

Hellenic Observatory of Corporate Governance

Boards in Greek Maritime Listed Companies:

Findings from the sixth Review



London, 2016

TABLE OF CONTENTS

1 INTRODUCTION	4
SECTION 1.1: DEVELOPMENTS IN 2014-2015	5
SECTION 1.2: GREEK SHIPPING INDUSTRY	11
2. METHODOLOGY	15
SECTION 2.1: POPULATION/SAMPLE	15
SECTION 2.2: VARIABLES ANALYZED	18
3. FINDINGS	20
SECTION 3.1: BOARD DEMOGRAPHICS	20
SECTION 3.2: BOARD SIZE	26
SECTION 3.3: TOTAL MEMBERS SERVED	28
SECTION 3.4: BOARD TENURE	29
SECTION 3.5: CEO DUALITY	35
SECTION 3.6: CHAIRPERSONS AND CEO POSITIONS	37
SECTION 3.7: CROSS DIRECTORSHIPS	37
SECTION 3.8: NON EXECUTIVES (EXTERNAL) DIRECTORS	38
SECTION 3.9: COMMITTEES	39
4. SUMMARY	41
5. THE CASE STUDY – NAVIOS GROUP	43
5. REFERENCES	44

Editorial

2016 marks the tenth year since the inception and development of the Hellenic Observatory of Corporate Governance. In those 10 years, **seventeen** reports have been produced and published providing a sound base for a deeper understanding and systematic study of the Board of Directors and Corporate Governance in Greece.

This review builds upon previous findings presented in **five** published reports by the HOCG (Vol. 7, No.02, 2014, Vol. 6, No. 2 in 2012, Vol. 5, No. 1 in 2011, Vol. 4, No. 3 in 2010 and Vol. 3 No. 3 in 2009) that portrayed a dynamic picture of the board composition of Greek Maritime Companies listed in international bourses.

Shipping markets can easily be characterised as volatile, dynamic and munificent. They are influenced not only by the industry players but also from worldwide economic, political and social factors. Setting aside the deep shipping recession in the 1980s, it is quite clear that the shipping industry has not yet fully recovered from the 2008 financial crisis.

In many sectors, the daily rate in US\$ dollars that a ship could earn in 2016 was manifold lower than in 2008 insufficient to cover vessel's' operating costs. Sector's overcapacity and slowing worldwide demand are the pillars for the pressures that the shipping industry is called to face.

The prominent role of the Greek maritime industry in the worldwide trade is providing us with the challenge to capture one of the most important aspects of its major participants by our study; which aims to investigate the Boards and Governance mechanisms of a small but extremely significant population of the shipping world. That is the Greek owned shipping companies that are listed around the world.

Therefore, I am proud to provide our readers with the research report, which builds upon data, gather from 2001 to 2015 inclusive.

I hope that believe that will help us to understand better important aspects of how Maritime firms are managed and prosper.

Dr Dimitrios N. Koufopoulos *BSc, MBA, PhD, AIIA, MCMI, FIC, MCSI*

RevVer: 2017-08-02

Boards in Greek Maritime Listed Companies: 2002- 2016

1. Introduction

The importance of maritime industry is profound for the global economic and trade reality since 80% of the global merchandise volume is transported by sea, the most economically efficient mean of mass volume transport. There are many different kinds of vessels and they are categorized according to their capacity, roles and their design to serve specific trade routes:

- **Handymax:** Small size dry bulk ships with a capacity less than 60,000 Deadweight tonnage (DWT)
- **Supramax:** Dry bulk ships with a capacity between 50,000 to 60,000 Deadweight tonnage (DWT).
- **Panamax:** The largest acceptable size to transit the Panama Canal, that can be applied to both freighters and tankers. Their average capacity is about 65,000 dwt.
- **Aframax:** Crude and product tankers having a size between 80,000 and 120,000 dwt.
- **Capesize:** Ships with capacity over 150,000 dwt that handle raw materials, such as iron ore and coal.
- **Suezmax:** Tankers whose capacity is between 120,000 and 200,000 dwt
- **VLOC / ULOC:** Very Large Ore Carrier / Ultra Large Ore Carrier. A specific bulk carrier class above 200,000 dwt designed to carry iron ore.
- **VLCC:** Very Large Crude Carriers, 150,000 to 320,000 dwt in size.
- **ULCC:** Ultra Large Crude Carriers, more than 320,000 dwt in size. Used for carrying crude oil on long haul routes from the Persian Gulf to Europe, America and East Asia.

The Maritime industry is volatile, susceptible not only to endogenous factors, like supply and demand of ships, bunker prices and capacity, but also to exogenous factors like geopolitical

instability or extreme weather conditions. These events usually affect many industries and the global economic activity, however, maritime industry tends to respond quite uniquely in comparison with similar industries or even stays unaffected.

On the one hand, EU and USA sanctions to Russia left untouched the sea trade routes, on the other hand the extreme weather conditions in North America during the 2015 winter caused a slow down to the economic activity of the area and consequently to the sea trade.

The financial crisis has transformed the whole sector and especially shipping companies, which interact with the rest of the economic system. Financial institutions and institutional investors became much stricter in financing new or older projects, causing in many cases financial asphyxiation to companies trying to re-finance their debts. Furthermore, changes in legislation regarding corporate tax and the fuels used by ships which should be much more environmentally friendlier are due to come, and these are only in EU.

For the investors and anyone else who wishes to understand the basic trends or how this industry operates, it is fundamental to monitor the Baltic Dry Index, which measures the transport costs of raw materials in different trade routes and summative. The index has 3 sub-indexes each for a different ship size: Capesize, Supramax and Panamax. The trends of the summative index draw a vivid picture of the dry bulk shipping industry and subsequently illustrates the global balance between supply and demand of raw materials. Similar indexes for tankers and containerships have

been issued by the Baltic Exchange and other organizations.

Greece was always playing a pivotal role in the world maritime scene. The entrepreneurial spirit of Greek ship owners is worldwide acknowledged. Therefore, it is very important to

understand the corporate procedures especially in the Greek maritime firms that are public owned. This research has not only academic interest but also provides insights for the corporate world.

1.1 Developments in 2014-2015

During this period, regional tensions have risen and hard geopolitical games were evident. Russia's annexation of Crimea and the consequent sanctions from EU and USA, the tensions in South China Sea between China, USA and third parties, EU political and economic instability and recently the UK's referendum affected the sea trade directly and indirectly.

The shipping market was also affected in 2015 by the lower rate of growth in global GDP, in comparison with the previous years, which was a result of the poor performance of the emerging markets and the developing economies. Furthermore, China's change in fossil fuels policy, especially regarding the coal, in combination with the decision of the government of the Philippines to stop the bauxite and ore nickel exports, contributed negatively to market trends.

The banking sector faced many setbacks which forced banks to mitigate their exposure to high risk investments like the maritime sector either by

reconstructing problematic loans or by selling them. At that point, private equity funds dynamically entered the market and rebought high-risk loans from banks or offered financing with very profitable terms. Because the hit from the financial crisis was harder for European banks the ship finance from Asian banks or Export Credit Agencies, like Export Import Bank of China (CEXIM) controlled by the Chinese government, grew. Before the crisis the exposure of these agencies in total debts of the shipping industry was around 10%, by the end of 2015 their exposure represented 33% of the total debts of the shipping industry. Another form of financing, according to KPMG, that emerged during this period is collaborative financing where Export Credit Agencies collaborate with banks to help shipping companies to carry the heavy burden of their financial obligations.

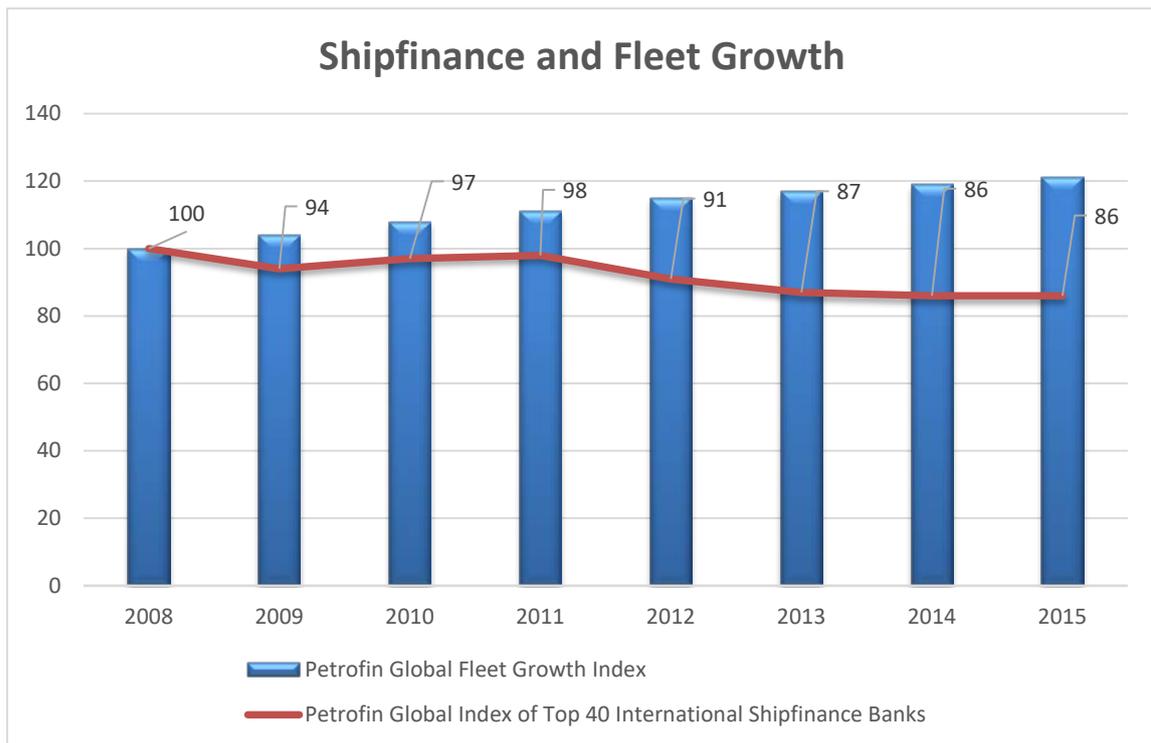


Diagram 1: Shipfinance and Fleet Growth

Petrofin (2015) Global Bank Research, page 4

As the diagram 1 depicts the bank lending not only reduced between 2008 and 2015, but also seem to be unrelated to the global fleet growth. Moreover, traditional loan provider banks to the shipping industry, like RBS and Commerzbank, decided to quit the industry leaving space for a total reshape of the ship finance.

The adverse economic environment led many formerly thriving corporations to economic asphyxiation, cash drain and led them finally to bankruptcy (Petrofin, Global Bank Research, 2015).

All the above-mentioned factors are exogenous to maritime industry causing different trends but as a sector, the shipping industry is affected more from endogenous determinants.

The financial crisis was a hard hit for the world trade and the shipping sector but the combination of that reality with the paramount increase of the world fleet created a vast tonnage surplus, especially in dry bulk carriers. The prices for a new built ship dropped resulting to a massive wave of orders.

World Fleet Development in Mill. dwt

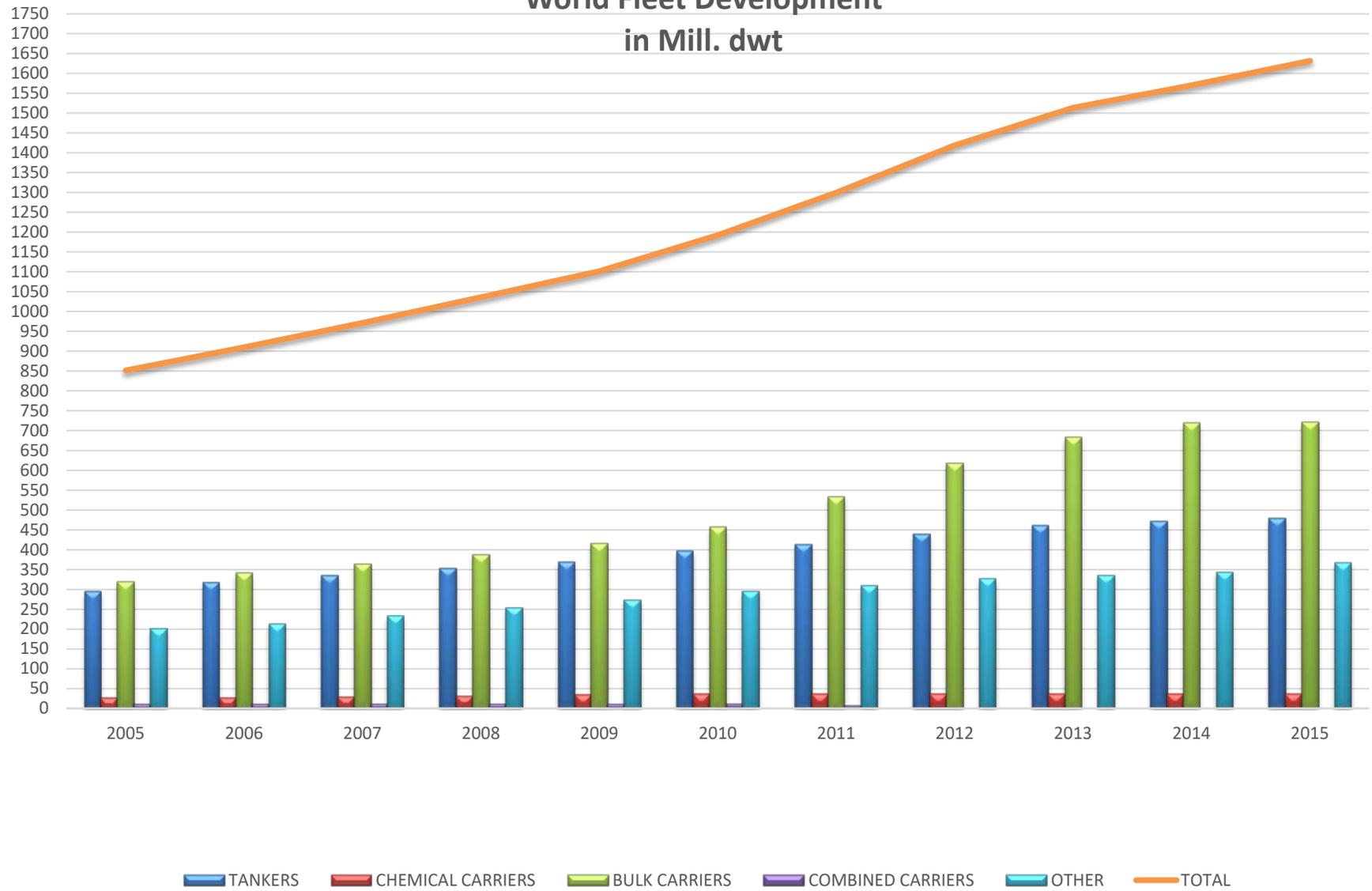


Diagram 2: The World fleet development Source: The Platou Report 2015

After these ship deliveries imbalance was created between supply and demand in the ship market, forcing freight rates down. In many cases ships, could not break even with the daily operating expenses. More ships remained idle, new

deliveries were postponed and the utilization of the fleet remained low.

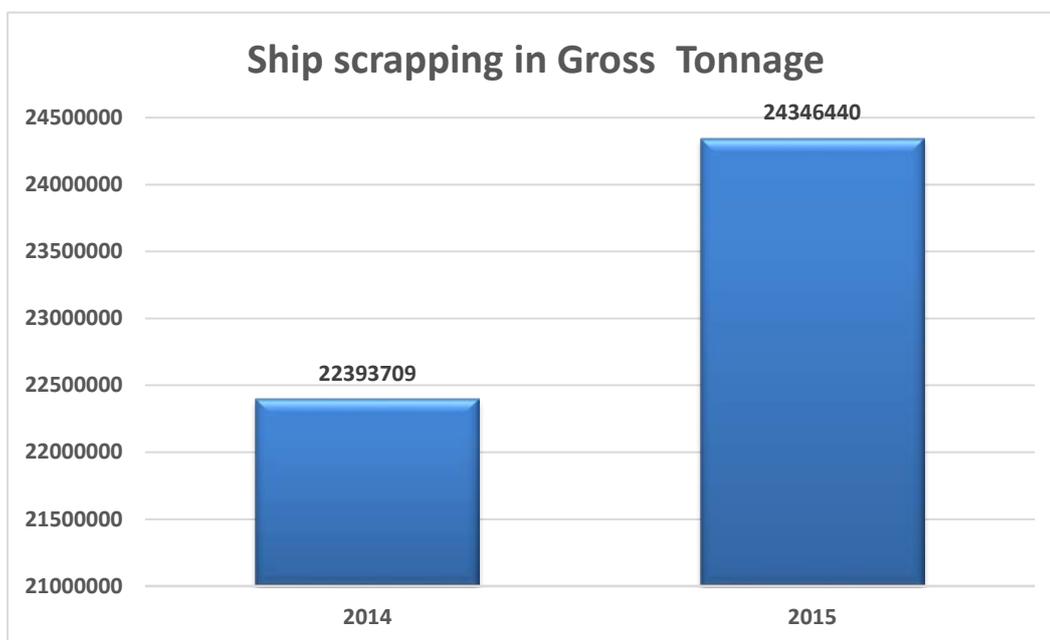


Diagram 3: Ship scrapping in Gross Tonnage

Source: UNCTAD, Review of Maritime Transport 2015

Shipping companies started to sell ships for scrapping, trying to reduce deadweight tonnage surplus and increase fleet utilization. As a result of this process, more young ships, than it was used to, were sent for scrapping reducing the average age of the global fleet and especially the dry bulk fleet (The Platou Report 2015).

