is being finalised pending consultation and feedback from the IFC and other stakeholders. Actions to close this task are expected to be completed in the next monitoring period. |
| ESAP 4a.1 | The Company will develop an overarching human resource policy (HR) for Kenya and Ethiopia, which will make reference to Performance Standard 2 and ILO conventions, and will include associated country specific implementation procedures   | 3/31/16                        | IN PROGRESS | AOC has prepared a Human Resources Policy and framework plans for Retrenchment and Internal Grievances ( <i>ie</i> , worker grievances). These have been submitted to IFC for review. This action will be closed pending review and confirmation that it meets requirements of relevant IFC PS.   |
|           | (ii) The Company will develop a<br>Retrenchment Framework Plan that aligns<br>with the requirements of Performance<br>Standard 2 and that should be utilised in  |                                |             | Tullow has an Employee's Handbook that includes a Human Resources Policy. Tullow follow national law with regards to retrenchment. Tullow are preparing documentation of the retrenchment   |

| Index    | Task Title & Description  | Anticipated<br>Completion Date | Rating      | Discussion   |
|----------|---|--------------------------------|-------------|--|
|          | cases of collective dismissal by the Company and/or contractor/subcontractor  (iii)The Company will develop and implement a formal internal grievance mechanism applicable to all employees and workers employed at Company's sites by contractors and sub-contractors. |                                |             | procedure. This will be submitted to IFC for review. This action will be closed pending review and confirmation that it meets requirements of relevant IFC PS.   |
| ESAP 4b  | The Company will prepare a security risk assessment and develop Security Management Plans that are aligned with Performance Standard 4. These will be reviewed and updated as the project evolves.  | 3/31/16                        | IN PROGRESS | AOC has prepared a Security Policy and submitted it to IFC for review. This element of this action will be closed pending review and confirmation that it meets requirements of relevant IFC PS.  AOC will prepare and submit specific Security Management Plans prior to future operational activities.  Tullow has prepared Security Management Plans for ongoing activities and submitted these and supporting studies to IFC for review. This action will be closed pending review and confirmation that it meets requirements of relevant IFC PS. |
| ESAP 5.1 | The Company will develop Land Acquisition and Livelihood Restoration (LALR) Plans for each of the two countries (Kenya, Ethiopia).  | 3/31/16                        | IN PROGRESS | AOC has prepared a LALR Framework and submitted it to IFC for review. This element of this action will be closed pending review and confirmation that it meets requirements of relevant IFC PS.  AOC will prepare and submit specific LALR Plans for prior to future operational activities.  Tullow has prepared a Land Access Framework and submitted it to IFC for review. This element of this action will be closed pending review and confirmation that it meets requirements of relevant IFC PS.  |
| ESAP 5.2 | The Company will redesign its compensation plan in Ethiopia to incorporate procedures to compensate prior to commencing work,   | 07/31/16                       | CLOSED      | Compensation Plan redesigned and the Management of Change provided to IFC as evidence.   |

| Index    | Task Title & Description  | Anticipated<br>Completion Date | Rating      | Discussion   |
|----------|---|--------------------------------|-------------|--|
|          | vacating land and any potential damage that could occurred after seismic survey.  |                                |             |  |
| ESAP 6.1 | The Company will develop a biodiversity strategy for Kenya as described in the ESRS  (ii) The company will develop a similar plan prior to any substantive work related to development of successful wells in Ethiopia  | 4/31/16                        | IN PROGRESS | AOC are preparing a Biodiversity Management Framework in consultation with stakeholders and with guidance from IFC. AOC will complete the development of the framework and submit to IFC for review.   |
|          |   |                                |             | AOC will prepare and submit specific Biodiversity Strategy (including the Biodiversity Panel) prior to future operational activities.  |
|          |   |                                |             | Tullow is preparing a Biodiversity Strategy. The strategy will be submitted to IFC for review.   |
| ESAP 7   | The Company will prepare and submit ESIAs to IFC addressing local regulatory requirements and IFC Performance Standards in any case where wells progress to production. These will be presented to IFC for review and approval at least four months prior to start of any substantive construction. | 12/31/16                       | IN PROGRESS | It is noted that AOC and Tullow have completed ESIAs for all activities currently underway and planned for 2016. An ESIA for the Upstream South Lokichar Development Project has commenced with a scoping study and baseline surveys in process during this monitoring period. The detailed ESIA is expected to commence within the next monitoring period with completion targeted for the end of 2016. |
| ESRS 1   | PS3: Hydrogeological study of Ethiopian blocks if there is further operational activity   | No Date                        | IN PROGRESS | AOC intends to complete such a study prior to commencement of any work.  |
| ESRS 2   | PS3: Quantify and report greenhouse gas (GHG) emissions for all activities  | No Date                        | IN PROGRESS | AOC has developed a system for tracking GHG.  AOC will commence tracking of GHG at the start of 2016. Final actions to close this task are expected to be completed in the next review period.   |
| ESRS 3   | PS 8: Ensure cultural heritage management plan is in place for future exploration and development activities  | No Date                        | IN PROGESS  | AOC intends to complete such a study prior to commencement of any work.  |

#### 4.3 RECOMMENDATIONS

## 4.3.1 AOC HSEC Management System

AOC has developed numerous environmental and social policies, plans and procedures to guide its business operations. These could be further improved through the development of an organised HSEC management system with overarching plan cross referencing the relevant documents. These documents should have a common naming/numbering system, structure and review cycle to form a basis for the current and developing plans as and when AOC move into an operator role.

#### 4.3.2 *ESAP Item 7*

Given the scale of the South Lokichar Development Project, it is recommended that AOC and Tullow engage IFC specialists to review the proposed Development ESIA at a point prior to completion of the draft for review to ensure that it will address the requirements of the IFC Performance Standards.

#### 5 ASSESSMENT AGAINST IFC PERFORMANCE STANDARDS

#### 5.1 Introduction

The focus of the current IMG review was the activities that have been undertaken and planned in the South Lokichar Phase 1 Development Project area <sup>(1)</sup> and the systems and processes that the operator Tullow has in place and/or is developing. The term 'Operator' in this section therefore refers to AOC's JV partner Tullow.

# 5.2 PERFORMANCE STANDARD 1: ASSESSMENT AND MANAGEMENT OF ENVIRONMENTAL AND SOCIAL RISKS AND IMPACTS

## 5.2.1 Project Strategy

Environmental and Social Assessment Management Systems, Policy, Identification of Risks and Impacts, and Management Programmes

The Operator has an Environmental, Health and Safety Management System (EHS MS) aligned with ISO 14001 in place. The Operator also has an Health, Safety, and Environment (HSE) policy (T-KE-EHS-POL-0001) that addresses compliance with national legislation and industry best practice in managing environmental and social risks, ethical and social responsibility, maintaining safe working environments, prevention of pollution and protecting the physical environment, wildlife, culture and archaeology of Kenya. The policy is widely communicated within the Operator's procedures.

Within the EHS MS there are a series of policies, plans, procedures and guidance documents addressing health, safety, environmental, social, security and asset protection issues. These address all the requirements of the IFC Performance Standards.

Contractors engaged by the Operator are required to have similar policies and procedures and where necessary bridging documents are produced to ensure that all required Operator policies and procedures are linked the contractor plans.

The Operator has undertaken a series of oil and gas exploration licence block-wide ESIAs as well as activity specific ESIA in compliance with Kenyan regulatory requirements. Twenty ESIAs have been undertaken by the Operator in Kenya to date covering exploration and appraisal activities in its six licence blocks covering specific activities such as seismic surveys, exploration drilling, and extended well testing. The block-wide ESIAs

<sup>(1)</sup> The Development Project area means the area that includes the primary project site(s) and related facilities that the client (including its contractors) develops or controls.

adequately covered the Area of Influence (AOI) (1) of the current activities, including seismic lines, well pads, camps, logistics bases and roads.

These ESIAs covered the broad range of issues and key impacts as required under Kenyan legislation and under the IFC Performance Standards, including pollution control, community health and safety, land access, biodiversity, vulnerable and marginalised communities and cultural heritage. The ESIAs address the legislative requirements and also identify emerging legislation that may have an effect on the operations. ESIAs are submitted to NEMA for approval and grant of environmental license prior to the relevant work commencing. The Operator obtains other permits and licences required for specific activities such as for the discharge of treated waste water and the operation of waste incinerators.

As the ESIAs were generally block wide and produced prior to final decision on the location of well sites, camp sites and other facilities, the Operator prepared Site Specific Assessments (SSAs) to cover activities at a specific well pad or camp site location. The SSA supplemented the assessment in the ESIAs. The SSAs are subtitled Scouting Reports and address the proposed civil engineering work and potential impacts on land access, environment (habitats and species, trees), cultural heritage/archaeology, social performance/communities, water resources, and security/EHS. The SSAs were implemented with deliberate policy of avoidance and minimisation of impact on water courses, trees, settlements *etc* and to allow flexibility of site location accordingly. In addition to the SSA procedures there is a management of change process (MOC) which assesses cost, schedule, technical, contractual and operational impacts (including EHS issues).

Although the details of the potential full development (upstream, midstream and downstream) are not fully defined the indicative impacts were assessed within an SEA undertaken by RSK (2014) <sup>(2)</sup>.

