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DANISH MARITIME AUTHORITY

ADMINISTRATIVE BURDENS IN THE MARITIME SECTOR

SUMMARY REPORT



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Foreword

This report sums up findings from three studies on administrative burdens in the maritime sector. The studies have been conducted by COWI on behalf of the Danish Maritime Authority and they are important parts of the series of initiatives from the Danish Maritime Authority to ease administrative burdens in the maritime sector.

The first studies on Danish seafarers and Danish shipping companies gave interesting information from the perspective of both the seafarers and the shipowners. We found that Danish seafarers use up to 20% of their working time on tasks they deem as administrative burdens. Among employees in shipowners' landbased offices the figure was 9 %.

Since shipping is a global industry, we found that it would be interesting to also investigate whether the same conditions prevail internationally. We have therefore conducted a survey among international seafarers – thereby strengthening our data to take into account data from 59 nationalities. Our third study shows that 30 % of international seafarers feel that they spend too much time on tasks that they consider to be administrative burdens. We found that all nationalities to some extent are annoyed and frustrated by the same administrative burdens in the maritime sector.

Many people in the maritime sector have contributed valuable time and effort to make the studies successful by helping in relation to raising awareness of the studies and by coming forward with many well-intended points of view that can inform DMA, other authorities and stakeholders in their future reflection and decision-making. We want to send our thanks to all these contributors. A special thanks goes to those who helped us disseminate our international survey without whom we would not have been able to succeed in collecting survey data internationally.

1 Introduction

The aim of this executive summary is to sum up the conclusions and perspectives from three studies examining administrative burdens in the maritime sector:

- › Administrative burdens among Danish seafarers (2011)
- › Administrative burdens in shipping offices (2012)
- › Administrative burdens among international seafarers (2013)

The executive summary gives a condensed description of the study findings. Further details on data collection, data analysis and study findings are given in the individual reports.

Administrative burdens among international seafarers:

<http://www.sofartsstyrelsen.dk/publikationer/Sider/Skibsfartspolitikoghvervsvilk%C3%A5r.aspx>

Administrative burdens in shipowners offices:

<http://www.dma.dk/SiteCollectionDocuments/Publikationer/BurdensInShipownersOffices.pdf>

From craft to control - Danish seafarer's perspective of administrative burdens in the maritime sector:

http://www.dma.dk/SiteCollectionDocuments/Publikationer/DraftSummaryReport_19122011.pdf

The studies describe the '*as is-situation*' but also give many inputs and reflections on a '*to be-situation*' with better utilisation of human resources and capabilities, especially among skilled officers on maritime vessels. They, in turn, show promising potentials for a new approach to LEAN, SAFE and EFFICIENT ship operations for the future.

This report is deliberately written in a cautious tone, respecting that we are addressing a complex issue with different interests and many stakeholders.

2 Findings

Over the last 20 years the maritime system and all the stakeholders involved in the maritime sector have aimed to continually improve safety and efficiency at sea. The efforts have mainly focused on the creation of formal standardised procedures and requirements to create safety and efficiency. This approach has had a positive effect on safety up to this point. But gradually the documentation and control requirements have grown larger, more complex and more time consuming.

Administrative burdens seem substantial

Our survey of Danish seafarers shows that they use no less than one-fifth of their working day on dealing with what they consider to be *administrative burdens*.¹ They fill out forms, maintain documentation on board the ship and take part in inspections. In the Danish shipowners' offices, the administrative personnel use almost 10 % of their working time on administrative burdens. In our survey of international seafarers, 30 % of seafarers feel that they spend too much time on tasks that can be considered administrative burdens. These burdens primarily stem from unnecessary repetition of tasks and demands for too much paperwork and documentation to be handled.

A cautious conclusion could be that the substantial level of administrative burdens, which seafarers and shipowners experience, reflects a significant potential to reallocate time to more fruitful tasks within the sector. This could possibly lead to increased efficiency and quality.