Another important endogenous factor is seasonality which affects the market for tankers, dry bulk carriers, LPG and LNG carriers also. There are many trends all over the world affecting different economic sectors but in 2014 the seasonal cool off in South America and the wet from El Nino conditions in West and dry conditions in East slowed down

significantly the palm oil exports, according to an Intermodal's analyst on Hellenic Shipping News (2016).

In the same direction in 2015, the traditional increase in demand before and after the Ramadan for vegetable oils did not occur for India and Pakistan causing significant setback for world trade (Clarksons, 2015).

The few last years the focus in dry bulk market has shifted to grains, which are valuable commodities for emerging and developing economies, creating volatility in the market which emanates from the seasonality of the cargo (Head of Market Research & Asset Valuations of Allied Shipbroking on Hellenic Shipping News,2016).

The shipping market by major vessel type

In Table 1 it is noticed that from January 2013 to January 2014 the world fleet rose by 4.1% and to January 2015

another 3.5%. In January 2015, the world fleet reached a total of 1.75 billion dwt UNCTAD (2015).

World fleet by merchant vessels of 100 GT and above.				
Type of Vessel	2013 .000 of dwt	2014 .000 of dwt	2015 000. of dwt	Percentage change 2014/2015
Oil tankers	472 890 (29.1)	482 447	489 388	1.4%
%	29.1%	28.6%	28.0%	
Bulk carriers	686 635	726 322	760 468	4.4%
Percentage	42.2%	43.1%	43.5%	
General cargo ships	77 589	77 507	76 731	-1.0%
	4.8%	4.6%	4.4%	
Container ships	206 547	215 880	227 741	5.5%
Percentage	12.7%	12.8%	13.0%	
Other types	182 092	185 306	194 893	5.2%
Percentage	11.2%	11.0%	11.1%	
World total	1 625 750	1 689 462	1 749 222	3.5%
	100.0%	100.0%	100.0%	

Table: 1 World fleet by principal vessel types, 2013–2015

Source: UNCTAD (2015) on the basis of data supplied by Clarkson Research Services.

The tanker market

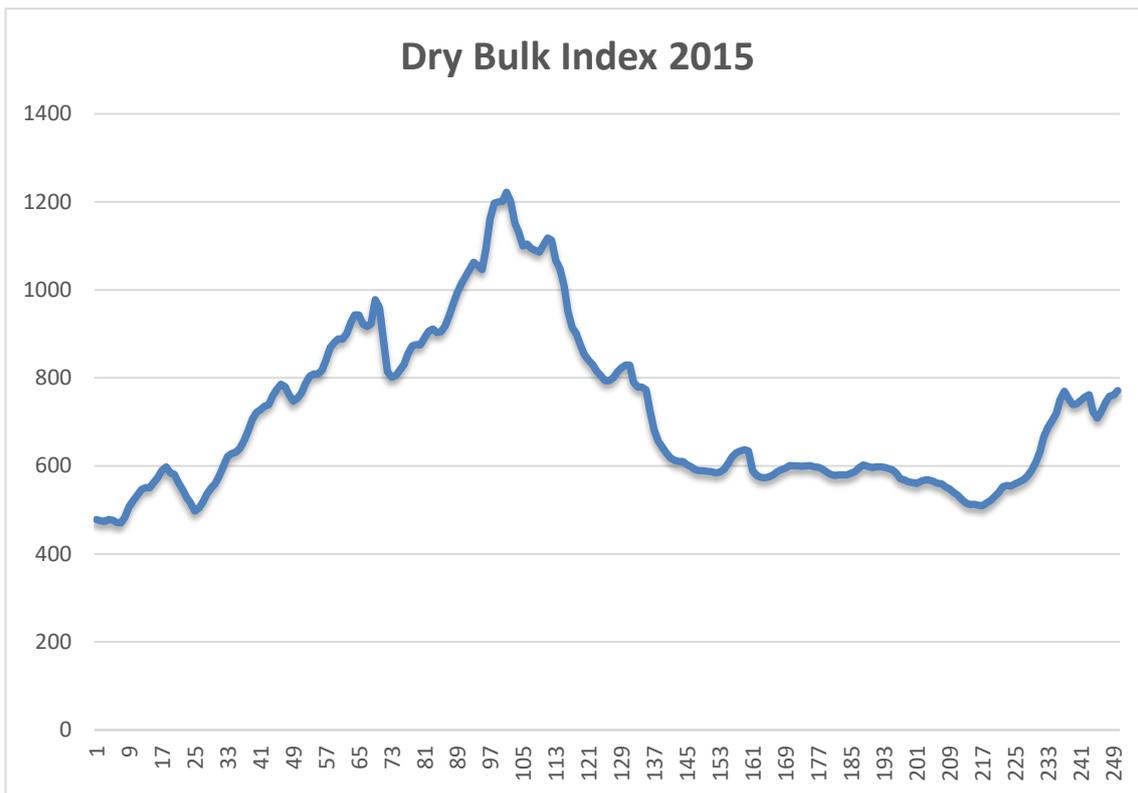
Against all odds and all projections for 2014, which were forecasting a continuing downturn for the market, OPEC's surprising decision to support its market share and not the oil prices led to an increase in oil production, which is always good news for the global tanker fleet. The demand improved especially in the second half of 2014 and continued for the whole 2015 which was the best year for the market since 2008. In addition, strong refinery margins kept the demand for tankers at high levels all year.

The dry bulk carriers market

The dry bulk market in 2014 was in downturn mostly due to the decline in coal imports from China. On the contrary, mid-sized ships benefited by the all-time higher exports from China.

The first half of 2015 was also disastrous leading a paramount number of ships for scrapping. Furthermore, most of the ships were operating below operating expenses level, as shown by the all-time lows in November and in December in BDI (Baltic Dry Index) (The Platou Report 2015).





The container carriers market

The low European demand for containerized goods, the increased imports in US in combination with the over-supply of ships, created by new deliveries (4 year high- 8% increase in fleet in 2015), resulted in poor performance for the period 2014-2015.

The LPG carriers market

2014 was a very good year for the LPG carriers market with a 6% fleet growth and utilization reaching 99% rocketing earnings. Increased US exports by 70% and a healthy 10% from Middle East resulted to such a profitable year. The massive increase in LPG fleet bigger than the increase in demand, moderated earnings.

The LNG carriers market

During 2014 the LNG carriers' fleet not only not only did it witness an increase in utilisation but also in the numbers of carriers, thanks to new LNG port projects and after 2 years of decline the market saw growth. Although 2015 was also a good year, it did not have the same pace due to lower imports in Japan and Korea (UNCTAD 2015).

1.2 Greek Shipping Industry

With long standing history and tradition in the maritime industry, Greece still plays a vital role to the global sea trade. According to Loyd's List Top 2015, the biggest private ship-owner, controlling 143 ships with a total of 26.8 million of Dead-weight tonnage (Dwt), is Mr. John Aggelikousis, who finishes in the 6th place

World fleet ownership by Dwt Top 5 countries

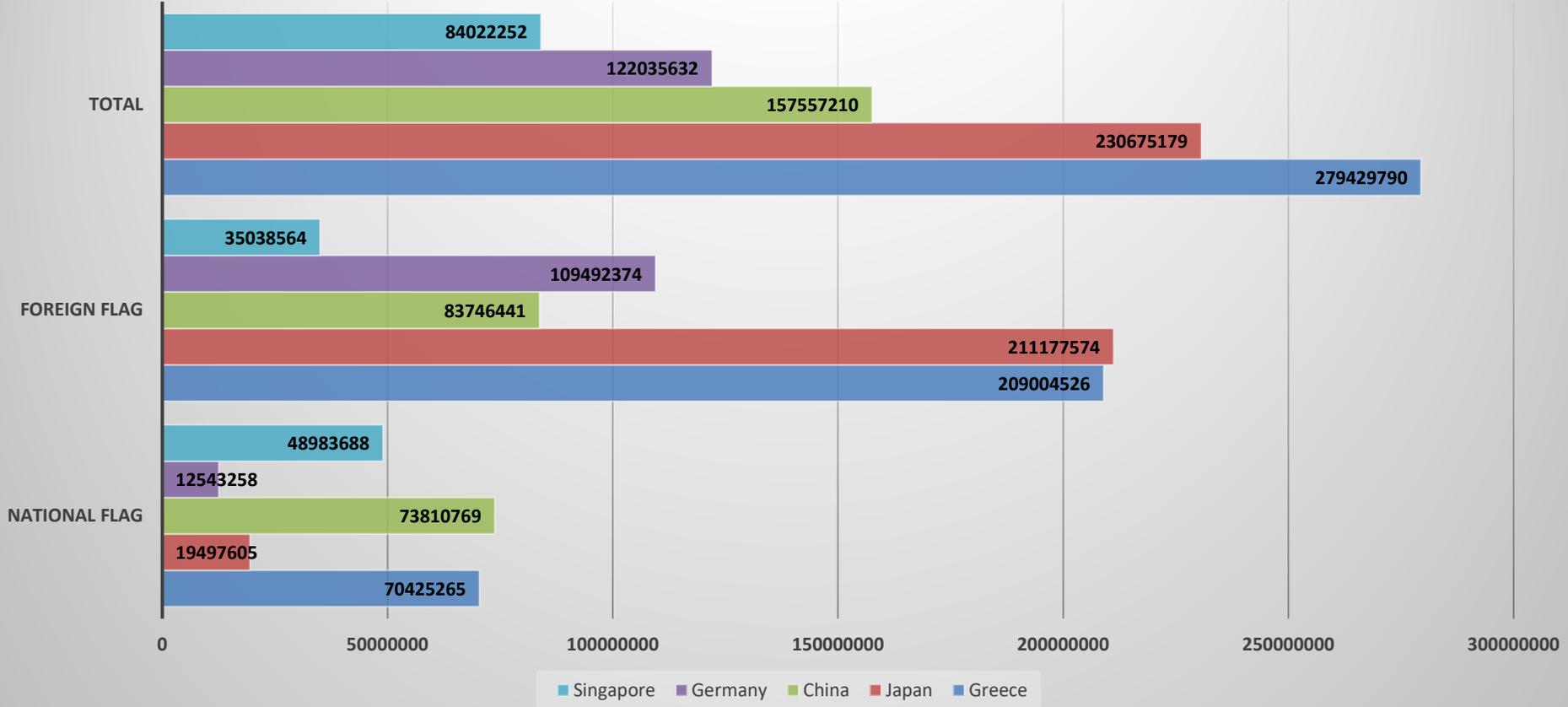


Diagram 5: World Fleet Ownership Source: UNCTAD (2015), page 36

of that list, only after big government-controlled or multinational companies like Cosco, MOL, NYK, China Shipping and AP Moller Maersk. Place (5th) is also occupied by Mr. Aggelikousis in the list with the 100 most influential people in shipping industry. Many more Greek Ship-owners are in the list: Aggeliki Fragkou (16th), George Oikonomou (17th), George Prokopiou (18th), Peter G. Livanos (21st), Petros Pappas (31st), Nikolas Tsakos (45th), Peter Georgiopoulos (47th), Theodore Veniamis (48th), Kostis Konstantakopoulos (52nd), Evangellos Marinakis (65th), Simeon Palios (88th) and Dimitris Melissanidis (98th). Most of them are springs of well-known families in maritime sector. UNCTAD (2015) and

Clarkson's (2015) consider the Greek Merchant fleet to control more than 16% of the total global Dwt, ranking it to the first place above countries like Japan (2nd), China (3rd), Germany (4th) and Singapore (5th). In addition, Greece is ranked 7th globally, regarding the number of registered ships her flag and second in European Union with 796 ships according to the Union of Greek Ship-owners (UGS). Another significant finding is that 40 maritime groups control 64% of the Greek owned merchant fleet (Clarkson's, 2015). Petrofin Research (2015) have found a decrease of 2.99% in the number of Greek owned companies from 668 in 2014 to 648 in 2015.

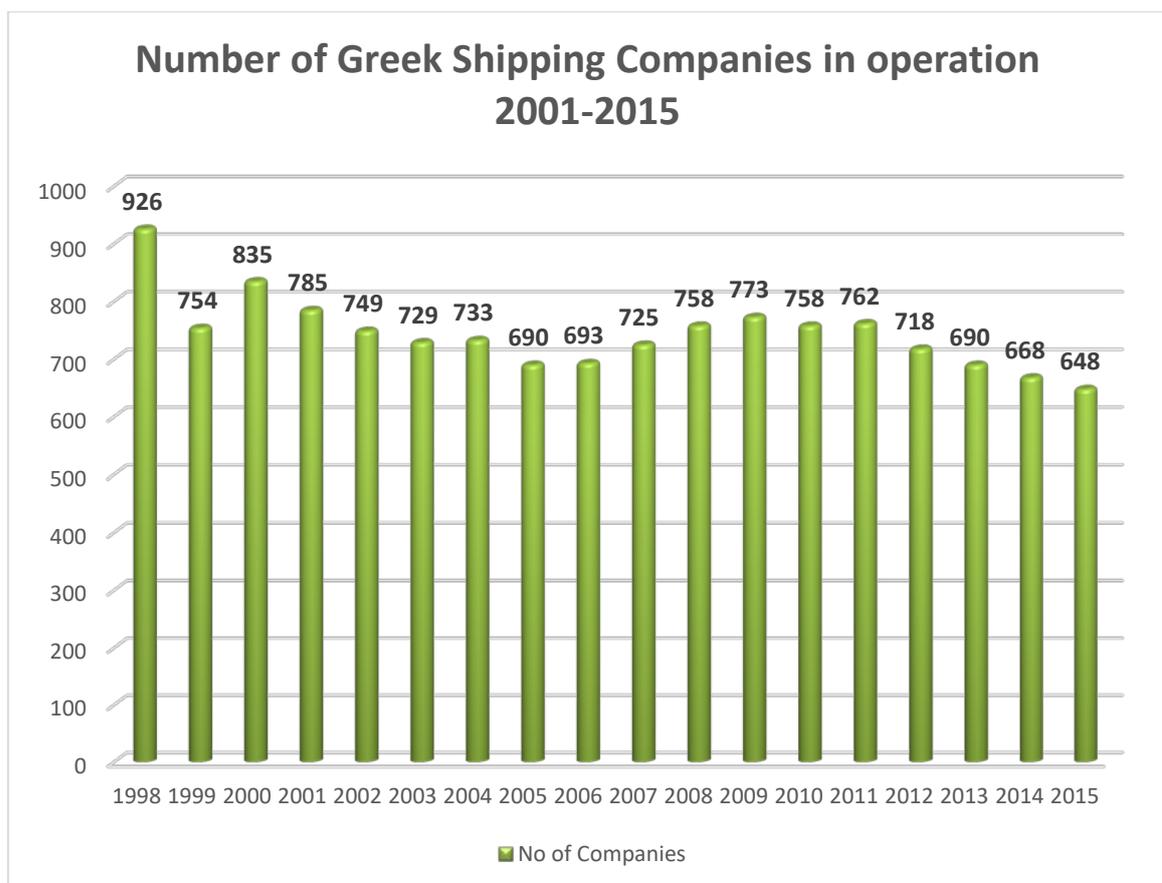


Diagram 6: Number of Greek Shipping Companies in operation 2001-2015

Source: Petrofin Research (2015)

From another point of view, the Greek owned and Greek based fleet increased to 4909 vessels in 2015, from 4707 vessels in 2014. In the same direction moved the overall tonnage of that fleet with an increase of 7.52% reaching 328 254 435 tonnes.

The maritime sector is extremely important for the vulnerable and unstable Greek economy. The maritime services contributed 6.42 billion euros to the Greek government's balance of payments, a rise of 2.13% in contrast with 2014 according to UGS (Year).

