



# ANNUAL REPORT 2019

deployed throughout the Company. When relevant, these risks are included in the detailed risk review and analysis is done for all tenders, projects and FPSO (asset) fleet operations which are part of the Company's portfolio. Climate change risks are assessed as part of the SBM Offshore's Enterprise Risk Management (ERM). This results in a heat-map of risks which are incorporated in a Risk report. This report provides an overview of the top ten risks and the latest Risk Profile versus the defined Risk Appetite status to the Management Board and Supervisory Board.

The quarterly Risk report covers proposal, projects and fleet individual risks, as well as Group Functions and Execution Centers, and includes actions and managing measures in place to mitigate each risk which are followed-up on by partners. In order to manage the transition risk and opportunity of a changing energy mix, SBM Offshore defines action in light of the evolution of the energy landscape. It is gradually diversifying its product portfolio through product development and investments in R&D.

### **METRICS AND TARGETS**

Once again this year, SBM Offshore set out short-term targets for the upcoming year (see section 2.3 Sustainability ). These ten targets were linked to the six SDGs the Comany has implemented. Several of SBM Offshore's SDG targets are part of the Company's efforts to mitigate the effects of climate change, focused on limiting the Company's emissions and adapting our ways of working.

Focus on emissions reduction:

- Reduce by 25% the mass of gas flared under SBM Offshore account (in tonnes of gas flared per thousand tonnes of hydrocarbon production) (SDG 7)
- Ensure that 60% of project offices operations have a local sustainability certification (SDG 7)

Focus on improved management of emissions:

- 100% of FPSO EPC proposals recording carbon emissions planned over asset life (SDG 9)
- Propose uniform air travel CO<sub>2</sub> measurement system to enable target setting (SDG 13)

Focus on new technological developments:

 30% of R&D budget going to low-carbon technologies (SDG 9)

## **5.2 REPORTING BOUNDARIES**

SBM Offshore not only reports on impacts it causes, but also on impacts it contributes to, and impacts that are linked to its activities. In each of the following paragraphs we elaborate in detail on the boundaries of our material topics. The boundary of a material topic relates to the parts of the organization and supply chain covered in the figures.

## 5.2.1 HEALTH, SAFETY AND SECURITY REPORTING

The HSS performance indicators boundaries take into account:

- Employees, which include all direct hires, part-time employees, locally-hired agency staff ('direct contractors') in the fabrication sites, offices and offshore workers, i.e. all people working for the Company
- Contractors which include any person employed by a contractor or contractor's subcontractor(s) who is directly involved in execution of prescribed work under a contract with SBM Offshore.

SBM Offshore implements consultation and participation in accordance with the applicable rules and regulations, and with the ISM onboard offshore units in the form of joint committee. The committee meets with the management team at an agreed frequency to address health and welfare and safety concerns of the employees.

All employees are provided HSSE trainings to familiarize themselves with the Company's health, safety, and security rules and regulations. As part of the training content, individuals attend internal classroom training, attend external training, practice on hands-on training or perform e-learning. The training topics are based on the hazards identified through the structured identification process as well as the regulatory requirements and includes Company standard training package such as security, Life Saving Rules, display screen equipment, site hazard awareness etc.

HSS incidents are reported and managed through the Company centralized incident management tool (SRS – Single Reporting System) which is a web-based reporting system that is used to collect data on all incidents occurring in all locations where the Company operates. The system records safety, environmental, security incidents, loss of containments, equipment failure and damage only incidents.

SBM Offshore reports on all incidents classified as fatalities, injuries and high consequence injuries - work-related injuries that results in a fatality or in an injury from which the worker is not expected to recover from within six months. Safety incidents are reported based on the incident classifications as defined by the IOGP Report 2018 – June 2019. Health incidents are reported based on the occupational illnesses classification given in IOGP Report Number 393 – 2007. The main-type of work-related injury categories are related to slips, trips and falls (walking at same level & on stairs) (40%) as well as finger injuries (30%). All incidents with an actual or a potential consequence for the Health, Safety and Security of personnel and/or impact on the environment arising out of Company's activities are investigated. Investigations, based on the type, criticality and severity of the event, are performed by specifically identified personnel using methods amongst which TapRoot® and 5 Why. The Company also reports incident data from contractor's construction facilities if the incident is related to an SBM Offshore project.

Safety incidents are reported based on the incident classifications as defined by the IOGP Report 2018 – June 2019. Health incidents are reported based on the occupational illnesses classification given in IOGP Report Number 393 – 2007.