A draft Scoping Report/Terms of Reference (Project Report) has been prepared for the upstream Southern Basin Phase 1 Development Project. The report makes reference to Kenyan legislation and good international industry practice (including IFC Performance Standards). In addition the Operator intends to prepare a separate Cumulative Impact Assessment (CIA) covering other activities within the upstream AOI as well the cumulative impacts of the upstream, midstream and downstream components so as to meet Operator and IFC requirements.

The Operator maintains a risk register for current operations including an evaluation of the risk and the management measures necessary for control. This includes risks with respect to the Voluntary Principles on Security and Human Rights.

Area of Influence means the area likely to be affected by the project, including all its ancillary aspects.
 Op cit.

Mitigation commitments and recommendations made in the exploration and appraisal ESIAs have been taken forward into the more detailed Environmental and Social Management Plans.

Organisational Competency, Capacity and Training

The Operator has a clear management structure with named people with responsibilities for all aspects of health, safety, environmental, social, security/asset protection management both at head office level and field level (eg, Field Environmental Monitors, Field EHS Supervisors, Field Security Advisors, Field Social Performance Manager/Supervisors, Community Liaison Officers, and Grievance Officers). Staff are well qualified and competent in their position and staff levels are adequate.

In addition there are clear lines of reporting for contracted services (*eg*, environmental monitors, medical support, ESIA consultants, Social Investment contractors and security providers) to their respective Operator contract holders.

The Operator has a detailed programme of training and capacity building across all HSEC areas including health and safety, technical, cultural heritage and cultural awareness. A detailed log of training received by each employee/contractor is maintained.

Where required the Operator has taken on external experts to undertake studies, identify risk and develop management plans. These have included ESIAs and reports on Conflict Analysis and Responsible Business Assessment.

Emergency Preparedness and Response

The Operator has Incident Management Procedures and Guidelines (T-KE-EHS-PRO-0002). These include: a Crisis and Emergency Management Policy; identification and assessment of credible risk; emergency response organisation, process and plans; and resource and training requirements. The incident management teams are required to undertake annual training as well as three desk-top exercises and one full exercise per year based on identified credible emergency scenarios to test the response plans, key functions and stakeholder relationships. Post exercise reviews are undertaken to learn lessons and drive continuous improvement. Reviews are also undertaken annually, as part of the MOC procedure, following changes in legislation or Operator procedures and after actual incidents.

Bridging documents to interface between Operator and contractors during incident responses also exist to ensure roles, responsibilities and authorities are defined and communication is maintained.

Stakeholder Engagement is under the responsibility of the Social Performance team with senior management based in Nairobi and delivery staff based in the field (including Community Liaison Officers and Village Sensitisation Officers). Initial community engagement was undertaken as part of the ESIA processes where relevant stakeholders were identified and consulted. More detailed Stakeholder Engagement Plans (SEPs) were then prepared to include national and county government and community level engagements (including both the traditional leadership and the government representative leadership). Site-specific engagement plans were also developed for specific operations such as new well pads or rig moves.

Following deterioration in community relations in 2013 (related primarily but not exclusively to employment and business opportunities) a series of community consultations and studies were undertaken to improve relationships. From this, a more comprehensive Pre-development Community SEP is currently under development for ongoing work. This includes addressing the requirement for Free Prior Informed Consent (FPIC) as required under IFC Performance Standard 7, where this is applicable.

Relationships are reported as much improved with the stakeholder consultations, provision of project information through community outreach programmes, delivery of agreed social investment programmes and the operations of the three Community Resource Centres and the Enterprise Development Centre helping to build trust and understanding.

The SEP includes a grievance mechanism for communities where individuals can raise issues or grievances directly with the Operator or through intermediaries (including confidentially). The Operator has set a target of seven days for addressing grievances and an average of five days is being achieved. Monthly reports of grievances analysed by type of grievance, how reported, relevant contractor/department responsible and status are produced.

## Monitoring and Review

The Operator has a HSE Audit Procedure (T-KE-EHS-PLN-0033) detailing the planning, executing and close-out of EHS audits for its operations. This is linked to an EHS Risk Management Procedure (T-EHS-PRO-0004) and Action Tracking Procedure (T-EHS-PRO-0005).

The EHS audit programme includes site inspections, country level and independent third party level audits to monitor, evaluate and report EHS compliance and associated liability at its operational locations. The site based inspections and audits are undertaken on a daily, weekly, monthly and quarterly basis depending on the issues and risks.

Contractors are also audited and are required to undertake their own sitebased audits and routine inspections and checks.

A record is kept of all EHS incidents, along with corrective measures put in place. In addition there is a grievance monitoring procedure.

#### 5.2.2 Observations

Environmental and Social Assessment Management Systems, Policy, Identification of Risks and Impacts, and Management Programmes

The ESIAs that were undertaken for the exploratory and appraisal phases met the regulatory requirements and provided a basis for developing ESMPs for field-wide operations. For the current activities there is a gap between the assessment made in the block-wide ESIAs and the approach taken with the SSAs for site-specific development. The SSAs assess deliverability and take into consideration environmental and social aspects such as presence of trees and proximity to communities. They do not however explicitly reference ESIA baseline data or link with the assessment of significance of impacts and related mitigation measures. Improvements to the SSA process in the form of a type of ESIA addendum cross referencing the ESIA findings and updating baseline data where necessary would address likely significant impacts more comprehensively and transparently. The issue of cumulative impacts also needs to be addressed in the SSAs.

To enable a more rigorous and evidence based assessment of site specific EHS and community requirements, consideration should be given to improving the criteria used for SSAs. Expansion of the existing questionnaire based approach to include measurable EHS and community based components could be developed. This would also enable compliance against criteria to be completed, improving demonstration of compliance.

An example of activities that may not have been assessed in the block-wide EIA but are progressed without formally assessing potential impacts is where the community requests that temporary infrastructure or ground works are left to provide community benefit. Leaving murram pits as water traps for the community or leaving temporary seismic tracks open for local transport can have impacts that were not assessed or managed.

The MOC process assesses cost, schedule, technical, contractual and operational impacts (including EHS issues), however, it does not cross reference the ESIA and SSA to provide a check on the assessment of impacts and any necessary mitigation that may be required.

It is important to ensure that the current and developing systems and plans are capable of continuous assessment of impacts and continuous improvement, including modifying mitigation measures rather than relying on ESIA mitigation measures and approaches that were developed at a point in time prior in the early stages of the project. The recommendation is to

move from the ESIA as a permit requirement to a process required for effective management post disclosure of the ESIA and throughout the lifetime of the development project. This is particularly important for social impacts where the conditions that existed at the time of the ESIA can change and new impacts and issues emerge.

The documents provided for review were a combination of controlled documents and uncontrolled documents and reports where the authorship, date and status were unclear. Some of the controlled documents were incomplete, past their stated review date or without authorising signature. Examples of controlled documents with no or incomplete document numbers are TKBV Decommissioning and Restoration Guidance - Rev 0 AM 26.01.15 and T-KE-EHS-PLN-XXXX TKBV Decommissioning and Restoration Plan R0 14 Oct 2014. The Operator recognised that the finalisation of documentation lagged behind the activities during the exploration phase and some of these documents are now being superseded by new documents currently in development.

## Organisational Competency, Capacity and Training

It is recognised that during the initial exploration phase there were areas for improvement in how communities were engaged and grievances were managed. It is clear that lessons have been learned from that period and positive steps have now being taken to improve the team's capacity and capability to address the key issues of land access, community engagement and security.

In particular the Operator has strengthened its EHS and SP teams and a series of more comprehensive operational plans and procedures are under development. The IMG was impressed by the depth of understanding of the issues, and the commitment and confidence of the leadership teams and the field based teams. Observations were made and evidence reviewed of training and capacity building efforts that have been made within the field based teams. Challenges in this area have been recognised given the changing workforce as the project activities move between different communities.

The positive management changes and approaches have had significant impact on the current operations and it was observed directly and through document review that operations were well managed, issues are being addressed and community relations at the currently operational sites are good.

The challenge for the next phase is to build on the management improvements made and fully resource and develop the plans and procedures to address current issues and the likely emerging issues from a full scale development project (*eg*, permanent land take, economic displacement, up to 5,000 workers within a limited project area and worker influx from outside the project area).

Emergency response plans and procedures, including Incident Investigation Procedures, are in place covering credible incidents within operational sites. It was not clear to the extent that communities have been informed about the risks and response measures, particularly where there could be community exposure to risks (*eg*, vehicle accident on roads, accidental release of hazardous materials).

The Incident Investigation Report (Emex 3254) of the environmental spill during flaring operations at the Amosing Extended Well Test site in February 2015 showed the process that the Operator goes through to assess the root cause of incidents and the corrective measures taken to avoid similar incidents. In this case the root causes were assessed as inadequate equipment design and maintenance and inadequate planning and procedures for supervision of operations, communications and response. It was also reported that there was some community concern over the incident given the large amount of black smoke released.

Stakeholder Engagement, Disclosure of Information and Grievance Mechanism

The draft Pre-development Community Stakeholder Engagement Plan for the South Lokichar Development Project presents more comprehensive and robust procedures for the development of relationships and provision of information to national and county government, local communities and other stakeholders. The SEP also addresses the issue of community engagement for the permanent land access that will be required for the Development Project. One issue raised by the Operator and by community representatives spoken to was the management of stakeholder engagement undertaken by contractors.

The activities of the Community Liaison Officers (CLOs) and Village Socialisation Officers (VSOs) were observed at a Tullow Community Resource Centre and outreach meeting. It was reported that the resource centre received 1000 visits in September with most being related to obtaining information, registering for employment and business registration. There were also 20 grievances submitted directly to the Lokichar resource centre. The resource centres seem to be a well-used and effective mechanism for disseminating information and receiving community requests and grievances for those who have ready access to them.