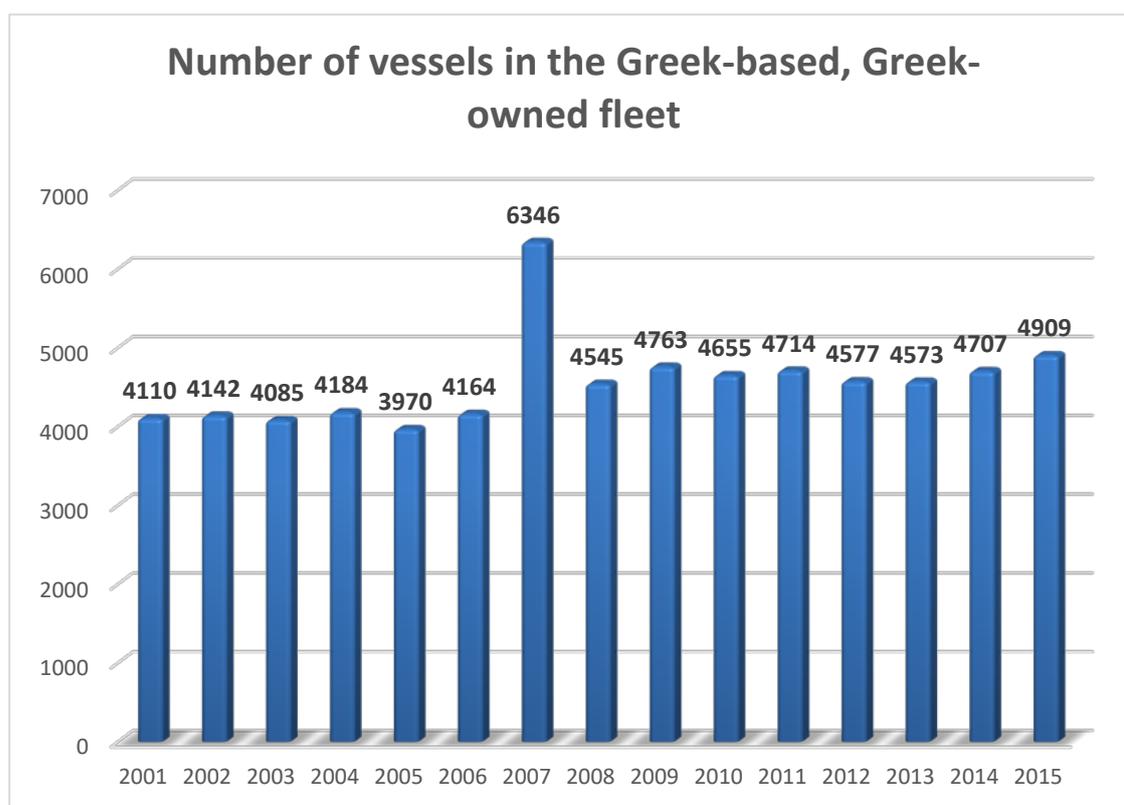


Diagram 7: Number of vessels in the Greek-based, Greek-owned fleet

Source: Petrofin Research (2015)

On the contrary, due to the volatile political and economic conditions and mainly due to the enforcement of capital controls in the Greek banking system in mid-2015 there was a significant decrease in income from maritime services for the state, reaching 30% comparing to 2014 and almost the to the same level as 2009 at the start of the global financial crisis.

Moreover, it could be said that a new practice emerges for Greek ship-owners that of retaining in the Greek banking system only the required amount of capital to finance their businesses (Bank of Greece, 2016).

On the other hand, Greek ship-owners have agreed to extend the voluntary taxation scheme of the shipping community until 2018.

2. Methodology

2.1 Population /Sample

The study focuses on the board characteristics of Greek maritime companies, which are listed in foreign Stock Exchanges. **Diagram 3** illustrates their number throughout the same period. Furthermore, **Table 2** presents the maritime companies included in our study from 2001-2015 and **Table 3** depicts all the significant developments related to these companies.

Table 4 demonstrates the number of IPOs, Mergers & Acquisitions as well as any Delistings of publicly listed Maritime Companies for the period 2001-2015.

Data was collected both from the annual

reports found in the corporate websites of the Greek maritime companies as well as from the websites of the bourses that the companies were listed.

As such the Securities & Exchange Commission (SEC) (www.sec.gov), the New York Stock Exchange (www.nyse.com), the London Stock Exchange (www.londonstockexchange.com), the Nasdaq Stock Market (www.nasdaq.com) and the Singapore Stock Exchange (www.sgx.com) were consulted.

The data collection process took place during the summer of 2016, while the analysis was based on 39 maritime companies.

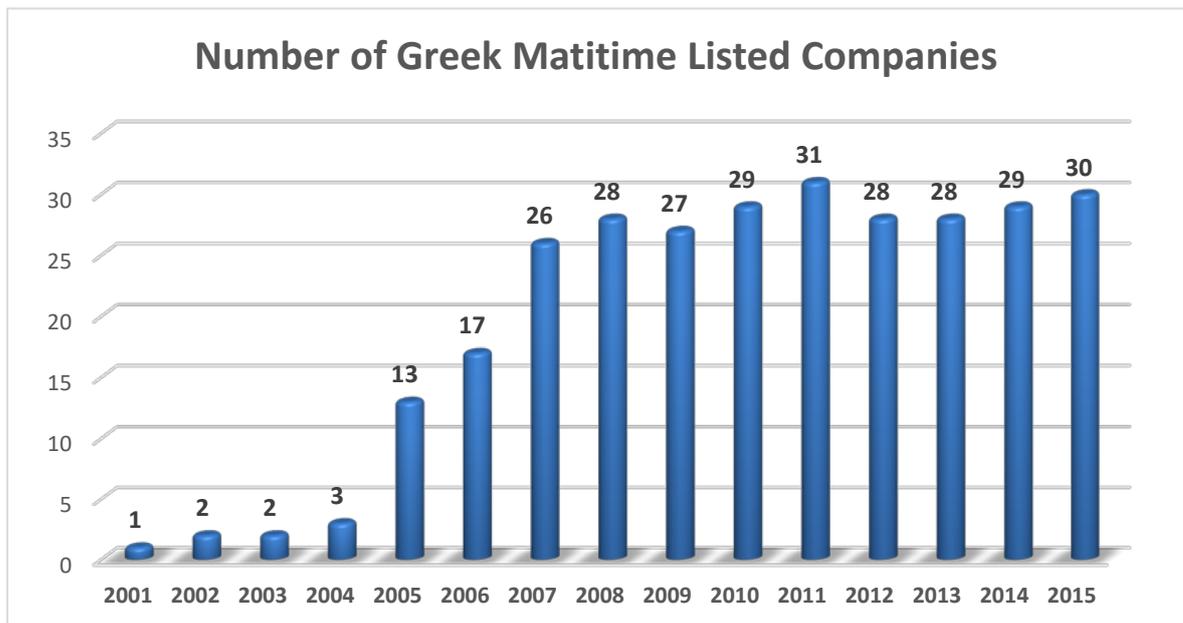


Diagram 8: Number of Greek Maritime Listed Companies (2001-2015)

In the above diagram (diagram 3), it can be observed that after the boom of IPOs between 2005 and 2007, the number of the listed Greek maritime companies in

international stock exchange markets tends to stabilize reaching its maximum value in 2011, with 31 listed companies.

 NYSE New York Stock Exchange			
AEGEAN MARINE PETROLEUM NETWORK INC.(ANW), DEC 2006 	BOX SHIPS (TEU) APRIL 2011 	COSTAMARE(CMRE), NOV 2010 	CRUDE CARRIERS CORP. (CRU), MAR 2010⁵ 
DANAOS CORP (DAC), OCT 2006 	DIANA SHPPING INC. (DSX) MAR 2005 	DORIAN LPG (LPG), MAY 2014 	EXCEL MARITIME CARRIERS (EXM), SEP 2005 
GASLOG LTD (GLOG), MAR 2012 	GENCO SHIPPING & TRADIN.(GNK), JUL 2005 	GENER8 (GNRT), June 2015 	GENERAL MARITIME CORP. (GMR), JUN 2001⁷ 
NAVIOS MARITIME ACQ. (NNA), JUL 2008 	NAVIOS MARITIME PARTNERS (NMM), NOV 2007 	NAVIOS MIDSTREAM PARTNERS L.P. (NAP), 2014 	OCEANAUT INC. (OKN), APR 2007² 
PARAGON SHIPPING INC. (PRGN), MARCH 2010 	SAFE BULKERS INC (SB), MAY 2008 	STAR BULK CARRIERS CORP(SEA), DEC 2005 	TSAKOS ENERGY NAVIGATION (TNP), MAR 2002 
 NASDAQ			
ARIES MARITIME TRANSPORT (RAMS), JUN 2005¹ 	CAPITAL PRODUCT PARTNERS L.P. (CPLP), APR 2007⁵ 	DIANA CONTAINERSHIPS, (DCIX) JUNE 2011 	DRY SHIPS INC. (DRYS), FEB 2005 
EAGLE BULK (EAGLE), JUNE 2005 	EUROSEAS LTD (ESEA), JAN 2007 	GENCO SHIPPING & TRADIN.(GSTL), JUL 2005 	FREESEAS INC (FREE), DEC 2005 
NAVIOS MARITIME HOLDINGS(NM), NOV 2005 	OCEAN FREIGHT INC.(OCNF), APRIL 2007⁴ 	OCEAN RIG(ORIG) OCTOBER 2011 	OMEGA NAVIGATION ENT. (ONAV50), APR 2006 
PARAGON SHIPPING INC. (PRGN), AUG 2007 	PYXIS TANKERS (PXS), OCT 2015 	QUINTANA MARITIME LTD. (QMAR), JUL 2005³ 	SEANERGY MARITIME HOL (SHIP), SEP 2007 
STAR BULK CARRIERS CORP(SBLK), DEC 2007 	STEALTHGAS INC (GASS) OCT 2005 	TOP SHIPS(TOPS) AUG 2004 	
 London Stock Exchange			
GLOBUS MARITIME LTD. (GLBS), JUN 2007 	GOLDENPORT HOLDING INC. (GPRT), APR 2006 	HELLENIC CARRIERS LTD (HCL), NOV. 2007 	
 SGX SINGAPORE EXCHANGE			
OMEGA NAVIGATION ENT. (ONAV50), APR 2006⁶ 			

Table 2: Greek Maritime Listed Enterprises for the period 2001-2015

Notes	Significant Developments (Chronological Order)
Quintana Maritime	On April 15, 2008, Quintana Maritime Limited (QMAR) was merged into Excel Maritime .
Oceanaut	As of April 6, 2009, Oceanaut, Inc. went out of business (<i>Note 2</i>).
Aries Maritime Transport Limited	As of December 21, 2009 Company was renamed ' New Lead Holdings Ltd ' and trades Under the symbol 'NEWL'.
OceanFreight	On November 3, 2011: OceanFreight became a wholly-owned subsidiary of DryShips .
Capital Product Partners LP	On 30th September of 2011, Capital Product Partners completed the acquisition of Crude Carriers Corp. in a unit-for-share transaction, whereby Crude became a wholly-owned subsidiary of CPLP.
Omega Navigation	The Nasdaq Stock Market, Inc. has determined to remove from listing the common stock of Omega Navigation Enterprises, Inc. (the Company), effective at the opening of the trading session on October 17, 2011.
General Maritime	The company filed for chapter 11 bankruptcy protection on 17 November 2011, after oversupply in the shipping industry caused it to lose money for at least eight quarters. In April 2012 General Maritime came out of bankruptcy as a result of investment from Oaktree Capital Management.
Genco	The company due to financial difficulties, filled for voluntary petition of debt relief, consequently the trade of the company's stock in NYSE, stopped on June 17, 2014. After the re-emergence of Genco from bankruptcy, it acquired its subsidiary Baltic Trade and started trading again on July 20, 2015 on NYSE.
Navios Midstream Partners	On November 18, 2014, Navios Midstream Partners completed an Initial Public Offering ("IPO") of its common units, increasing the Navios family members to 4 companies.
Eagle Bulk Shipping	The company stops being under Greek ownership effectively on March 9, 2015.

Table: 3 Significant Developments 2001-2015

From **Table 4** we note that almost half of the shipping companies got listed in the Stock Exchanges within 2005. Besides, in these 15 years we notice 4 mergers & acquisitions (Quintana was merged to Excel Maritime-2008, OceanFreight was acquired by Dryships-2011, Capital Product

Partners acquired Crude Carriers-2011 and Genco acquired Baltic Trading-2015) and 4 companies who got delisted from the Stock Exchanges (Oceanaut-2009, Omega Navigation-2011, General Maritime-2012, Genco-2014).

Year	Number of IPOs	Mergers & Acquisitions	Delisted
2001	1		
2002	1		
2003	0		
2004	1		
2005	11		
2006	4		
2007	8		
2008	2	1	
2009	1		1
2010	2		
2011	2	2	1
2012	2		1
2013			
2014	2		1
2015	2	1	
Total	39	4	4

Table 4: IPOs, Mergers & Acquisitions; & De-listings of Maritime Companies

2.2 Variables analysed

The study examined the following variables for the period 2001-2015.

Board Member age was captured by recording the date of birth of directors and calculating their age for the year ended 31.12.16.

Age of the Chairpersons and the CEOs was captured by recording their date of birth and calculating their age by the end of each year for the period 2001-2015. Furthermore, this variable was classified as:

- Age of sole Chairpersons who served **only** in that position
- Age of sole CEOs who served **only** in that position
- Age in case of duality (The Chairman

and the CEO is the same individual)

Foreign Nationals were counted by looking at the surnames' origin.

The gender of Chairpersons and CEOs was identified by their full names.

Total Board Memberships was captured **for the whole sample** by the number of all directorships through the years. This particular variable captures the number of positions/seats that Boards have, rather than the number of persons (individual directors) that occupy them.

Total Male Board Members (for the whole population and all years) was captured by the absolute number of male directorships that existed within the Boards through the years. The exact number was ascertained by examining both their names and surnames. Further, we calculated the **total male board members** by excluding any cross directorships or/and mobility.

Total Female Board Members (for the whole population and all years) was captured by the absolute number of female directorships that existed within the Boards through the years. The exact number was ascertained by examining their names and surnames. Additionally, we calculated the **total female board members** by excluding any cross directorships or/and mobility.

Board Size was measured by capturing the number of serving directors of each company as of December of each year.

Average Board Size was measured by calculating the average of each company's board size throughout the years.

Total Board Members: was calculated by excluding any mobility and/or cross directorships from the total board memberships. This variable captures the absolute number of directors that serve as board members in one or more companies.

Average Tenure of the Board members (in months) was measured by calculating the sum of the serving period (in months) of all directors (including Chairman and CEO) divided by their total number for each company.

Average Tenure of Board Members (in Months excluding Chairperson and CEO) was measured as the "Average Tenure of the Board" but excluding the Chairperson(s) and the CEO(s).

Average Tenure of Chairpersons and Average Tenure of CEOs was measured by calculating the sum of the serving period (in months) for each company's Chairpersons or CEOs divided by the total number of Chairpersons or CEOs that served in each of the companies throughout the years.

Average tenure of sole Chairpersons and sole CEOs was measured by calculating the sum of the serving period (in months), divided by the total number of sole Chairpersons or sole CEOs that served in each of the companies throughout the years.

The number of Chairpersons and CEOs was calculated by counting the absolute number of Chairpersons and CEO's respectively for each company through the years.

The number of the sole Chairpersons and CEOs was calculated by counting the absolute number of sole Chairpersons and sole CEO's respectively through the years.

CEO Duality, as of December 31st of each year, was captured by examining whether the CEO was also the Chairperson or whether the two positions were separate.

Cross Directorships: the directors that were serving in more than one board simultaneously have been identified and recorded along with the corresponding companies.

Non-Executive (External/Independent Directors): A variable in our study that was measured by calculating the sum of all Independent Directors that served in the Boards of the Companies.

Education Level: A variable in our

study that was captured by recording directors' educational status: 1. College Degree, 2. Bachelor Degree 3. Master Degree or 4. PHD

Committees: We counted the number of committees each year for each company.

3. Findings

3.1 Board demographics

a) Age

Undoubtedly, Age is a significant variable of board composition and academic research has been conducted to determine how the age diversity of a Board of Directors as well as the age of CEO and Chairman can affect the revenue and the profitability of a company.

Some of the findings depict a positive relationship between board members' average age and corporate performance. Simultaneously it has been supported that by expanding the age diversity between the board members, the board's aggregated human and social capital can be maximised.

The average age of the board members follows an upward trend since 2005, when the average age of the board

members was 50.46 years, the lowest value for the whole period. On the contrary, the highest average age for the Board members was back in 2003, with 56.90 years. The upward trend can be explained from the fact that most of the Greek companies in the maritime industry are operated by a closed group of people, as most of them are family owned..

Only in 2015 that upward trend stops and a decrease in the average age of the board members can be observed, which could signify a change in the composition of the boards (retirements of elder directors, new companies etc).

