



DanishShipping

Danish Shipping Facts and Figures

December 2017



Table of Contents

1. Danish Shipping Industry	4
The Danish Merchant Fleet	4
Danish Shipping Exports	6
Employment	8
2. Global Merchant Fleet	10
Top Ten Operator Nations	10
Top Ten Operators	12
Flag States	13
3. World Trade	14
Shipping Markets	16
4. Ship Building and Recycling	18
Trading of secondhand vessels	20

Danish Shipping Industry

In 2017, the Danish fleet has grown considerably and reached an all-time high when measured by the gross tonnage of ships flying the Danish flag. The number of ships has hovered around 682 ships. Container ships represent the largest segment within Danish Shipping, whereas offshore and specialized vessels comprise the largest number of ships.

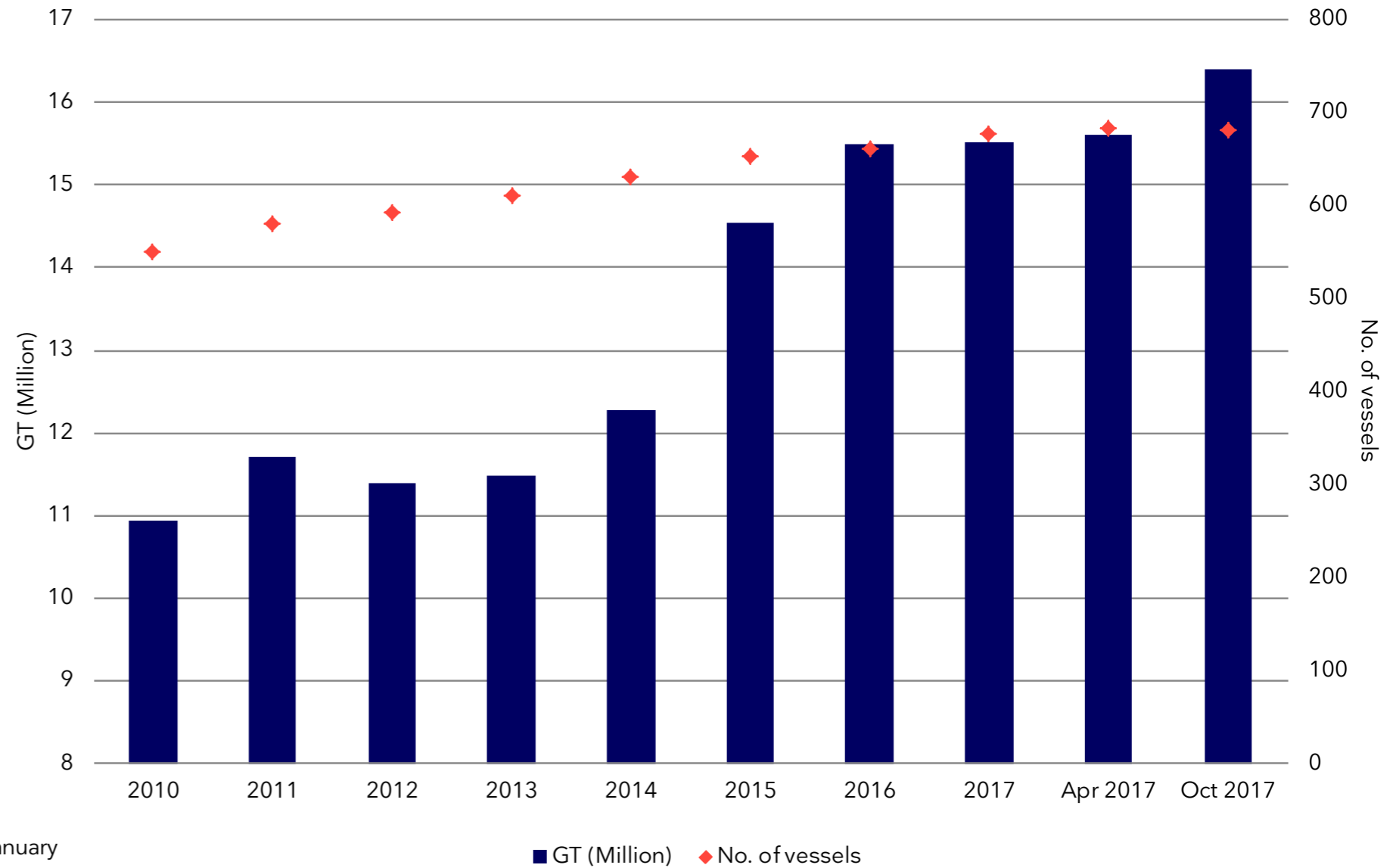
Since April 2017, the Danish fleet has grown by 800.000 GT, and consists of 16.4 million GT as of October 2017. This is more than twice as much gross tonnage under Danish flag compared to 2006. The increase can be explained by the growth within the container segment from 10.5 million GT in April to 11.4 million GT in October 2017.

The growth in tonnage under Danish flag points to the fact that Denmark is overall considered a solid and strong flag for shipping companies.

Despite the growth in tonnage, the number of vessels flying the Danish flag has remained at a constant level throughout the past couple of years. The fleet still contains 682 ships.

Container is by far the largest segment measured in gross tonnage, whereas offshore and specialized vessels, as well as passenger transport and RoRo comprise the largest segments measured by the number of ships. 392 vessels in the above mentioned segments fly the Danish flag.