It is not clear at this stage the extent to which the communities fully understand what the full Development Project will entail and what effects it will have on their communities and livelihoods. Information on the next project activities is available in the resource centres and the SEM, CLOs and VSOs will have an important role in trying to communicate the scale and extent of the development over the coming months. Where required, obtaining prior and informed community consent for project development will be key to managing social impacts and conflict. The current work in engaging communities at several levels including the formal and traditional

leadership, and representatives of other community groups including women and youth seems to provide an effective model to achieve this.

## Monitoring and Review

Only a limited number of audit forms were reviewed, however, it was noted that reference is made to compliance with the ESIA which only provide broad mitigation commitments, whereas reference to specific ESMP procedures would be more appropriate to ensure compliance with the agreed and current management plans and procedures.

#### 5.3 Performance Standard 2: Labour and Working Conditions

#### 5.3.1 Project Strategy

The Operator has an overarching Human Resources (HR) and Industrial Relations (IR) system that is managed by the HR Department. HR Department has staff in the Tullow office in Nairobi and HR Officers stationed at the Kapese camp.

The Operator has developed various supporting procedures, including those currently reviewed by the IMG and outlined below.

The Operator's Employee handbook that outlines the terms and conditions of employment including:

- working hours;
- remuneration;
- annual leave;
- termination of employment; and
- code of conduct.

The Eldoret Agreements were developed by the Operator in conjunction with the Ministry of Labour, Social Services and Security, the Ministry of Energy and Petroleum, Turkana County government and the Kenya Federation of Kenya Employers. The Eldoret Agreements relate to labour and working conditions implemented by the Operator, and are applicable to all contractors.

The Eldoret Agreements stipulate Operator requirements that are also applicable to all contractors including:

- minimum wage;
- transport allowance;
- redundancy packages; and
- performance bonuses.

Although the HR Department are involved in the management of contractors, the contractor management process is largely overseen by the Contracting and Procurement (C&P) function which defines relevant contractual terms and

conditions for contractors and their workforce. In addition, contract holders within their respective departments have primary responsibility for managing contractors.

To date the IMG have reviewed the following documents relating to contractor management:

- tender evaluation procedures that outline the requirements for meeting the Operator's requirements including their Environmental, Health and Safety (EHS), technical and commercial requirements;
- contractor selection and prioritisation matrix;
- contractor procedures for local recruitment;
- contract templates outlining terms and conditions of employment, conditions of the contract, scope of work, and contractor performance management.

Review of documentation and the IMG site visit confirms that the Operator largely complies with Kenyan legislative requirements and IFC Performance Standard 2. This includes meeting the following requirements:

- development of HR policies and procedures;
- the prohibition of any forced labour and child labour;
- adequate wages; and
- safe work places and adequate health and safety procedures.

#### 5.3.2 Observations

Existing documentation reviewed <sup>(1)</sup> provides sufficient detail for the management of the workforce relating to working conditions and terms of employment including health and safety, remuneration, working hours and annual leave requirements. However within the existing systems gaps were identified primarily around systems for contractor management and the worker grievance mechanism.

Feedback from site personnel indicated that a large proportion of grievances raised are related to contractor management, mainly relating to contractor labour and working conditions. Common grievances reported are contractor delay in payment of workers, lack of contracts in place, working conditions and lack of local content representation. It was noted by Operator personnel that the Operator is currently seeking to further develop existing contracts with contractors to avoid such issues in the future. This will include incorporating comprehensive requirements on labour and working conditions.

<sup>(1)</sup> It is important to note that the IMG have requested for further documentation on labour and working conditions including evidence of the worker grievance mechanism, retrenchment procedure and examples of contractor performance reports

Another gap identified, and reported by Operator personnel is the varying capacity of contract holders to oversee and manage contractor performance.

A Grievance Mechanism exists, as well as individual contractor grievance mechanisms. There is however indications that the procedure is not fully functioning as workers route grievances through the community grievance process, and directly raise grievances with the Operator's community Grievance Officer whose primary responsibility is supposed to be engagement with external stakeholders and managing their grievances. Managing both internal (worker) and external grievances has the potential to lead to a breakdown in communication of grievances to the relevant contractor HR departments, as well as placing pressure on the community Grievance Officer's role and encouraging redundancy of the existing contractor grievance mechanisms.

The interface between the HR Department and other internal departments could be improved. Various internal departments (particularly field teams) are involved in the recruitment of workers including the Land Access department. It was noted during the field visit that the HR department is not always informed of recruitment of workers within other departments, and that recruitment of these workers does not always follow the Operator's recruitment procedures including the provision of contracts to workers.

# 5.4 PERFORMANCE STANDARD 3: RESOURCE EFFICIENCY AND POLLUTION PREVENTION

## 5.4.1 Project Strategy

The Operator has developed a framework that documents management measures that aim to minimise the adverse impacts of activities on human health and the environment as well as the sustainable use of resources. The EHS MS aligned with ISO 14001 along with HSE policy addresses, amongst other things, the prevention of pollution and protecting the physical environment. The management framework is administered by the EHS Department.

The Operator's EHS MS includes specific standards that outline procedures for the management of resources and pollution, in particular:

- Standard 2: Regulatory Compliance and Consultation;
- Standard 3: Risk Management;
- Standard 6: Operations Maintenance and Integrity;
- Standard 9: Environmental and Social Management;
- Standard 11: Incident Reporting and Investigation;
- Standard 12:Training Competency and Behaviours; and
- Standard 14: Assessment, Assurance and Improvement.

Based on observations made and evidence provided, the project strategy in relation to IFC Performance Standard 3 is outlined below.

## Consumption of Water and Energy

Water for industrial uses is currently managed through procedures in the EHS MS. Borehole water is used to supply water for drilling activities on site. These boreholes are metered and monitored for quantity and quality. Potable water supplied from boreholes is also provided to communities. A reverse osmosis plant is used to supply potable water at the main workers camp. Reusable containers for water are provided to reduce plastic waste.

Electricity is supplied through a series of diesel generators on site at well pads and the workers camp. Solar water heaters and some PVAs were observed on site.

Trucks, pick-up trucks and other vehicles are all powered by diesel engines. Fuel use is managed through fleet management processes.

#### Green House Gas Emissions

GHG emissions from the Operator's sites are calculated using industry emission factors based on monthly fuel and energy usage as well as calculated gas emissions. This information is required as part of the Operator's quarterly environmental reporting procedure (T-ESP-PRO-0001) and monthly data are reported through the Operator's on-line reporting system (known as Tullow Insight).

#### Pollution Prevention

The Operator operates a wastewater treatment plant at the workers camp that has been designed to manage domestic liquid wastes from the facility. Treated wastewater is irrigated to an adjacent area. The facility is licensed by NEMA.

The Operator manages air emissions from sources such as flaring. Flaring of natural gas may occur at well pads during well tests and well clean-ups resulting in air emissions. The EHS MS and operating procedures for flaring activities manages these risks. Vehicles and generators also emit air emissions through the combustion of diesel fuels.

Dust is generated at sites on occasion when soil surfaces are disturbed during dry periods of the year.

Noise is generated at facilities that may impact occupational safety of workers. This noise is managed through the EHS MS and standard operating procedures for safe use of plant.

#### Waste Management

The Operator has a Waste Management Plan (T-KE-ESP-PLN-0082W dated October 2015) that outlines the procedures to manage hazardous and non-hazardous wastes on-site, including management of cuttings from drilling operations. The plan includes measures for the separation, collection, storage and disposal for wastes generated by facilities. This includes measures to track wastes from generating facilities to disposal locations. Wastes are generally managed and disposed of by third party contractors. Chain-of-custody documentation is used to track wastes as they are passed between contractors for disposal. Waste management is regulated by Kenyan legislation and enforced by NEMA.

Wastes generated are separated and recycled where possible by licensed contractors. Domestic wastes are incinerated on site where possible and other wastes are managed by contractors who collect and transport the waste to appropriate facilities in Nairobi.

## Hazardous Materials Management

The storage and management of hazardous materials is undertaken according to Kenyan requirements. Hazardous wastes are transported and managed by contractors according to NEMA regulations. Drill cuttings from drilling operations using synthetic oil based drilling fluids are treated in a Thermal Desorption Unit with the residue currently transported and disposed at an approved hazardous waste disposal facility in Nairobi pending a decision on alternative usages.

All above ground storage tanks are equipped with bunding to provide secondary containment in the event of spillage. Lined sumps are installed and used to avoid spillage of hazardous substances. The Operator has established spill response procedures for all operating sites, including the availability of spill response kits. Incident Management Procedure and Guidelines (T-KE-EHS-PRO-0002) have been prepared to manage any potential discharges of hazardous materials during emergency situations. A Hazardous Waste Certificate of Disposal No 201 has been issued by NEMA.

#### Pesticides Use and Management

There is no broad programme of pesticides use. Insecticides are used in worker camps to control mosquitos.

#### 5.4.2 *Observations*

The Operator has developed EHS procedures to manage risks associated with human health, pollution and resource use as required by IFC Performance Standard 3.

Potential risks and threats are identified and well managed through the EHS MS and SSA procedures developed for the individual sites. Evidence of MOC procedures, routine auditing and compliance and training was observed, including examples of where the EHS MS operated to identify and correct deficiencies.