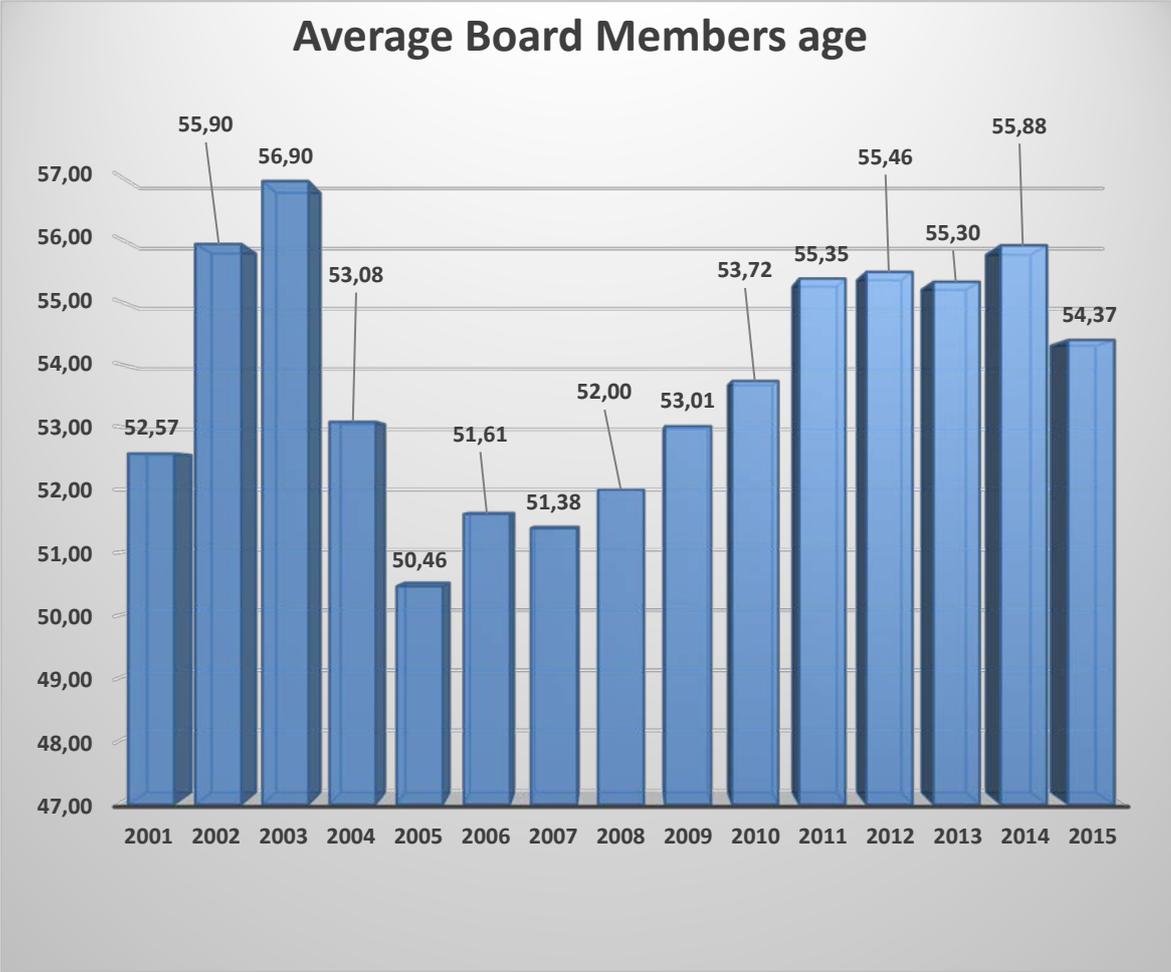


Diagram 04: Average Age of the Board Members

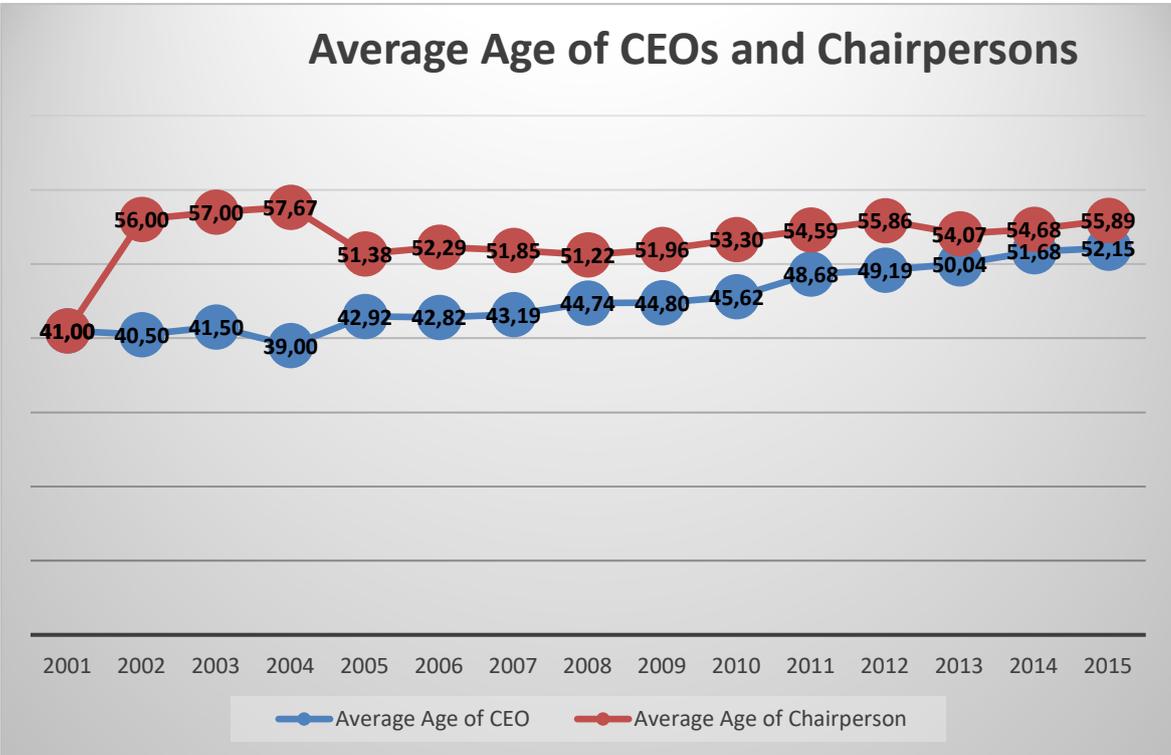


Diagram 5: Average Age of CEOs and Chairpersons

The same upward trend observed in the average age of the board members can be observed also in the average age of the CEOs and the Chairpersons. In 2001, the average age of the CEOs and the Chairpersons was 41 years,

when in 2015 the average age of CEOs was 52.15 years and that of the Chairpersons 55.89 years. Moreover, a convergence between the average ages of the CEOs and Chairpersons after 2005 could be observed.

b) Foreign Nationals (Non-Greeks) in the Board

In Europe and USA the number of foreigners appointed to Board of Directors has increased significantly over the past decade. At the same time, an increasing number of companies around the world include foreign nationals in their Boards in an attempt to expand from a domestic-oriented focus to a more international mind-set.

During these 15 years, 397 directors

served in the 39 firms and **171** members out of these were Non-Greeks Directors.

We should notice that every Board had at least one foreign national as a director, while the maximum number of foreigners identified, in one company, was 16. Moreover, half of the companies (51.48%) had up to 3 foreign nationals in their boards (**Diagram 6**).

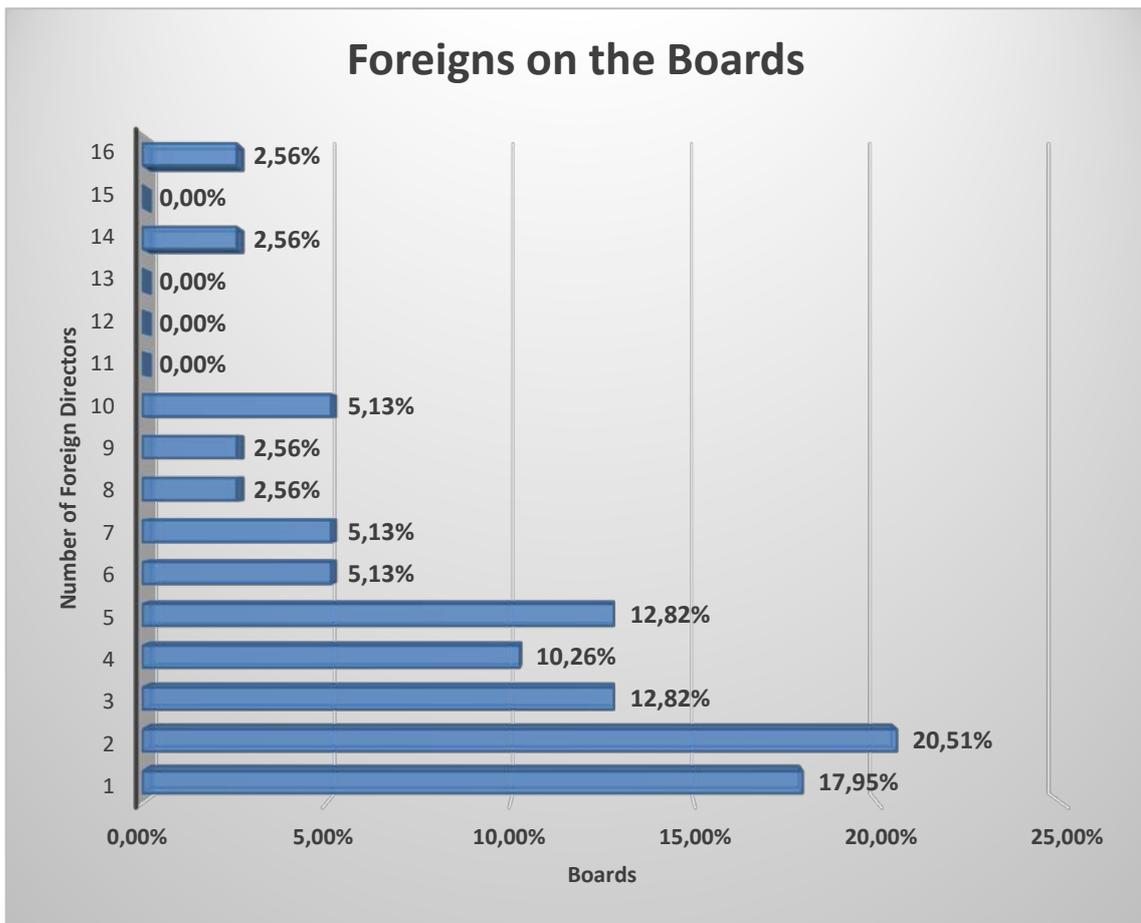


Diagram 6: Number of Foreign Nationals in Greek Maritime Boards (n=39)

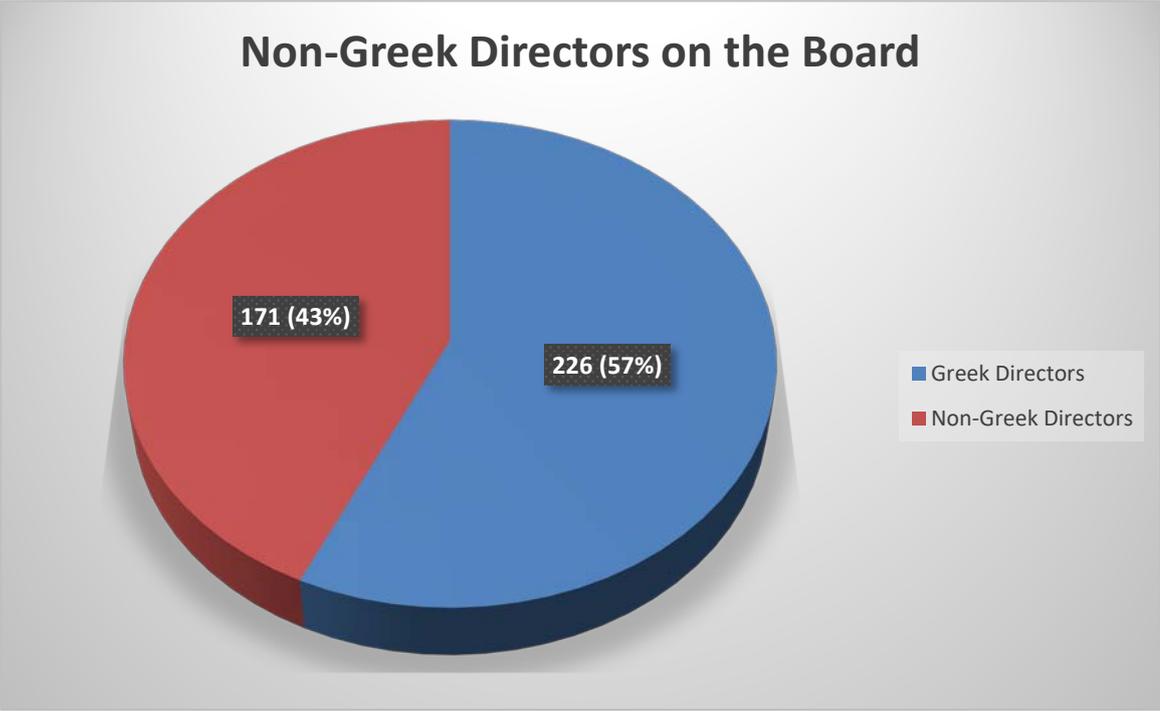


Diagram 7: Non-Greek Directors on the Board

In total 57% of the Board members during 2001-2015 were Greek nationals and a striking 43% were non-Greek, signifying

the ethnic diversity that exists in Greek maritime companies' boards.

c) Gender

Regarding the gender issue, there is a growing body of scholars who support that the appointment of female directors can improve a company's performance and that companies with more women on their boards outperform those with fewer or no female directors. Even though there is a slight increase of women on boards, seats are still barely filled by women. There is no doubt that diverse boards are more able to consider issues in a holistic way and be involved in effective decision making. Female directors enhance board independence and contribute substantially to corporate governance due to their "power sharing" style. Women utilizing their different experiences and knowledge, comparing to their male colleagues,

they bring different cognitive frames to a board (Post & Byron 2015). Gender role theory, dictates that men and women have distinct behavioural patterns based on their gender, not only guiding their behaviour, but also affecting the perception and evaluation of other individuals for them (Smith et al, 2013).

In the 34 companies examined in the period **2001-2015**, 375 out of 397 directorships (BOD positions) were held by men, with an average of 9.62 per company.

Respectively, there were only 22 directorships held by women in with an average of 0.54. Consequently, there is a striking discrepancy in the board composition between men and women, which is depicted in **Table 5**.

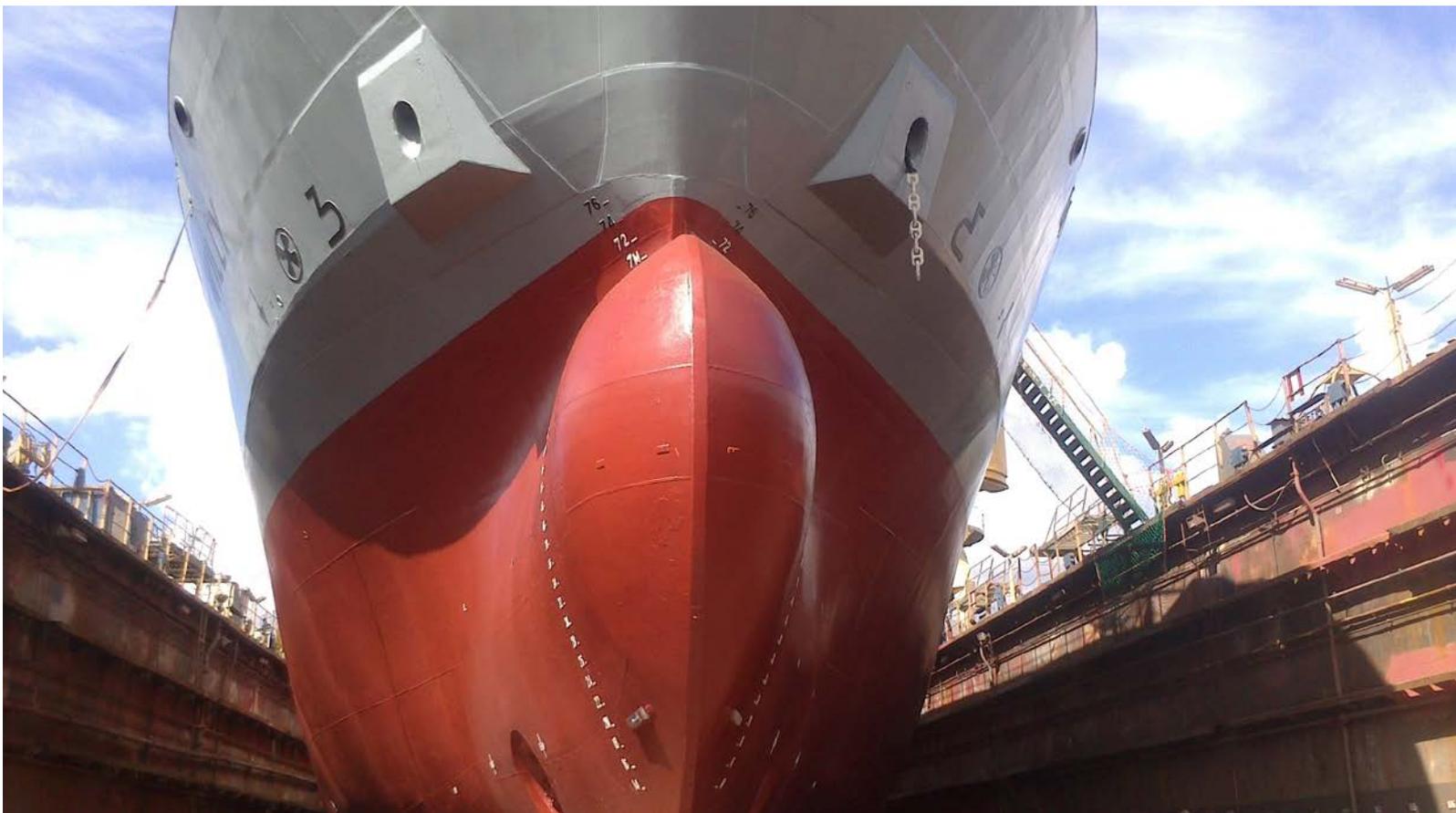
	Total Directorships	Male Directorships	Female Directorships
MEAN	10.15	9.62	0.54
STD.DEV	3.66	3.67	0.96
MIN	5.00	4.00	0.00
MAX	19.00	18.00	4.00
SUM	397	375	22

Table 5: Total Memberships, Men and Women served in Boards (n=39)

The total number of directors was 344 after excluding mobility (6 directors) and cross directorships. Out of these, 327 (95%) were men; while there were only 17 female directors (5%). Only one woman, Mrs. Angeliki Frangou, was simultaneously the Chairman and the CEO of four different maritime companies (Navios Maritime Holdings, Navios Maritime Partners,

Navios Acquisition and Navios Midstream Partners), which preferred the duality structure for their governance. Besides, Mrs. Foteini Karamanlis was the CEO of Hellenic Carriers.

