



Social Media Usage Patterns in Port Industry: Implications for Port Promotion and Public Relations

Aylin ÇALIŞKAN¹, Soner ESMER²

¹Yaşar University, Faculty of Business, Turkey

²Dokuz Eylül University, Maritime Faculty, Turkey

aylin.caliskan@yasar.edu.tr; ORCID ID: orcid.org/0000-0001-7154-8629

soner.esmer@deu.edu.tr; ORCID ID: orcid.org/0000-0002-0614-7818

Abstract

While social media has been penetrating the daily lives of individuals, the businesses have started to develop new strategical approaches for using social media tools, since they understand the importance of this new area. This study aims to take a step on the gap about social media marketing in the port industry. The focused sample is container ports located in Turkey, but to gain more meaningful insights, a comparison is also made with the ports of Los Angeles, Rotterdam, and Antwerp. The post set on Facebook, which covers the 8 months' period, was analyzed through a social media analytics software, and the most attractive topics and engagement levels were determined. It was found that the most attractive posts of ports with high engagement levels do not include any statement, image, or video about port service, infrastructure and superstructure, investments, or success stories. At the end of the study, suggestions are developed by supporting with real cases for ports' social media management.

Keywords: Social Media, Port Marketing, Public Relations, Promotion, Communication Tools.

Limancılık Endüstrisinde Sosyal Medya Kullanım Modelleri: Liman Tanıtımı ve Halkla İlişkiler için Çıkarımlar

Öz

Sosyal medya bireylerin günlük hayatlarına nüfuz etmişken, işletmelerde bu yeni alanın önemini kavradıklarından beri sosyal medya araçlarını kullanmada yeni stratejik yaklaşımlar geliştirmeye başlamışlardır. Bu çalışmanın amacı liman endüstrisinde sosyal medya yönetimi konusundaki boşluğa bir adım atmaktır. Çalışmada odaklanılan örneklem Türkiye'de bulunan konteyner terminalleridir. Daha anlamlı sonuçlar elde etmek amacıyla Los Angeles, Rotterdam ve Antwerp limanlarıyla da bir karşılaştırma yapılmıştır. Dünyadaki en büyük sosyal medya platformu olan Facebook'ta 8 aylık süreyi kapsayan süre için bir sosyal medya analizi yazılımı ile limanlar analiz edilmiş, en dikkat çekici konular ve katılım seviyeleri belirlenmiştir. Yüksek etkileşim düzeylerine sahip limanların en dikkat çekici mesajlarında liman hizmeti, altyapı ve üstyapı, yatırımlar veya başarı öyküleri hakkında herhangi bir açıklama, resim veya video içermediği tespit edilmiştir. Çalışmanın sonunda gerçek örnek olaylarla desteklenerek limanların sosyal medya yönetimleri için öneriler geliştirilmiştir.

Anahtar Kelimeler: Sosyal Medya, Liman Pazarlaması, Halkla İlişkiler, Promosyon, İletişim Araçları.

To cite this article: Çalışkan, A. and Esmer, S. (2018). Social media usage patterns in port industry: implications for port promotion and public relations. *Journal of ETA Maritime Science*, 6(1), 61-74.

To link to this article: <https://dx.doi.org/10.5505/jems.2018.82905>

1. Introduction

Although marketing is an integral part of a port process [1], it is still a virgin area where only a limited number of attempts have been made in port-related studies, which constitute only 1.3 percent of total [2]. Early approaches to the marketing research in port industry belong to the Katty Bernard [3] and Institute of Shipping Economics and Logistics (ISL) [4]. Bae [5], Kounoupas and Pardali [6], and Cahoon and Hecker [7] are the studies conducted in the area of market orientation in the port industry. Customer satisfaction, as an indivisible part of marketing science, was handled in the studies of Brooks and Schellinck [8], Thai [9], and Asfour [10]. Market positioning and differentiated marketing offerings subjects were handled by Pardali and Kounoupas [11] and Bauk [12]. A popular subject of marketing science, relationship marketing, has been examined in the port studies of Çalışkan and Esmer [13, 37] and Bennett and Gabriel [14]. Port business marketing communication subject has been unable to go beyond the publication of Katty Bernard [3] titled "Marketing Promotion Tools for Ports" prepared for the UNCTAD monographs on port management. The other well-known studies in marketing communication area of port marketing belong to the Pando et al. [15], Cahoon [16], Parola et al. [17], and Notteboom et al. [18] which had always referred to Bernard's study.

