

# OPERATIONS REVIEW

Sembcorp Marine generated positive EBITDA (earnings before interest, tax, depreciation and amortisation) of \$104 million for FY2019. However, at both operating and net levels, we posted losses of \$139 million and \$137 million respectively. This was the result of accelerated depreciation for our Tanjong Kling Yard and continued low business volumes, offset partly by profits from our Repairs & Upgrades business, which rose on improved margins and better product mix.

We recorded group revenue of \$2.88 billion in FY2019, compared with \$4.89 billion the year before. The revenue decline in FY2019 was largely due to lower revenue from Rigs & Floaters and Offshore Platforms projects, partially offset by higher revenue from Repairs & Upgrades. Excluding the effects of the delivery of one jack-up rig to Borr Drilling in FY2019 as well as the 2018 delivery of seven jack-up rigs to Borr Drilling, one jack-up rig to BOT Lease and sale of a semi-submersible rig, turnover would have been \$2.67 billion – a 6% increase compared with \$2.53 billion in FY2018.

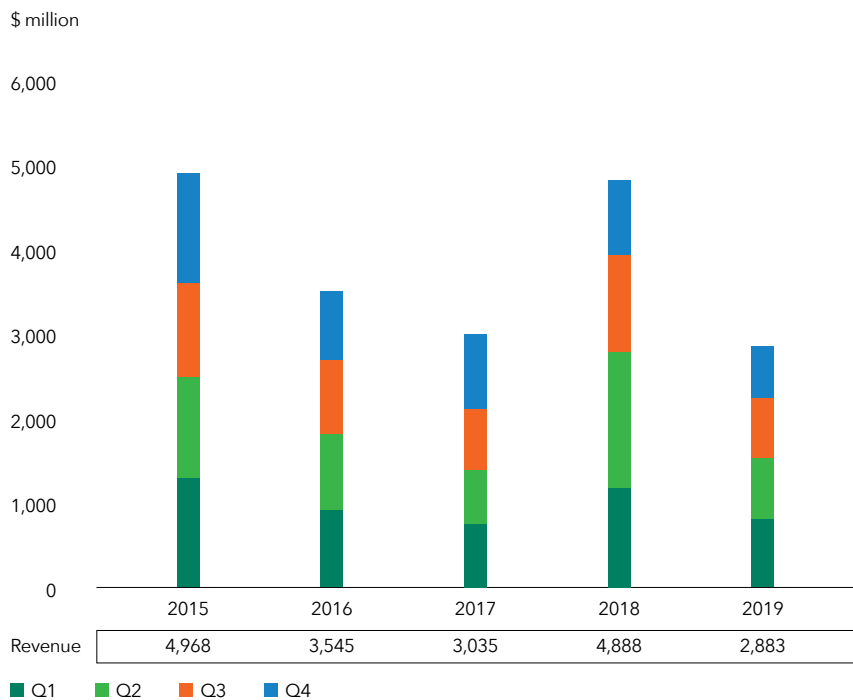
## SEGMENTAL REVENUE

### Rigs & Floaters

Our Rigs & Floaters business generated revenue of \$2.07 billion in FY2019, compared with \$4.15 billion in the previous year. The higher revenue in FY2018 was due to revenue recognition on the delivery of seven jack-up rigs to Borr Drilling, one jack-up rig to BOT Lease, and the sale of a semi-submersible rig.

Rigs & Floaters revenue in FY2019 was mainly attributed to higher percentage recognition from ongoing drill ship and floater projects, including the two

### FY2019 Turnover: \$2.88 billion



Transocean drill ships, the Shell Vito floating production unit (FPU), and the Johan Castberg and Karish floating production, storage and offloading (FPSO) vessel projects.

Floater revenue increased 18% to \$1.25 billion in FY2019, on higher percentage recognition for the Johan Castberg FPSO, Shell Vito FPU and Karish FPSO projects.

Rig building revenue totalled \$822 million in FY2019 on recognition of one jack-up rig delivery, drill ship revenue from our ongoing Transocean drill ship projects and delivery of a semi-submersible crane vessel.