The following Table (**Table 6**) gives us a deeper insight of all the 17 women who are serving in the BOD of Greek Maritime Listed Companies.



FIRST NAME	LAST NAME	POSITION/COMPANY	EDUCATION
Angeliki	Frangou	CHAIRMAN, CEO NAVIOS MP CHAIRMAN, CEO NAVIOS MH CHAIRMAN, CEO NAVIOS ACQUISITION CHAIRMAN, CEO NAVIOS MIDSTREM PARTNERS	Bachelor's degree in mechanical engineering from Fairleigh Dickinson University and a master's degree in mechanical engineering from Columbia University
Charlotte	Stratos	DIRECTOR, COSTAMARE DIRECTOR, HELLENIC CARRIERS	Not Available
Anna	Kalathakis	DIRECTOR, NAVIOS ACQUISITION	MBA from European University at Brussels (1992) and a Juris doctor from Tulane Law School (1995).
Brigitte	Noury	DIRECTOR, NAVIOS ACQUISITION	Master of Economic Sciences degree and a Diploma in Business Administration from the University of Dijon.
Chryssoula	Kandylidis	DIRECTOR, DRYSHIPS	Graduated from Pierce College in Athens and from the Institut Francais d' Athenes. She is also a Graduate of the University of Geneva holding a degree in Economics.
Milena	Pappas	DIRECTOR, STARBULK	Graduated from Cornell University, N.Y. and in 2007 she received a Master of Science (MSc) in Shipping, Trade and Finance degree from Cass University, London.
Fotini	Karamanlis	CEO, HELLENIC CARRIERS	Law degree from the University of Athens and a Master's Degree (LLM) from the University of Cambridge.
Elpida	Kyriakopoulou	CFO HELLENIC CARRIERS	Degree in Maritime Studies from the University of Piraeus, Greece and is a Member of the Greek Association of Certified Accountants.
Christina	Anagnostara	DIRECTOR, SEANERGY	Studied Economics in Athens and has been a Certified Chartered Accountant since 2002.
Vasiliki	Papaefthymiou	DIRECTOR, NAVIOS MH	Received her undergraduate degree from the Law School of the University of Athens and a Master's degree in Maritime Law from Southampton University in the UK.
Miranda	Xafa	DIRECTOR, STEALTHGAS INC.	Not Available
Maria	Vassalou	DIRECTOR, TSAKOS ENERGY NAVIGATION	Not Available
Christina	Tan	DIRECTOR, DORIAN LPG	Not Available
Emily	Stephens	DIRECTOR, STARBULK CARRIERS CORP.	Graduated with a B.A. degree in Government cum laude from Dartmouth College
Semiramis	Paliou	DIRECTOR, DIANA SHIPPING INC.	Obtained her BSc in Mechanical Engineering from Imperial College, London and her MSc in Naval Architecture from University College, London.
Rene	Kemp	DIRECTOR, STARBULK CARRIERS CORP.	Received a First Class Bachelor of Laws degree with Honours from James Cook University in Queensland.
Jennifer	Box	DIRECTOR, STARBULK CARRIERS CORP.	Graduated summa cum laude with a B.S. degree in Economics and a minor in Mathematics from Duke University

Table 6: Women Served in Boards

d) Directors' Education

Boards need to deal effectively with the complexity of today's regulatory and business environment. Therefore, highly educated Board Members are of paramount importance in today's business landscape. Diagram 6 portrays the educational level of board members based on the available data (79 percent of the population). A very small percentage (3.49%) of the Directors that serve in the Boards of the Greek Maritime firms has college or higher institution education. Almost one third of the population has

received a B.Sc. (31.40%) and most of them have been awarded an M.Sc. (38.37%). Furthermore, a small percentage of them have achieved to become Doctors of Philosophy in their research areas.

Finally, the most common degrees are in Mechanical Engineering, Finance/economics, Maritime Law, Transportation Management, Naval Architect and Business Administration.

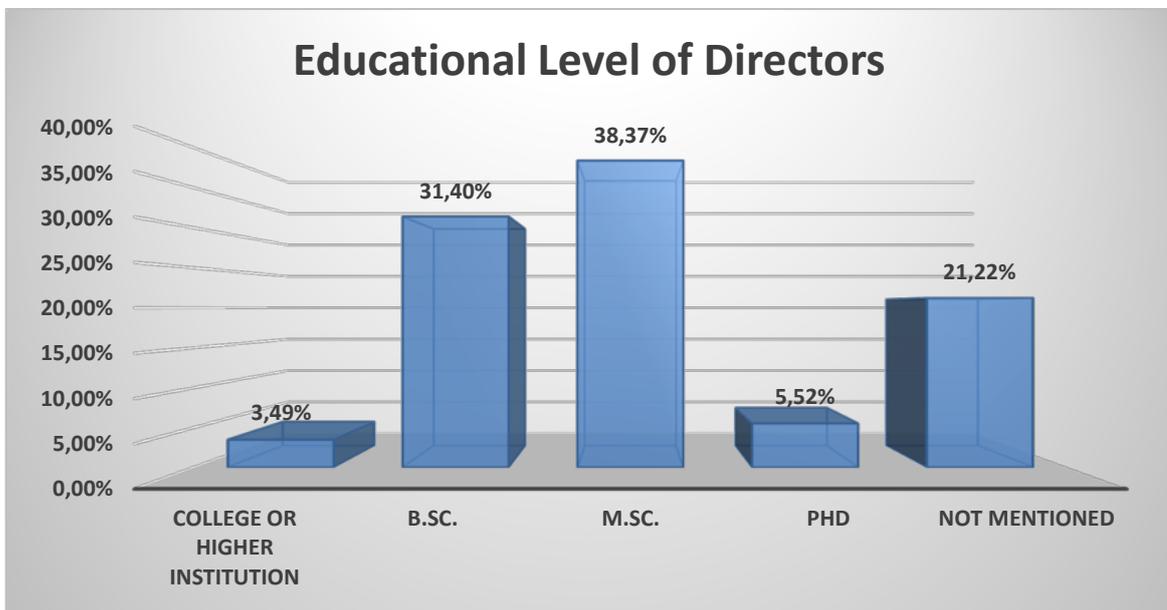


Diagram 6: Educational level of Directors

3.2 Board size

Research has focused on the optimal size of the board but findings in this area are still inconclusive. Smaller boards tend to be more flexible in the decision making process and more effective in monitoring Top Managers. However, other researchers argue that larger boards have more problem solving capabilities and could improve the performance of the organization.

First of all, larger boards tend to represent a higher degree of external stakeholders. From that angle, although corporate directors' main obligation is to monitor management in alignment with the owners' interests, they may fulfil their duties having in their mind their personal relationships. In that case, the consensus required for the board to

take a decision is harder to be achieved, due to the fact that a compromise of a larger number of personal interests must be reached.

Diagram 7 illustrates the average Board size for the period 2001-2015. It can be observed that, excluding the years 2001-2004, where the variable takes its highest values, the average board size fluctuates between 6.2 and 6.9 directors.

The highest value is observed in 2002 and 2003 with the average number of Directors in the Boards rising to 8, whilst the smaller Boards could be observed in 2013 with an average size of 6.21 members. It can be said that throughout the examined period there is not very big fluctuation in the average size of the Boards.

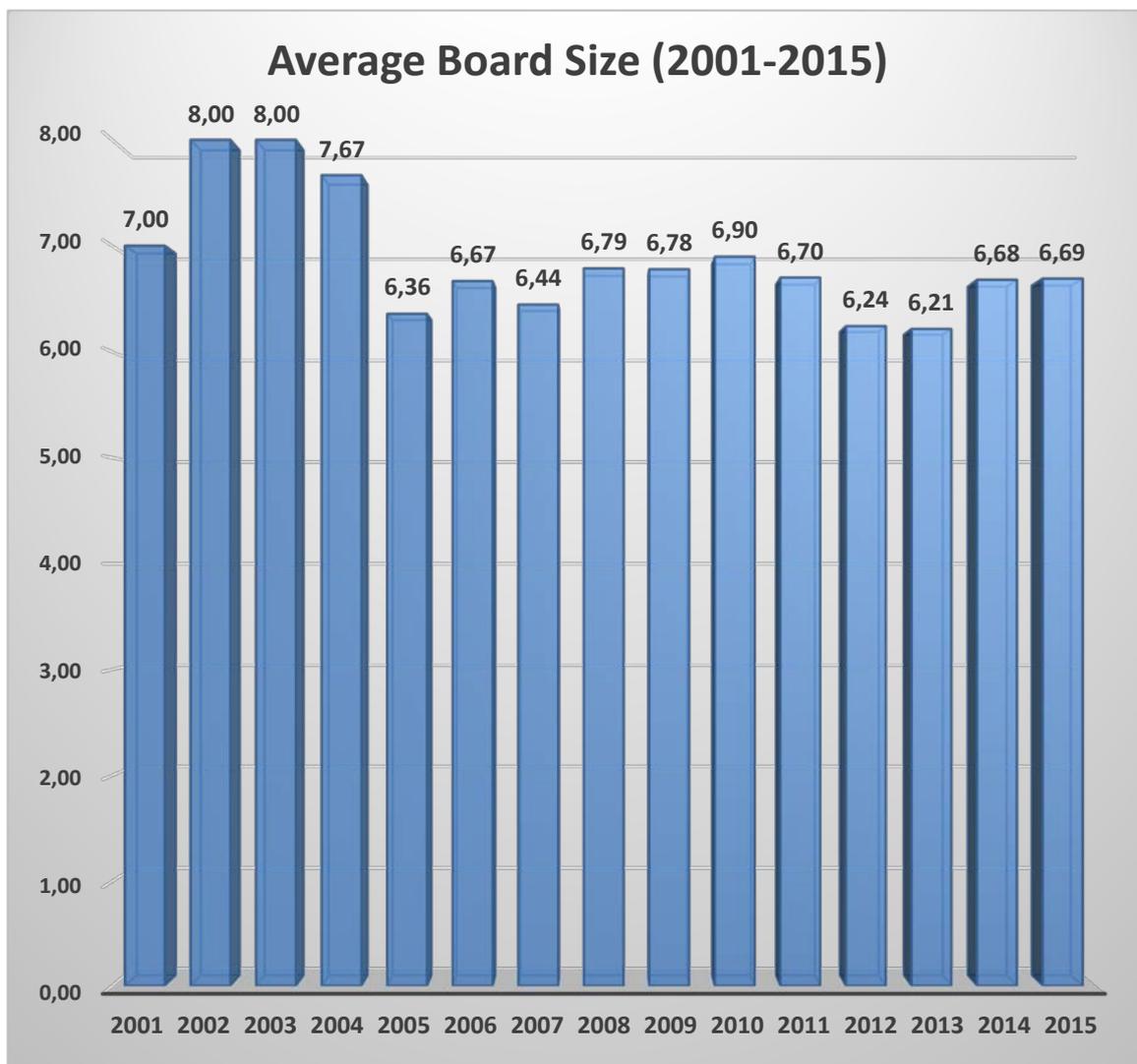


Diagram 7: Average Board Size 2001-2015

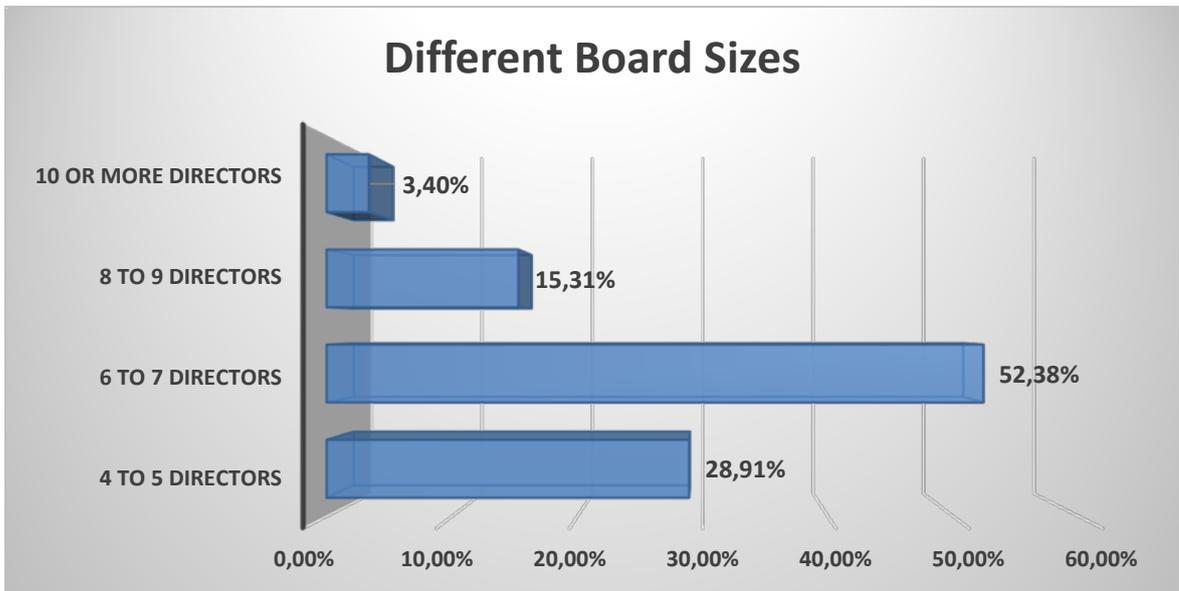


Diagram 8: Classification of the Boards according to their size

Most the companies (52.38%) have six or seven Directors in their Board, whilst 28.91% of the companies have 4 or 5 directors. Moreover, 8 to 9 Directors have

15.31% of the companies and only 3.40% (notably... xxxxxx) of the companies have more than 10 Directors.

3.3 Total Members Served

Another significant variable of our study is the total number of the board members who served the companies for the 15-year period. As we can observe from diagram 9 the majority of the companies had only 6 to 9 Directors, whilst the second largest category was that of 10 to 13 Directors (30.77%).

Only a 12.82% of the companies had a total number of 14 to 17 Directors and 5.13% of the 39 Maritime Firms employed 118 to 20 Directors through the years.

Finally, a small percentage of 7.69% of the companies has only up to Five Directors.

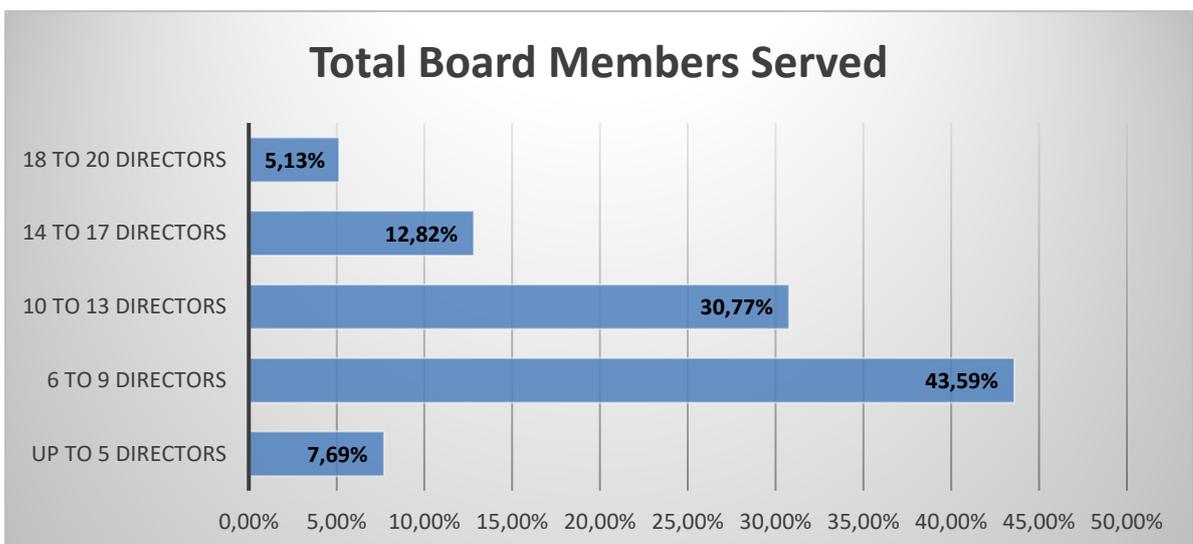


Diagram 9: Total Board Members served for the period 2001-2012

3.4 Board Tenure

It is a common phenomenon for Boards to avoid defining a maximum period that a Director may be appointed to a position; although some of them specify a maximum of either three or four three-year terms. In the past it was widespread for Board members to have long tenures and maintain their position until there was an important reason to depart, such as change in management or personal reasons.

Board members' tenure found itself in the eye of the storm by commentators and researchers, since the corporate and fraud scandals of the last decade increased the demand for specific expertise as well as scrutiny of the activities resulting from the disclosure of financial documents. Nowadays, it is an undeniable fact that there is a great need of experienced Directors who can keep abreast of changes to technology,

strategy and finance. Tenure, director's serving time on a board, has been supported that constitutes a link for firm-specific knowledge and experience, when it is viewed as element of human capital. Knowledge accumulation is stemming from the director's service in a board, creating not only organizational expertise and knowledge but also links with the stakeholders of the company (Johnson et al, 2012; Forbes & Miliken, 1999).

Between 2012 and 2015, 64 new appointments in the boards of the Greek Maritime companies were documented. Especially, in 2014 and 2015 these numbers were 20 and 24 because 3 new companies, Gener8 Maritime, Navios Maritime Midstream Partners L.P. and Pyxis Tankers Inc. made their IPOs.