In B2B marketing, marketing communication tools have critical importance for the management [19] since they help to develop and maintain interactions with the actors in the environment the company operates. Social media, which enables users to create and share content and allows two-sided, faster and personalized interactions, have been attracting the attention of B2B marketers [20]. It is well known in the current literature that traditional marketing communication

tools which consist of advertising, direct mailing, organizing port days, personal selling, attending international shipping exhibitions, attaining representatives, efforts for domestic networking, attending domestic fairs, visiting schools, organizing conferences, being a speaker at a conference, and organizing press days are used by port businesses to interact with stakeholders in port community [3, 16, 17, 18]. Besides them, port businesses focus on their websites in order to manage the communication with stakeholders [18]. Using social media is a new emerging communication tool for port businesses. Mangold and Faulds [21] offered social media as a hybrid component of the promotional mix and as an integral part of the businesses' integrated marketing communications strategy. Instead of solely having a website that offers one-way communication, traditional transactional goals and promotion [6], with the help of social media companies are more close to achieving long-term relationships. Social media is seen as a cornerstone of marketing since it has changed the instruments and strategies companies use to communicate [5] with their stakeholders.

The aim of this research is to take a step on the gap about social media marketing in the port industry. The focused sample is container ports located in Turkey, but to gain more meaningful insights, a comparison is also made with the ports of Los Angeles, Rotterdam, and Antwerp. Notteboom et al. [18] emphasize the need of tailoring the content of communication tools with diverse topics to attract and raise the interests of the targeted stakeholders. In order to explore the current communication contents of ports and to enlighten if they are tailoring the contents as Notteboom et al. [18] offers, ports' posts are analyzed and summarized through this study. At the end of the study, suggestions are developed by supporting with real cases for ports' social

media management.

2. Social Media for Port Promotion and Public Relations

As one of the 7 P's in service marketing, the promotional mix is used by ports with the aims of communicating with customers, letting them use the services continuously, and developing the port image. Promotion in the port industry can be defined as activities performed with the aim of informing and changing the attitudes and behaviors of port users [22]. Promotion is seen as a key tool of the non-price competition of ports [23]. Promoting is requisite for port businesses to enable communication with customers, prospects and other stakeholders, to increase awareness, to affect attitudes and behaviors towards the seaport, and to increase economical transactions [3, 16].

Port industry stakeholders include port users (i.e. ship agents, brokers, freight forwarders), carriers (shipping lines, tramp operators), employees and labour unions, concessionaries (i.e. terminal operators), port service providers (i.e. customs, pilots, coast guard), shareholders, financial institutions, regulators, local community, and societal groups of interest [18, 24, 25]. Ports have to manage the relations with all the stakeholders and monitor and examine issues, claims, and complaints raised by them [18, 26]. Close relations that developed between ports and stakeholders may help to dig critical clues and issues, and will be benefited by ports in decision-making processes and in developing plans and operations.

With the help of social media, port businesses can make this promoting and communication process easier. Additionally, social media would help port businesses to display all of their promotional activities on one platform. Reaching to the greater mass can be achieved via social media by exhibiting all the other performed communication tools (i.e. advertisings,

sector reports, videos, images, social responsibility projects, social activities, the conferences or other professional platforms that the port attended) in one social media platform. For example, how can the art contest in National Sovereignty and Children's Day (23 April) that was arranged by Evyap Port for children of employees be heard better than social platform? Similarly, is it more possible to know traditional picnic days of Marport through their websites? With the help of social media, the promotional efforts of ports have more potential to reach to a greater audience and raise the ports social image.

With the aim of creating awareness and positive feelings about their services and business, ports can use two independent business functions, marketing, and public relations as a hybrid function through social media. The aim of marketing public relations (MPR) is to generate revenue while creating a favorable image for the business. The aim is to design public relations activities according to support marketing activities [27]. The aim is to stimulate consumer acceptance and understanding, boosting awareness, building trust, informing and educating target audiences, protecting and enhancing the image of the brand, and giving customers reason to buy [28]. MPR also encourages the intermediaries (e.g. opinion leaders, consumers) to spread a message about the company voluntarily and intentionally [29]. Both commercial and non-commercial messages can be transmitted through ports' social media pages. Non-commercial messages, for example, social responsibility projects that are carried out, aim at developing public relations and indirectly generating revenue through targeting conscience of customers and increasing positive perceptions of them about the company. The basic point here is that ports can use PR activities to contribute to the achievement of marketing plans through social media.

3. Methodology

The aim of this research is to take a step on the gap in the literature about social media usage in the port industry. There is not a definite way of analyzing social media. Generally, qualitative methods are used to capture more depth and grounded understanding [30]. To capture the dynamics of ports' social media, several steps were followed in this research;

- 1- Firstly the social media tools that are used by container ports located in Turkey were determined. The most and least active ports were decided. At the last step of this part, an exploratory study was conducted to reveal the content of posts shared by ports. The posts (between March-October 2016) in Facebook, Instagram, Twitter, and LinkedIn were analyzed through inductive content analysis, where meaningful themes in each message were extracted by the researchers.
- 2- Secondly, the most attractive topics on Facebook were determined by engagement stats and comparison was made between container ports located in Turkey and the top container ports in the world. The main similarities and differences were discussed.
- 3- Thirdly, important issues, suggestions to increase the power of using social media, and managerial implications were discussed.