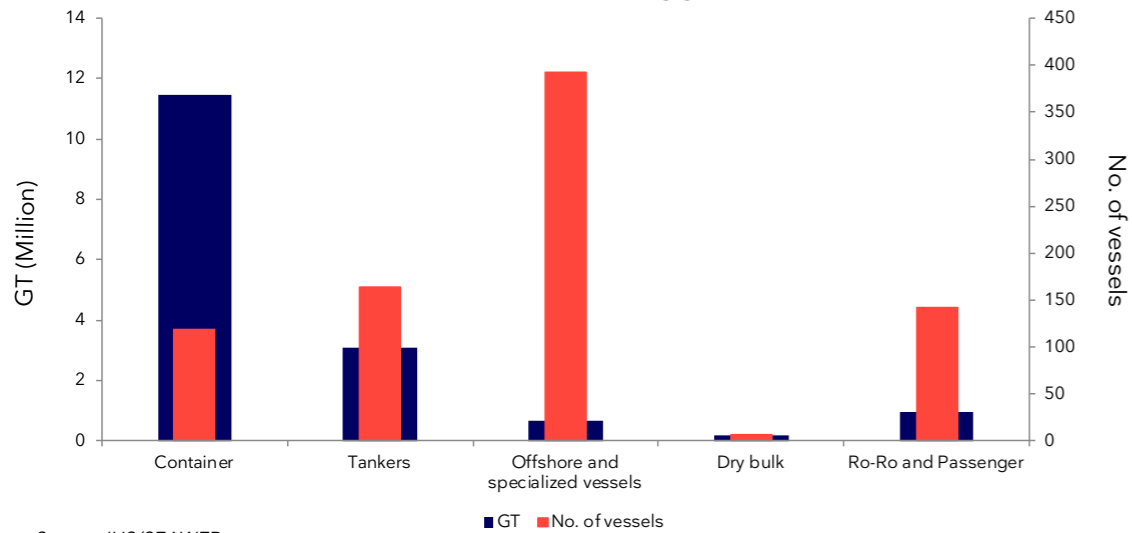
The Danish Flagged Merchant Fleet



January

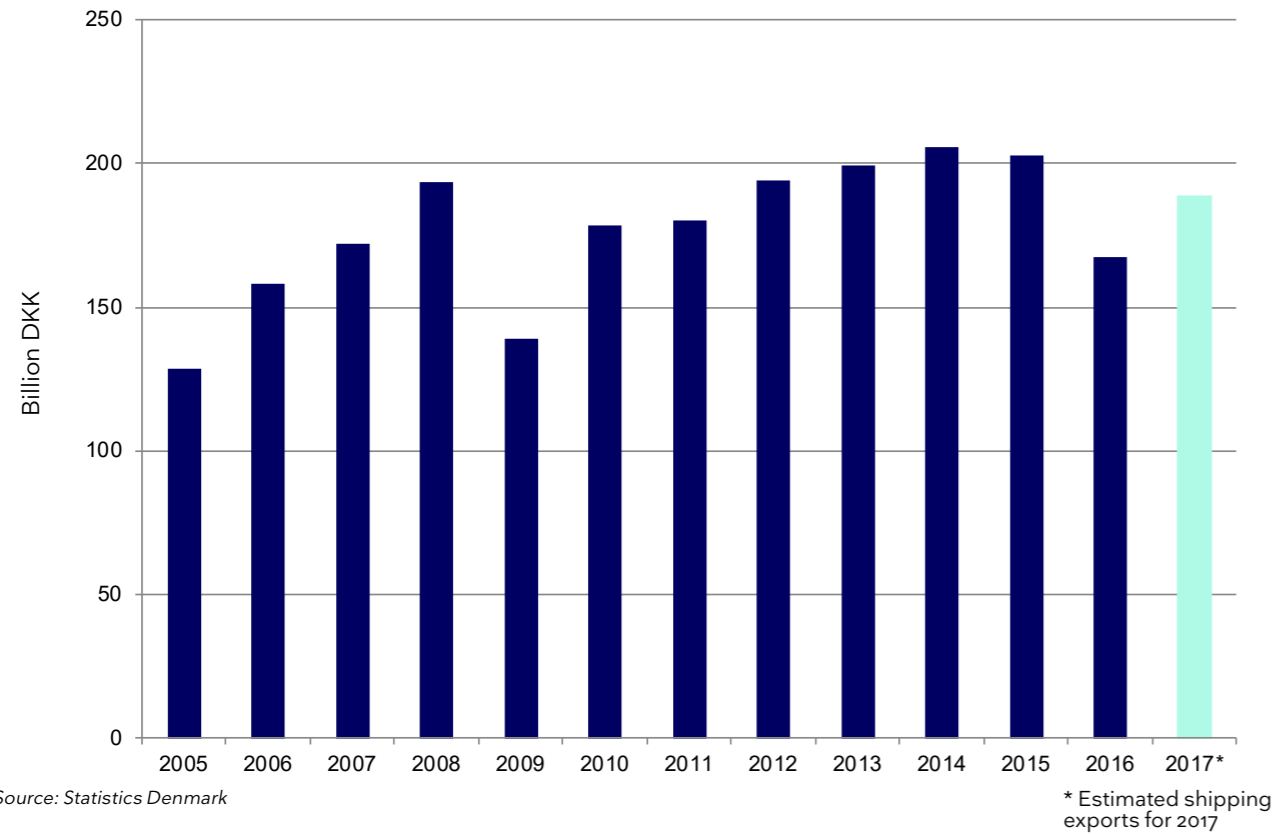
Source: IHS/SEAWEB

Composition of the Danish Flagged Merchant Fleet



Source: IHS/SEAWEB

Danish Shipping Exports

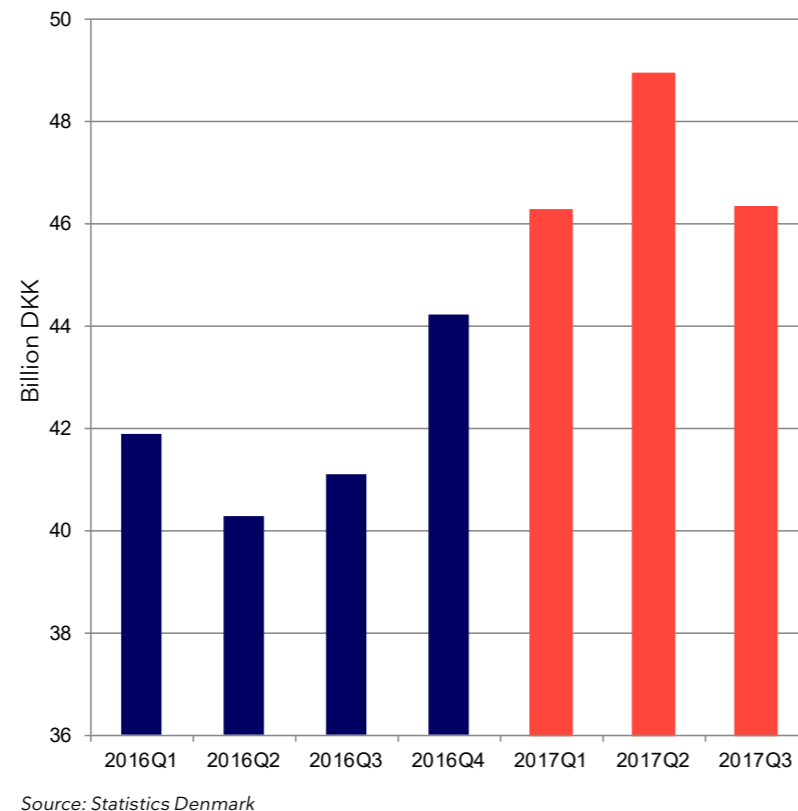


Shipping exports are recovering in 2017

Shipping is still recovering from the large decrease in exports in 2016. The exports from Danish shipping companies decreased from more than 200 billion DKK to 167 billion DKK from 2015 to 2016. Correspondingly, shipping's share of total Danish exports fell from 20 pct. to 16 pct. in one year.

Shipping remains Denmark's largest export industry. Based on the first three quarters of 2017, the diagram above illustrates the projected shipping exports in 2017, which will reach 188.7 billion DKK based on the assumption that the fourth quarter equals the average of the first three quarters.

While the quarterly export from Danish shipping companies fluctuated around 41 billion DKK in 2016, the three first quarters of 2017 has brought a significant increase in shipping exports. Between January and September 2017, shipping exports amounted to more than 141 billion DKK. Thus, Danish Shipping expects a strong increase in exports in 2017, though shipping exports presumably do not reach the historically high levels of 2014 and 2015.



Shipping is the most global industry

Two thirds of the value creation of Danish shipping companies take place outside of the EU. For the rest of the Danish export industry only one third of the value creation takes place outside of the European Union. Thus, shipping is considered the most global, Danish industry.

It is therefore of great importance for the industry that the EU ensures global trade agreements with regions outside of the union in order to maintain the current trade within these markets as well as enable future growth.

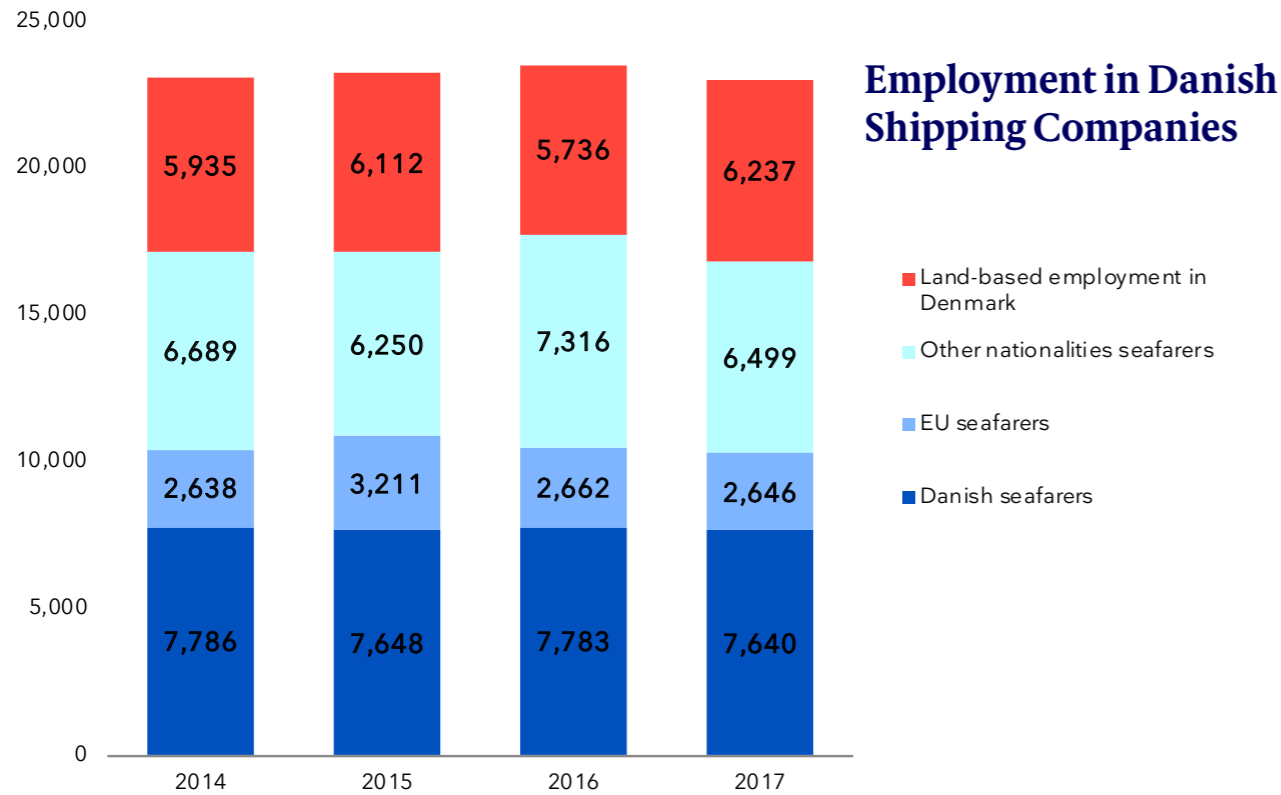
2/3
of exports take place outside of Europe.