Appropriate licensing arrangements have been sought by the Operator and issued by the relevant Kenyan authority (NEMA). These licenses are for point source pollution sources as well as waste management and transfer. The Operator has appropriate procedures in place to identify and tack non-conformance. Examples were provided by Operator representatives of auditing procedures, including non-compliances that had triggered improvements within the EHS MS.

Site specific assessments are used to determine pollution sources and resource use for different development components. It was observed however that these assessments were broad in nature and may not reflect specific based criteria in relation to the environmental elements assessed. It was also noted that some potential pollution sources, such as roads and sediment and erosion control, were not adequately assessed.

The EHS MS is a good overarching document that provides general guidance on EHS management. Site specific EHS management plans for project components would, however, improve the management of pollution and natural resource use. Site specific EHS management plans would also improve data collection and reporting and enable different facilities to be compared over time. This would also improve auditing and compliance procedures by enabling a more quantitative assessment of performance to be undertaken.

A recording spreadsheet for Greenhouse Gas emissions has been developed by AOC and AOC will be working with the Operator to implement procedure for the collation of emissions data.

#### 5.5 PERFORMANCE STANDARD 4: COMMUNITY HEALTH, SAFETY AND SECURITY

## 5.5.1 Project Strategy

The Operator has various policies and procedures in place to manage community health, safety and security with the overall objective of aligning to the requirements of IFC Performance Standard 4 to:

- anticipate and avoid adverse impacts on the health and safety of communities from the Project; and
- ensure that the safeguarding of personnel and property is carried out in accordance with relevant human rights principles and in a manner that avoids or minimises risks to communities.

Existing Operator procedures include the management of security personnel and the protection of human rights, as well as emergency response requirements.

Documents reviewed included the following.

- Voluntary Principles on Security and Human Rights risk register.
- Security Management System.
- Training on the Voluntary Principles on Security and Human Rights.
- Draft Memorandum of Understanding for implementation of the Voluntary Principles on Security and Human Rights with the Government of Kenya.
- Kapese Site Security Plan.
- Security and Human Rights Position Brief and associated annexes including a red flags questionnaire assessment.

#### 5.5.2 *Observations*

The Operator has developed and implemented training on the Voluntary Principles for Security and Human Rights, and is proactively managing their security personnel including their interaction with external stakeholders including local communities.

The Operator has an Emergency Response Plan in place, as well as an overarching Field Evacuation Plan and basin-wide Security Plan, which is complemented by site specific evacuation and security plans respectively.

The Emergency Response Plan covers incidents on site, emergency procedures relating to project activities and medical procedures in the event of an emergency. The Emergency Response Plan does not currently include any requirements to assist or collaborate with government bodies, local communities and other key stakeholders in their preparations to respond to emergency situations.

From the documentation reviewed, there is currently no data that provides a health profile of the potentially affected communities in order to understand community exposure and risk to disease, including the potential impact of project activities on local communities such as workforce interaction with communities. It is understood that the ESIA currently being conducted will address this requirement, and will be key to developing a Community, Health, Safety and Security Management Plan.

# 5.6 PERFORMANCE STANDARD 5: LAND ACQUISITION AND INVOLUNTARY RESETTLEMENT

#### 5.6.1 Project Strategy

With regards to resettlement impacts, the Operator outlined the following objectives which are supported by existing documentation.

- At all times avoid, and where avoidance is not possible, minimise any impacts of access to land for exploration and appraisal activities on communities, their livelihoods, the environment and cultural heritage.
- Support the business to achieve exploration and appraisal success through timely and well managed land access which complies with national legislation and is in line with Performance Standard 5 principles.

The Operator has developed various procedures for any land take and resettlement impacts. Procedures have been developed and implemented for the exploration and appraisal phase of the project, and the Operator is developing a framework that is applicable for the development phase. The various procedures include:

- SSAs are used to confirm the presence of settlements, and where any land take / resettlement impacts are triggered.
- Land Access Procedure that includes the details of the SSA as well as
  various appendices that details the engagement undertaken with the
  community. This includes a letter of understanding that details the
  agreement made with the community including what the Operator is
  providing to the community in exchange for land take.
- A Land Access Framework for the development phase that outlines the
  objectives of aligning to both Kenyan legislative requirements, as well as
  IFC Performance Standard 5. The framework also outlines the process that
  will be undertaken for any resettlement impacts during the development
  phase, including details on the entitlements matrix and valuation method
  to be used.

## 5.6.2 Observations

The Operator has a well-documented procedure for undertaking temporary land take which, based on interviews with Operator personnel and selected community members, is currently meeting the requirements of the community. It is also evident that comprehensive and detailed engagement is undertaken with the affected communities.

The Land Access Procedure also ensures that the affected communities derive development benefits through the provision of local employment and community benefit projects, in line with requirements of IFC Performance

Standard 5. The community benefit projects provided range according to the needs and requests of the community, and have included provisions of boreholes, upgrade of class rooms and school dormitories.

It was noted by Operator personnel, as well as an observation made during the site visit, that the existing procedures undertaken for land take are sufficient and existing measures are appropriately scaled to the resettlement impacts. In the future it will be important to develop a strategic approach to the land take requirements of the development phase, as these are likely to be permanent and greater in number. This will include a livelihoods focused approach and understanding how livelihoods can be restored and / or diversified as a result of any resettlement impacts. The existing Land Access Framework outlines these requirements.

A gap within the existing Land Access Procedure regarding documentation of Free, Prior and Informed Consent (FPIC) was identified. It is important to note that elements of the FPIC are currently being undertaken, as the Operator already undertakes detailed engagement when seeking the consent of the affected community during the land access process. However the existing documentation does not formalise or reference the FPIC process, and identify that obtaining community consent is a key objective of the procedures. In addition, although community sign-off is documented in the letter of understanding there is currently no documentation (1) of the full engagement process undertaken to achieve community consent, as well as confirming that the affected community are informed and understand the FPIC process. Documentation of the engagement process should also include an explanation and documentation of the various parties involved in reaching consent, including community representatives.

# 5.7 PERFORMANCE STANDARD 6: BIODIVERSITY AND SUSTAINABLE MANAGEMENT OF LIVING RESOURCES

## 5.7.1 Project Strategy

The Operator has undertaken several assessments and developed management procedures that are relevant to the conservation of biodiversity and management of natural resources.

An ESIA has been undertaken for the 3D Seismic Survey in Block 10BB (2012). This document provides an overview of the biodiversity values of the Development Project area and a description of probable risks and impacts as a result of project activities.

<sup>(1)</sup> It is acknowledged that records of engagement, including those undertaken for land access may exist within the Social Performance Department, however those relating to land access should also be documented within the Land Access Department, and may require coordination between both Departments.

A Critical Habitat Screening and Assessment for the Lokichar Upstream Development has also been prepared by Golder Associates as part of the ESIA scoping phase. This assessment applies the critical habitat criteria within IFC Performance Standard 6 to the AOI of the project. The assessment has identified potential critical habitat triggers at a broad landscape level based on modelled data for species of conservation significance. In developing the assessment, some stakeholder engagement has also occurred.

SSAs consider some biodiversity value when defining environmental impacts and mitigations. This includes the identification of habitat values and resources and the presence or absence of species of conservation significance. A Biodiversity Management Plan (T-KE-EHS-PLN-0015) for broader Kenyan operations that includes the identification and mitigation measures or the management of invasive species has also been prepared by the Operator.

The Operator has developed procedures for the restoration of sites following completion of project activities. These procedures are outlined in the document TKBV Decommissioning and Restoration Guidance and the Reinstatement and Restoration Plan (T-KE-EHS-PLN-0009). These activities include actions to level the site, re-seed and re-plant native species within disturbed areas. UK-based Kew Gardens has been engaged in discussion to provide advice on restoration activities.

The Operator has started discussions with local NGOs regarding the possible establishment of conservancies within the AOI. The purpose of these conservancies is primarily to improve governance and coordination in management of resources; improve security, promote peace-building, and strengthen existing and promote further diversification/resilience of livelihoods. Potential additional benefits of this approach include improving natural resource use and productivity, and biodiversity conservation.

## 5.7.2 *Observations*

An ESIA for the South Lokichar Development Project is currently being prepared. The observations below are based on current status, however, it is understood that the Development Project ESIA is likely to assist compliance with the requirements of IFC Performance Standard 6.

Some relevant information is available within the 2012 Block 10BB ESIA documents and the Critical Habitat Screening Assessment however, the review of documentation provided has shown that a comprehensive baseline assessment of biodiversity and ecosystem services has not been undertaken to date that would satisfy the requirements of IFC Performance Standard 6.

Up-to-date baseline data should be collected on species of conservation significance within the AOI to inform the Critical Habitat assessment. The Available data does not provide sufficient spatial definition within the Development Project area to define whether project activities would impact on Critical Habitats.

The identification of modified and natural habitats as required by IFC Performance Standard 6 has not been undertaken within the Development Project AOI. A comprehensive and defensible assessment is necessary to enable the Operator to have sufficient data to apply the mitigation hierarchy and determine necessary management measures to achieve a no-net-loss or net-gain (for any Critical Habitats) of biodiversity values.

A specific assessment of Ecosystem Services has not been undertaken to define the provisioning, regulating and cultural ecosystem services relied on by people within the AOI. Some relevant information is contained within the ESIA (2014) and other supporting social assessment documentation has been collected.