The focused sample of this study is 25 container ports located in Turkey (Figure 1). 60% of these ports are private, 28% are commercialized, and 12% are public ports (Figure 1). Most of the sample are private ports and mostly operated by Turkish origin companies [23]. 90% of total cargoes in Turkey are handled by private ports [31]. Commercialization is a concept where the ownership of ports belongs to the state and the operation rights are transferred to

the private sector [32]. In the sample, we have 7 commercialized container terminals and 3 public ports which have not been commercialized yet.

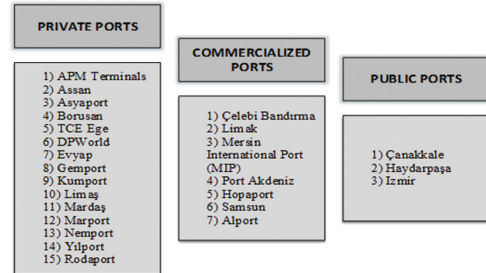


Figure 1. The Sample and the Management Profiles

Even the sample comprises of local coasts located in Turkey, 9 out of 25 ports are operated by global terminal operators (e.g. APM, TIL, GTL, DP World, Cosco Pacific, PSA). 36% of the sample represents the international context so it can be said that the limitation about generalizability of the results is reduced. Additionally, the management profiles and investment characteristics of the sample may help to comment on the social media applications, differences, and similarities.

4. Social Media Tools Used by Ports in Turkey

There are available several platforms in social media, to name a few, Facebook, Instagram, YouTube, LinkedIn, and Twitter. Facebook is the most popular social network worldwide with 1.71 billion active users according to the September 2016 statistics [33]. After Facebook, the most popular social networks are Instagram, Twitter, and LinkedIn with 500, 313, and 106 million active users, respectively [33]. So, it would be logical to expect that at least some of the targeted customers are going to be on social platforms.

In this part of the study, the social media tools that are used by container ports in Turkey are searched. The most active and

less active ports are determined, and the posts in all social platforms shared by ports are analyzed through content analysis with the help of Excel.

oriented toward work-related contexts and primarily used by business professionals as a networking tool. Industrial customers and professionals usually use LinkedIn

Table 1. *Social Media Tools Used by Container Ports in Turkey*

| Container Ports in Turkey | Facebook | Instagram | Twitter | LinkedIn | YouTube |
|---------------------------|----------|-----------|---------|----------|---------|
| APM Terminals İzmir | X | X | X | X | X |
| Assan Port | X | X | X | X | |
| Asyaport | X | X | X | X | X |
| Borusan | X | | X | | X |
| Çelebi Port of Bandırma | X | | | | |
| TCE Ege | | | X | | |
| DP World Yarımca | X | X | X | | X |
| Evyap port | X | | | X | |
| Hopaport | X | | X | X | X |
| Kumport | | | | X | |
| Limakport | X | X | | X | |
| Limas Port | | | | | |
| Mardaş | | | X | X | |
| Marport | X | X | X | X | |
| Mersin (MIP) | | X | | X | |
| Nemport | | | | X | |
| Port of Akdeniz | X | | | | |
| Port of Canakkale | X | | | X | |
| Yılport | | X | | X | |
| Alport | X | | X | | |
| Rodaport | | | | X | |
| Samsun Port | | | | | |
| TCDD Port of Haydarpaşa | | | | | |
| TCDD Port of İzmir | | | | | X |

In Table 1, the official accounts of ports on social platforms were searched and listed. According to the results (Table 1), Turkish port industry mostly uses LinkedIn because industrial customers are more reachable through such kind of professional social platforms. LinkedIn as a niche network is

for such several reasons as asking each other for advice when making business-related decisions, finding new partners, developing a business-related network, business collaboration and sharing new developments about their businesses [34]. Yılport has the highest followers

(3060) among other ports in LinkedIn platform and Mersin (MIP) follows Yilport with 2040 followers. Even Hopaport, LimakPort, Nemport, Port of Çanakkale, and Rodaport have LinkedIn accounts and have followers (LimakPort has 1070 followers), it is observed that they have not posted anything.

Secondly, container ports in Turkey mostly use Facebook platform where they can create profiles and encourage others to become a fan of the page. They share company, service, and equipment information and host conversations, publish photos and videos, and event information on Facebook. Marport is the most active user with 5067 posts and followed by Port Akdeniz with 3616 posts. Apart from the ports in Table 1, Çelebi Port of Bandırma, Limak Port, Port of Çanakkale, and Alport have Facebook accounts, but they do not use them actively because only a few posts (4-72) had been posted years ago (2011-2013).