It is essential to underline that the seafarers and shipowners' understand the rationale underlying most procedures and requirements even though these may lead to administrative burdens. They acknowledge that such procedures are not implemented with the aim of being 'a burden', but that they in principle serve higher-end objectives like personal safety and environmental protection. However, many are worried that the marginal utility of more procedures and requirements could now be negative: That procedures and requirements introduced with the intention of protecting people and the environment can in fact obstruct that aim.

¹ Administrative burdens are defined as "*administrative work which in the opinion of the stakeholder is not adding value proportionate to the resources the stakeholder will have put in to the work to comply with specific rules and requirements*".

2.1 Specific observations

In this section we outline some of the main observations from the studies carried out.

Observation 1

Seafarers of all nationalities perceive administrative burdens in the maritime sector as frustrating and burdensome. Our international survey indicates that the perception of administrative burdens among seafarers is more or less universal.

In comparing nationalities and possible cultural influences on the perception of administrative burdens, we find the perceptions from seafarers from 59 countries are relatively similar in terms of what work tasks are considered an administrative burden and why that is the case. Based on this we cannot find a clear cultural pattern which lead to the findings that all seafarers regardless of nationalities find that many work tasks on ships are considered an administrative burden. Despite very similar assessments internationally among seafarers we may see a cultural tendency towards Western European seafarers being more vocal in voicing the many inappropriate consequences of issues, rules and procedures existing today. Many of these issues are listed below.

Observation 2

Seafarers are concerned about ship safety and take great professional pride in their jobs. Many requirements and procedures are thus understood and accepted as a natural part of working routines.

Many seafarers say that they consider drills² to be meaningful because both their own safety and that of the ship is at stake. Realistic scenarios are rehearsed so that all staff knows what to do in the event of e.g. a fire, man over board or other serious incidents. The filling-out of journals in the engine room and on the bridge is something which seafarers have grown accustomed to and see as a good way of documenting and sharing information. It is not perceived to be a significant burden.

Most seafarers also express their understanding of the need to conduct inspections to make sure that the ship's standard and performance is satisfactory. They recognise that this is a reasonable instrument to combat sub-standard shipping. Seafarers suggest putting more focus on competences and the creation of a behaviour-based safety culture in the future instead of primarily using procedures to enhance safety.

Observation 3

Seafarers and shipowners experience that there are significant potentials for standardisation and optimisation concerning port and pre-arrival documents and processes.

The surveys that have been conducted in Denmark and internationally show that the procedures concerning port and pre-arrival documents are considered a burden.

² Often with ISPS drills as an exception.

The studies show that the seafarers and shipowners recognise that there is an intention towards increased digitalisation in this field, but in their view, the potential for relieving the burdens has not been fully utilised yet. The seafarers often find it difficult to see the rationale in manual handling of information which is already available in digital form or could easily be handled in a digital format. At the same time, the seafarers point to the differences in formats and forms used in different countries and ports when, essentially, it is the same data which is being handled.

Observation 4

The seafarers find ISPS rules to be somewhat burdensome and do not always acknowledge that they lead to a reduction of the risk of terror actions in ports.

The seafarers do not find the ISPS rules more time-consuming than most other areas of work. However, half of the Danish seafarers who are particularly sceptical consider it very annoying because the implementation of the rules, in their view, does not lead to fulfilment of the purpose for which the rules were created. 27 % of international seafarers do not find that ISPS requirements lead to increased ship safety. For example, to the seafarers, it does not make sense to have a guard 24 hours a day in safe ports with professional guards already doing the job.

Observation 5

The seafarers and shipowners consider possibilities for the exchange and sharing of inspection data among those responsible to be underutilised.

There are substantial burdens associated with inspections and vetting. Two-thirds of international seafarers feel that tasks in this relation are being performed too often and almost 75 % feel that there is too much paperwork involved. Seafarers especially from tanker ships consider vetting inspections to be highly time-consuming and very annoying.

The studies indicate that while seafarers find inspections useful and necessary at the general level, they see possibilities to relieve some of the burdens experienced. One of the aspects mentioned by many seafarers is that port states, classification societies and vetting companies do not coordinate the inspections in order to make better use of data from earlier inspections and to avoid similar inspections within a short period to the same ship. The seafarers are being asked about the same issues and are asked to put forward the same documents for various checks and inspections.