Some definition of mitigation measures have been demonstrated within the previous Block 10BB (2012) ESIA and within the Operator EHS MS. However, the application of the mitigation hierarchy within IFC Performance Standard 6 requires, as an outcome, the demonstration of appropriate avoidance and mitigation measures. Mitigation measures should reduce overall impacts to biodiversity and be specific to predicted impacts. This will assist demonstration of compliance with the required no-net-loss or net gain goals.

Mitigation measures for the restoration of disturbed areas have been developed and are currently being implemented as part of the ESMP. These protocols include measures to reshape the land surface and seed/replant native vegetation. Experts from Kew Gardens have been engaged in discussions to provide scientific advice on restoration activities in the ESMP. The adequacy of the protocols and the requirements in the ESMP should be reviewed to incorporate best practice techniques for restoration, relevant success criteria, monitoring protocols, and mechanisms for continual improvement and contingency.

#### 5.8 Performance Standard 7: Indigenous Peoples

## 5.8.1 Project Strategy

One of the requirements of IFC Performance Standard 7 is the application of FPIC in specific circumstances, *ie*, project impact on land and natural resources subject to traditional ownership or customary use, resettlement (economic and / or physical displacement) from land and natural resources subject to traditional ownership or customary use and impacts on cultural heritage. The objective of FPIC is to build on and expand the process of Informed Consultation and Participation (ICP). FPIC should be established through good faith negotiation between the Operator and affected communities.

It is important that during the FPIC process the Operator documents the mutually accepted process with the affected community, as well as providing

evidence of the agreement between both parties as the outcome of the negotiations.

The Operator has existing procedures in place (in relation to securing land access during the exploration and appraisal phase) that capture elements of the FPIC process, including the activities that are undertaken during any land access procedures. In addition, the pre-development community SEP outlines the requirements and objectives of conducting FPIC.

#### 5.8.2 Observations

The existing activities that are undertaken as part of the Land Access Procedure capture many of the elements of an FPIC process. It was also observed that the Operator's Land Access Team are conducting detailed engagement activities with affected communities to ensure their participation and agreement on the land access process, and subsequent negotiation process.

Although the Land Access Team is engaging with affected communities, the existing procedure does not reference the objectives and requirements to undertake FPIC. In addition although there is documentation of the final agreement made between the Operator and affected community for temporary land take, the Land Access Team do not currently document the entire engagement and negotiation process including detailing community feedback during the engagement process, as well as including details on key community members involved in the negotiation and consent process.

#### 5.9 Performance Standard 8: Cultural Heritage

## 5.9.1 Project Strategy

The objective of IFC Performance Standard 8 is to ensure that cultural heritage is protected from the adverse impacts of project activities, and to support the preservation of cultural heritage.

In line with the objectives of Performance Standard 8 the Operator has procedures in place for the protection of cultural heritage, as well as to manage any impacts to cultural heritage as a result of Project activities. The site specific assessment reports identify the requirement for a member of National Museums of Kenya (NMK) and Turkana Basin Institute (TBI) to participate in the SSA and subsequently be available during any land access activities where cultural heritage is identified.

#### 5.9.2 Observations

The Operator has cultural heritage management measures in place that include an overarching Cultural Heritage Management Plan, as well as the development of site specific Cultural Heritage Management Plan when

required. The need for development of a Cultural Heritage Management Plan is identified through SSAs where key issues of accessing new land are identified, including any potential impacts to cultural heritage. During the preparation of the SSA, the Operator works with NMK and TBI who are responsible for assessing the area, confirming the presence of cultural heritage resources, and implementing the necessary management measures to protect cultural heritage resources.

Although overarching management measures are in place, the site specific assessment is not being applied to road development activities and as such no determination of the need for a Cultural Heritage Management Plan is made.

#### 6 CONCLUSIONS

## 6.1 ESAP REQUIREMENTS

An assessment of AOC progress with ESAP requirements and recommendation is provided in *Chapter 4* identifying those actions that have been completed and those that are in progress. A discussion on progress is provided against each ESAP item. As the delivery date for the majority of the ESAP items are within the next review period the status of each item will be reviewed at that time.

Recommendations have been made regarding the development of AOC's HSEC management systems and associated plans, procedures and guidelines, and for IFC review of the Operator's South Lokichar Development ESIA as it develops to ensure that it will address the requirements of the Performance Standards.

## 6.2 IFC PERFORMANCE STANDARDS REQUIREMENTS

An assessment of the Operator's performance with the IFC Performance Standards is provided in *Chapter 5*.

The assessment criteria applied to issues identified in the review are divided into 'Observations' where it is considered that improvements can be made and 'Non-Conformances' where there is an actual impact or likely impact to receptors and resources.

The Operator is actively managing the risks and potential impacts identified through previous ESIAs and more importantly through direct experiences during the exploration and appraisal phases where there were significant issues, not least with community relationships. It has strengthened its capability and capacity and now has a strong team in place and is developing a comprehensive set of management plans and procedures for the development phase. Positive results of the renewed approach to HSE and community issues are already evident in the field.

Overall the Operator's current activities are considered to meet the requirements of the IFC Performance Standards. There are no current non-conformances or situations judged to have had significant impacts, or present an immediate risk of impact, to receptors or resources that require corrective action.

A series of recommendations have been made to address were performance could be improved to address observations.

*Table 6.1* present the recommendations made following the assessment of the Operators activities against each of the IFC Performance Standards. Each item has been assigned a code to allow for tracking during future IMG reviews ('Rev1' refers to the first IMG review and each recommendation is number sequentially by Performance Standard).

The rating (Observation or Non-conformance) and the current status (Open, In Progress or Closed) of each recommendation is also provided.

#### 6.3 RECOMMENDATIONS FOR NEXT REVIEW

In the current schedule there are no site-based activities planned for Block 9 in Kenya and the Rift Basin Area Block and South Omo Block in Ethiopia over the next six month review period. Focus of the next review should continue to be on the South Lokichar Basin and Block 12A activities (depending on activities being undertaken at that time).

As the South Lokichar Development Project ESIA progresses and the operator develops, finalises and implements new ESMPs, procedures and guidance then the next IMG review needs to look more closely at the detail of systems, plans, procedures and guidance to assess the applicability and effectiveness of the measures and the corrective actions taken. This will include an assessment of progress against the recommendations presented in this first IMG review with items being closed, left open or amended, depending of the project activities and schedule.

A review of previous internal and external audits, incident reports and grievances received over the previous review period would also be undertaken.

There is also a need to seek more detailed community views from smaller focus groups in areas that may be affected by the project to understand the level of awareness of the development Project and emerging issues and concerns.

 Table 6.2
 Evaluation of IFC Performance Standard Requirements

| Index       | Category  | Action  | Rating         | Status | Timing |
|-------------|---|---|----------------|--------|--------|
| Performance | Standard 1 Assessment and M                       | Management of Environmental and Social Risks and Impacts            | -              | •      |        |
| Rev1-PS1-1  | Environmental and Social                          | AOC should organise EHS policy, plans and procedures into an        | Recommendation | Open   | Next 6 |
|             | Assessment Management                             | EHS Management System. This should start with review and            |                |        | month  |
|             | Systems, Policy,                                  | update of documentation and finalisation and control (assigned      |                |        | Review |
|             | Identification of Risks and                       | document numbers, dated, signed off). A comprehensive EHS           |                |        |        |
|             | Impacts, and Management                           | document register listing the in-date controlled documents, the     |                |        |        |
|             | Programmes  | planned review cycle and the status of supporting documents         |                |        |        |
|             |   | would be a first step in this process.                              |                |        |        |
| Rev1-PS1-2  | Organisational Competency,                        | The current Tullow team is managing the issues associated with      | Recommendation | Open   | Next 6 |
|             | Capacity and Training                             | on-going activities well, however, increased capacity and on-going  |                |        | month  |
|             |   | training is recommended for the more intensive activities during    |                |        | Review |
|             |   | the Development Project.  |                |        |        |
| Rev1-PS1-3  | Emergency Preparedness and                        | Community engagement as part of the SSA procedure is                | Recommendation | Open   | Next 6 |
|             | Response  | recommended to inform communities of risks where accidents          |                |        | month  |
|             |   | and emergencies may occur, potential impacts and response           |                |        | Review |
|             |   | procedures, including community communication. This should be       |                |        |        |
|             |   | extended to cover potential road transport incidents and other      |                |        |        |
|             |   | offsite emergencies.  |                |        |        |
| Rev1-PS1-4  | Stakeholder Engagement,                           | Outcomes of future SSAs undertaken for site specific activities     | Recommendation | Open   | Next 6 |
|             | Disclosure of Information and Grievance Mechanism | should be disclosed to neighbouring communities and other           |                |        | month  |
|             | ana Grievance Niechanism                          | stakeholders with an interest in EHS issues.                        |                |        | Review |
|             |   | The Grievance Mechanism for contractors needs to be improved        |                |        |        |
|             |   | and communicated to all contractor employees.                       |                |        |        |
| Rev1-PS1-5  | Monitoring and Review                             | Refinement of auditing and compliance procedures should be          | Recommendation | Open   | Next 6 |
|             |   | considered to be more measurable and evidence based. Based on       |                |        | month  |
|             |   | improved criteria included in SSAs and site specific EHS MPs,       |                |        | Review |
|             |   | auditing and compliance assessments could move to a measurable      |                |        |        |
|             |   | and evidence based approach, reducing subjective judgments on       |                |        |        |
|             |   | compliance.   |                |        |        |
| Performance | Standard 2 Labour and Work                        | ing Conditions  |                | •      |        |
| Rev1-PS2-1  | Contractor Management and                         | Training sessions should be provided to contractor holders to       | Recommendation | Open   | Next 6 |
|             | Monitoring  | ensure that contract holders have the capacity and resources        |                |        | month  |
|             |   | required to manage and monitor contractor performance.              |                |        | Review |
|             |   | Training should include an identification of any gaps in capability |                |        |        |
|             |   | to manage contractors, as well as development of measures           |                |        |        |