Having a channel/profile on YouTube allows companies to exhibit all company-related videos in one place. Companies can customize the channels on YouTube to match their visual identity [34]. Even numerous ports have informative videos on YouTube, only six of them manage their own YouTube channels. The most active user is Asyaport with 20 uploaded videos, 30361 views, and 81 subscribers. APM terminals Izmir follows Asyaport with 11 uploaded videos, 5832 views, and 16 subscribers. TCDD Port of Izmir's one and only social media activity, which belongs to the uploading one video on YouTube, results in getting 2045 views and 3 subscribers.

Twitter termed as "microblog" social media tool can be used by companies in transmitting brand news, service/product offerings, resolving customer problems and responding to questions. The reactions to the news or tweets sometimes are more

influential and meaningful rather than the content of the news. On the Twitter platform, it has been observed that Marport is the most active port with 474 posts. Borusan Port follows it with 193 posts. TCE Ege's one and only social media act belong to have a Twitter account and having just one post. Also, Alport is not an active user with 2 posts on Twitter.

Image communication tools of ports such as symbols, pictures, graphs [4] can be shared on Instagram. Out of 24 ports, 8 ports have an Instagram account. Marport is the most active user with 210 posts following by APM Terminals Izmir with 85 posts. Mersin (MIP) and LimakPort are not active users with 0 and 4 posts, respectively.

An exploratory study was conducted to reveal the content of posts shared by ports. The posts (between March-October 2016) in Facebook, Instagram, Twitter, and LinkedIn were analyzed through inductive content analysis, where meaningful themes in each message were extracted by the researchers [36]. Deductive content analysis method was not proper for this analysis because there is not any available categorical scheme developed formerly. Posts covered 10 days' period, were examined manually and keywords were determined (e.g. investment, news, environment, safety, security, etc.). The determined keywords were searched in all posts. The same process was conducted for the remaining posts that do not include the previous key words. At the end of the process, the issues that are shared by ports on social media are determined and can be seen in Table 2.

The contents of posts get beyond the limits of revealing the port characteristics such as infrastructure, superstructure, operations, throughput numbers, etc. The posts tend to reveal more messages focusing on environmental issues and social matters.

Table 2. Post Contents of Ports on Social Media Platforms

| | |
|---|---|
| <ul style="list-style-type: none"> • Images and videos of port • Images and videos of ships • Images and videos of workers • Information about port products and services • Special day greetings • Social responsibility projects • Social events (sports activities, festivals, fairs, visits, etc.) • Innovative solutions • Training and education activities • Prizes and certificates | <ul style="list-style-type: none"> • Messages about safety and security issues • Information about maritime and maritime sector • Media news • Messages about environmental awareness and sustainability • New investments • New handling equipment and services • Market share information • Cooperation news • Incoming and outgoing cargoes |
|---|---|

5. Similarities and Differences between Turkish Ports and World Container Ports

In this part of the study, a comparison between the social accounts of container ports located in Turkey and the top container ports in the world was conducted to reveal the differences in most attractive topics determined by engagement stats. The top container ports were determined from the Top 20 container terminals list of UNCTAD- Review of Maritime Transport 2015. 9 container ports (APM, Assan, Asya, Marport, DPWorld, Evyap, Hopaport, Borusan, and Akdeniz) from Turkey and 3 best container ports (Rotterdam, Antwerp, and Los Angeles) in the world had constituted the sample which was

determined according to the having an official and active social account on Facebook. Because having a social account does not make any sense without being an active user. Social accounts of ports were analyzed through a social analytics tool namely Keyhole. The focus analysis point is to handle determined key performance indicators which involve engagement stats (like, share, and comment). The accounts were examined for 8 months' period (March-October 2016). The aim was to gather data from the social accounts of ports and to make comparisons between two samples and make the data useful for digging insights to guide ports' social marketing strategy.

Table 3. Contents and Engagement Stats of Social Media Accounts of Turkish Container Ports (According to the Highest Engagement Stats)

| Port | Topic | Shares | Likes | Comments |
|------------------------|---|--------|-------|----------|
| APM TERMINALS IZMIR | Inauguration video | 124 | 170 | 7 |
| | International Women's Day (8 March) | 41 | 179 | 1 |
| | News about investment plans and project details | 54 | 140 | 4 |
| | World Day for Safety and Health at Work (28 April) | 55 | 123 | 1 |
| | World Environment Day (5 June) | 10 | 161 | 0 |
| ASSAN PORT | Republic Day (29 October) | 98 | 1540 | 7 |
| | Victory Day (30 August) | 0 | 595 | 0 |
| | Eid al-Adha (religious festival) | 0 | 526 | 7 |
| | Commemoration of Atatürk, Youth and Sports Day (19 May) | 31 | 323 | 0 |
| | Professional sectoral fair attendance | 2 | 301 | 0 |

./..