A number of captains and officers in both the Danish and international survey feel that the recurrence rate of inspections for well-functioning ships is too high. They think that it should somehow be possible to 'earn' the opportunity to be inspected less if a ship has historically done well in inspections.

According to shipowners, inspections and especially vetting inspections are a huge frustration point mainly for the seafarers, but also to some extent for the shipowners, because many of them have personnel employed to support crews in preparing for vetting. Vetting inspections are extremely important to the financial performance of the specific ships and therefore many shipowners perceive vetting inspection as a market demand they simply accept, while others say that the vetting regime has become excessive. In their opinion, even to the extent that it has become counterproductive to everybody involved in the maritime sector.

Observation 6

The seafarers experience that various incentive schemes in place for those performing inspections lead to increased burdens for well-performing ships and have a detrimental effect on the ability of the inspections to actually serve their purpose.

During the studies, many seafarers have mentioned issues associated with inappropriate incentives. For example, at port state control inspections, many seafarers have the impression that some countries measure their performance in relation to PSC by the number of ships inspected. This in some places leads to a practise of selecting well-performing ships for inspection. This leads some seafarers to feel that they are 'punished' for good behaviour with the unreasonable burden of additional inspections and, at the same time, that PSC inspections are not catching sub-standard vessels as they are intended to.

Also, seafarers mention that they have the impression that some countries have performance targets in relation to the number of points that are raised in connection with a particular inspection. Some seafarers point out that, for well-performing ships, this leads to a focus on irrelevant details and to inspections taking longer than necessary.

Observation 7

Despite a general acceptance of the need for inspections, seafarers and shipowners perceive the inspection regime to have grown to a disproportionate level where inspections focus on unnecessary detail.

Inspections take place when the ship is in port and has many other tasks. This makes inspections a very stressful procedure that sometimes takes so much attention that safety in e.g. cargo operations can be jeopardised.

The seafarers experience that there is a considerable variation (from country to country, from inspector to inspector) in the way in which inspections are being conducted and the issues in focus. They would like to see a higher degree of predictability and less randomness.

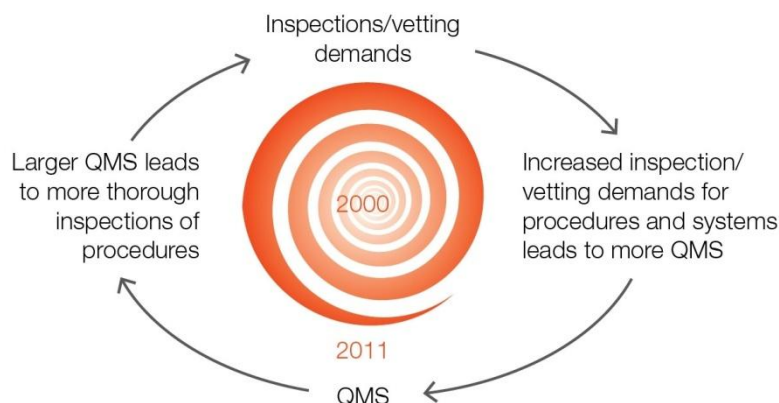
Vetting inspections is, by seafarers and shipowners dealing with tanker vessels, considered to be a special nuisance. Vetting is extremely important to shipowners. Doing badly in a vetting can ruin a business. On the other hand, the private vetting companies have to justify new inspections, so they tend to dig deeper to justify the inspection. The result, according to seafarers, is that small problems are often blown out of proportion. Seafarers find it particularly frustrating that inspections focus too much on correct paperwork and procedures and too little on actual ship standards. Inspection thereby becomes the 'control of control' with a tendency to evaluate the quality of the control system rather than the quality of the ship and crew. This trend is also described in other studies of audits and inspections.³

Some seafarers describe the development over the last 10 years as a vicious circle in which increasing demands from inspections and vetting leads to an increased

³ E.g. Michael Power: The Audit explosion, 1995.

level of detail and documentation in the internal QMS systems. This again leads to focus on more detail in the inspections.