| Index       | Category                    | Action  | Rating         | Status | Timing |
|-------------|-----------------------------|---|----------------|--------|--------|
|             |                             | required to fill these gaps.  |                |        |        |
|             |                             |   |                |        |        |
|             |                             | Existing contractual agreements should be reviewed to ensure that     |                |        |        |
|             |                             | contractor performance requirements are captured within the           |                |        |        |
|             |                             | agreements, as well as detailing corrective measures that may be      |                |        |        |
|             |                             | required to address any non-compliance.                               |                |        |        |
| Rev1-PS2-2  | Formalisation of Worker     | Worker Councils should be formed to represent the different           | Recommendation | Open   | Next 6 |
|             | Grievance Mechanism         | contractors, and provide a functional worker grievance                |                |        | month  |
|             |                             | mechanism.  |                |        | Review |
| Rev1-PS2-3  | Internal Communication      | Develop and formalise a procedure to ensure that there is internal    | Recommendation | Open   | Next 6 |
|             | Procedure                   | communication and feedback between the various internal               |                | _      | month  |
|             |                             | departments and the HR Department. The procedure should               |                |        | Review |
|             |                             | include requirements for all departments to notify the HR             |                |        |        |
|             |                             | department of any planned recruitment. Use of the Monday              |                |        |        |
|             |                             | morning briefing meetings was recommended as one of the               |                |        |        |
|             |                             | mechanisms to inform the HR Department of any planned                 |                |        |        |
|             |                             | recruitment.  |                |        |        |
| Performance | Standard 3 Resource Efficie | ncy and Pollution Prevention  |                |        |        |
| Rev1-PS3-1  | Site Specific EHS           | General EHS MPs have been developed for waste; water; air; OHS;       | Recommendation | Open   | Next 6 |
|             | Management Plans            | and emergencies on site; however these plans have not been            |                |        | month  |
|             |                             | tailored for specific sites or operations. Site specific EHS MPs for  |                |        | Review |
|             |                             | each well pad, camp and other significant infrastructure would        |                |        |        |
|             |                             | enable specific risks to be identified and managed at a site specific |                |        |        |
|             |                             | level.  |                |        |        |
| Rev1-PS3-2  | SSA Criteria                | To enable a more rigorous and evidence based assessment of site       | Recommendation | Open   | Next 6 |
|             |                             | specific environment, health and safety requirements,                 |                | _      | month  |
|             |                             | recommendations have been made to improve the SSAs.                   |                |        | Review |
|             |                             | •   |                |        |        |
|             |                             | The SSA procedures should include road design criteria to apply       |                |        |        |
|             |                             | when developing the road network. Given the level of ground           |                |        |        |
|             |                             | disturbance likely from road construction and maintenance, site       |                |        |        |
|             |                             | specific guidance and criteria should be developed for the road       |                |        |        |
|             |                             | network.  |                |        |        |
| Rev1-PS3-3  | Measurable HSE              | Expansion of the existing SSA questionnaire based approach to         | Recommendation | Open   | Next 6 |
| 1.0.11000   | Components                  | include measurable environmental and health based components          |                | o p cm | month  |
|             | .1                          | should be developed. This will also enable compliance against         |                |        | Review |
|             |                             | criteria to be more easily demonstrated.                              |                |        |        |
|             |                             | chiefa to be more cashy acmonstrated.                                 |                |        |        |
|             |                             |   |                |        |        |
|             |                             |   |                |        |        |

| Index       | Category                    | Action  | Rating         | Status | Timing |
|-------------|-----------------------------|---|----------------|--------|--------|
| Rev1-PS3-4  | Sediment Erosion Control    | A sediment and erosion control plan should be developed to relate | Recommendation | Open   | Next 6 |
|             |                             | to project activities and linked to the SSA procedures. Although  |                |        | month  |
|             |                             | erosion and subsequent water pollution is likely only to occur    |                |        | Review |
|             |                             | during infrequent high rainfall events, measures should be made   |                |        |        |
|             |                             | to reduce soil erosion damage to infrastructure, especially roads |                |        |        |
|             |                             | and drill pads.   |                |        |        |
| Rev1-PS3-5  | Greenhouse Gas Emissions    | A procedure for the collation and reporting of greenhouse gas     | Recommendation | Open   | Next 6 |
|             |                             | emissions should be prepared.                                     |                | -      | month  |
|             |                             |   |                |        | Review |
| Performance | Standard 4 Community Heal   |   |                | •      |        |
| Rev1-PS4-1  | Emergency Response Plan     | Update the existing Emergency Response Plan to include            | Recommendation | Open   | Next 6 |
|             |                             | consideration of responding to emergency situations, taking the   |                |        | month  |
|             |                             | community and local authorities into account. This will involve   |                |        | Review |
|             |                             | engagement with relevant communities and government bodies        |                |        |        |
|             |                             | on the types of potential emergency situations, measures required |                |        |        |
|             |                             | to manage an emergency situation, and the required resources and  |                |        |        |
|             |                             | responsibilities required to responds to emergency situations.    |                |        |        |
|             |                             | Updates to the Emergency Response Plan should be documented,      |                |        |        |
|             |                             | and disclosed to local communities, as well as relevant           |                |        |        |
|             |                             | government bodies (eg, emergency services, healthcare facilities  |                |        |        |
|             |                             | and police).  |                |        |        |
| Performance | Standard 5 Land Acquisition | and Involuntary Resettlement                                      |                | •      |        |
| Rev1-PS5-1  | Free Prior and Informed     | Formalise the FPIC process and incorporate this into the existing | Recommendation | Open   | Next 6 |
|             | Consent for Land Access     | Land Access Procedure, as well as the Land Access Framework for   |                |        | month  |
|             |                             | the development phase. This should clearly outline the objectives |                |        | Review |
|             |                             | and activities required to achieve FPIC.                          |                |        |        |
|             |                             | Implementation of the FPIC process should be documented and       |                |        |        |
|             |                             | provide evidence of the agreement between the two parties on the  |                |        |        |
|             |                             | outcome of the negotiation.                                       |                |        |        |
| Performance | Standard 6 Biodiversity Con | servation and Sustainable Management of Living Natural Resources  |                |        |        |
| Rev1-PS6-1  | Baseline Biodiversity and   | A comprehensive baseline assessment is required to define the     | Recommendation | Open   | Next 6 |
|             | Habitat Assessment          | biodiversity values that are likely to be present within the AOI  |                | -      | month  |
|             |                             | and specifically the Development Project area. The baseline       |                |        | Review |
|             |                             | assessment should focus on species of conservation significance   |                |        |        |
|             |                             | and their habitats.   |                |        |        |
|             |                             | A spatial assessment of the distribution of Natural and Modified  |                |        |        |
|             |                             | 11 Spanar assessment of the distribution of Inatural and Modified |                |        |        |

| Index      | Category                  | Action  | Rating         | Status | Timing |
|------------|---------------------------|---|----------------|--------|--------|
|            |                           | Habitats within the AOI and Development Project area is               |                |        |        |
|            |                           | required. This assessment should define and justify the criteria      |                |        |        |
|            |                           | used to spatially define the extent of natural and modified           |                |        |        |
|            |                           | habitats.   |                |        |        |
|            |                           | Using the updated baseline assessment and the definition of           |                |        |        |
|            |                           | natural and modified habitats, critical habitat triggers should be    |                |        |        |
|            |                           | screened and assessed for the AOI and Development Project area.       |                |        |        |
| Rev1-PS6-2 | Ecosystem Services        | In conjunction with the social assessment being undertaken as         | Recommendation | Open   | Next 6 |
|            | Screening                 | part of the Development ESIA process, screening of ecosystem          |                |        | month  |
|            |                           | services relevant to the Development Project area should be           |                |        | Review |
|            |                           | undertaken. Where necessary, additional baseline data should be       |                |        |        |
|            |                           | collected.  |                |        |        |
| Rev1-PS6-3 | Conservation Significance | Based on the spatial definition of natural, modified and critical     | Recommendation | Open   | Next 6 |
|            | Mitigation                | habitats and data in relation to the distribution and utilisation of  |                |        | month  |
|            |                           | species of conservation significance within the AOI, the mitigation   |                |        | Review |
|            |                           | hierarchy should be applied to the likely Development Project         |                |        |        |
|            |                           | area. Specific mitigation measures should be developed to limit       |                |        |        |
|            |                           | impacts on species of conservation significance and their habitats.   |                |        |        |
|            |                           | Following application of the mitigation hierarchy, any residual       |                |        |        |
|            |                           | impacts on biodiversity values and ecosystem services should be       |                |        |        |
|            |                           | measured using an appropriate metric to demonstrate compliance        |                |        |        |
|            |                           | with no-net-loss or net gain goals. If required, biodiversity offsets |                |        |        |
|            |                           | can be considered to assist in achieving the goals. Consultation      |                |        |        |
|            |                           | with relevant stakeholders such as government agencies and            |                |        |        |
|            |                           | NGOs should be undertaken as required.                                |                |        |        |
|            |                           | Mitigation measures defined during the application of the             |                |        |        |
|            |                           | mitigation hierarchy should be outlined and incorporated into the     |                |        |        |
|            |                           | EHS MP and site specific EHS MPs                                      |                |        |        |
| Rev1-PS6-4 | Biodiversity Action Plan  | If Critical Habitat is identified and impacted by the project, a      | Recommendation | Open   | Next 6 |
|            |                           | Biodiversity Action Plan should be prepared in relation to the        |                |        | month  |
|            |                           | management of any critical habitats by the Operator.                  |                |        | Review |
| Rev1-PS6-5 | Invasive Species          | The existing invasive species management list contained in the        | Recommendation | Open   | Next 6 |
|            | Management                | broader Kenyan Biodiversity Management Plan should be                 |                |        | month  |
|            |                           | updated to relate to site-specific requirements and incorporated      |                |        | Review |
|            |                           | into the EHS MP and site specific EHS MPs.                            |                |        |        |
|            |                           |   |                |        |        |