Table 3. Contents and Engagement Stats of Social Media Accounts of Turkish Container Ports (According to the Highest Engagement Stats) (Cont')

| Port | Topic | Shares | Likes | Comments |
|-----------------|---|--------|-------|----------|
| ASYA PORT | Democracy watch against coup attempt | 8 | 272 | 3 |
| | News about gaining status of EcoPort | 24 | 126 | 0 |
| | Job vacancy announcement | 89 | 64 | 0 |
| | Port video | 15 | 84 | 0 |
| BORUSAN PORT | Information about having the half of the Gemlik ship traffic | 13 | 618 | 1 |
| | News about being a leader in market share on general cargo market | 15 | 464 | 0 |
| | Investment news | 5 | 59 | 0 |
| DP WORLD YRIMCA | Inauguration video | 226 | 212 | 5 |
| | Introducing video | 165 | 138 | 9 |
| | News about starting commercial activities | 123 | 104 | 3 |
| | Statement about gender equality | 3 | 110 | 1 |
| EVYAP PORT | Turkish Maritime and Cabotage Day (1 July) | 12 | 76 | 0 |
| | Movement/hour performance record | 9 | 73 | 0 |
| | Indicators of calling ships and handled cargoes | 13 | 56 | 1 |
| MARPORT | Day of the Seafarer (25 June) | 14 | 212 | 0 |
| | Port photo with containers and a ship | 13 | 187 | 0 |
| | Port photo with cranes and a ship | 3 | 163 | 3 |
| | Ramadan feast | 1 | 162 | 2 |
| | Iftar photos (the evening meal during Ramadan) | 1 | 160 | 1 |
| | Port photo (entire port) | 17 | 157 | 0 |
| HOPA PORT | News about the interview with the port management | 17 | 55 | 3 |
| | Port photo | 6 | 32 | 0 |
| | Statement about ship traffic | 10 | 25 | 0 |
| PORT OF AKDENİZ | Ramadan feast | 6 | 144 | 4 |
| | Turkish Maritime and Cabotage Day (1July) | 13 | 109 | 0 |
| | New handling equipment technology development news and its photos | 4 | 103 | 3 |
| | Social organization for port workers | 1 | 125 | 2 |
| | News about new service offerings and photos of one process achieved | 16 | 117 | 3 |

The Table 3 and Table 4 were constituted according to the highest engagement stats of posts. The topics with high engagement average (likes+comments+shares/post) in Turkey port market are Celebration of

Republic Day, Celebration of Victory Day, Celebration of Eid al-Adha, Inauguration video and Celebration of Commemoration of Atatürk, Youth and Sports Day. The topics with high engagement average

(likes+comments+shares/post) in Port of Los Angeles, Rotterdam, and Antwerp are Video of a cruise ship, Photo of Vincent Bridge taken by an employee, Photo of Vincent Bridge taken by a student, Photos and news about LA Fleet Week and Video of a cruise ship.

According to the above lists that involve posts with highest engagement average, both in two samples, the posts included social patterns such as photos with beautiful scenery, social activities, and celebration of special days are getting more attention from the audiences.

shows the power of sharing attractive photos and videos with high engagement stats on social media accounts of ports. Port of Antwerp realized this power and posted the most beautiful port photos regularly by giving the name of the owner on Facebook by eliminating the posts on Instagram shared by the public with the #portofantwerp hashtag.

The main difference between two samples is the given importance on the celebration of special days. It has been observed that the contents of Turkish Ports' posts are managed in accordance

Table 4. Contents and Engagement Stats of Social Media Accounts of Ports of Los Angeles, Rotterdam, and Antwerp (According to the highest Engagement Stats)

| Port | Topic | Shares | Likes | Comments |
|---------------------|---|--------|-------|----------|
| PORT OF LOS ANGELES | Photo of Vincent Bridge from the view of the port by an employee. | 161 | 505 | 21 |
| | Photo of Vincent Bridge from the view of the port by a student. | 105 | 458 | 18 |
| | Photo and news about LA Fleet Week | 104 | 360 | 24 |
| | Crane photo from the view of crane operator and possessed crane number in port | 42 | 307 | 16 |
| | Statement emphasized the importance of port as the largest trade gateway in Americas and a photo of port | 45 | 287 | 8 |
| PORT OF ROTTERDAM | Video of cruise ship (Harmony of the Seas) at the port | 788 | 1197 | 139 |
| | Video of cruise ship (Harmony of the Seas) at the port | 32 | 286 | 13 |
| | The photo and news about the arrival of cruise ship Harmony of the Seas | 68 | 168 | 35 |
| | Photos of sky with the view of the port | 24 | 252 | 6 |
| | Canal investment photos | 59 | 223 | 15 |
| PORT OF ANTWERP | Interesting news and photo about a safety helmet belongs to the port which was found in south Dorset coast in England | 90 | 154 | 13 |
| | Photo of port | 11 | 262 | 5 |
| | Photo and information of NYK Blue Jay containership that had arrived at the port | 26 | 220 | 9 |
| | Inauguration of Kieldrecht Lock by King of Belgium | 90 | 150 | 13 |
| | Call for votes for the most sustainable port award | 22 | 176 | 17 |