Danish Shipping Companies' Exports



Employment



Source: Danish Shipping

Constant number of seafarers

The number of Danish seafarers has stayed constant the last couple of years, while the number of international seafarers in Danish shipping companies has decreased significantly from 2016 to 2017.

Despite the significant decline in shipping exports in 2016, it is noteworthy that Danish shipping companies have managed to keep the number of Danish seafarers at a constant level in 2017. The unemployment among Danish seafarers is almost non-existing ultimo 2017. Therefore, a further increase in the employment of Danish seafarers will require a larger pipeline of seafarers from the educational institutions in Denmark.

In 2017, the enrollment of students at maritime educational institutions declined slightly compared to 2016. The decrease in students enrolled was less than two pct. Danish Shipping has proposed a broad range of initiatives to strengthen the pipeline of seafarers and maintains an ambition to increase the number of Danish maritime students.

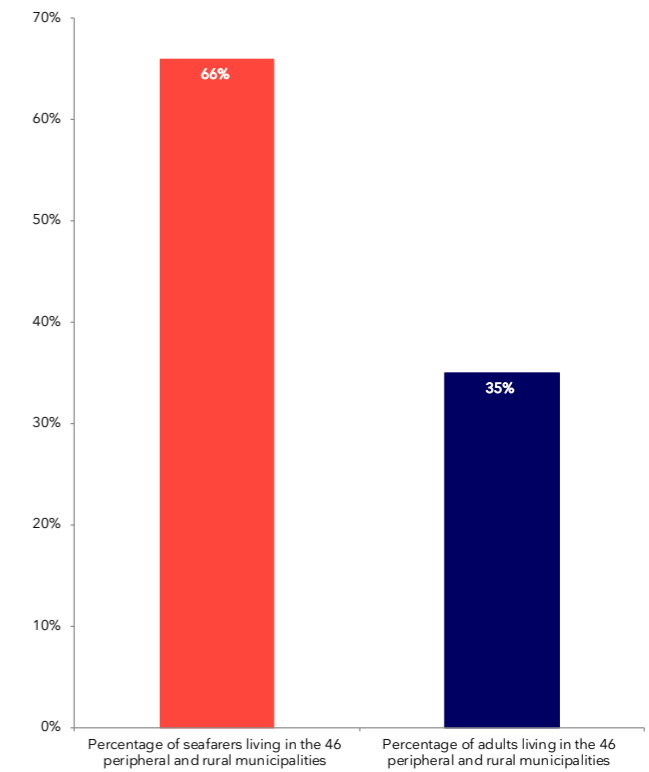


What is Blue Denmark?

The maritime cluster includes all maritime companies and operations in Denmark, including shipping companies.

The cluster is referred to as Blue Denmark. It accounts for approximately 25 pct. of total Danish exports.

Danes in the Peripheral and Rural Municipalities



Source: Danish Shipping

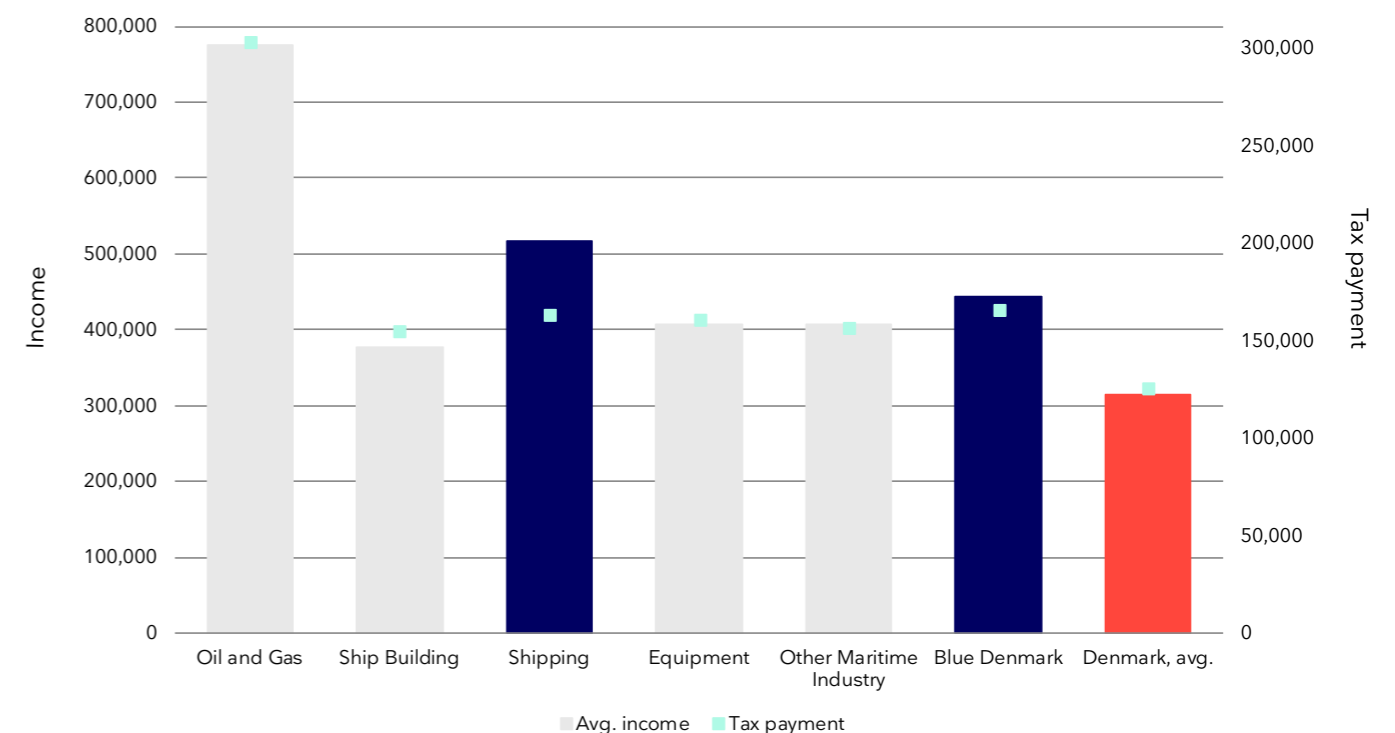
Shipping secures employment

Most Danish tonnage is owned by shipping companies situated around the capital, Copenhagen. Even though the companies have their headquarters in or around the capital new data illuminates the positive impact of shipping in peripheral and rural districts of Denmark.

Two out of three Danish seafarers live in the peripheral and rural municipalities. This is almost twice the total share of adults living in these municipalities. Thus, there is a large overrepresentation of seafarers in the countryside.

The Danish maritime cluster is referred to as 'The Blue Denmark'. According to the Danish Ministry of Business, Industry and Financial Affairs, the total employment in the maritime cluster is 95.000 jobs. With regard to income and tax payments, the size of shipping is among the top contributors in the maritime cluster. The Danish maritime task force that has worked in 2016 and 2017 has concluded that shipping companies comprise the core of the maritime cluster in Denmark.