FY2018's high revenue of \$3.1 billion was due to revenue recognition on the delivery of seven jack-up rigs to Borr Drilling, one jack-up to BOT Lease and the sale of a semi-submersible rig.

### Offshore Platforms

Offshore Platforms revenue was \$131 million in FY2019, with revenue

recognition from the Hornsea 2 wind farm substations and Tangguh gas modules projects. Our FY2018 Offshore Platforms revenue was higher at \$184 million due to contributions from the Culzean platforms project, which was completed and delivered in June 2018.

### Repairs & Upgrades

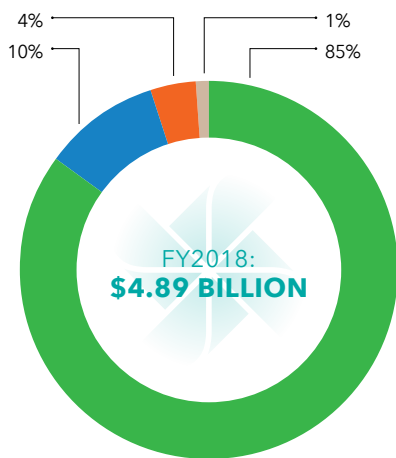
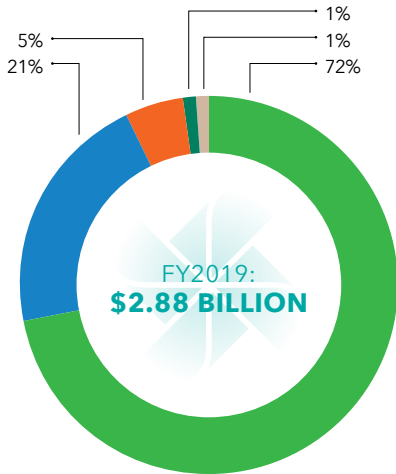
The Group's Repairs & Upgrades business recorded a revenue of \$605 million in FY2019, 27% more than the \$476 million in FY2018, on account of higher revenue per vessel at \$2.16 million (FY2018: \$1.61 million) from an improved vessel mix of higher-value works. Our yards repaired and upgraded 280 vessels in the year (FY2018: 296 units).

### Specialised Shipbuilding

Maiden revenue contribution from the Group's Specialised Shipbuilding segment totalled \$35 million in FY2019 on recognition of our ongoing ROPAX (roll-on/roll-off passenger) ferries project.

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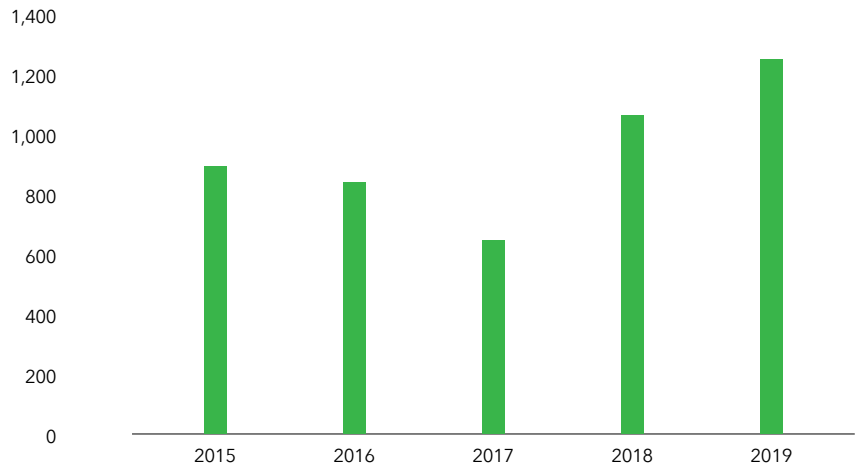
## Turnover Contribution by Segments



- Rigs & Floaters
- Repair & Upgrades
- Offshore Platforms
- Specialised Shipbuilding
- Other Activities