The main similarities between two samples are the announcement of investments, the importance and success stories of ports. Also, the other similarity

with the culture of the local community. Posts that are unrelated to port industry (e.g., the celebration of religious festivals, the celebration of days special to Turkey

such as Victory Day and Republic Day) were taken high reactions from audiences. At this point, Turkish ports' social media content appears differently from other ports in the world and raises the question why the Turkish case stands as an exception. Here, one cannot ignore the role of Turkish culture, customs, Islamic traditions and social values on social media marketing strategies of Turkish ports.

It is also important to mention that ports of Los Angeles, Rotterdam, and Antwerp are under public ownership and they are highly active on social media. However, it is seen that public owned ports in Turkey (e.g. Izmir Alsancak) are not active on social media.

6. Discussion and Implications for Port Managers

It has been found essential to underline some important issues that discovered during the research process of usage of social media tools of ports. Firstly, it has been observed that active ports in social media use more than one social platforms. It would be beneficial for ports to find the right social platform to focus more. Building such success measurement criteria (i.e., engagement level of customers) would be helpful for ports since it would give hints about whether to focus more on a platform or leave it. For instance, on YouTube account of DP World Yarımca, the port video has 573 views, but on Facebook account, the same video has 25000 views, 212 likes, and 226 shares. So, it can be concluded that the Facebook account is more proper for DP World Yarımca with the aim of reaching a large audience.

Secondly, it has been discovered that tailoring the post content helps ports to reach a wider audience. For example, even the reaching population is rather small than Assan Port, APM Terminals Izmir's creativeness and the way of sharing of the desired image is better than Assan Port. For

instance, they celebrate the International Women's Day on 8 March with a picture taken in port with port's smiling women employees. The post took 179 likes and 41 shares while Assan Port's Women's Day celebration post (doesn't contain any port specific logo, image, or something else) just had 24 likes. As the professionals in social media announce every time that "The content is the king in social media", it has been seen that it is also crucial for ports to utilize an opportunity from the power of social media through innovative and novel content creating.

As we discussed earlier, the benefits of social media to the port industry are set forth as promotion and increased public relations. The results in the previous section had raised the question of does social media really represent a beneficial tool for port businesses in a promotional manner? Because it has been observed that the most attractive posts of ports with high engagement levels do not include the port service, infrastructure, and superstructure, investments, or success stories. There is a paucity of the social media literature in terms of measuring the success or benefits of social media. Most of the studies focus on the engagement rates and follower numbers as success indicators as it is handled in this research either. Return expectations of ports would be increased customers, business volume, profitability, etc. However, it is not possible to make a relationship analysis quantitatively between the social media data and return expectations. It is hard to measure the direct effects of social media on port economic gains besides there is no study that conducts this kind of measurement in the literature. Also, Michaelidou et al. [35] found in their study that uncertainty whether or how social media could help brands is one of the main barriers in B2B sector to use SM.

To measure the benefits and trends of social media and to develop proper

strategies, data mining tools can be used by ports. Although it is easy to reach stakeholders via social media and to initiate a relationship with them, like any other relationships it takes time to reap the benefits and needs great effort to make it worthwhile [34]. To shorten this process and to measure the benefits more accurately ports can use data mining tools with the aim of measuring engagement, checking competitors, tracking campaign, analyzing brand, building competitive intelligence, caring customer, launching services, ranking influencers. Sentiment analysis can be done in order to reveal the feelings of people about the port and services.

Besides the promotional effects of social media, we focus on the public relations benefits for ports. During the analysis process, it has been observed that ports utilize an opportunity from the power of stakeholders to reach larger mass to create the required positive image. Every post ports make on a social media platform is an opportunity for them to reach a larger audience through spreading with the help of sharing of followers. Workers, media, news companies, schools, logistics clubs, other partners in the logistics industry, academicians have the ability to share the posts of ports if they find it remarkable, or interesting. At that point, the aim is more than classical advertising. Word-of-mouth is sincerer than the formal advertising content. For example, crane videos of Port of Akdeniz are shared even by metallurgy and materials engineers, students, and also grab and machine companies. Also, APM's post about the maritime week in a university is shared mostly by students, the port video of Asya Port is shared by real estate agents to promote the local area, Hopa Port's post about ship traffic in the port is shared by academicians, professionals, and again by real estate agents. Additionally, it has been discovered that ports increase their social