On the contrary, the board departures were significantly less, reaching 50 in 4 years' time.

New Directors Appointments 2012				
Company	Position	Name	Surname	Date
Freeseas	Director	Xenophon	Galinas	11/12/2012
GasLog	Chairman	Peter	Livanos	4/4/2012
GasLog	CEO	Paul	Wogan	
GasLog	Director	Philip	Radziwill	
GasLog	Director	Bruce	Blythe	
GasLog	Director	Paul	Collins	
GasLog	Director	William	Friedrich	
GasLog	Director	Jullian	Metherell	
GasLog	Director	Antony	Papadimitriou	
GasLog	Director	Robert	Somerville	
Genko Shipping	Director	Alfred E.	Smith IV	7/11/2012
Seanergy	CEO	Stamatis	Tsantanis	1/10/2012
Tsakos Energy Navigation	Director	Efthimios	Mitropoulos	31/5/2012

New Directors Appointments 2013				
Company	Position	Name	Surname	Date
Navios Maritime Partners L.P.	Director	Dimitris	Papastefanou Gkouras	06/2013
Euroseas Ltd	Director	Apostolos	Tamvakis	25/7/2013
Star Bulk Carriers	Director	Roger	Schmitz	25/7/2013
Capital Product Partners L.P.	CEO	Petros	Christodoulou	8/9/2014
Hellenic Carriers Limited	CFO	Alkis	Papadopoulos	1/6/2014
Ocean Rig UDW Inc.	Director	Kyros	Melas	8/7/2013
GasLog Ltd	Director	Dennis M.	Houston	06/2013
New Directors Appointments 2014				
Company	Position	Name	Surname	Date
Danaos	Director	William	Repko	07/2014
Star Bulk Carriers	Director	Rajath	Shourie	07/2014
Star Bulk Carriers	Director	Emily	Stephens	07/2014
Star Bulk Carriers	Director	Rene	Kemp	07/2014
Star Bulk Carriers	Director	Stelios	Zavvos	07/2014
Goldenport Holdings Inc.	Director	Alexis	Stephanou	09/2014
Top Ships Inc.	Director	Konstantinos	Karelas	04/2014
Top Ships Inc.	Director	Alexandros G.	Economou	04/2014
Top Ships Inc.	Director	Per Christian	Haukenes	09/2014
Top Ships Inc.	Director	Paolo	Javarone	09/2014
Box Ships Inc.	Director	Athanasios	Reisopoulos	06/2014
Ocean Rig UDW Inc.	Director	John	Liveris	14/2/2014
GasLog Ltd	Director	Donald J.	Kintzer	24/10/2014
Dorian LPG Ltd	Director	Ted	Kalborg	12/2014
Navios Maritime Midstream Partners L.P.	Chairman, CEO	Angeliki	Frangou	18/11/2014
Navios Maritime Midstream Partners L.P.	Director	Shunji	Sasada	18/11/2014
Navios Maritime Midstream Partners L.P.	Director	Alexander	Kalafatides	18/11/2014
Navios Maritime Midstream Partners L.P.	Director	Christos	Kokkinis	18/11/2014
Navios Maritime Midstream Partners L.P.	Director	Stefan	Kuch	18/11/2014
Navios Maritime Midstream Partners L.P.	Director	Vasilios	Mouyis	18/11/2014

New Directors Appointments 2015				
Company	Position	Name	Surname	Date
Navios Maritime Holdings Inc.	Director	Shunji	Sasada	1/1/2015
Diana Shipping Inc.	Director	Kyriacos	Riris	03/2015
Diana Shipping Inc.	Director	Semiramis	Paliou	
Star Bulk Carriers	Director	Mahesh	Balakrishnan	03/2015
Star Bulk Carriers	Director	Jennifer	Box	03/2015
Capital Product Partners	Director	Nikolaos	Syntychakis	30/6/2015
Ocean Rig UDW Inc.	Director	George	Kokkodis	8/9/2015
Ocean Rig UDW Inc.	Director	Chrysoula	Kandylidis	3/12/2015
Ocean Rig UDW Inc.	Director	Vassilis	Karamitsanis	3/12/2015
GasLog Ltd	CEO	Paul	Wogan	12/5/2015
Dorian LPG Ltd	Director	Malcom	McAvity	01/2015
Dorian LPG Ltd	Director	Christina	Tan	05/2015
Gener8 Maritime Inc.	Chairman, CEO	Peter C.	Georgiopoulos	30/6/2015
Gener8 Maritime Inc.	Director	Ethan	Auerbach	30/6/2015
Gener8 Maritime Inc.	Director	Nicholas	Bush	30/6/2015
Gener8 Maritime Inc.	Director	Dan	Ilany	30/6/2015
Gener8 Maritime Inc.	Director	Adam	Pierce	30/6/2015
Gener8 Maritime Inc.	Director	Roger	Schmitz	30/6/2015
Gener8 Maritime Inc.	Director	Steven D.	Smith	30/6/2015
Pyxis Tankers Inc.	Chairman, CEO	Valentios ("Eddie")	Valentis	30/10/2015
Pyxis Tankers Inc.	Director	Robin P.	Das	30/10/2015
Pyxis Tankers Inc.	Director	Robert B.	Ladd	30/10/2015
Pyxis Tankers Inc.	Director	Basil G.	Mavroleon	30/10/2015
Pyxis Tankers Inc.	Director	Aristides J.	Pittas	30/10/2015

Table 7: Board Appointments 2012 – 2015

Departures of Directors 2012				
Company	Position	Name	Surname	Date
Aegean	Director	Abel L.	Rasterhoff	1/5/2012
Freeseas	Director	Didier	Salomon	11/12/2012
Freeseas	Director	George	Kalogeropoulos	11/12/2012
Goldenport	Director	Christos	Varsos	6/4/2012
Goldenport	Director	Epameinondas	Logothetis	6/4/2012
Ocean Rig	Director	Pankaj	Khanna	2/10/2012
Seenergy	Director	Dimitrios N.	Panagiotopoulos	11/5/2012
Seenergy	Director	George	Taniskidis	11/5/2012
Starbulk	CEO	Prokopios (Akis)	Tsirigakis	31/3/2012
Starbulk	Director	Peter	Espig	7/9/2012
Tsakos Energy Navigation	Director	William	O'Neil	31/5/2012
Top Ships	Director	Marios	Hamboullas	15/2/2012
Top Ships	Director	Roy	Gibbs	15/2/2012
Top Ships	Director	Yiannakis C	Economou	15/2/2012

Departures of Directors 2014				
Company	Position	Name	Surname	Date
Tsakos Energy Navigation Ltd	Chairman	D. John	Stavropoulos	3/6/2014
Dryships Inc.	Director	Evangelos	Mytilinaios	1/1/2014
Euroseas Ltd	Director	Tim	Gravely	01/2014
Star Bulk Carriers Corp.	Director	Milena Maria	Pappas	06/2014
Top Ships Inc.	Director	Michael G.	Docherty	21/3/2014
Capital Product Partners L.P.	Chairman	Evangelos M.	Marinakis	19/12/2014
Capital Product Partners L.P.	Director	Nikolaos	Syntychakis	09/2014
Hellenic Carriers Limited	CFO	Elpida	Kyriakopoulou	31/5/2014
Ocean Rig UDW Inc.	Director	Michael	Gregos	14/2/2014
Eagle Bulk Shipping Inc.	Director	Douglas P.	Haensel	22/9/2014
Eagle Bulk Shipping Inc.	Director	Joseph	Cianciolo	22/9/2014
Eagle Bulk Shipping Inc.	Director	Alexis	Zoullas	22/9/2014
Eagle Bulk Shipping Inc.	Director	Jon	Tomasson	22/9/2014
Eagle Bulk Shipping Inc.	Director	Thomas B.	Winmill	22/9/2014
Dorian LPG Ltd	Director	Robert	Bugbee	11/2014
Departures of Directors 2015				
Company	Position	Name	Surname	Date
Navios Maritime Holdings Inc.	Director	Ted C.	Petrone	1/1/2015
Dryships Inc.	Director	George	Xiradakis	1/12/2015
Dryships Inc.	Director	Chryssoula	Kandylidis	1/12/2015
Dryships Inc.	Director	Vassilis	Karamitsanis	1/12/2015
Danaos Corporation	Director	Andrew B.	Fogarty	01/2015
Danaos Corporation	Director	Robert A.	Mundell	08/2015
Star Bulk Carriers Corp.	Director	Rajath	Shourie	03/2015
Star Bulk Carriers Corp.	Director	Emily	Stephens	03/2015
Goldenport Holdings Inc.	Director, Chief Accounting Officer	Konstantinos	Kabanaros	01/2015
Capital Product Partners L.P.	CEO	Petros	Christodoulou	30/6/2015
Ocean Rig UDW Inc.	Director	Kyros	Melas	8/9/2015
Ocean Rig UDW Inc.	Director	Savvas	Georghiades	3/12/2015
Ocean Rig UDW Inc.	Director	Prokopios (Akis)	Tsirigakis	3/12/2015
GasLog Ltd	Director	Robert	Somerville	12/5/2015
Dorian LPG Ltd	Director	Nigel D.	Widdowson	05/2015
Dorian LPG Ltd	Director	Eric	Fabrikant	05/2015

Table 8: Board Departures 2012 – 2015

The average tenure of the board members varies substantially from company to company and this could be explained by the diversity that exists on the year that each company listed in a Stock Exchange. The average Tenure of the whole Board for the period 2001-2015 is 54.70 months with a standard deviation of 25.99. Moreover, if we exclude the Chairperson and the CEO the average tenure of the Board reduces to 50.42 months with a standard deviation of 23.22 months.

Furthermore, the average tenure of a CEO is 71.73 months with a standard deviation of 44.94 months. However, if the individual occupies only the position of the CEO, the average tenure reduces almost to half, serving 31.77 months on average.

Similarly, the average tenure of the Chairpersons for the period 2001-2015 is 42.44 months, which is reduced to 31.40 months if the individual chairs the Board.

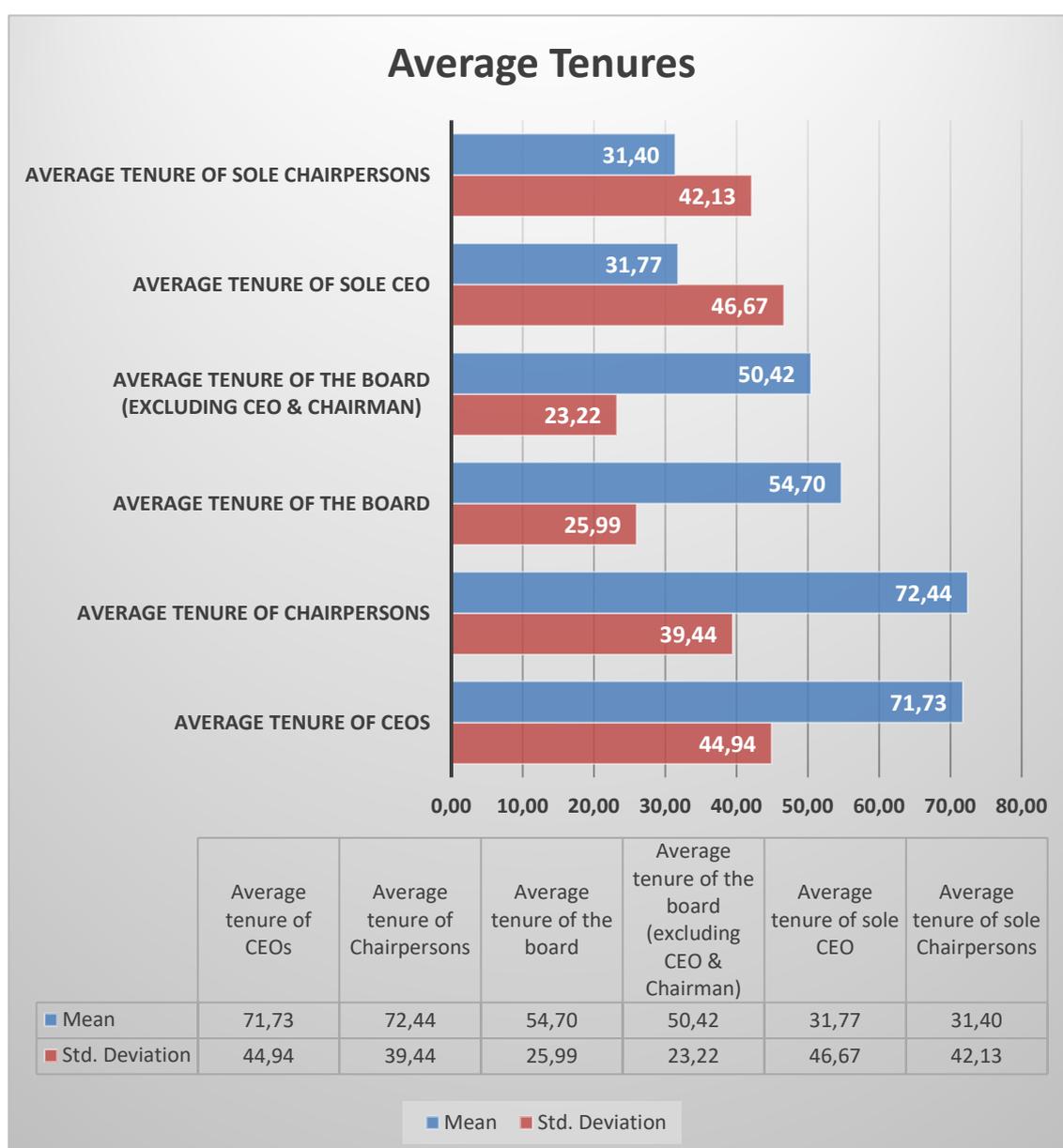


Diagram 10: Average Tenures

Average Tenure of the Board

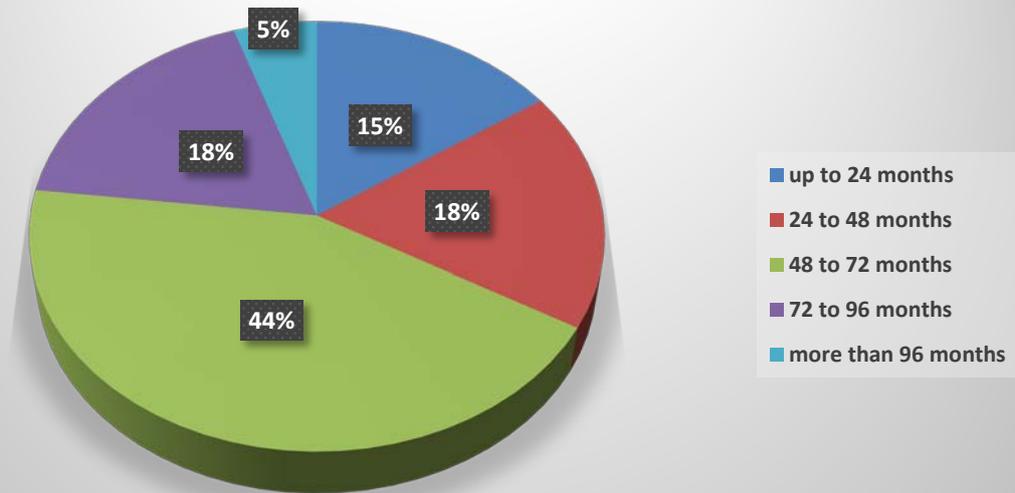


Diagram 11: Average Tenure of the Board in detail

According to diagram 11, 18% of the Greek maritime listed companies have an average Board tenure between 24 to 48 months, thus 2 to 4 years. However, more than the double percentage of companies has an average board tenure between 4 to 6 years. Interestingly, an 18% of the companies have an average board tenure of 4 to 6 years and only a 5% of

them have average board tenure more than six years.

Finally, there are some companies (15%), probably some of the new listed companies (Dorian LPG, Gener8 Maritime, Navios Maritime Midstream Partners, Pyxis Tankers), with a maximum average board tenure of 24 months.

Average CEO tenure in detail

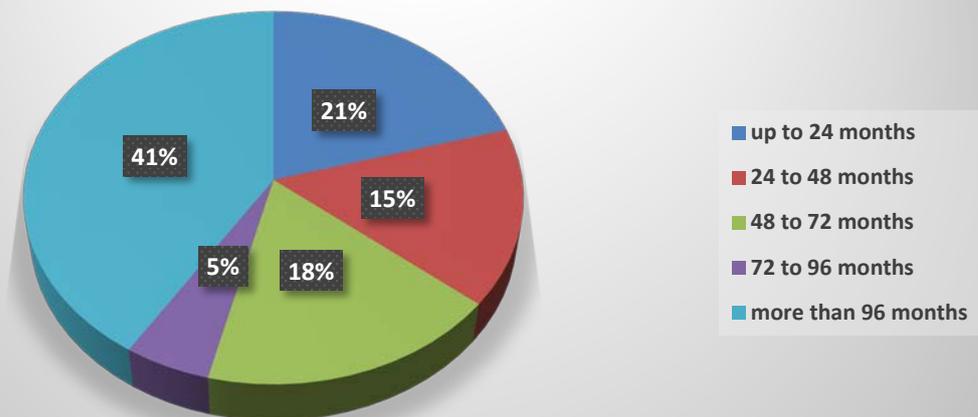


Diagram 12: Average Tenure of the CEO in detail

The majority of CEOs (41%) has an average tenure of more than 8 years, a fact that could be explained by the fact

that the majority of the companies are family-owned enterprises.