The Company uses records of exposure hours and SRS data to calculate Health and Safety performance indicators set by SBM Offshore.

## 5.2.2 ENVIRONMENTAL REPORTING

### OFFSHORE

In accordance with the IOGP and IPIECA guidelines, SBM Offshore reports on offshore units using the following reporting boundaries:

- Units in the Company's fleet producing and/or storing hydrocarbons under Lease and Operate contracts
- Units in which the Company exercises full operational management control

SBM Offshore considers 'operational management control' as: having full authority to introduce and implement operating policies at the operation, in line with the IPIECA definition.

The environmental and process safety performance of the Company is reported by region or management area: Brazil, Angola, North America & Equatorial Guinea. Based on the criteria stated above, SBM Offshore reports on the environmental and process safety performance for the following 12 units:

- Brazil FPSO *Espirito Santo*, FPSO *Capixaba*,
  FPSO *Cidade de Paraty*, FPSO *Cidade de Anchieta*,
  FPSO *Cidade de Ilhabela*, FPSO *Cidade de Marica*,
  FPSO *Cidade de Saquarema*
- Angola FPSO Mondo, FPSO Saxi Batuque and FPSO N'Goma
- North America & Equatorial Guinea FPSO Aseng
- Asia FPSO Kikeh

The environmental offshore performance reporting methodology was chosen according to the performance indicators relative to GRI Standards and IOGP guidelines. This includes:

- Greenhouse Gases, referred to as GHG which are N<sub>2</sub>O (Nitrous Oxide), CH<sub>4</sub> (Methane) and CO<sub>2</sub> (Carbon Dioxide)
- GHG emissions per hydrocarbon production from flaring and energy generation
- Non Greenhouse Gases which are CO (Carbon Monoxide), NOx (Nitrogen Oxides), SO<sub>2</sub> (Sulphur Dioxide) and VOCs (Volatile Organic Compounds)
- Gas flared per hydrocarbon production, including gas flared on SBM Offshore account
- Energy consumption per hydrocarbon production
- Oil in Produced Water per hydrocarbon production

SBM Offshore reports some of its indicators as a weighted average, calculated pro rata over the volume of hydrocarbon production per region. This is in line with the IOGP Environmental Performance Indicators.

### **ONSHORE**

SBM Offshore reports on its onshore scope 1, 2 and 3 emissions<sup>34</sup>. As indicated in the 2018 Annual Report, efforts have been made in 2019 to further mature onshore emissions reporting to extend the reporting scope to include all locations in operational control by SBM Offshore. In 2019, the reporting scope includes all locations where the headcount is over 10 and yards over which the Company has full operational control. This scope has been extended from that used previously; due to improved reporting and data quality, the Company can now report onshore emissions on more locations. There is no revision of the 2018 data however, as there was no data for the locations added in the scope in 2019.

Next to this, the Company has started reporting both the 'location-based approach' as well as the 'market-based approach' for its scope 2 emissions. This is related to the SDG target on percentage of renewable energy used in the offices set in place in 2018. These changes did not result in a change of the reported emissions over 2018 as for 2018 only information on the location-based approach is available. SBM Offshore reports onshore emissions data for the following locations: Amsterdam, Houston, Kuala Lumpur, Marly, Monaco, Rio de Janeiro, Schiedam, Shanghai, Carros lab, Canada Shorebase, Georgetown Shorebase, Luanda Shorebase, Malabo Shorebase, Rio Shorebase, Santos Shorebase, and Vitória Shorebase. The Singapore office is excluded as we have no visibility on energy breakdown usages as the energy is included in the lease.

<sup>&</sup>lt;sup>34</sup> The World Resources institute GHG Protocol Corporate Standard classifies a company's GHG emissions into three 'scopes'. Scope 1 emissions are direct emissions from owned or controlled sources. Scope 2 emissions are indirect emissions from the generation of purchased energy. Scope 3 emissions are all indirect emissions (not included in scope 2) that occur in the value chain of the reporting company, including both upstream and downstream emissions.

The Company reports on scope 3 emissions related to business flights. This consists of all flights invoiced and paid for via our standard travel system in 2019 and the data covers all operating companies. The GHG emissions relating to business flights are based on third-party documentation on distances, the conversion to CO<sub>2</sub> equivalent is based on CO2emissiefactoren.nl. There are two ways of calculating flight related emissions: including or excluding the additional impact of CO<sub>2</sub> when emitted at high altitude. Unlike the 2018 report, this year the Company is calculating scope 3 emissions using emissions factors that include the additional impact of CO<sub>2</sub> when emitted at high altitude for all flights. This methodological change as well as an increase in amount of flights, have caused a significant increase in flights related GHG emissions compared to 2018.