| Index       | Category                     | Action   | Rating         | Status   | Timing   |
|-------------|------------------------------|--|----------------|----------|----------|
| Rev1-PS6-6  | Decommissioning and          | The Decommissioning and Restoration Guidance and                     | Recommendation | Open     | Next 6   |
|             | Restoration                  | Reinstatement and Restoration Plan should be refined based on        |                |          | month    |
|             |                              | the outcomes of the ESIA process and advice from technical           |                |          | Review   |
|             |                              | specialists  |                |          |          |
| Rev1-PS6-7  | Supply Chain Sustainability  | An assessment of the supply chain to determine the sustainability    | Recommendation | Open     | Next 6   |
|             | Assessment                   | of Natural Resources supplied should be undertaken.                  |                |          | month    |
|             |                              |  |                |          | Review   |
| Rev1-PS6-8  | Monitoring and Evaluation    | Monitoring and evaluation criteria should be defined and             | Recommendation | Open     | Next 6   |
|             | Criteria                     | incorporated into the EHS MS; site specific plans, BMP (if           |                |          | month    |
|             |                              | required) and relevant revised restoration plans.                    |                |          | Review   |
| Performance | Standard 7 Indigenous Peopl  | le   | 1              | <u>'</u> | <b>-</b> |
| Rev1-PS7-1  | Free Prior and Informed      | It is recommended that the Operator formalise requirements to        | Recommendation | Open     | N/A Next |
|             | Consent for Land Access      | undertake FPIC through the revision of the Land Access               |                |          | 6 month  |
|             |                              | procedures to reflect FPIC requirements. The implementation of       |                |          | Review   |
|             |                              | FPIC should ensure that the following is achieved and                |                |          |          |
|             |                              | documented:  |                |          |          |
|             |                              | engagement and negotiation processes including                       |                |          |          |
|             |                              | documentation of key milestones, agreements and feedback             |                |          |          |
|             |                              | from the affected community;   |                |          |          |
|             |                              | detail of the community members involved in the FPIC                 |                |          |          |
|             |                              | process; and   |                |          |          |
|             |                              | ensuring that the affected community are fully informed of           |                |          |          |
|             |                              | the land access process, and objectives of FPIC.                     |                |          |          |
| Performance | Standard 8 Cultural Heritage | 2  |                |          | -        |
| Rev1-PS8-1  | Cultural Heritage Training   | Maintain relevant training requirements for field staff that will be | Recommendation | Open     | Next 6   |
|             |                              | responsible for the management of impacts to cultural heritage       |                |          | month    |
|             |                              | resources. This will involve working with the necessary teams in     |                |          | Review   |
|             |                              | the field to ensure that cultural heritage management measures       |                |          | N/A      |
|             |                              | are in place, and implemented when necessary.                        |                |          |          |

## Annex A

IMG Review Schedule

7-12 December 2015

## IMG REVIEW VISIT PROGRAMME

| Monday 7 <sup>th</sup> December 2015 |                                       |   |  |
|--------------------------------------|---------------------------------------|---|--|
| TIME                                 | ACTIVITY                              | REMARKS/ACTION                            |  |
| 0800hrs                              | AOC ESG Discussion. Attendees (IMG,   | Kempinski Hotel                           |  |
| Duration: 2hrs                       | IFC, AOC, Helios)                     |   |  |
| 1030hrs                              | Arrival at Tullow offices.            | Tullow Leading                            |  |
| 1100hrs Duration: 15min              | Introduction                          | Robert Gerrits/Alex Budden<br>Tullow /AOK |  |
| 1115hrs Duration: 30min              | Overview of Tullow Kenya              | Rob Gerrits - Tullow                      |  |
| 1145hrs Duration: 15 min             | Overview of Turkana Operations        | Rob Gerrits - Tullow                      |  |
| 1200hrs Duration: 30 min             | Environment                           | Alex Mutiso - Tullow                      |  |
| 1230hrs Duration: 30min              | Security                              | Sean McMurtry - Tullow                    |  |
| 1400hrs Duration: 30 min             | Health and Safety                     | Gordon Scott -Tullow                      |  |
| 1430hrs Duration: 45min              | Stakeholder Engagement                | Rosie Birungi – Tullow                    |  |
| <b>1515hrs</b> Duration: 45min       | Land Access                           | Susan Muchiri - Tullow                    |  |
| 1600hrs Duration: 30min              | National Content                      | Susan Munyori - Tullow                    |  |
| 1630hrs Duration: 30min              | Human Resources                       | Edward Mungatana - Tullow                 |  |
| 1700hrs Duration: 30min              | Upstream ESIA and Development Project | Alex Mutiso/Paul Mowatt -<br>Tullow       |  |

| Tuesday 8 <sup>th</sup> December 2015 |   |  |  |  |
|---------------------------------------|---|--|--|--|
| TIME                                  | ACTIVITY  | REMARKS/ACTION                             |  |  |
| 090hrs                                | Depart for Kapese   | • Flight DH8 -200 operated by DAC Aviation |  |  |
|                                       |   | •  |  |  |
| 1100hrs                               | Pre-Lunch Introduction Meetings                                     | Tullow Leading                             |  |  |
| Duration: 4 hrs                       | <ul><li>Field Operations Manager</li><li>Field SP Manager</li></ul> |  |  |  |

## IMG REVIEW VISIT PROGRAMME

|                         | <ul> <li>EHS</li> <li>Asset Protection</li> <li>National Content</li> <li>Grievance Officer</li> <li>Field Communications</li> </ul>  |   |                |
|-------------------------|---|---|----------------|
| 1400hrs Duration: 4 hrs | <ul> <li>Continuation of Tullow Programme.</li> <li>Kapese IOB Tour</li> <li>Visit to Lokichar TCR and EDC</li> <li>EDC training session by Equity Bank and local Business</li> <li>Meeting with field Communications</li> <li>Possible to include session with CSOs and/or local government</li> <li>Lokichar tour</li> <li>Return to camp and continuation of discussion</li> </ul> | • | Tullow Leading |

| Wednesday 9 <sup>th</sup> December 2015 |  |                |  |  |  |
|---|--|----------------|--|--|--|
| TIME                                    | ACTIVITY   | REMARKS/ACTION |  |  |  |
| 0800hrs Duration: 5 hrs                 | Tullow programme continues  Etom Well Drilling  Etom Land Access  Etom Engagement/Outreach Meeting | Tullow Leading |  |  |  |
| 1400hrs Duration: 4 hrs                 | Tullow Programme Continues  • Twiga Drill Site   | Tullow Leading |  |  |  |

| Thursday 10 <sup>th</sup> December 2015 |   |  |  |  |  |
|---|---|--|--|--|--|
| TIME                                    | ACTIVITY  | REMARKS/ACTION                             |  |  |  |
| 0800hrs  Duration: 5hrs                 | <ul> <li>Tullow Programme Continues</li> <li>Social Investment project – completed Lokicheda primary School</li> <li>Ngamia Camp (reclamation)</li> <li>Ngamia EWT (tank farm as activities will have ceased)</li> <li>Ekales GGS Camp (reclamation)</li> </ul> | Tullow Leading                             |  |  |  |
| 1500hrs                                 | Return flight from Kapese   | • Flight DH8 -200 operated by DAC Aviation |  |  |  |

| Friday 11 <sup>th</sup> December 2015 |                        |                  |  |  |  |
|---------------------------------------|------------------------|------------------|--|--|--|
| TIME                                  | ACTIVITY               | REMARKS/ACTION   |  |  |  |
| 1300hrs                               | Debrief and Discussion | Alex/IMG Leading |  |  |  |
| Duration: 4 hrs                       |                        |                  |  |  |  |