## Turnover - Floaters

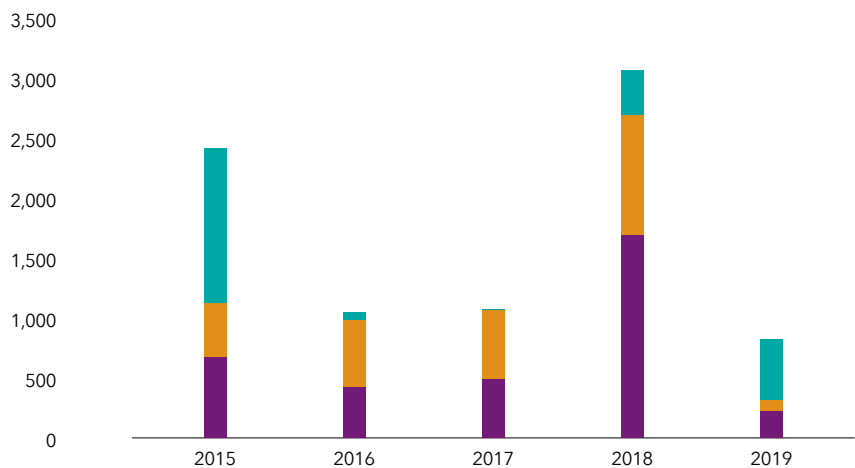
\$ million



Turnover - Floaters

## Turnover - Rig Building

\$ million

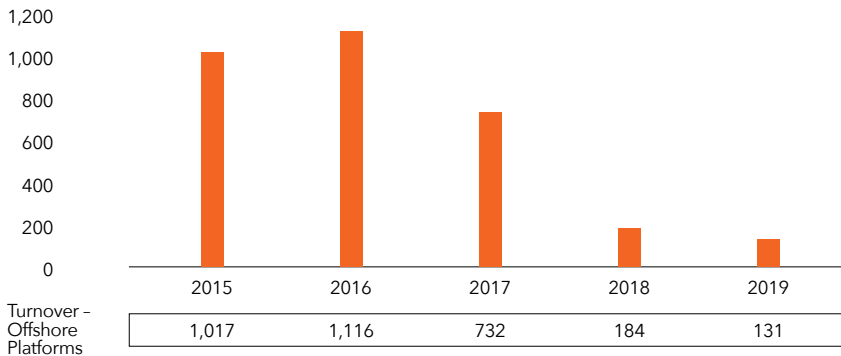


Turnover - Rig Building

- Jack-ups, Other Rigs
- Semi-submersibles - Drilling, Accommodation, Well Intervention, Crane
- Drill Ships

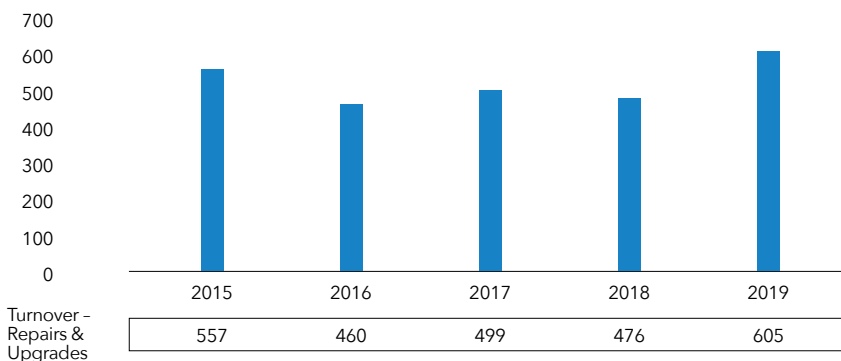
### Turnover - Offshore Platforms

\$ million



### Turnover - Repairs & Upgrades

\$ million



Sembcorp Marine delivered the *Sleipnir*, the largest and strongest semi-submersible crane vessel in the industry

### PROJECT DELIVERIES

During the year, Sembcorp Marine delivered several major projects, some of which set global industry records.