Figure 1 Illustration of spiral on how inspections and QMS interact



Observation 8

The seafarers acknowledge that QMS is installed for a reason but there is a perception among seafarers that QMS procedures are becoming more and more burdensome. On the other hand, shipowners find it frustrating to implement new rules with various national interpretation or implementation forcing them to produce large QMS to encompass all the national differences.

Handling of the QMS is also perceived as a heavy burden by many seafarers. One example is when journal entries have to be repeated and entered into QMS as well.

The seafarers understand the reasons behind most of the procedures, but at the same time complain about the amount of paperwork. They find that it is sometimes more important to document correct behaviour on paper than to actually follow through on efficient environment-friendly or safe-ship operations. Some seafarers go as far as to point out that increased burdens have reached a level where it actually might reduce safety and security because filling-out papers tend to remove focus from the primary concerns of safety, environment and security in a stressful and busy working environment.

The detailed QMS can also lead to a feeling among the seafarers of being left with very little room for manoeuvre and autonomy. This is also experienced as a disregard of the professional competences of the seafarers and their ability to judge what is best in a given situation.

The shipowners highlight a large frustration with the different interpretations of international rules making it extremely difficult to implement a lean QMS on ships. They wish for more internationally harmonized rules in relation to QMS rather than the current tendency for countries to make their own national rules.

Seafarers generally say that QMS should ideally fit the actual work processes and not the other way around. In our studies we have seen very user friendly systems that allow seafarers to work smart, so data is stored digitally and all jobs and operations are integrated into one working process. On the other hand, we have also ex-

perienced cases where QMS is based on general technical assumptions, meaning that the seafarers could actually damage the ship if they followed the QMS directions. When the QMS is not thought through, seafarers will have to use shadow systems, work-around check lists and procedures which is time-consuming and frustrating.

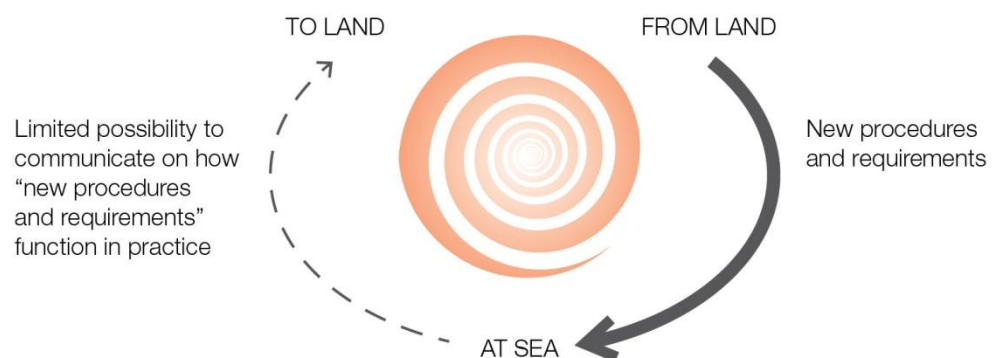
Another observation is that the QMS and key performance indicators may have incentive structures which can actually lead to honest behaviour being punished – and thus cheating about reporting of e.g. near-misses or rest hour compliance may be rewarded. It would seem beneficial to develop a learning culture instead of a culture focusing on finding errors.

Observation 9

Seafarers find that there is a lack of responsiveness to look into the consequences of new procedures and paperwork introduced to the vessels.

Not only do many seafarers describe that they are to implement rules and procedures at a growing pace, they also ask for better communication channels between land and sea to enable them to submit their ideas and suggestions related to procedures. They often feel as the last link of the chain with limited feedback opportunities. An example of this disturbing finding is the fact that 33 % of international seafarers have not during the last three years been approached by a ship manager, a senior officer, a shipowner or a DPA (designated person ashore) to give feedback. Also, many captains/masters have experienced the annual master's review as a mechanism that does not function well enough.

Figure 2 Illustration of a broken feedback process



The result of this is a feeling of alienation to the rules and procedures and especially those who are 'constructed in an office' far from the reality of the seafarer. Seafarers suggest that shipowners should assess the consequences when putting forward new procedures. To be noted, there are positive experiences from Maersk Supply who used the crews actively to reduce the number of procedures from some 4500 procedures to less than 2000.