Salaries and Tax Payment from Employees in Blue Denmark



Source: COWI/The Economich Council of the Labour Movement

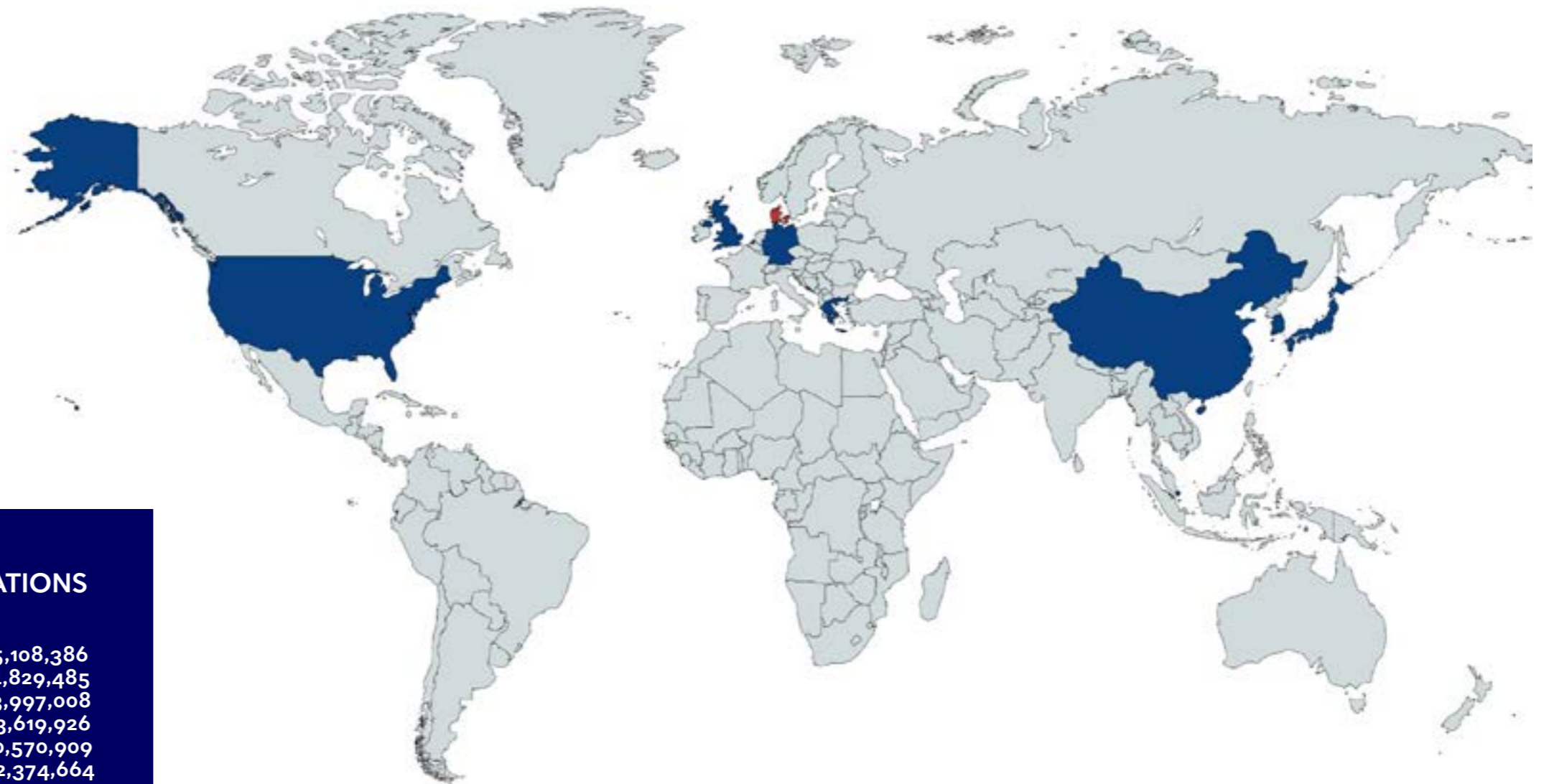
Global Merchant Fleet

Denmark moves from number eight to seven on the global ranking of operator nations, making Denmark the only country to advance on the list. Denmark also advances on the list of flag states moving from number 14 to 13.

With fierce competition among shipping companies globally, the Danish-controlled fleet has managed to advance and outpace the South Korean fleet. The South Korean shipping company Hanjin went bankrupt in early 2017 partly due to the overcapacity in the global shipping industry. This has had an effect on South Korea's ranking on the list of operator nations.

From first quarter of 2017 to the third quarter of 2017, the Danish-controlled fleet measured by operated tonnage has grown from 57 million GT to approximately 60.5 million GT

On top of the list, Greece, China and the United States of America are expanding their respective fleets at the same rapid speed as Denmark. Whereas, Japan, Germany and South Korea are losing ground and have reduced the fleet in 2017. This has resulted in Denmark almost catching up with Germany on the sixth place. Thus, Denmark is close to reaching top-two of merchant fleets in the EU after Greece, if the positive development continues, and the Danish fleet keeps expanding.

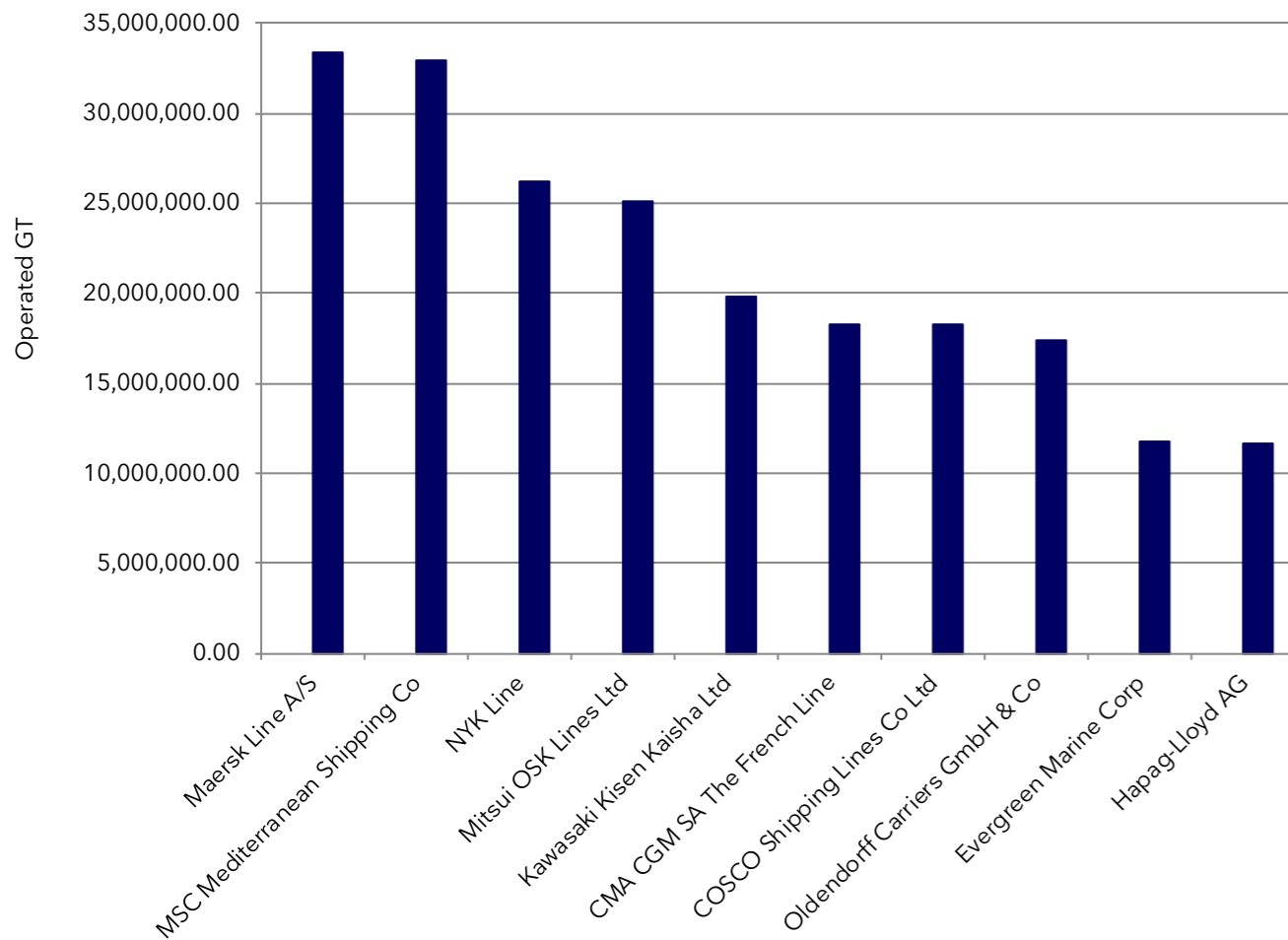


TOP TEN OPERATOR NATIONS (GT)

1. Greece	155,108,386
2. Japan	124,829,485
3. China	103,997,008
4. Singapore	93,619,926
5. USA	70,570,909
6. Germany	62,374,664
7. Denmark	60,492,994
8. South Korea	55,582,449
9. UK	51,095,108
10. Hong Kong	49,512,587