For the onshore electricity usage, the Company uses the World Resources Institute Greenhouse Gas Protocol (GHG Protocol) method and conversion factors to calculate  $CO_2$  equivalents. For fuels the Company uses conversion factors published by the UK government's Department for Environment Food & Rural Affairs (DEFRA).  $CO_2$  equivalency is a quantity that describes, for a given mixture and amount of greenhouse gas, the amount of  $CO_2$  that would have the same global warming potential (GWP), when measured over a specified timescale (generally, 100 years).

### **ATMOSPHERIC EMISSIONS**

The calculation of air emissions from offshore operations units uses the method as described in the EEMS-Atmospheric Emissions Calculations (Issue 1.810a) recommended by Oil & Gas UK. SBM Offshore uses the GHG Global Warming Potentials from the Fourth Assessment Report issued by the Intergovernmental Panel on Climate Change (IPCC).

Emissions reported in the Company records include:

- GHG emissions for the production of energy. Records of GHG emissions from steam boilers, gas turbines and diesel engines used by the operating units.
- GHG emissions from gas flared. Flaring events accountability is split into either client or SBM Offshore: 'SBM Offshore Account' is flaring resulting from unplanned events. Whereas client account is flaring resulting from events caused by the client or planned by SBM Offshore in agreement with the client.
- GHG emissions from flights. Scope 3 emissions are calculated using distances and third-party emissions factors.
- GHG emissions for onshore operations are reported using the market-based and location-based approaches.

Identifying the causes of flaring for which SBM Offshore is responsible and acting on these events is part of the continuous improvement process.

#### **OFFSHORE ENERGY CONSUMPTION**

The energy used to produce oil and gas covers a range of activities, including:

- Driving pumps producing the hydrocarbons or reinjecting produced water
- Heating produced oil for separation
- Producing steam
- Powering compressors to re-inject produced gas
- Driving turbines to generate electricity needed for operational activities

The main source of energy consumption of offshore units is Fuel Gas and Marine Gas Oil.

## OIL IN PRODUCED WATER DISCHARGES

Produced water is a high volume liquid discharge generated during the production of oil and gas. After extraction, produced water is separated and treated (deoiled) before discharge to surface water. The quality of produced water is most widely expressed in terms of its oil content. Limits are imposed on the concentration of oil in the effluent discharge stream (generally expressed in the range of 15-30 ppm) or discharge is limited where reinjection is permitted back into the reservoir. The overall efficiency of the oil in water treatment and as applicable reinjection can be expressed as tonnes of oil discharged per million tonnes of hydrocarbon produced.

Incidental environmental releases to air, water or land from the offshore operations units are reported using the data recorded in the SRS database. SBM Offshore has embedded a methodology for calculating the estimated discharge and subsequent classification within the SRS tool.

#### **Changes in reporting**

In 2019, SBM Offshore chose to no longer report spills according to the GRI indicator previously used, GRI 306-3: Effluents and waste. The Company feels that 'oil in produced water' is a more relevant indicator for our water pollution as the levels of discharge are significantly higher than of oil spills and the data is of higher quality. Oil spills are still reported in other sections of the report.

#### **DATA REVISIONS**

The offshore environmental data has been revised due to an improved scoping methodology implemented in 2019. The parameter 'Units in which the Company has full ownership or units that are jointly owned and where the Company has at least 50% ownership' was removed and scoping is now solely based on operational control, as is common in this industry. SBM Offshore considers operational control as: having full authority to introduce and implement operating policies at the operation. This scoping update results in Kikeh being included in the offshore emissions reporting scope. In accordance with the GHG Protocols and to facilitate comparability of the data, we have revised the environmental data reported in 2018 to reflect the new scope.