In July 2019, the Group safely and successfully delivered *Sleipnir*, the world's largest, strongest and most sustainable semi-submersible crane vessel (SSCV) to Heerema Marine Contractors. With its 220-metre by 102-metre reinforced deck area and equipped with a pair of 10,000-tonne revolving cranes, the SSCV can hoist 20,000 tonnes in a single lift, boosting its operational efficiency to new levels in offshore installations and decommissioning.

Following its delivery, *Sleipnir* has been in high demand and has secured contracts for both installation and decommissioning work. In September 2019, the vessel set a world record for an offshore crane, completing a 15,300-tonne lift to install the topsides for Noble Energy's Leviathan development in the Mediterranean.

*Sleipnir's* line-up of contracts include the Tyra jackets and topsides installation and removal in the Danish North Sea; Brae Bravo jackets and topsides removal in the UK North Sea; as well as transportation and installation of the High Voltage Alternating Current (HVAC) platform for the Hollandse Kust Zuid (HKZ) Alpha project, one of the largest offshore wind farm zones being developed in the North Sea. With its large cranes capable of a 135-metre lifting height and a combined 20,000-tonne lifting capacity, *Sleipnir* is very well placed to accommodate the trend of increasingly bigger offshore wind turbines.

# OPERATIONS REVIEW



*Q7000: Sembcorp Marine delivered its second newbuild semi-submersible well intervention vessel to Helix, based on a design jointly developed by Sembcorp Marine and Helix*



*Significant operational milestone for Sembcorp Marine's wholly-owned and operated Brazilian subsidiary Estaleiro Jurong Aracruz (EJA): Completion of P-68, its first floating production, storage and offloading (FPSO) project*

Other significant deliveries during the year included:

- The Helix Q7000 semi-submersible well intervention vessel, a dynamic positioning Class 3 (DP3), North Sea environment capable well intervention unit which can execute operations in water depths of up to 3,000m (10,000 feet).

With its open deck plan and tri-axial configuration, Q7000 can undertake a wide range of production enhancement operations, including well clean-up and offshore field development support. Equally optimised for well decommissioning, including suspension, tubing removal, tree recovery and sea floor clearance, Q7000 has secured a charter for an estimated minimum 80-day campaign to perform subsea workover and integrated well intervention services off the coast of Nigeria.

- P-68, the first FPSO project completed and delivered by Sembcorp Marine's wholly-owned and operated Brazilian subsidiary Estaleiro Jurong Aracruz (EJA).

P-68 left the yard on Sep 16, 2019, for deployment at the ultra-deepwater Berbigão and Sururu fields in Brazil's Santos Basin. A newbuild vessel, P-68 measures 316m in length and 54m in width. It produces up to 150,000 barrels of oil per day (BOPD), has a 1.6-million-barrel storage capacity and can accommodate 154 persons.

The vessel was constructed for Tupi B.V., a consortium comprising Petrobras Netherlands B.V. (PNBV), Total Brazil Services B.V., BG Gas Netherlands Holdings B.V. (Shell) and Galp Sinopec Brazil Services B.V. (Petrogal).

EJA's P-68 work scope included fabricating six modules, pipe-racks and a flare, and integrating them on the vessel along with other free issue items. The yard also executed carry-over works on the FPSO's hull, which was built by another shipyard. In completing the project, EJA has cemented its status as a premier facility in Brazil capable of taking on full engineering, procurement, construction and commissioning (EPCC) work for large-scale offshore projects. It also offers vessel repair and upgrade solutions.

## WORKS IN PROGRESS

Work on our ongoing projects continues apace. In our Singapore yards, the projects include:

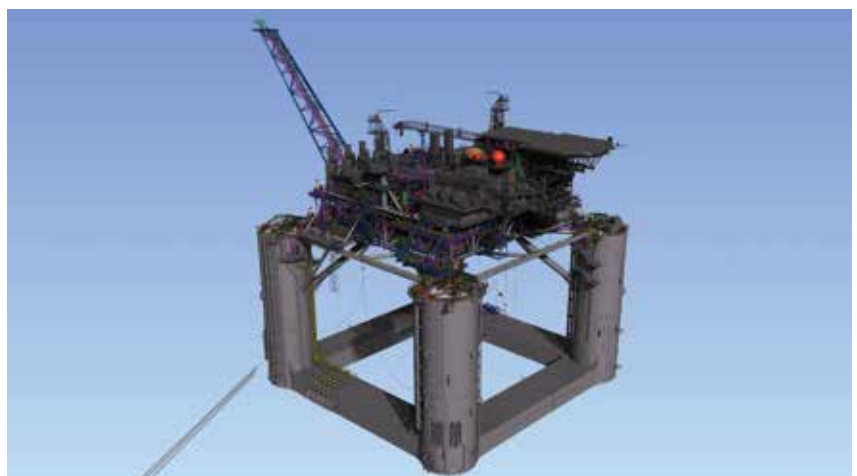
- Turnkey engineering, procurement and construction of the newbuild FPSO hull and living quarters for Equinor's Johan Castberg field development in the Barents Sea;
- Engineering, procurement, construction and integration of vessel hull, living quarters and topside modules, including owner-furnished equipment, for TechnipFMC's newbuild FPSO, to be deployed in the Energean-operated Karish deepwater field in the Eastern Mediterranean;
- Construction and integration of hull, topsides and living quarters for Shell's newbuild Vito semi-submersible FPU;



Artist's impression of Johan Castberg FPSO



Artist's impression of Karish FPSO



Artist's impression of Shell Vito FPU



# OPERATIONS REVIEW



*Strike-steel of Shell Whale FPU*

- Construction and integration of hull and topside for Shell's newbuild Whale semi-submersible FPU;
- Construction of two high-specification, ultra-deepwater drill ships for Transocean, based on Sembcorp Marine's proprietary Jurong Espadon 3T design;
- Engineering, procurement, construction, hook-up and commissioning works on two substation topsides and jackets for Ørsted's Hornsea 2 Offshore Wind Farm in the UK North Sea;
- Design and construction of three battery-powered ROPAX ferries for Norled; and
- Design and construction of a 12,000-cubic-metre (cbm) capacity LNG bunker vessel for Mitsui O.S.K Lines (MOL).

Sembcorp Marine's Batam yard, EJA, is undertaking topside module construction and integration works for the Petrobras P-71 FPSO for the Tupi Project.



*Sembcorp Marine is building two drill ships for Transocean based on its proprietary Jurong Espadon 3T design*



*Ørsted's Hornsea 2 wind farm topsides were fabricated at Sembcorp Marine's Batam yard and are now at Admiralty Yard for additional work*

## REPAIRS & UPGRADES

Sembcorp Marine's Repairs & Upgrades business had a busy year in 2019. It serviced 280 vessels with an average per-vessel revenue of \$2.16 million, compared to \$1.61 million in FY2018.

In the Floating Storage Unit (FSU) and Floating Storage & Regasification Unit (FSRU) segment, we secured five conversion and upgrading contracts, valued at \$71 million in total. These projects were among 55 LNG-related repair and upgrade jobs we won in FY2019. This was a new record for such contracts awarded to a single service provider in the global LNG segment.

Repairs & Upgrades also serviced 16 cruise ships last year. With this, the Group retained its position as Asia's top cruise vessel repair and upgrading company.

The new IMO regulations on ballast water treatment and fuel sulphur reduction brought in more than 200 ballast water management system and gas scrubber retrofit orders for the Group over the past 18 months, with some to be completed in 2020. These green technology retrofit solutions and related works contributed close to \$100 million of revenue in FY2019.