Source: IHS/SEAWEB

Top Ten Operators



Source: IHS/SEAWEB

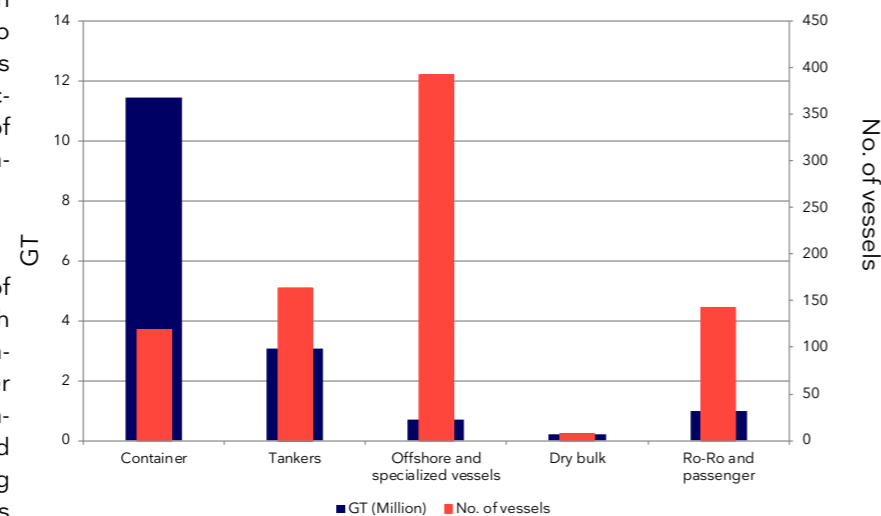
Maersk Line tops the list of operators

Since April 2017, Maersk Line has expanded its operated tonnage by 2.5 million GT. Maersk Line's ownership of MCC, Safmarine and Mercosul is not included in this ranking, and when taking the whole A.P Moller-Maersk Group into consideration, the leading position becomes even more evident. MSC is considered the second largest operator worldwide. Seven out of ten shipping operators on the Top Ten Operators have increased their size during 2017.

The Danish-operated merchant fleet

Illustrated on the right side is the distribution of the Danish-operated merchant fleet. Though tankers comprise the largest segment measured on the number of vessels, container ships by far comprises the largest share measured in GT. Note that the Danish-operated merchant fleet not only contains vessels flying the Danish flag, but also ships flying other flags operated from Denmark.

Danish Operated Merchant Fleet



Source: IHS/SEAWEB

EU-FLAGGED MERCHANT FLEET (GT)

Malta	72,264,325
Greece	41,417,968
Cyprus	22,043,860
Denmark	16,401,801
United Kingdom	15,855,636
Italy	15,753,000
Portugal	13,948,457
Germany	9,360,686
Netherlands	6,885,749
France	6,092,212
Belgium	5,316,213
Spain	2,424,550
Sweden	2,115,113
Luxembourg	1,714,710
Finland	1,590,546
Croatia	1,270,516
Estonia	384,873
Lithuania	361,307
Ireland	209,139
Latvia	131,785
Bulgaria	104,480
Poland	93,441
Romania	37,807
Slovenia	2,260

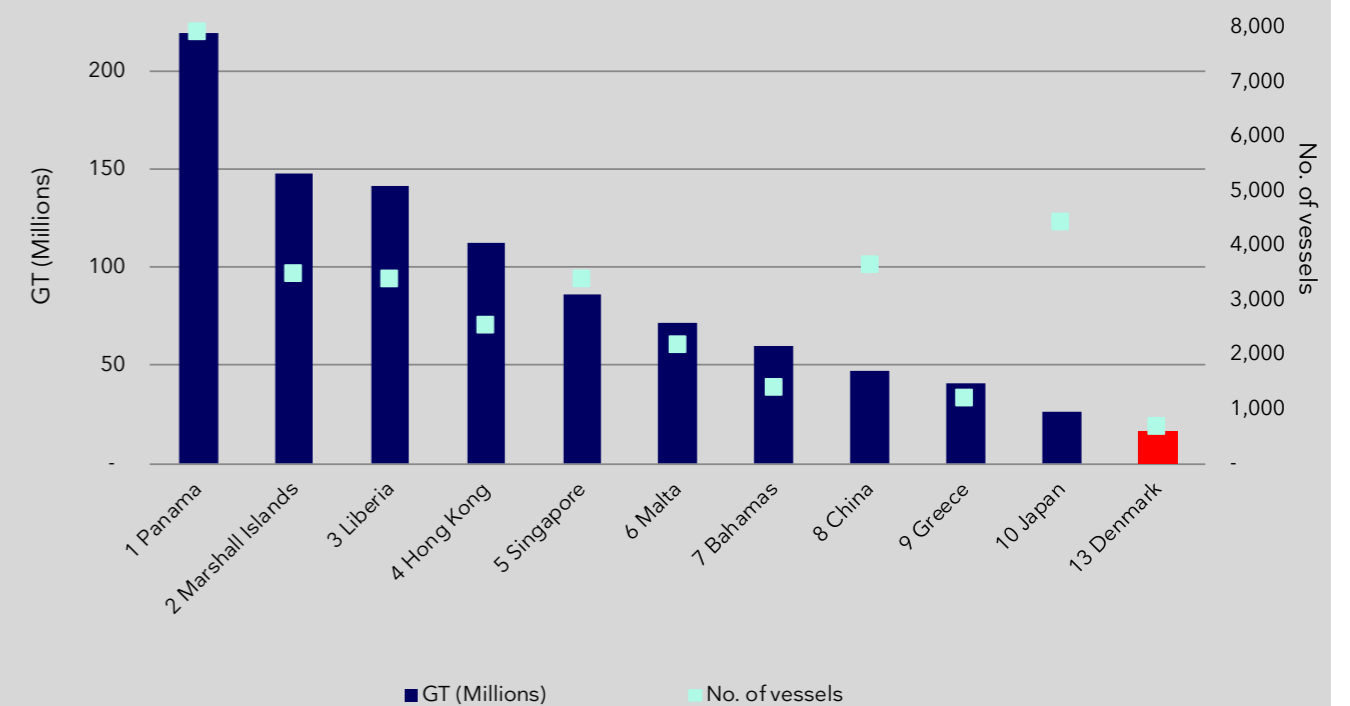
Denmark outpaces Italy

While the EU-flagged merchant fleet is stagnating, Denmark has advanced on the list and left Italy behind. Thus, Denmark is now number four on the list, while holding a fifth-place in April 2017. This is due to a growth in the Danish-flagged merchant fleet rather than a decrease in the Italian-flagged merchant fleet. On the top of the list, Malta has expanded its fleet by more than four million GT. Also, Portugal has increased its fleet considerably through the last couple of years, which is mainly due to the success of the open MAR-register.

... Due to growth in the Danish flag

Among the top global flag states, Denmark has advanced on the list from number 14 to 13 during 2017 leaving the UK and Isle of Man behind. While being very close to catching up with Indonesia, Denmark as a flag state still has far to go to the global top 10 with Japan being 9.3 million GT ahead of Denmark. In the top of the list, Marshall Islands has surpassed Liberia as number two, whilst Panama is still by far the largest country measured by registered tonnage.

Top Ten Flag States and Denmark



Source: IHS/SEAWEB

World Trade

Despite slow growth in global trade compared to growth in GDP, seaborne trade is expected to rise in the forthcoming years. Asia is the center of global seaborne trade, as approximately half of the global volume of goods is loaded and unloaded in Asia.

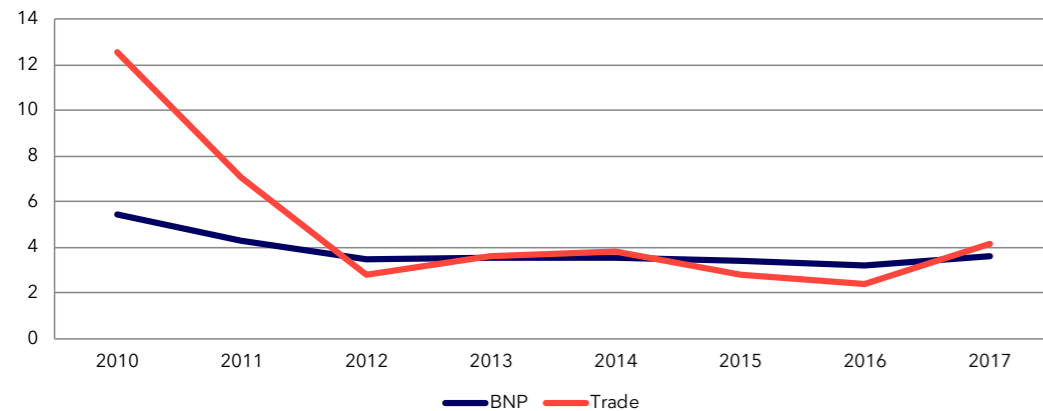
Historically, the growth in global trade has been twice the growth in gross domestic product, GDP. In recent years, this has changed fundamentally. This has had a negative impact on global shipping, as more than 80 pct. of global trade by volume is carried on board ships according to United Nations Conference on Trade and Development, UNCTAD. However, from 2016 to 2017 the annual percentage change in world trade has outpaced the change in GDP.