Revised Data for 2018

	2018 Annual Report	Revised 2018 Annual Report
Number of offshore units (vessels)	13	14
SBM Offshore Production		
Hydrocarbon Production (tonnes)	52,207,616	53,883,020
Energy Consumption		
Total Energy Consumption <sup>1</sup>	58,033,793	62,085,490
Emissions – Offshore		
GHG Scope 1		
Carbon dioxide (CO $_2$ ) in tonnes	4,764,227	5,284,570
Methane (CH <sub>4</sub> ) in tonnes	10,132	12,072
Nitrous oxide ( $N_2O$ ) in tonnes	295	320
Emissions – Onshore		
GHG Scope 1 <sup>2</sup>	194	194
GHG Scope 2 <sup>2</sup>	3,880	3,880
GHG Scope 3 – Air travel	17,529	17,529
Flaring		
Total Gas Flared per production <sup>3</sup>	9.81	11.45
Gas Flared on SBM Offshore account per production <sup>3</sup>	3.70	3.98
Proportion of Gas Flared on SBM Offshore account	38%	35%
Other/Air Pollution – Non Greenhouse Gas Emissions		
Carbon monoxide (CO) in tonnes	6,491	7,390
Nitrogen oxides (NOx)	7,184	7,824
Sulphur dioxides (SO <sub>2</sub> )	1,448	1,485
Volatile organic compounds (VOCs)	1,068	1,282
Emissions – (Offshore+Onshore)		
Total emissions	5,126,895	5,703,414
Discharges		
Quantity of oil in produced water discharges in tonnes per million tonnes of hydrocarbon production <sup>4</sup>	3.50	5.33
1 GJ = gigajoule, energy from fuel gas and marine gas oil		

2 tonnes of CO<sub>2</sub> equivalents

3 tonnes of gas flared per thousand tonnes of hydrocarbon production

4 tonnes of oil discharged to sea per million tonnes of hydrocarbon production

## 5.2.3 PROCESS SAFETY REPORTING

A Loss of Primary Containment (LOPC) is defined as an unplanned or uncontrolled release of any material from primary containment, including non-toxic and non-flammable materials (e.g. steam, hot condensate, nitrogen, compressed  $CO_2$  or compressed air).

A Process Safety Event (PSE) is defined as a LOPC from a process that meets the Tier 1 or Tier 2 definitions within API RP 754.

LOPC events are reported in the Company's Single Reporting System as highlighted in section 5.2.1. This system includes a built-in calculation tool to assist the user in determining the release quantity of LOPC events. All LOPCs are analysed to identify those considered to be PSEs as per API RP 754. Process Safety KPIs used by the Company include the number of Tier 1 and the number of Tier 2 PSEs.

Using this new scope, the 2018 figures would have been as follows:

## 5.2.4 HUMAN RESOURCES REPORTING

The Company's Human Resources (HR) data covers the global workforce and is broken down by region (continents) and employment type. The performance indicators report on the workforce status at year-end December 31, 2019. They include all staff assigned on unlimited or fixed-term contracts, employee new hires and departures, total number of locally-employed staff from agencies, and all crew working on board the offshore operations units and shore bases.

### HEADCOUNT, TURNOVER & NATIONALIZATION

Human Resources considers:

- 'Direct Hire' employees as a staff member holding a labor contract for either an unlimited or a defined period (or an offer letter for an unlimited period in the USA).
   Direct hires are recorded on the payroll, directly paid by one entity of the SBM Offshore Group.
- 'Contractors' as an individual performing work for or on behalf of SBM Offshore, but not recognized as an employee under national law or practice (not part of SBM Offshore companies payroll, they issue invoices for services rendered).
- 'Subcontractors' are not considered as staff in the HR headcount breakdown structure. This population is managed as temporary service and are not covered by HR processes policies.

SBM Offshore includes the BRASA Yard in Brazil and the PAENAL Yard in Angola in its reporting scope based on partial ownership and operational control including human resource activities and social responsibility for the employees.

In principle, reporting on headcount, turnover, training and collective bargaining covers all SBM Offshore, including construction yards. For the reporting on Appraisals, construction yard employees are not included, due to the limits on influence and impact that SBM Offshore has on JV partners in the PAENAL and BRASA yards.

SBM Offshore reports its HR data in all the regions (Africa, Asia, Europe, North America, South America, Other) it is located.

Certain differences may potentially arise between the headcount numbers reported by Finance, HSSE and HR. This is due to the difference in the reporting structure of the two departments. Turnover has been calculated as such; number of employees who have left the Company in 2019 (between January 1 and the December 31, 2019) compared with the headcount on January 1, 2019 and the number of newcomers in 2019. For fleet operations, engagement and development of the local workforce is the main indicator for successful local content development. In this perspective, SBM Offshore monitors the percentage of local workforce – % of nationalization per regions – and invests in training to increase or maintain the targeted level. For example, specific programs in both below countries focus on education and training of nationals to facilitate them entering the workforce with the required level of gualifications and knowledge.