On the contrary, only 5% of the companies have an average CEO tenure between 6 to eight years. Almost one out five companies (18%) has a CEO tenure between 4 to 6 months. A slightly reduced percentage

(15%) of the companies has an average CEO tenure between 2 to 4 years. Moreover, 21% of the companies have an average CEO tenure up to 24 months.

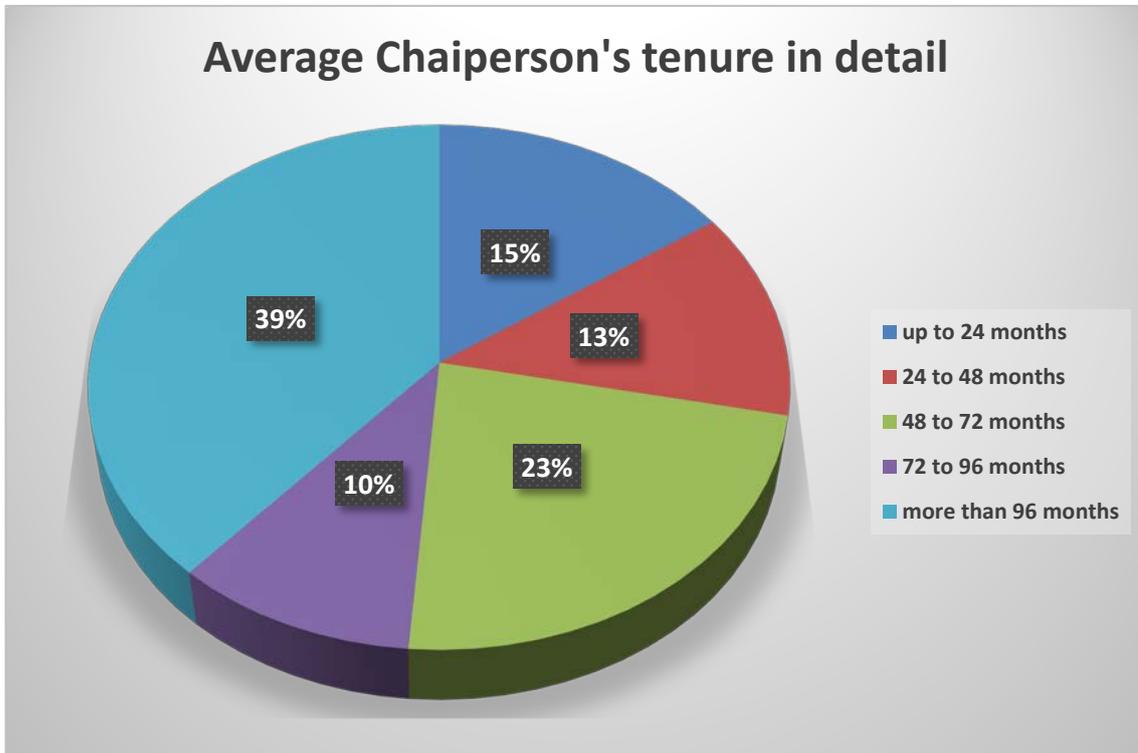


Diagram 13: Average Tenure of the Chairperson in detail

As diagram 13 illustrates, the majority of the companies (39%) have long serving Chairpersons, whose tenures exceed the 8 years. Again this could be a result of family ownership. Moreover, only 10% of the companies have Chairpersons that have an average tenure between 6 to 8 years. The percentage of the companies with

an average Chairperson tenure between 4 to 6 years reaches the 23%, which is almost double than that of the companies with an average Chairperson tenure of 2 to 4 years (13%). Finally, only 15% of the companies have an average Chairperson tenure up to 24 months.

3.5 CEO Duality

The corporate scandals of Enron, Worldcom and Tyco revived the discussions about splitting the roles of CEO and Chairperson. Advocates of agency theory argue that the positions of CEO and Chairman should be separate. A person who seats in both

positions creates a conflict of interest that could negatively affect the interests of the shareholders and reduces the monitoring of the board. On the other hand, there are supporters of CEO duality since it provides a clear focus and unity of

command at the top level. Moreover, some researchers argue that during a crisis the combined role of the Chairman and the CEO can actually enhance performance, when other academics believe that the duality structure is associated with higher percentages of firm bankruptcy. In our study, the CEO duality/separation was examined as of December of each year for the period 2001-2015. It can be supported that the listed Greek Maritime firms have the tendency to follow the duality

model, as the diagram 14 illustrates. In more detail, since 2002 the percentage of the companies following the duality structure, although it fluctuates, gradually increases, reaching its maximum value in 2013 with the majority of the CEOs being Chairpersons at the same time (67.9%). However, since 2013 a small increase in the separation structure can be observed, with 33.3% in 2014 and 34.5% of the companies instead of 32.1% in 2013.

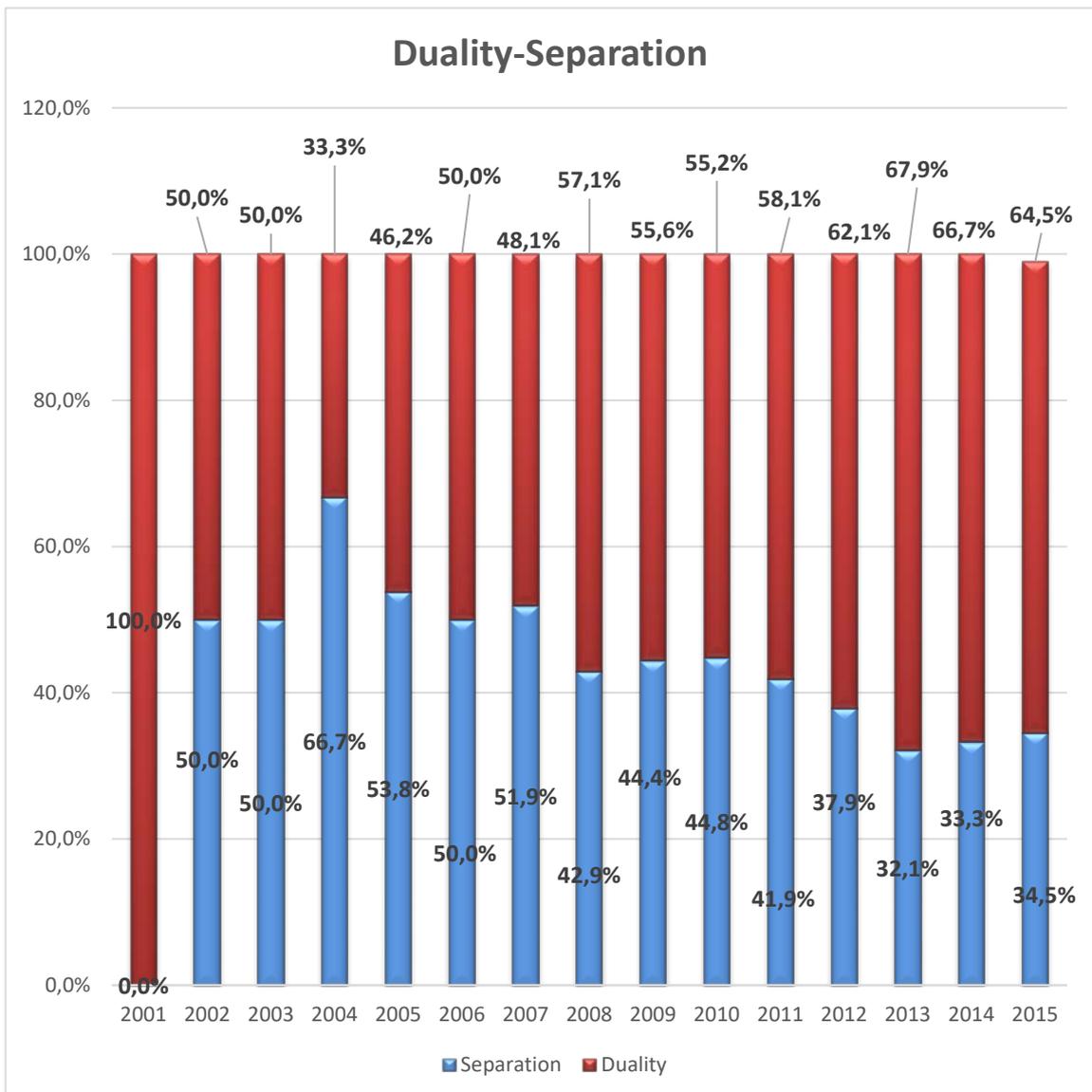


Diagram 14: Duality vs. Separation for the period 2001-2015

3.6 Number of Chairpersons' and CEOs Positions

The total number of chairpersonships for these twelve (12) years was 41 while the exact number of Chairpersons was 32 due to cross directorships. It is noteworthy that in 29 out of the 34 companies (85.3%) there was no change of the Chairperson during the examined period. For the rest of the companies it was found that four companies had changed their Chairman once and one company twice.

The total Number of CEO positions was 42 while the exact number of CEOs was 33 due to cross directorships. At the same time, there were 27 companies (79.4%) that didn't change their CEO at all, 4 changed only once and 3 that replaced him twice.

Extending our research, we traced the sole Chairpersons and CEOs meaning

the individuals who served exclusively in these two roles-excluding the duality cases. More specifically, 17 (50%) out of the 34 companies had appointed sole Chairpersons. Furthermore, it was found that in 15 companies there was only one sole Chairperson while two other companies were served by two and three sole Chairpersons respectively.

Moreover, it was revealed that 17 (50%) out of the sampled 34 companies appointed sole CEOs, whereas 12 companies had one sole CEO; it was also traced that 4 companies served by two sole CEOs and in 1 company three sole CEOs respectively. Consequently, it is clearly shown that in 17 out of the 34 companies of our sample no sole CEO was found.

3.7 Cross directorships

The directors that were serving in more than one board simultaneously, have been identified and recorded in our study. For the sake of clarity, it is important to mention that directorships constitute positions in the Board that held by Directors. This is a very significant variable since Cross Directorships allow the well experienced directors to share their knowledge and experience in different Boards. Furthermore, it has been argued that cross directorships are a mean of distribution for practices, structures, strategies and processes.

However, the network of Cross Directorships could create concentration of power within specific groups of people.

In total, throughout the examined period, there were 326 cross

directorships. In the first 4 years not even one board interlocking was identified. However, between 2005 and 2008 there is an upward trend reaching the 39 cross directorships in 2008. In 2009 a severe drop can be observed, only to be succeeded from a rise which in 2011 led to the highest observed value of 42 board interlocks. Finally, after an attenuation between 2012 and 2014, in 2015 cross directorships reached number of 35.

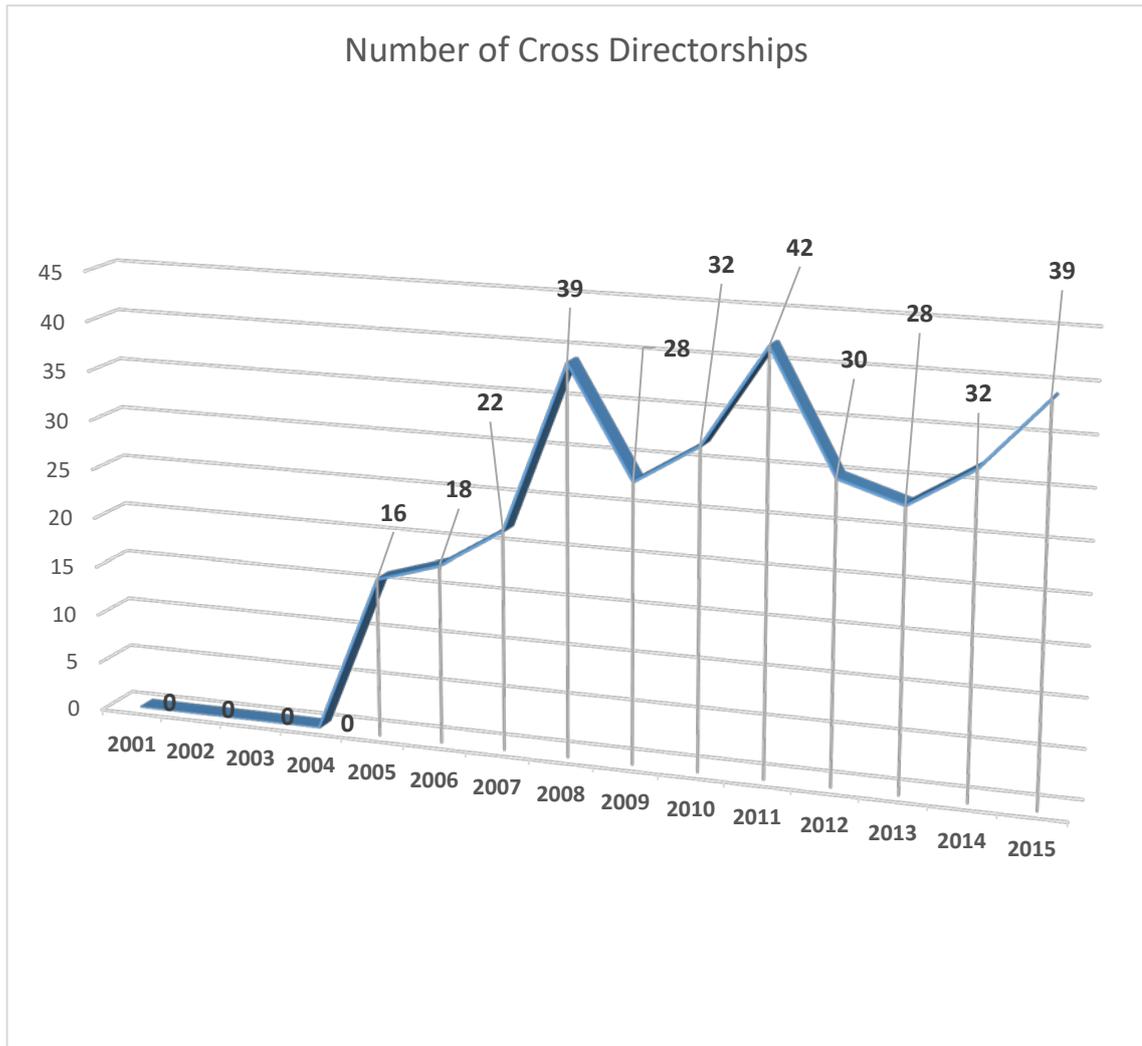


Diagram 15: Number of Cross Directorships

3.8 Non-Executive (Externals) Directors

In order to be successful every board needs the right blend of skills and expertise. The recruitment of external directors can bring to the organization specialists in the areas of accounting, finance and technology. Additionally, independent directors could act independently of the management interests, play the control role of boards most efficiently and be more aligned with outside investors' interests. Moreover, the regulatory authorities

across the world have imposed specific ratios of independent directors in the boards. The listed Greek Maritime companies, during the examined 15year period prefer to choose independent directors in their boards (55.78%) over dependent directors (44.22%). An explanation could be that the increased number of independent directors gives to the board increased legitimacy in the markets and a wider access to resources

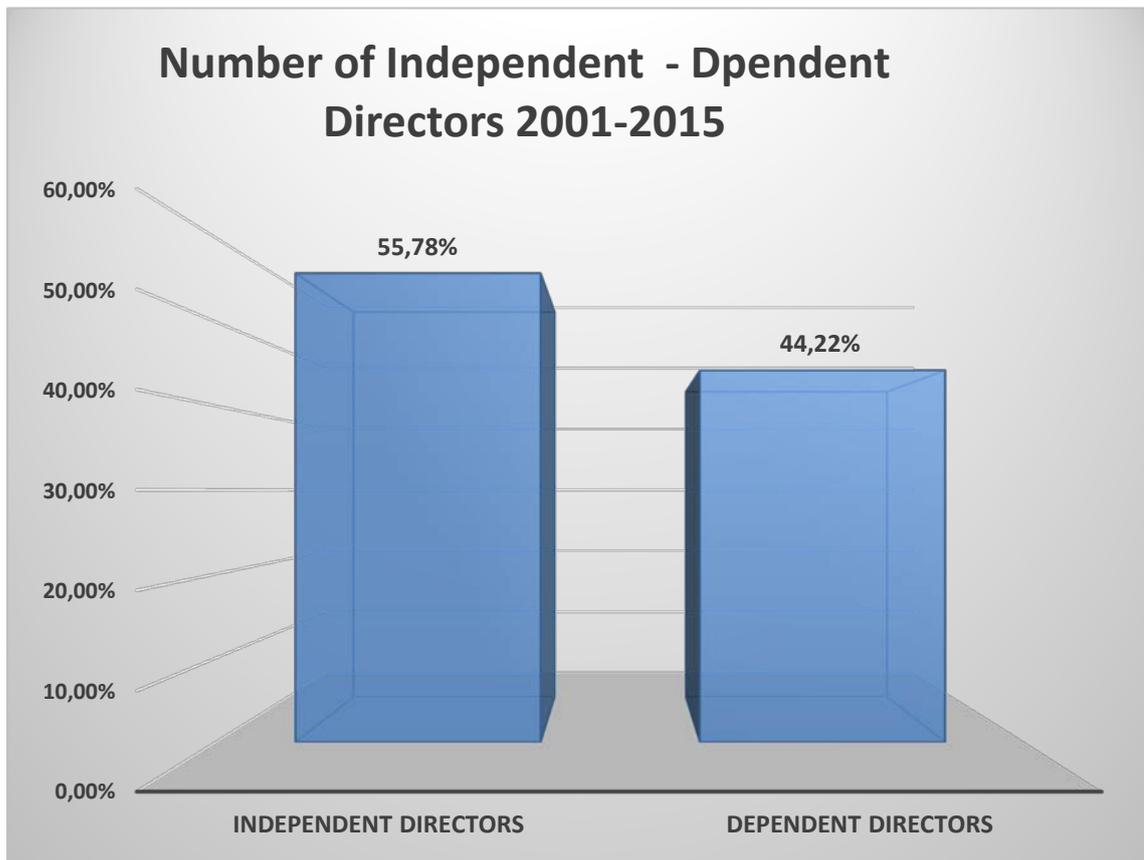


Diagram 16: Number of Independent and Dependent Directors 2001-2015

3.9 Committees

The composition of the board and its committees should be designed in a way that balances the skills, experience, independence and knowledge of the board members in order for them to fulfill their respective duties and responsibilities effectively, reports the Financial Regulatory Authority (2016) in the UK. Moreover, formal and rigorous

assessment of the committees should take place yearly. Furthermore, due to the fact that important decisions are taken by committees shaping the future of a company, there is specific legislation that dictates the composition of the committees (number of independent directors) based on the size of the listed companies.