The global seaborne trade has historically increased by three pct. annually, but reached a low 1.8 pct. in 2015. However, forecasts predict a

rise by 2.8 pct. in 2017 and 3.2 pct. annually in the period 2017 and 2022. The largest increases are expected within containerized trade. Though these forecasts are not certain, they can be considered positive indications for the near future. However, UNCTAD still predicts overcapacity in the shipping market in the forthcoming years.

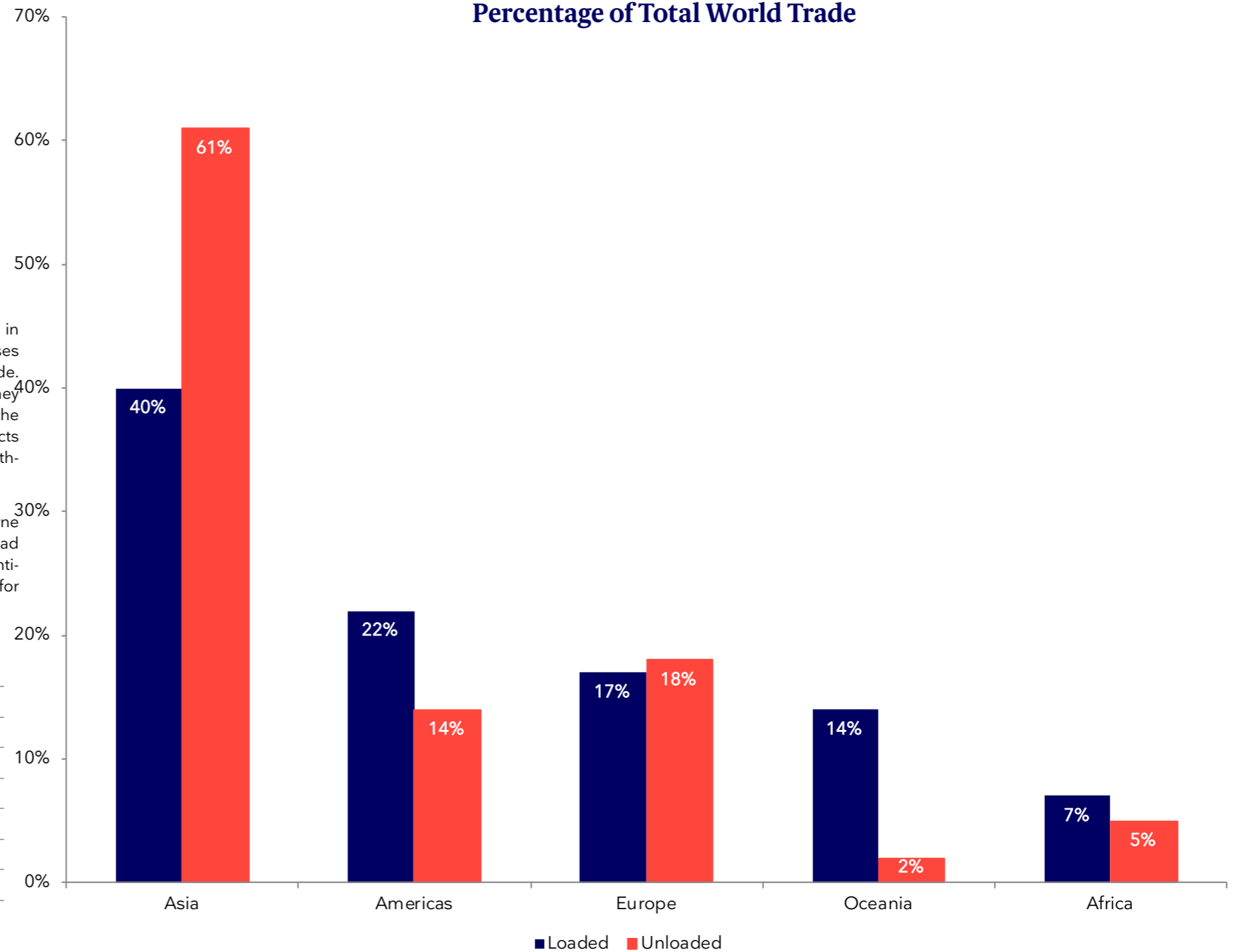
More than half of global volumes of seaborne trade are unloaded in Asia. Despite small load and unload ratios for Africa, the African continent is still considered a growing market for maritime transport in general.

Growth in GDP and World Trade in Annual Percentage



Source: IMF, World Economic Outlook Database, October 2017

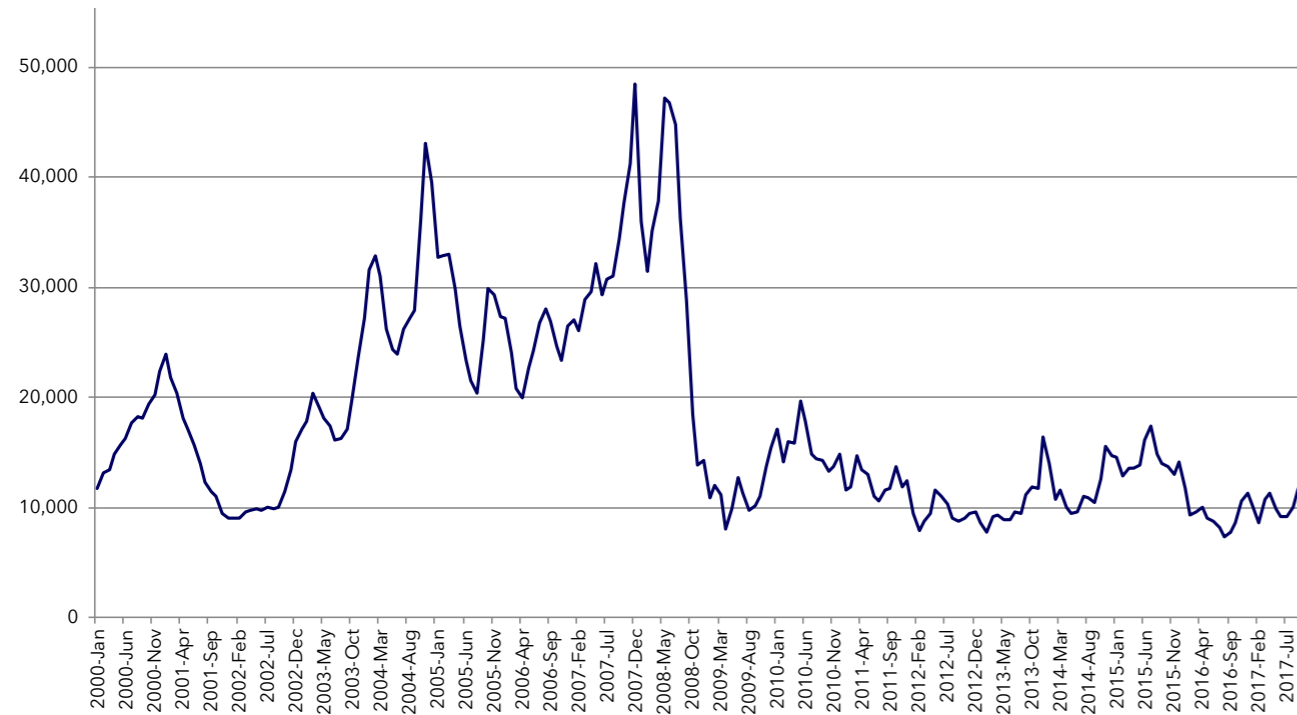
Percentage of Total World Trade



Source: Danish Shipping

Shipping Markets

ClarkSea Index



Source: Clarkson

Shipping markets improve slowly

Shipping markets remain subdued in a historical perspective. However, despite the historical low average daily earnings, the ClarkSea Index has grown by almost 30 pct. from June until November 2017.