- 87% of Brazilian direct hire workforce consists of Brazilian nationals
- 81% of Angolan direct hire workforce consists of Angolan nationals

#### PERFORMANCE MANAGEMENT

In order to ensure personal development and optimal management of performance within the Company, SBM Offshore conducts annual performance reviews for all employees. Globally, the Company uses a common system to rate and evaluate all employees.

### **COLLECTIVE BARGAINING**

Collective bargaining is a process of negotiation between employers and a group of employees aimed at agreements to regulate working salaries, working conditions, benefits, and other aspects of workers' compensation and rights for workers. Within SBM Offshore, it is considered as collective bargaining: all the employees of which the interests are commonly represented by external or internal representatives of a trade union to which the employees belong.

#### **HUMAN RIGHTS**

SBM Offshore considers all contracts with qualified vendors as significant investment agreements, therefore the Company included human rights clauses in the Supply Chain Charter signed by our vendors.

#### Changes in reporting

This year, SBM Offshore is reporting on fewer GRI indicators. We no longer report against GRI 404-1: Training and Education or our Own Indicator on People development, and GRI 401-1: Employement has been replaced by an Own indicator on Turnover. This is part of an effort to streamline the reporting and increase focus on the most material information.

## 5.2.5 COMPLIANCE REPORTING

SBM Offshore reports on significant fines paid by SBM Offshore and all affiliate companies. To define a significant fine the following thresholds are considered (subject to final assessment by Management Board on a case by case basis):

1. Operational fines of a regulatory and/or administrative nature which exceed US\$500,000

No significant operational fine had to be paid in 2019.

2. Legal and compliance fines of a criminal nature which exceed US\$50,000:

No significant legal and compliance fines of a criminal nature had to be paid in 2019.

## **5.3 NON-FINANCIAL INDICATORS**

## 5.3.1 HEALTH, SAFETY & SECURITY

Health, Safety & Security

	Year-to-Year		2019 – by Operating Segment	
	2019	2018	Offshore	Onshore
Exposure hours				
Employee <sup>1</sup>	13,926,255	12,038,253	8,809,567	5,116,688
Contractor <sup>2</sup>	20,652,056	15,282,127		20,652,056
Total Exposure hours	34,578,311	27,320,380	8,809,567	25,768,744
Fatalities (work related)				
Employee	0	0	0	0
Contractor	1	1	0	1
Total Fatalities	1	1	0	1
Fatality Rate (Total) <sup>3</sup>	0.01		0	0.01
Injuries				
High-consequence work-related Injury Employee <sup>4</sup>	0	0	0	0
High-consequence work-related Injury Contractor <sup>5</sup>	0	0	0	0
High-consequence work-related Injury Rate Employee <sup>6</sup>	0	0	0	0
High-consequence work-related Injury Rate Contractor <sup>6</sup>	0.00	0	0	0.00
High-consequence Work-related Injury Rate (Total) <sup>7</sup>	0.00	0	0	0.00
Total Recordable Injury Employee	16	14	11	5
Total Recordable Injury Contractor	6	11	0	6
Total Recordable Injury Rate Employee <sup>8</sup>	0.23	0.23	0.25	0.20
Total Recordable Injury Rate Contractor <sup>8</sup>	0.06	0.14	0	0.06
Total Recordable Injury Frequency Rate (Total) <sup>8</sup>	0.13	0.18	0.25	0.09
Occupational Illness				
Employee	1	20	1	0
Contractor	0	0	0	0
Total Recordable Occupational Illness Frequency Rate (Employees only) <sup>9</sup>	0.01	0.33	0	0

1 Direct hires, part-time employees, locally hired agency staff ('direct contractors') in the fabrication sites, offices and offshore workers, i.e. all people working for the Company.

2 Any person employed by a contractor or contractor's sub-contractor(s) who is directly involved in execution of prescribed work under a contract with SBM Offshore.

3 Fatalities per 200,000 exposure hours.

4 Work-related injury that results in an injury from which the Employee cannot, does not, or is not expected to recover fully to pre-injury health status within 6 months, excluding fatality.

5 Work-related injury that results in an injury from which the Contractor cannot, does not, or is not expected to recover fully to pre-injury health status within 6 months, excluding fatality.

6 High-consequence work-related injuries per 200,000 exposure hours.

7 Total high-consequence work-related injuries per 200,000 exposure hours.

8 Recordable injuries per 200,000 exposure hours.

9 Occupational illnesses per 200,000 exposure hours.