## Annex B

List of Documents Provided Relevant to the South Lokichar Development Project

| TOPIC               | DOCUMENT  |
|---------------------|---|
| Development Project | Upstream Component Scoping Study 29April15 Master   |
| ESIA                | Critical Habitat Screening and Assessment   |
|                     | Upstream Component Lokichar Critical Habitat Screening Report March2015   |
|                     | Draft Stakeholder Engagement Plan November2014  |
|                     | Pipeline PR Rev 0 17 Apr 15 Draft   |
|                     | Pipeline SEP Rev 4 17 Apr 15 Draft  |
|                     | Terminal ESIA Draft SEP and Tactical Plan Rev03 280415  |
|                     | Terminal ESIA Project Report_Rev01_170415 Draft   |
|                     | Tullow Kenya BV Indigenous Peoples Applicability Assessment Method 12091  |
| SEA                 | ITT-TKEN10000XX - Attachment A1 Scope of Work UPSTREAM BASIN  |
|                     | J051-ILFM-AD-0011-Final Report Rev0 Hoima-Lokichar-Lamu Crude Oil Pipeline  |
|                     | J051-ILFM-AD-0033-Scoping_Study (Pre-ESIA Uganda) Rev1 Hoima-Lokichar-Lamu Crude Oil Pipeline                                       |
|                     | J051-ILFM-AD-0034-Scoping_Study (Pre-ESIA Kenya) Rev1 Hoima-Lokichar-Lamu Crude Oil Pipeline  |
|                     | Lake Turkana Development Plan SEA Decision Assistance Tool Final[1]   |
|                     | Lake Turkana Development Plan SEA Report -Final July 2014 [1]   |
|                     | RSK Route Report  |
| Block 10 BA & BB    | 10BA Drilling ESIA Report Final 27 01 14  |
|                     | Block 10 BB 3D Seismic EIA Report Final 27 1  |
|                     | Block 10BA SIA REPORT 2014 FINAL 1 (2)  |
| Block 12A           | ESIA for the Proposed Exploratory Drilling Project in Block 12A - Background Information and Invitation for Stakeholders to Comment |
|                     | Community Grievance Mechanism and Resolution Procedure31July  |
|                     | County and Community TKBV Presentation  |
|                     | ESIA Study for proposed Drilling in Block 12A   |
|                     | Issues & Response Register  |
|                     | Understanding oil and gas lifecycle Posters   |
|                     | Baringo MPs meeting Register  |
|                     | ESIA of the proposed exploratory drilling of block 12A - Questionnaire for Households   |
|                     | T-EHS-STD-0013 EHS Management Standards   |
| EHS                 | Drill cuttings management status April 2015   |
|                     | Kenya 2014 EHS Objective Tracker  |
|                     | T-KE-EHS-POL-0001 - Environmental Health and Safety Policy signed off   |
|                     | T-SEA-POL-0003  |
|                     | Tullow Harm Index   |
|                     |   |

| TOPIC       | DOCUMENT   |
|-------------|--|
| EHS         | 04-10-15 PTW Complex Lift  |
|             | 06-10-2015 Amosing 5 Marriott rig 46 Environmental & Waste Management Audit              |
|             | 09.12.15 Trip Waste Transfer Manifest  |
|             | Cultural Heritage Management Procedure Final 09 06 14.                                   |
|             | Decommissioning of Lowoidapal 3D seismic survey base camp and seismic cut lines          |
|             | Emex 3254 Incident Investigation Report Amosing Environmental Spill during flaring FINAL |
|             | Engomo Atlas Decommissioning Audit Rev 02 AM 26 08 15 Final                              |
|             | Engomo Wellpad Restoration Signoff TAI   |
|             | ENGOMO-1 WELL DRILLING SITE & ATLAS CAMP DECOMMISSIONING AUDIT REPORT 2015               |
|             | Hazardous Waste Certificate of Disposal No 201   |
|             | Nature Systems NEMA Discharge License WWTP   |
|             | Kenya EHS Org Chart 2015 Projection  |
|             | Kenya EHS Org Chart Projection 2016  |
|             | Marriott Rig 46 EHS Assurance Inspection Record  |
|             | MOC EHS plan TKBV 2015001 (2)  |
|             |  |
|             | TKBV Decommissioning and Restoration Guidance Rev 0 AM 26.01.15                          |
|             | T-KE-EHS-PLN-XXXX TKBV Decommissioning and Restoration Plan R0 14 Oct 2014               |
|             | TKBV Waste Management Plan October 2015 Final  |
|             | T-KE-EHS-PLN-0009_TKBV Reinstatement and Restoration Plan                                |
|             | T-KE-EHS-PLN-0015 – Biodiversity Management Plan Alien Invasive Species Register         |
|             | T-KE-EHS-PLN-0033 TKBV Tiered EHSS Assurance Plan Rev 3                                  |
|             | T-ESP-PRO-0001 Tullow Quarterly Environmental Reporting Procedure. Rev 0 2015.           |
|             | T-KE-EHS-PRO-0002 - Incident management procedure v10 (2)                                |
|             | T-KE-EHS-STF-0030 - MOC Audit Form v1  |
|             | T-SNE-STD-0002 MOC   |
|             | T-KE-EHS-PRO-0024 Cultural Heritage Management Procedure                                 |
|             | SSA Report Etom B_NMK  |
|             | Well Site Restoration and Waste Management Tracker October 2015                          |
|             | Wells Restoration Works Status   |
| Land Access | 12A Land Document Pt 1 Title validation report for Cheptuket Block 12A Lead prospect     |
|             | Analysis of valuation and negotiation Cheptuket  |
|             | Ekales-2 - Site Specific Assessment- Scouting Report                                     |
|             | Extract from Land Access Procedure for E&A - SSA Scouting - Jan 2015                     |
|             | LA Procedure ALL Appendices 190115   |
|             | T-KE-ESP-PRO-0004 -Land Access Procedure for EA - Jan 2015                               |
|             | LAF for Development Phase Draft V2 - 31.10.15  |
|             | Turkana social structures and land - 160315 v2   |
|             | LAF for Development Phase Draft V2 - ANNEXES - 31.10.15                                  |

| TOPIC                      | DOCUMENT  |
|----------------------------|---|
| Security & Human<br>Rights | 140915-Tullow Draft MOU - Voluntary Principles and Human Rights - 120092014 EMFJ final comments                   |
|                            | 150417-Conflict Risk Assessment and Management- Position Brief  |
|                            | Community Perception on Conflict, Conflict Mitigation and Security in Turkana and Pokot Regions Small Arms Survey |
|                            | 150421-TKBV Security and Human Rights- Position Brief   |
|                            | Responsible Business Assessment, Tullow Oil - Final Report, December 2014   |
|                            | T-KE-HSS-PLN-0041-13T Kapese Site Security Plan   |
|                            | 140820- 10BB13T Lokichar Basin Annex A - VPSHR and Security Risk Register   |
|                            | 151119-T-KE-HSS-PRO-0029 - 150810-TKBV Security Management System   |
|                            | 20150709 Synopsis of training - Voluntary Principles on Security and Human Rights                                 |
|                            | FHE-DC-#168663-v5-Tullow Kenya Security Audit Report  |
| Stakeholder<br>Engagement  | IMG Stakeholder Groups  |
|                            | 3D-Extension Project - Stakeholder Engagement Plan  |
|                            | Pre-development Stakeholder Engagement Plan South Lokichar Basin 2015   |
|                            | Outreach Guidelines - Phase 1 Closing E&A Phase (Oct 2015)  |
|                            | August 2015 Grievance Mechanism Report  |
|                            | Cultural Awareness Training Attendance Record_1   |
|                            | November 2015 GM Reports June-Nov 2015  |
|                            | 150402 Forced engagement action flowchart v2  |
|                            | Block 10BB - Kerio Basin Demobilisation and communication Sensitisation Strategy (3)                              |
|                            | Community Newsletter April Edition  |
|                            | T-KE-ESP-PRO-0002 -TKBV_Grievance_Mechanism_FINAL_19.01.2015(2)   |
|                            | Geotech Survey SEP (1)  |
| Social Performance         | Tullow SI projects  |
|                            | Turkana Social Aspects  |
|                            | Contractors goods services expenditure summary - March 2015 final   |
|                            | Ekoi and Ekowa- A proposal to recalibrate TKBV local relations FINAL  |
|                            | Eldoret agreement 1-11-20140001   |
|                            | T-KE-ESP-PRO-0003 -TKBV Environment and Social Commitments Procedure 19012015 FINAL                               |
| HR/Contracting             | Local Staff T&C   |
|                            | Contractor Procedures - Local Recruitment Final   |
|                            | Contractors' Employment Summary (List) March 2015   |
|                            | Permit letter from TCG for Tausi Twiga3 Ewoi Emong Ekosowan 10.12.13  |
|                            | Samaki - Signed Letter of Understanding 10th Nov 2014   |
|                            | Employment Summary Sheet March 2015   |

| TOPIC                   | DOCUMENT   |
|-------------------------|--|
|                         | Samaki - Signed Letter of Understanding 10th Nov 2014  |
|                         | T-KE-ESP-GUD-0002 Contractor CSR Guidance note   |
|                         | Turkana Goods Services March 2015  |
|                         | Employment Act Cap226 No11 of 2007 01  |
|                         | Tullow Kenya Employee Handbook   |
|                         | Redundancy Action Day Nov 2014   |
|                         | Redundancy FAQs November 2014  |
|                         | Redundancy criteria  |
|                         | Fleet vehicles - March 2015  |
| Financial<br>Management | T-KE-ESP-GUD-0001-FINANCIAL MANAGEMENT GUIDELINES 2014 -Above Ground Risk Units 15th Dec (2) |
|                         | Summary Employment and Salaries reports - May-Sept2015                                       |
|                         | Contractors goods services expenditure summaries May-Sept 2015                               |
|                         | T-KE-ESP-PRO- 0001 Donation Procedure  |
| Training                | Tullow Kenya BV 2012 Training Manual   |
|                         | TKBV EHS Job Specific Training Matrix 2015   |
|                         | T-EHS-STD-0012 EHS Training Development  |
|                         | Kenya 2015 Training completed updated December 2015  |
|                         | Contractors Training report March 2015   |
|                         | Training evidence accountability   |