The growth is significant, but one should keep in mind that the growth rates in 2017 do not necessarily reflect a linear curve in the forthcoming years. There are no indications that the average daily earnings measured in USD are to reach the pre-financial crisis highs. Rather, the ClarkSea Index is expected to fluctuate around the present levels, potentially with small improvements in the forthcoming years.

In general, the current average daily earnings are around one-third of the highest levels just before the financial crisis of 2008, but still the average daily earnings have grown by 75 pct. of the historical low numbers observed in August 2016.



WHAT IS CLARKSEA INDEX?

The ClarkSea Index is a broad index across different shipping segments. It measures average daily earning in US dollars in tankers, dry bulk and container, and is widely regarded as the best measure for the current state of the shipping markets.

Freight levels the highest in four years

Ten year ago in November 2007, the average of time charter rates for bulk carriers were seven times higher than in November 2017. Only once since 2010 has the Baltic Dry Index reached a level above 2,000. This development points to the fact that the dry bulk markets have not yet recovered from the financial crisis in 2008.

On a positive note, the rates in November 2017 are the highest since the end of 2013. Thus, there is reason to believe that the historical low rates in the beginning of 2016 are history, and rates will remain at a higher level in the forthcoming years.

Yet, there are no indications that the bulk market will reach the high levels from the mid-2000's again in the near future. One indication is the fact that more vessels have been built in 2017, thus contributing to an overcapacity in the market. Also, the Baltic Dry Index was at a stable level below 2,000 in the beginning of this millennium, just as reflected in the numbers between 2014 and 2017.

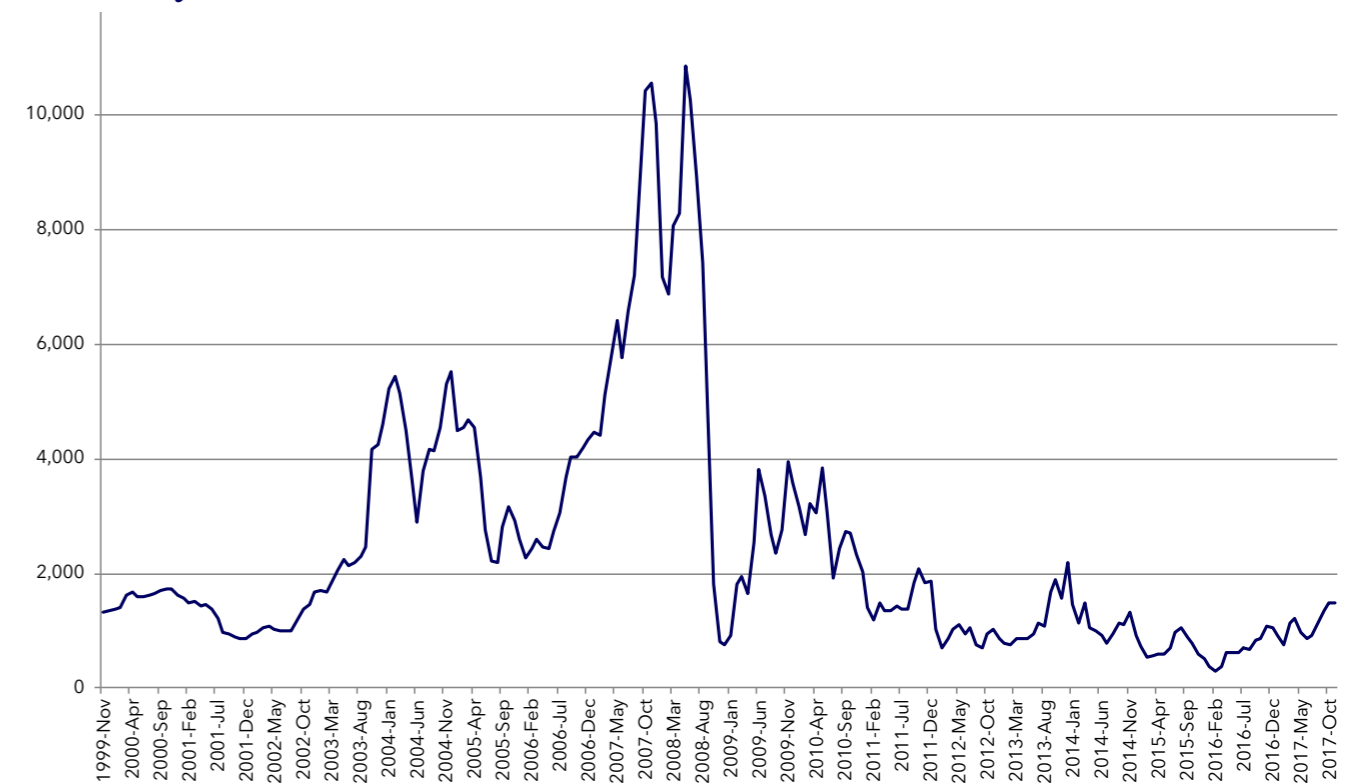


WHAT IS BALTIC DRY INDEX?

The Baltic Dry Index is an average of time charter rates in four dry bulk segments: Capesize, panamax, handymax and handysize.

As such, the BDI can be considered as an indicator for future economic activity. The BDI was indexed at 1,000 at