Royal Caribbean's cruise ship *Quantum of the Seas* departing Tuas Boulevard Yard after a successful overhaul



Sembcorp Marine set a new record with 55 LNG-related repair and upgrade jobs received in 2019 - the highest number of such contracts awarded to a single service provider in the global gas segment



Sembcorp Marine successfully completed repair works on LNG carrier *Northwest Sanderling*



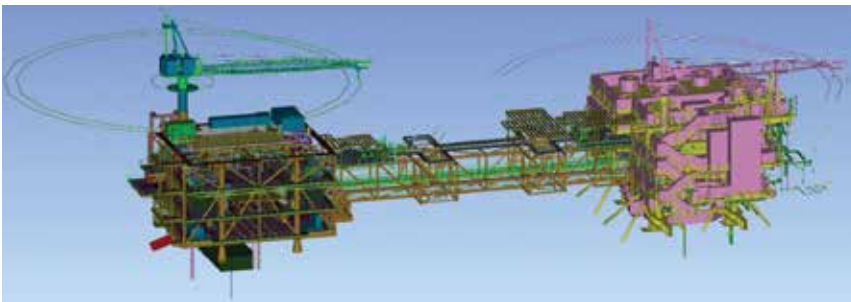
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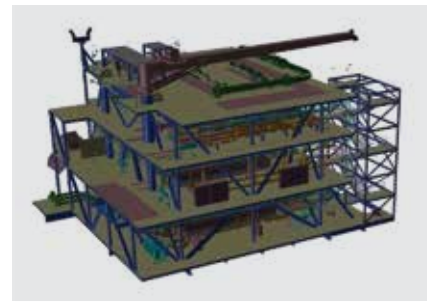
Gas scrubber retrofit projects for Maran Tankers



Karmol LNGT Powership Africa undocking from Sembcorp Marine Admiralty Yard after completing FSRU conversion



Artist's impression of well-head platforms for the Gallaf Batch 2 project



Artist's impression of a platform for the Tyra field project

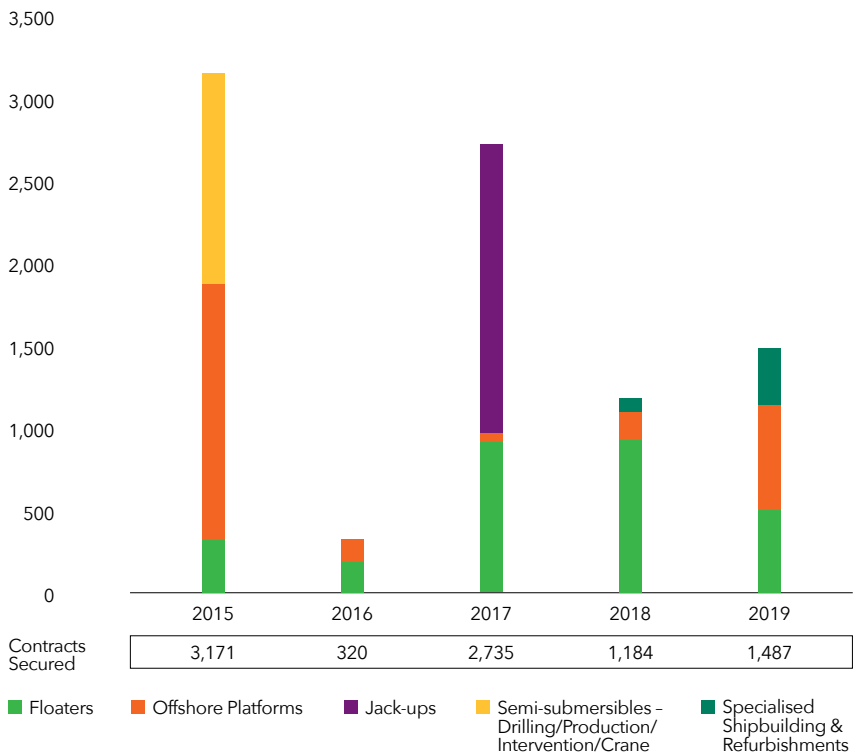
## CONTRACTS SECURED AND NET ORDER BOOK

Despite difficult market conditions, the Group clinched \$1.49 billion of new contracts in FY2019, exceeding the \$1.18 billion for FY2018. These included:

- Construction and integration of the topside and hull of an FPU for Shell Offshore Inc., for deployment to the Whale field in the Gulf of Mexico;
- Two offshore platform projects valued at \$550 million for: the fabrication and integration of two well-head platforms under North Oil Company's Gallaf Batch 2 Project at the Al Shaheen oil field in Qatar; and platforms and bridges fabrication for the Tyra field redevelopment project in the Danish North Sea for Total;