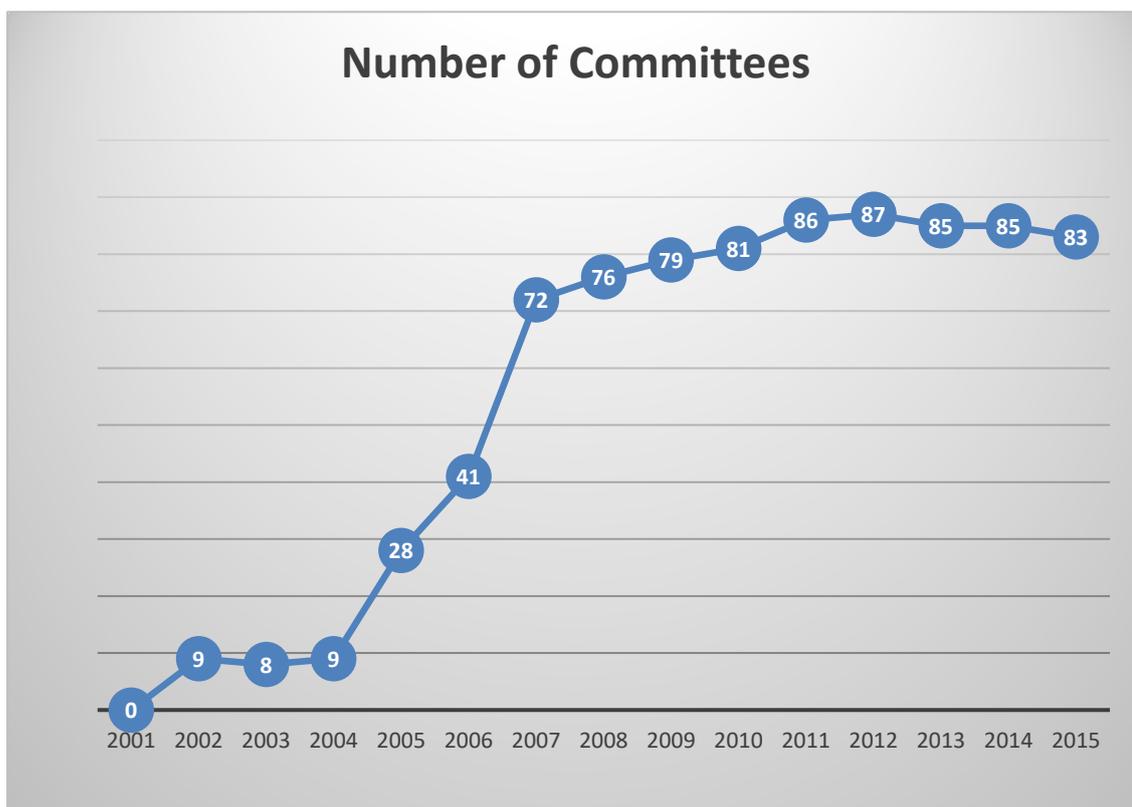


Diagram 17: Number of committees in Greek Maritime Firms between 2001 and 2015

As it can be seen from diagram 17, the Greek maritime companies started to implement the enforced regulations regarding the introduction of board committees after 2001 and the big corporate scandal of Enron. In 2002, with only two listed companies the number of committees raises to 9, whilst the number of committees remains the same in 2004 with three listed firms. Between 2006 and 2007 the number of committees almost doubled from 41 to 72. For the period 2008-2012, an upward trend can be observed, with the maximum value of 87 committees in 2012. However, in

the last three years of the examined period, the number of committees decline, reaching in 2015 the 83 committees. Furthermore, all the companies have introduced an audit committee, the second most ‘popular’ committee is the compensation committee, whilst the third most common used committee is the nominating and governance committee. However, there is a vast variety of committees with different focus, ranging from the above mentioned to operational and environmental R & D committees.

4. Summary

The recent financial crisis is reshaping the maritime sector in ways that we are not able to predict or estimate. The exit of big financial institutions from the shipping financing created severe problems not only to many maritime firms with open ship orders, but also to companies specialised in bulk cargoes, which were hit by a prolonged period of low freights. However, even though the circumstances were not the best for new IPOs, 4 companies entered the American stock markets.

The findings presented in this report, portrayed a concrete picture of the synthesis of Boards in the Greek owned listed Maritime sector

Summarising our findings, we can say that after 2005 there is an upward trend in the average age of the board members. However, the average board member age in 2005 was 50.46 years and in 2015 54.37, which signifies the fact that corporate Boards have refreshed their members with younger individuals.

In the aftermath of the financial crisis, 2011-2014, the average age of the board members is just above 55 years, a period that can only be compared with that after the corporate scandals of Enron in 2002-2003, where the average age was 55.90 and 56.90 years.

The same can be said about the average age of the Chairpersons, which although on average they are getting older, the difference is less than five years between 2005 and

2015. On the contrary, CEOs in 2015 on average are ten years older (52.15 years) than they used to be in 2005 (42.92).

The national diversity is evented in the boards of the Greek maritime companies, where there is no board without a non-Greek member. Moreover, above 5% of the boards have 6, 7 and 10 foreigners in their composition. The majority (20.51%) of the boards have 2 non-Greek directors. In total, 43% of the directors throughout the examined period are foreigners.

From 344 directors, between 2001 and 2015, only 5% of the them are women (17 individuals), occupying 22 directorships positions. On the contrary, the 327 men occupy 375 directorships. It is also worth mentioning that two out of seventeen women held more than one chair, Mrs Aggeliki Frangou and Mrs Charlotte Stratos.

The majority of the directors have been awarded an M.Sc. (38.37%), whereas only 5.52% have managed to acquire a PhD. One third (31.40%) of the directors have completed their undergraduate studies and 3.49% of the directors have a degree from college or a higher institution. Interestingly, there are not available information regarding their qualifications for one out of five directors.

The average board size during the examined period, although it fluctuates between 6.21 and 8

members, after 2005 remains very close to 6.5 members, having its lowest values in 2012 and 2013 with 6.24 and 6.21 members respectively. This means that the average board size remains almost the same for most of the years of the study. The majority of the boards have 6 to 7 directors (52.38%), whereas 4 to 5 directors have the 28.91% of the boards.

Another very important variable, that of tenure, has been examined. The average tenure of the boards is 54.70 months. However, when we exclude the CEO and the Chairperson from our analysis, this number declines to 50.42 months. Furthermore, the average tenure of the CEOs and the Chairpersons are close to each other, with 71.73 and 72.44 months respectively.

Nevertheless, when the average tenure of sole Chairpersons and Sole CEOs was examined, their average tenure was more than two times less than the initial findings, which included the duality structure.

Notably, the Greek maritime companies prefer the duality structure over the separation. Moreover, it can be said that after 2010 there is a significant increase in the duality

model reaching its highest value in 2013 (67.9%).

As the years past and the number of listed companies was rising, the number of cross directorships was also increasing, reaching its highest value in 2011 with 42 interlocks. A network of individuals that serve in different boards at the same time promotes information exchange and builds strategic relationships.

The regulatory authorities are particularly interested on the number of independent directors that serve in the boards, that is why they have enforced specific quotas. In the boards of the Greek shipping companies 55.78% of the directors are independent and 44.22% dependent, a fact that help them build their legitimacy in the financial markets.

From the same point of view, every company has at least two committees.

Finally, the Greek maritime industry remains the most prominent in the world capitalising on its strengths. From the corporate governance point of view, although there are not any initiatives or corporate strategies related to that, the firms not only follow the enforced guidelines but also, they try to create an investor friendly environment in their struggle to acquire higher levels of financing.

5. THE CASE STUDY – NAVIOS GROUP

Navios Group of shipping companies is one of the biggest shipping groups of Greek interests. The seven companies of the group (Navios Maritime Holdings, Navios Maritime Partners, Navios Maritime Acquisition, Navios South American Logistics, Navios Tankers Management, Navios Maritime Containers and Navios Midstream Partners) operate in various sectors of the shipping industry and in different geographical segments. Four of these companies, Navios Maritime Holdings, Navios Maritime Partners, Navios Maritime Acquisition and Navios Midstream Partners, are listed on NYSE and Nasdaq. The group has offices in Europe and in South and North America. The total fleet of the group rises to 137 ships of different specialization in 2015, whereas this number in 2014 was 143 ships. Nevertheless, during that period a renewal of the fleet took place as a number of previous ordered ships were delivered (from the annual reports).

The main figure behind this group is Mrs. Aggeliki Frangou President and CEO in all the listed companies, who comes from a family with long tradition in the maritime industry which goes back five generations (CNN, Leading Women with Becky Anderson, 2013). She started her own shipping company in early '90 with only one ship and in 2004 managed to raise \$200 million dollar and merged her business under the Navios name. She is one of the few women in that man held sector and she has been included in the Lloyd's list with the 100 most influential people in the maritime industry since 2010, when she first entered (Lloyd's list 2016). Mrs Frangou was awarded in 2016 the «Growth Award» by Eurobank and Grant Thornton (Grant Thornton, 2016).

The boards of Directors in the companies of Navios Group are also an interesting case. In the four board of directors have seated 26 different directors since 2004, when the parent company Navios Holdings was entered the NYSE. Except Mrs. Frangou, three more women have sat in the Navios Boards (Mrs. Vasiliki Papaefthymiou, Mrs. Anna Kalathakis and Mrs. Brigitte Noury), which means that 11.5% of the total number of Navios Group's executives are women, a very high percentage for the industry. Moreover, the nationality diversity is also high with 11 out of the 26 executives to be non-Greek. The majority (12) of the Navios directors holds a postgraduate degree, whereas 3 directors hold a Phd.

Although the all ships of Navios Group, produce liquidity according to Mrs. Frangou, 2015 and 2016 were extremely difficult. The revenues of Navios Maritime Acquisition reduced and Navios Maritime Holdings had losses (Deal News, 2016a). Moreover, the weaken Group was attacked from activists investors, who demanded the cancelation of a \$50 million dollars from one of the subsidiaries to the parent company and changes to the board of directors (Deal News, 2016b).

6. References

Bank of Greece. (2016). Monetary Policy Report 2015 - 2016. Athens.

Bergin, T. (2015). The Great Greek Shipping Myth, pp. 1–10.

Bimco. (2016). The shipping market in 2015 and looking forward

Boston Consulting Group (2013), “Impact Assessment of the Shipping Cluster on the Greek Economy & Society”, Available from: <http://www.bcg.gr/documents/file135208.pdf>

Clarkson Research Services, 2013, “Earnings since The Big Crash, The Big Performers”, Available from:
http://www.clarksons.net/markets/feature_display.asp?section=&news_id=34620&title=Earnings+Since+The+Big+Crash+-+Who%92s+Top+Dog%3F%0D

Deal News. (2016). «Νάρκες» στην πορεία της Φράγκου.

Deal News. (2016). Η Navios Holdings ξανά σε συμμόρφωση με το Χρηματιστήριο της Νέας Υόρκης.

Deal News. (2016). Ποιες μετοχές εισηγμένων έφεραν κέρδη και ποιες έγραψαν ζημίες, pp. 4–5.

Ernst and Young. (2015). Shipping Industry Almanac.

Eurostat. (2016). Half of EU trade in goods is carried by sea Rotterdam , Antwerp and Hamburg busiest cargo ports.

Grant Thornton. (2016). Growth Awards από την Eurobank και την Grant Thornton

Hellenic Shipping News. (2016). Half of EU trade in goods is carried by sea.

Hellenic Shipping News. (2016). Ship demolition market firms up as both prices and demand are high.

Hellenic Shipping News. (2016). Ship owners shy away from newbuildings, despite attractive pricing.

Hellenic Statistical Authority, 2014, “Greek Merchant Fleet: December 2013”, Available at:
http://www.statistics.gr/portal/page/portal/ESYE/BUCKET/A1104/PressReleases/A1104_SMA27_DT_MM_12_2013_01_P_EN.pdf (Accessed: 1 February, 2014)

Hellenic Statistical Authority. (2016). Greek merchant fleet of 100 GRT and over.

HOCG. (2009). Boards in Greek Maritime Listed Companies Findings from the First Review (Vol. 3, Iss.3).

HOCG. (2010). Boards in Greek Maritime Listed Companies Findings from the Second Review (Vol. 4, Iss.3).

HOCG. (2011). Boards in Greek Maritime Listed Companies Findings from the Third Review (Vol. 5, Iss.1).

- HOCG. (2012). Boards in Greek Maritime Listed Companies Findings from the Fourth Review (Vol. 6, Iss.2).
- HOCG. (2014). Boards in Greek Maritime Listed Companies Findings from the Fifth Review (Vol. 7, Iss.2).
- International Chamber of Shipping. (2016). Annual Review.
- IOBE. (2013). Η συμβολή της ποντοπόρου ναυτιλίας στην ελληνική οικονομία Επιδόσεις και Προοπτικές.
- Lloyd's. (2016). Lloyd's List One Hundred | Edition Seven.
- March, L., & Murnane, J. (2016). Container shipping : The untapped value of customer engagement
- Naftemporiki. (2016). Ελληνική επιστροφή στις ναυπηγήσεις.
- Naftemporiki. (2016). Η RBS βάζει τέλος στη ναυτιλιακή δραστηριότητα.
- Naftemporiki. (2016). Η υπερπροσφορά χωρητικότητας ενισχύει τα second hand πλοία.
- Naftemporiki. (2016). Σε κλοιό πιέσεων οι ευρωτράπεζες για τα ναυτιλιακά δάνεια. 2016.
- Petrofin Global Bank Research (2015) "Key Developments and Growth in Global Ship-Finance Bank Lending to Shipping" Available from: <http://www.petrofin.gr/en-gb/mNews.aspx?ElementId=f82b3bea-52c0-46d2-a316-aff7b1c79e2e> (Accessed: 1 November, 2015)
- Petrofin Research (2013) "2013 Greek fleet statistics" Available from: http://www.petrofin.gr/Upload/2ndPart-2013-Petrofin_Researcht-GreekFleetStatistics.pdf (Accessed: 1 November, 2013)
- Petrofin Research (2013) "2013 Research and Analysis: Greek shipping companies"
- Petrofin. (2015). Greek shipping portfolios as of end 2014.
- Petrofin. (2015). RESEARCH AND ANALYSIS: GREEK FLEET STATISTICS 2ND PART OF 2015 PETROFIN RESEARCH.
- Petrofin. (2015). RESEARCH AND ANALYSIS: GREEK SHIPPING COMPANIES 1ST PART OF 2015 PETROFIN RESEARCH.
- Petrofin. (2015). Ship finance banks become more aggressive, in streamlining their loan portfolios
- Petrofin. (2016). Dry Bulk market ; what is in store ?
- Platou, R. (2015). The Platou Report. <https://doi.org/10.1017/CBO9781107415324.004>
- Shipbroking, A. (2013). Ρεκόρ των Ελλήνων εφοπλιστών στις αγορές πλοίων, 7–8.
- UNCTAD. (2014). Structure Ownership and Registration of the World Fleet.
- UNCTAD. (2015). Review of Maritime Transport 2015.

United Nations Conference on Trade and Development (2009), “Review of Maritime Transport 2009”, Available from: http://www.unctad.org/en/docs/rmt2009_en.pdf (Accessed: 1 July, 2011)

United Nations Conference on Trade and Development (2010), “Review of Maritime Transport 2010”, Available from: http://www.unctad.org/en/docs/rmt2010_en.pdf

United Nations Conference on Trade and Development (2012), “Review of Maritime Transport 2012”, Available from: http://unctad.org/en/PublicationsLibrary/rmt2012_en.pdf (Accessed: 1 January, 2013).

Dr. Dimitrios N. Koufopoulos of Brunel Business School is the Scientific Director of the HOCG and Editor of the Review.

Project Leader: Konstantinos Athanasiadis

Contributors: Dr Ioannis P. Gkliatis, Dr Maria Argyropoulou, Aspasia Pastra, Anna N. Dimou, Maria Monopati, George Nastos

Disclaimer: The views expressed in this newsletter are those of the authors of the research and not those of the Brunel University, Brunel Business School and the Federation of the Greek Industries and Enterprises.