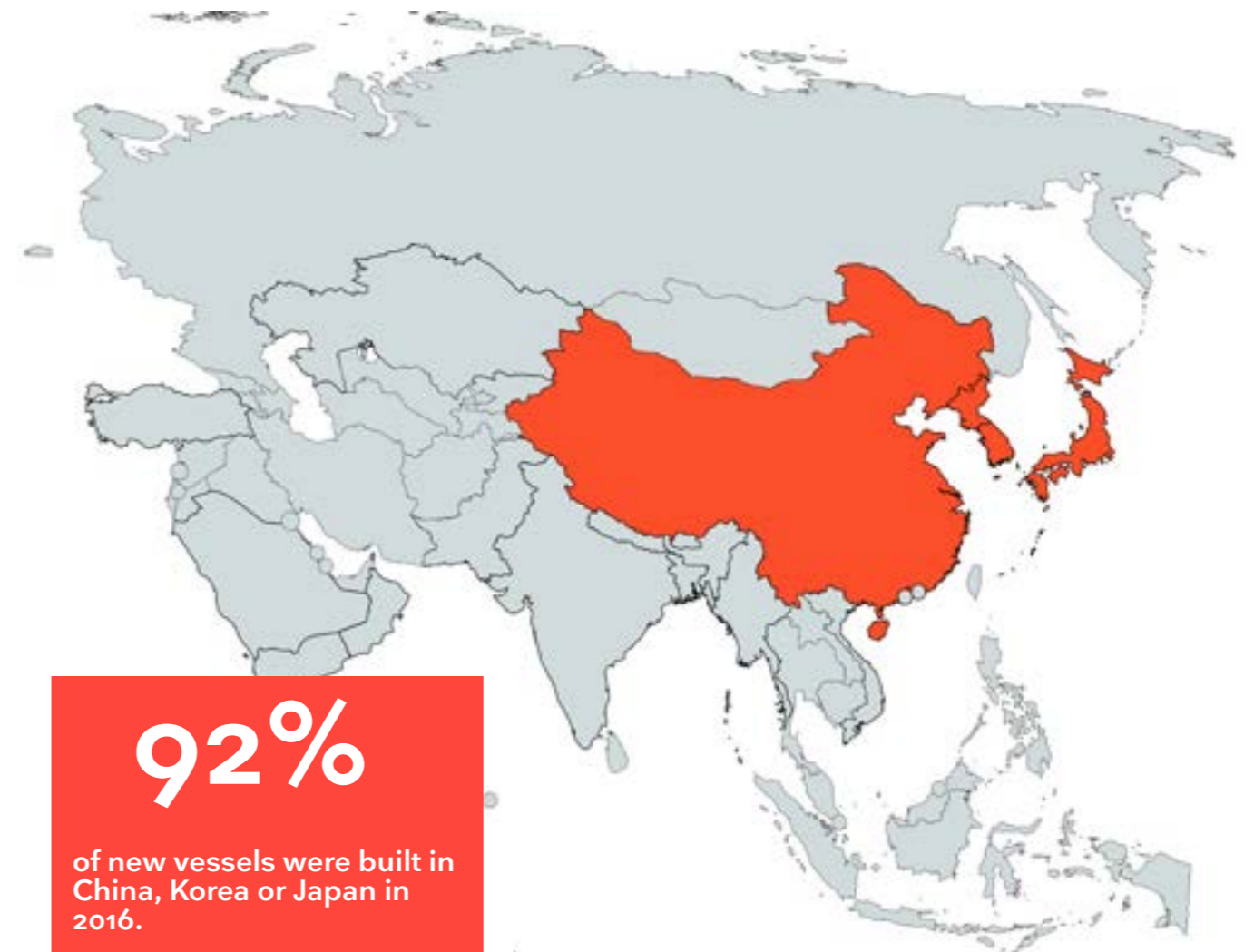
Baltic Dry Index



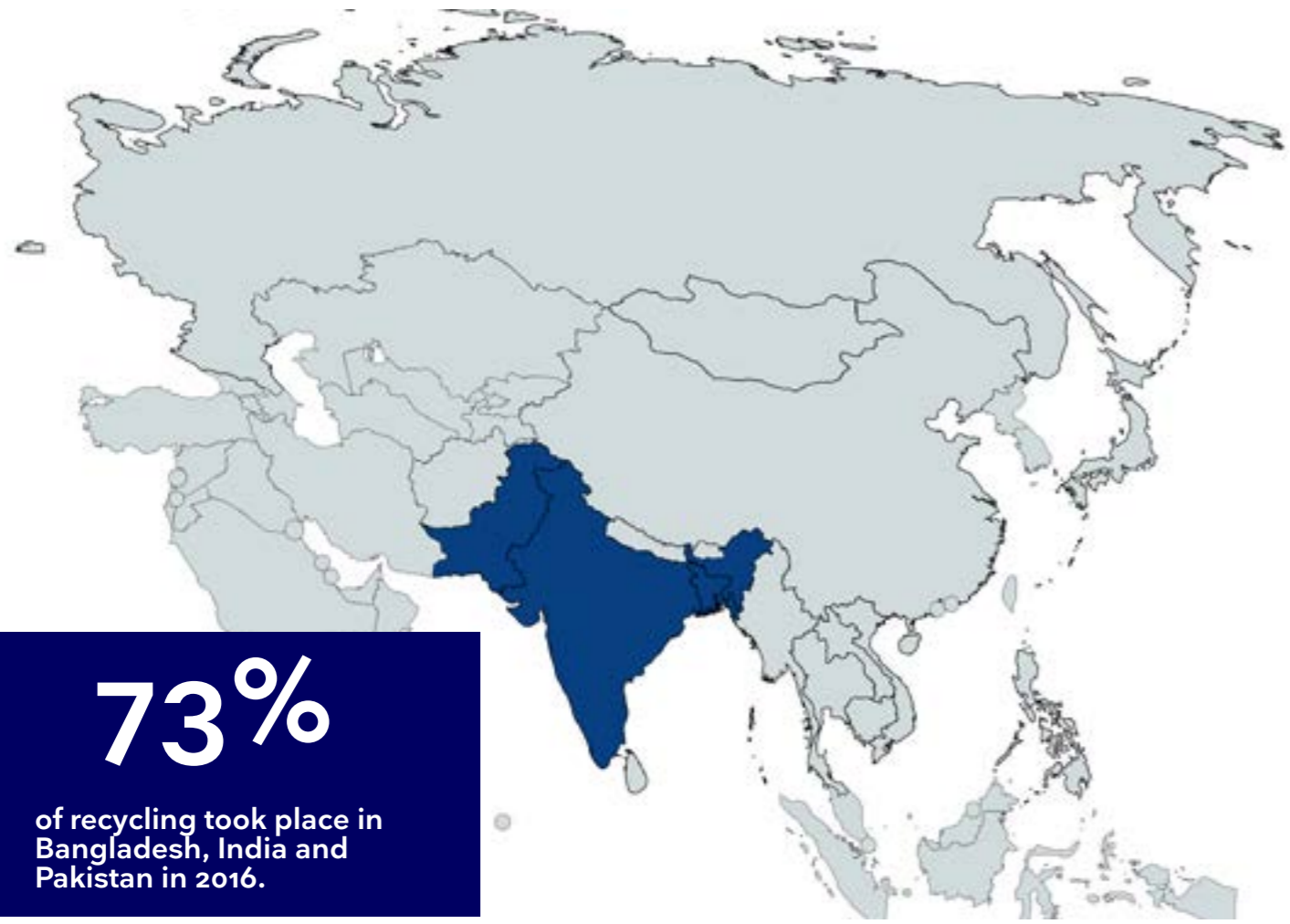
Source: Clarkson

Ship Building and Recycling

Asia is a hot spot for both building and recycling vessels. 73 pct. of recycling and 92 pct. of new buildings are based in the region. Korea and Japan are reknown for new buildings, while India, Bangladesh and Pakistan are frequently used for recycling.



92%
of new vessels were built in China, Korea or Japan in 2016.



73%
of recycling took place in Bangladesh, India and Pakistan in 2016.

104
vessels are currently to be built by shipping companies operating from Denmark

Asia leading global ship building

More than 90 pct. of ships are built in China, South Korea and Japan. The general forecast is that the three countries will remain the primary ship building countries in the near future.

When it comes to new buildings, Danish owners still ranks sixth among the countries with the largest stock of newbuildings in the pipelines based on gross tonnage.

And ship recycling also takes place in Asia

Bangladesh, India and Pakistan accounted for 87 pct. of ship recycling, based on gross tonnage recycled in 2016. According to UNCTAD, 73 pct. of all ships globally were recycled in the three countries in 2016. The average recycling age for ships has decreased in recent years due to global overcapacity, particularly dry bulk recycling has intensified.

Danish-operated fleet is also built in Asia

Looking closer at the Danish fleet measured by operated tonnage, it becomes evident that China, South Korea and Japan remain the largest ship building countries of ships operated from Denmark. Almost half of the ships are built in South Korea, whereas 17 pct. of the ships are built in China and 15 pct. in Japan. Almost 80 pct. of the Danish fleet will thus be built in these three countries. 10 pct. of the gross tonnage in the current Danish-operated fleet is, however, still built in Denmark.

Trading of Secondhand Vessels

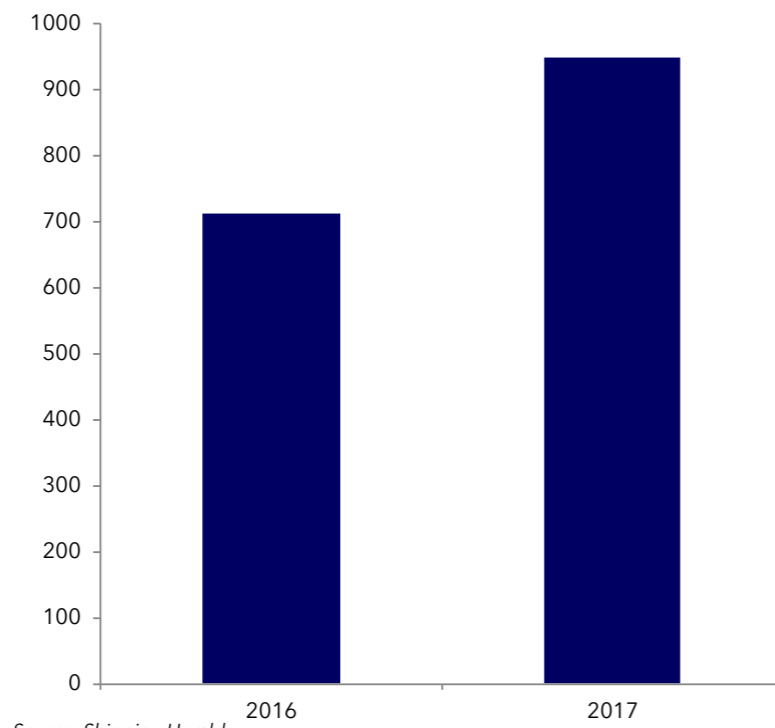
Ships are traded more frequently

Trading of secondhand vessels have increased during the first seven months of 2017. The trade rose by 33 pct. compared to the same time period in 2016 according to the Shipping Herald, as illustrated in the figure to the right.

This increase in trading of secondhand vessels is expected to continue to rise within the next couple of years, though the costs of registration still comprise a certain entry barrier in some shipping countries.

33%

increase in trade with
secondhand vessels in 2017



Source: Shipping Herald