### Contracts Secured

\$ million





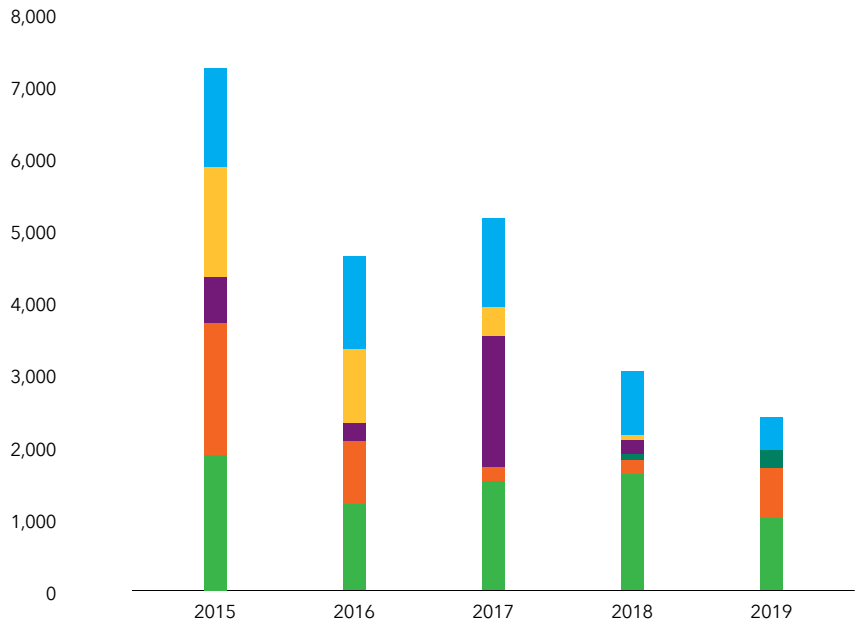
- Fabrication of 15 jacket foundations for the Formosa 2 Offshore Wind Farm, under a project with Jan De Nul;
- Design and construction of a 12,000cbm LNG bunker vessel for MOL;
- Conversion of the *Ariake* tanker into an FPSO for Shapoorji Pallonji Oil and Gas and Bumi Armada;
- Conversion/upgrade of five FSRU and FSU units; and
- Upgrade of 13 cruise ships, as well as a large-scale refit of *Asuka II*, Japan's largest cruise ship, for NYK Cruises.

As at the end of FY2019, our net order book stood at \$2.436 billion (excluding the Sete Brasil drill ship contracts) with completion and deliveries stretching into 2022. This includes:

- \$1.002 billion for floaters;
- \$707 million for offshore platforms;
- \$252 million for specialised shipbuilding and refurbishment projects; and
- \$475 million for drill ships.

Net Order Book by Product Type

\$ million



Net Order Book by Product Type

2015	7,242	4,709	5,255	3,088	2,436
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- Floaters
- Offshore Platforms
- Specialised Shipbuilding/Refurbishments
- Jack-ups
- Semi-submersibles
- Transocean Drill Ships

Note: Excludes Sete Brasil drill ship contracts.



## **ROBUST HEALTH, SAFETY AND ENVIRONMENT STANDARDS**

Sembcorp Marine stands by the dictum, "The Quality of Today is the Safety of Tomorrow". Our employees deliver top quality work to ensure crew safety aboard the rigs, vessels and platforms built by the Group. They are in turn supported by a robust health, safety and environment (HSE) regime that keeps them safe and well at all Semcorp Marine yards and facilities.





# PROPELLING OUR EMPLOYEEES TOWARDS EXCELLENCE

## EMPOWERING OUR WORKFORCE

We upgrade our employees continuously with the right type and level of skills to execute work safely and productively, and to adapt to new and disruptive technologies introduced into our operations.

Our ongoing competence development covers Industry 4.0 Readiness, Digitalisation and Gas & Process Engineering Training.