Observation 10 **The Danish shipowners mention a range of special Danish requirements⁴ and conditions that produce unnecessary administrative burdens for the shipowners' offices.**

The shipowners point to a number of human resource-related issues that all require administrative tasks on behalf of the shipowners' offices. According to the shipowners, the administrative burdens associated with these issues could be eased by introducing digital solutions and, in the case of tax, establishing a separate team with knowledge and competencies about the specific conditions characterising the maritime sector.

The shipowners also find that they have to spend many hours on gathering data to report to Statistics Denmark and other public authorities, but they do not feel that they benefit from this exercise. In addition, the same data needs to be reported to different authorities. For this reason, the shipowners wish that the reporting of data could be done less frequently and that the authorities could share the data.

Observation 11 **It is the sum of burdens that matters. Many seafarers and shipowners indicate that it is not a specific burden which causes frustration. Instead, it is the sheer sum of burdens which has accumulated over the years. Seafarers and shipowners indicate that rules and procedures have accumulated over the last 5-10 years to an extent where it is now becoming counter-productive.**

The seafarers and shipowners understand the reasons behind most procedures, but at the same time they complain about the level of and amount of paperwork. The seafarers' experience that document handling, rules, inspections and quality systems are gradually creating an accumulation of paperwork and procedures at sea which removes focus from operational tasks. Some seafarers go as far as to point out that increased burdens have reached a level where it actually might reduce safety and security because filling in papers tend to remove focus from the primary concerns of safety, environment and security in a stressful and busy working environment.

Shipowners are frustrated by the difficulties and complexity of maintaining an overview of changes in international and national rules. The shipowners feel that it is burdensome to:

- 1 find information in international and national databases
- 2 stay on top of changed regulations.

The next challenge is to find good ways to implement all the different sets of rules and procedures without making their IT-systems and QMS too complex, bureaucratic and inefficient for employees and seafarers to apply/use.

⁴ Special rules = *Særregler*

One minor but none the less time consuming activity for the shipowners is translating national rules and procedures into English. Many shipowners simply ask for the rules to be translated into English. This would also guarantee that there was one authoritative translation that everyone could refer to.

Many international seafarers point out that keeping up with the administrative duties while retaining the required focus on the operational tasks often implies violation of rest hour regulations and that this is a safety concern in itself.

Many seafarers feel that there should be more focus on ‘the competent seafarer’ and the (re-)creation of a culture that honours and makes use of the skilled seafarer. In short, they ask for a more balanced approach equally weighing actual, safe behaviour operations on the one side and documentation of safety procedures on the other.

3 A way forward

Having presented the main findings and observations, we will now outline a preliminary agenda for addressing the issue of administrative burdens and continual safety and efficiency improvements in the maritime sector. We suggest that the main ingredients in such an agenda is:

- › A revived focus on seamanship and safety culture with a view to reducing the number of procedures and burdens.
- › Increased cooperation and dialogue between stakeholders in all areas of the sector: seafarers, shipowners, classification societies and customers, e.g. oil majors.
- › Development of harmonious ‘work smart easy to use’ digital solutions to reduce paperwork and time consuming manual workflows.

In particular, the studies show that improvements in efficiency and reduction in levels of administrative burdens seem to be possible in relation to port and pre-arrival procedures, inspections and internal QMS.

3.1 Reviewed focus on culture, competences, work smart solutions, and dialogue between actors

Influence, feedback and learning

Influence refers to the degree to which seafarers can affect their work on board and how to give feedback to ports, public authorities and shipowners. We have been told that bettering the feedback mechanism is a way to strengthen the quality of systems by giving seafarers a higher degree of responsibility to apply their skills and knowledge into the improvement of the systems. The issue of poor and time-consuming feedback mechanisms may be addressed by:

- › When new systems, procedures and rules are introduced, they should be accompanied by **an assessment of consequences** for time and resources to implement and maintain these new changes. An analysis to whether the time usage stands in a reasonable proportion to the gains should be applied as a standard.