image and visibility through sponsoring and promoting events on Facebook. Events can be promoted and people can be invited to attend the event easily, without any expense, and in a less time-consuming way on Facebook. For example, Port of Los Angeles promoted the event for Lobster Festival and Music Weekend on Facebook and thousands of people declared their willingness to attend. Also, Port of Rotterdam organizes business events (e.g., meeting organization for informing shippers and logistics service providers about the latest developments in the port of Rotterdam) and publish through Facebook. With the help of sponsoring different events, the visibility can be increased on social media. For example, recently, the North Sea Jazz Festival which will be held in 2017 is sponsored by Port of Rotterdam. The event page on Facebook is opened as 'Port of Rotterdam North Sea Jazz Festival' and thousands of people are invited to the event through this page, and hundreds of people share this event on the social media platform. Thus, Port of Rotterdam increases its visibility, raises the awareness, and successfully manages its marketing public relations.

7. Conclusion

To port industry, social media marketing is just a new communication channel for their voice and content. However, the benefits of being more accessible, more familiar and recognizable for stakeholders and the easiness of the way to achieve these benefits through social media have been recognized by the port industry. Ports cannot design interesting equipment, entertaining services but some niche strategies can be determined. Besides attracting new customers, the main aims would be raising awareness, building a public image, sharing values, and so on. As the marketing department of Port of Hamburg indicates, isn't it a good

outcome for a port to have a positive image worldwide, standing for professionalism, efficiency, and innovation?

In this study, exploratory research was conducted to gain some insights into social media marketing efforts of ports. Firstly, the general tendency of ports in using social media tools was searched and the results indicate that LinkedIn is the most preferable in terms of the account number of ports, but Facebook is the most actively used social platform by ports in Turkey. Through content analysis, the content of ports' posts was listed. Secondly, to get meaningful information about most attractive topics in port environment, a social analytics tool was used to list the posts with high engagement levels both for container ports in Turkey and Port of Los Angeles, Rotterdam, and Antwerp. The main similarities and differences between two samples were discussed. It has found that the most attractive posts of ports with high engagement levels do not include the port service, infrastructure, and superstructure, investments, or success stories.

According to the top container ports list of the report of UNCTAD Review of Maritime Transport, this study only found three ports on social media platform (the accounts were managed in their native languages). Most of the ports in the top list belong to the Far East countries, and they may have social accounts, but they could not be found because of researchers' limitation in Far East languages. In the future, these ports' social media efforts can also be examined and broader insights can be gained. The limitation of measuring the direct effects of using social media on return expectations of ports can be reduced by interacting directly with port managements and by developing case studies. In the future, the social media use can be examined in the scope of competition between terminals in the same ports as well.

References

- [1] Cetin, C. K. and Cerit, A. G. (2010). Organizational effectiveness at seaports: a systems approach. *Maritime Policy & Management*. 37(3):195-219.
- [2] Woo, S. H., Pettit, S. J., Kwak, D. W. and Beresford, A. K. (2011). Seaport research: A structured literature review on methodological issues since the 1980s. *Transportation Research Part A: Policy and Practice*. 45(7):667-685.
- [3] Bernard, K. (1995). *Marketing Promotion Tools for Ports*, in UNCTAD monographs on port management, New York and Geneva.
- [4] ISL (1991). *Port Management Textbook: Volume 3 - Port Marketing*, Institute of Shipping Economics and Logistics, Bremen.
- [5] Bae, H. S. (2012). The effect of market orientation on relationship commitment and relationship effectiveness of port logistics firms. *The Asian Journal of Shipping and Logistics*. 28(1):105-134.
- [6] Kounoupas, E. and Pardali, A. (2015). Adding some context to port marketing: Exploring the content and measurement of market orientation in the port industry. *SPOUDAI-Journal of Economics and Business*, 65(1-2):3-26.
- [7] Cahoon, S. and Hecker, R. (2005). *Seaports in the New Economy: Using Services Marketing Strategies to Increase Cargo Throughput in a Hypercompetitive Environment*. Proceedings of the IAME Conference. Cyprus.
- [8] Brooks, M. and Schellinck (2015). Measuring port effectiveness: what really determines cargo interests' evaluations of port service delivery?. *Maritime Policy & Management*. 42(7):699-711.

