

Singapore Marine Industry's Performance in 2008

OVERVIEW

Total Turnover

2008 was a robust and record year for the Singapore marine and offshore industry which saw many successful completion and deliveries of vessels and rigs. It was a busy year throughout for shipyards as well as companies in the marine and offshore supporting industries as they strived to complete the projects on time, safely and within budget.

The year in review was also a volatile one for the industry with oil prices rising from January to peak in July before plummeting to a four-year low in December, triggered by the mortgage crisis in the US. Nonetheless, still surfing the waves of the international oil and gas boom, the marine and offshore industry turned in a remarkable performance in 2008 with a total output of S\$15.4 billion. This is a new record and yet another double-digit growth in total output recorded by the industry in recent years. The total output in 2008 saw a growth of 18% over the last year's figure of S\$13.05 billion.

This increase was contributed largely by the offshore rig building sector. For the first time in the industry's history, the offshore sector surpasses the ship repair and conversion sector in terms of their respective contributions to the industry's total output.

Output from the offshore sector soared to a new height of S\$7.39 billion in 2008 and grew by 49.1% year-on-year to account for 48% of the industry's total turnover. There was an increase of 3.26% in output from the ship repair and conversion sector with more vessel calls for repairs in Singapore. The sector brought in S\$6.47 billion representing 42% of the industry's total output. The shipbuilding sector registered a decline in output by 16.35% despite more vessels launched during the year. Its output of S\$1.53 billion in 2008 accounted for 10% of the industry's total turnover.

The increased volume and non-stop stream of work activities in the industry saw an increase in the industry's workforce as shipyards and companies strived to complete the projects within schedule. The total employment in the marine and offshore industry in 2008 stood at 141,000 workers. This figure includes production, administrative and other non-production workers. The industry continues to employ a significant number of foreign workers at the production level.

The safety performance in the industry has improved over the years with the implementation of safety management systems, safe work practices and risk management in the shipyards. The drive by the shipyards to inculcate a safety culture at the workplace based on safety ownership and zero tolerance for safety infringements, have created greater awareness of safety at all levels and contributed to the improved safety standards over the years.

In spite of the relentless efforts by the industry in safety promotion, training and implementation, statistics from the Workplace Safety and Health Council showed a rise in workplace injuries and fatalities in the marine industry in 2008 compared to the year before where the figures were at a significant low. In 2008, there were a total of 558 accidents in the marine industry, 13.9% higher compared to 2007.

There were 13 fatalities in the shipyards and anchorages in 2008, two more than the previous year. The industry's fatality rate rose from 8.4 per 100,000 persons employed in 2007 to 9.2 in 2008. The Accident Frequency Rate (AFR) in 2008 was 1.4 accidents per million man-hours worked, compared to 1.3 in 2007. The Accident Severity Rate (ASR) of 236 man-days lost per million man-hours worked in 2008 was more than the ASR of 212 in 2007.

Ship Repair & Conversion Sector

The ship repair and conversion sector, which has traditionally been the largest contributor to the industry's total output, saw its position overtaken by the offshore sector in 2008. Ship repair activity was buoyant in the first half of 2008 due to increase in shipping activities. However, ship repair business softened in the later part of the year as a result of the economic downturn and corresponding decline in world trade and shipping activities.

Ship repair and conversion sector's contribution to the industry's total output dipped by 6% from 48% in 2007 to 42% in 2008 as the shipyards focus on the higher value add offshore rig projects. However, higher earnings saw the sector's revenue rising to S\$6,468 million in 2008. This was S\$204 million or 3.26% more than the S\$6,264 million achieved in 2007. This healthy figure is attributed mainly to the large number of FPSO/FSO projects undertaken and completed during the year.

A total of 6,588 vessels called in Singapore for repairs in 2008. This was 9.89% or 593 vessels more than the 5,995 vessel calls recorded in 2007. The total gross tonnage of the vessels that called in Singapore for repairs in 2008 was also higher. At 43.26 million grt, this was 31.4% higher than that of 32.92 million grt in 2007.

A total of 14 FPSO/FSO conversion projects were completed in 2008 with more than ten others in the pipeline. Among the projects completed were the conversion of the world's largest gas FPSO *Cidade de Sao Mateus* and the world's first methane Floating Storage Re-gasification Unit (FSRU) *Golar Spirit*. As at end 2008, Singapore shipyards have completed a total of 144 FPSO/FSO and related projects.

Shipbuilding Sector

Traditionally, the shipbuilding sector is the smallest sector in the industry's revenue pie. Shipbuilding activities generated S\$1,530 million in 2008. This was a decrease of S\$299 million or 16.35% over the output of S\$1,829 million achieved in 2007. The sector's contribution to the industry's total output fell 4% to account for 10% of the total share in 2008 as against 14% in 2007.

A total of 139 vessels were launched in 2008. This was 37 vessels or 36.27% more than the 102 vessels launched in 2007. The 139 vessels launched have a combined gross tonnage of 197,074 grt. This was 43.6% lower than the gross tonnage of 349,429 grt in 2007.

Most of the vessels launched in 2008 were barges, workboats, tugs and offshore supply and support vessels. Other types of vessels launched included oil tankers, dredgers, passenger ferry boats, launches and yachts as well as a car carrier and an ice breaker ship.

Offshore Sector

The offshore sector achieved the highest growth with output leaping by a significant 49.1% to a new revenue level of S\$7,391 million in 2008. This sector includes the construction, repair, upgrading and conversion of all types of offshore drilling rigs and floating platform units.

The sector's output in 2008 was some S\$2,434 million more than the S\$4,957 million earned in 2007. Its contribution to the industry's output rose by 10% from a share of 38% in 2007 to 48% in 2008. Singapore shipyards' proprietary jack-up rig designs continue to clinch contracts from both new and existing customers.

Industry Outlook

The outlook for the marine and offshore industry is cautiously optimistic given the current global economic crisis and slowdown in new contracts pipeline. The industry's order books have remained healthy despite the cancellations of some ship and rig building orders by customers in end 2008 and 2009 as a result of the tightening of credit facilities. The current project stream for the major shipyards has deliveries extending up to 2012. There should be sufficient volume to keep the shipyards and their resident contractors busy in the next one to two years.

Despite the economic downturn, increasing global demand for oil and gas is expected to continue over the long term, fuelled by increased energy consumption from emerging economies of China, India and the Middle East. The search for more oil and gas to meet the expanded global demand is unlikely to halt in spite of the current economic difficulties and lower exploration budgets of oil majors.

The trend towards exploration into deeper waters offshore will continue given that reserves in existing oil fields are fast depleting and the urgent need to find new sources of oil to replenish and increase supply. The search has gone beyond the developed fields and conventional sources into undeveloped fields in harsher environments including the Arctic, and deeper depths as well as to other sources such as tar sands and oil shales.

The FPSO market remains steady, spurred by demand to produce from new oilfield discoveries. Nonetheless, the mood is one of market uncertainties with mixed reviews on the recovery expectations. The ship repair and shipbuilding sectors are likely to be affected by the prospect of slower economic growth and longer recovery period.

The marine and offshore industry is in a good position to ride through the current global economic downturn. During the last four decades, the industry has weathered many ups and downs in the business cycles. Lessons learnt from these past experiences and crises will help the industry to stay resilient and emerge stronger.