- › **Best practice sharing** Despite the particularities of the maritime sector, it is possible to find other sectors that share some of the features of the maritime sector, and to analyse efforts undertaken to reduce burdens in these sectors. To study the development of safety and safety procedures in the aviation sector would be a possibility. Benchmarking is often a useful 'tool' to initiate a potentially difficult dialogue (*if they can do it, why can't we?*).
- › **Monitoring the administrative procedures and systems** to assess whether they fulfil their intended purpose, thus allowing seafarers to spend less time on less critical issues of which they cannot understand the purpose.

3.1.1 Reducing administrative burdens in inspections

Regarding inspections, seafarers and shipowners find that there is a lack of coordination between classification societies, vetting companies and authorities. By increasing the access to and usage of common data this could be improved significantly. The issue could also be further addressed by:

- › Introducing 'work smart digital solutions' instead of manual procedures: authorities and inspections should allow for shipowners and seafarers to store digital data instead of printed and signed copies of everything.⁵
- › Introducing a more balanced and sustainable inspection culture focusing more on competences, culture and real observations and less on endless paper reports.

3.1.2 Reducing administrative burdens in QMS

Too many meaningless Key Performance Indicators (KPIs) sometimes prevent sensible and efficient prioritisation and management on vessels. Choosing the most important success criteria and rewarding the seafarers for fulfilling them makes it possible to lower the micro management that the current administrative procedures and systems create. Having only a few and focused success criteria allow the seafarers to take responsibility and pride in finding the best way to best practices in a specific context.

Another possible solution is to simplify and improve the QMS to simply make it a user-friendly tool, relevant to the seafarers in all daily operations, without compromising vetting demands or the ISM code

⁵ The Norwegian Maritime Directorate and coastal administration have implemented a single entry digital system which has significantly reduced the paperwork for masters. They now only have to send documents to the first port of visit. Currently, the EU is working on two projects, "the Blue Belt" and further development of "SafeSeaNet" which potentially could help seafarers and shipowners with a smart digital solution to lessen administrative burdens.

3.1.3 Reducing administrative burdens in port documents

Port documents create many frustrations to seafarers when different ports ask for different papers and formats of basically identical data. We recognise that the European Union focuses on this issue and has set 1 June 2015 as the deadline for the ability of Member States to electronically manage all reporting formalities for ships arriving in and/or departing from ports of the Member States. However, shipping is a global business and international systems are necessary to alleviate the administrative burdens on the seafarers related to port documents.

Possible ways forward are:

- Continued efforts to widen and implement standardisations and digitalisation of port- and pre-arrival documents in the EU through SafeSeaNet and other places.
- Analysis of the potential for optimal standardisation/digitalisation solution fitting for a global business as the maritime industry. This could be based on the preliminary lessons learned from SafeSeaNet. Considering that the technical tools to support increased digitalisation are available, why has limited progress been made in this area and why do national and port differences continue to exist?
- Harmonious implemented standardisations of in particular port-, pre-arrival- and ISPS documents globally based on the IMO Conventions and FAL forms. As a first step within the same country where information is shared between ports and public authorities.

3.2 Final remarks

This report is deliberately written in a cautious tone, respecting that we are addressing a complex issue with different interests and many stakeholders. Also, we are fully aware that listening to primarily seafarers has given us important information but not necessarily the full story. To better advance – also in relevant international forums – the issue of administrative burdens in the maritime sector, the knowledge base should preferably be strengthened. Inspired by the study, there appears to be a documentation need in particular related to a better understanding of the dynamics behind the introduction of procedures and requirements leading to administrative burdens.

Who produces administrative burdens?

Throughout the study process – we have been puzzled by understanding the deeper causes of the expansion of procedures, rules and requirements. Historically, accidents, individual cases and strong commercial interests have been a driver and the primary reason for new regulations and initiatives which may prove burdensome to the seafarers. On the other hand, no well-functioning system seems to be in place to evaluate a balance between costs and benefits from introducing new procedures and regulations – and the seafarers have not been able to voice their agenda and communicate the risk of counterproductive effects from regulations. An institutional analysis of the relevant stakeholders' interests and influences would provide a useful input to understand the interaction and causes of administrative burdens.