- [9] Thai, V. V. (2016). The impact of port service quality on customer satisfaction: The case of Singapore. *Maritime Economics & Logistics*. 18(4): 458-475.
- [10] Asfour, A. M. (2016). The Impact of The Holistic Marketing Strategies on Increasing Customers satisfaction In Container terminal Ports, A Comparative Study Between East And West Port Said Container Terminals. *The International Maritime Transport & Logistics Conference (Marlog 5) Toward Smart Ports 13 - 15 March*.
- [11] Pardali, A. and Kounoupas, E. (2007). The application of marketing strategies in the container seaport market. *Proceedings of the 5th International Conference on Maritime Transport and Maritime History*. Barcelona, Spain.
- [12] Bauk, S., Šekularac-Ivošević, S. and Jolić, N. (2015). Seaport positioning supported by the combination of some quantitative and qualitative approaches. *Transport*. 30(4): 385-396.
- [13] Çalışkan, A. and Esmer, S. (2017). Port Industry Related Relationship Marketing Applications. *Journal of ETA Maritime Science*, 5 (2). 202-215.
- [14] Bennett, R. and Gabriel, H. (2001). Reputation, trust and supplier commitment: the case of shipping company/seaport relations. *Journal of business & industrial marketing*. 16(6):424-438.
- [15] Pando J., Araujo, A. and Maqueda, F.J. (2005). Marketing management at the world's major ports. *Maritime Policy & Management*. 32(2):67-87.
- [16] Cahoon, S. (2007). Marketing communications for seaports: a matter of survival and growth. *Maritime Policy & Management*. 34(2):151-168.
- [17] Parola, F., Satta, G., Penco, L. and Profumo, G. (2013). Emerging Port Authority communication strategies: Assessing the determinants of disclosure in the annual report. *Research in Transportation Business & Management*. 8:134-147.
- [18] Notteboom, T., Parola, F., Satta, G., and Penco, L. (2015). Disclosure as a tool in stakeholder relations management: a longitudinal study on the Port of Rotterdam. *International Journal of Logistics Research and Applications*, 18(3), 228-250.
- [19] Mäläskä, M., Saraniemi, S. and Tähtinen, J. (2011), "Network actors' participation in B2B SME branding", *Industrial Marketing Management*, Vol. 40 No. 7, pp. 1144-1152.
- [20] Kho, N. (2008), "B2B gets social media", *EContent*, Vol. 31 No. 3, pp. 26-30.
- [21] Mangold, W. G., and Faulds, D. J. (2009). Social media: The new hybrid element of the promotion mix. *Business horizons*, 52(4), 357-365.
- [22] Esmer, S. (2011). Liman İşletmelerinde hizmet pazarlaması: pazarlama iletişimi. *Detay Yayıncılık*.
- [23] Esmer, S., Nguyen, H. O., Bandara, Y. M., and Yeni, K. (2016). Non-price competition in the port sector: A case study of ports in Turkey. *The Asian Journal of Shipping and Logistics*, 32(1), 3-11.
- [24] Moglia, F. and M. Sanguineri. (2003). "Port Planning: The Need for a New Approach." *Maritime Economics & Logistics* 5: 413-425.
- [25] Dooms, M., A. Verbeke, and E. Haezendonck. 2013. "Stakeholder Management and Path Dependence in Large-scale Transport Infrastructure Development: The Port of Antwerp Case (1960-2010)." *Journal of Transport Geography* 27: 14-25.
- [26] Brooks, M. R., and A. A. Pallis. (2008). "Assessing Port Governance

- Models: Process and Performance Components.” *Maritime Policy & Management* 35: 411-432.
- [27] Harris, T. L. (1993). How MPR adds value to integrated marketing communications. *Public Relations Quarterly*, 38(2), 13-17.
- [28] Papasolomou, I., and Melanthiou, Y. (2012). Social media: Marketing public relations’ new best friend. *Journal of Promotion Management*, 18(3), 319-328.
- [29] Giannini, G. T. (2010). *Marketing public relations: A marketer’s approach to public relations and social media*. Upper Saddle River, NJ: Pearson.
- [30] Graffigna, G., & Riva, G. (2015). Social media monitoring and understanding: an integrated mixed methods approach for the analysis of social media. *International Journal of Web Based Communities*, 11(1), 57-72.
- [31] Esmer, S. and Duru, O. (2017). Port governance in Turkey: The age of the global terminal operators. *Research in Transportation Business & Management*. 22:214-223.
- [32] Brooks, M. R. and Cullinane, K. (2007). Devolution, port performance and port governance. *Research in Transport Economics*. 17.
- [33] Statistics Portal (2016). <https://www.statista.com/statistic-portal/>
- [34] Singh, S., and Diamond, S. (2012). *Social media marketing for dummies*. John Wiley & Sons.
- [35] Michaelidou, N., Siamagka, N. T., & Christodoulides, G. (2011). Usage, barriers and measurement of social media marketing: An exploratory investigation of small and medium B2B brands. *Industrial marketing management*, 40(7), 1153-1159.
- [36] Berg, B.L. (2001). *Qualitative research methods for the social sciences*. 4th ed. MA:Pearson Education.
- [37] Caliskan, A. and Esmer, S. (2016). Exploring the Relationship Marketing Strategy of Ports. Annual conference of the International Association of Maritime Economists (IAME), August 23-26, Hamburg.
-