

NAVIGATING NEW FINANCIAL SEAS

How to deploy digital solutions to
maximise profit and reduce risk

Fiona Macdonald

CONTENTS

FOREWORD	4
INTRODUCTION	6
A FRAMEWORK FOR DECISION-MAKING	8
DIGITAL TRANSFORMATION VS DIGITAL OPTIMISATION	11
Digital transformation	11
Digital optimisation	12
Why is it important to differentiate between the two?	12
IDENTIFY THE CHALLENGES	13
Rapid technological change	14
Lack of access to real time information	15
Balancing financial constraints with the demands of the business	16
Lack of digital system integrability and operability	17
Rapid regulatory change	17
DETERMINE THE POTENTIAL OF DIGITAL SOLUTIONS	19
Using digital tools to improve decision-making	20
Defining pre and post-fixture activities	20
Laytime and claims management	22
The cost of charterparty ambiguity	15
Port call management	15
The price of poor predictions	15
Making payments	16
Digital disbursements	16
Digital crew and vendor payment	18
REFLECT ON THE PROCESS	32
RECOMMENDATIONS	34
01 - People are the most critical part	35
02 - Prioritise solutions that are high-impact, agile, and scalable	36
03 - Collaborate and adjust	38
<i>References</i>	39

By answering critical questions and offering insights into informed decision-making, this guide stands as an essential tool for financial leaders who are not only looking to keep pace with the rapidly evolving digital landscape but also aiming to leverage these advancements for optimal financial success.



The value of [digital] solutions might be clear to one working in the operational department, but for the finance team, the benefits may be less clear-cut.



FOREWORD

**BY HANS-CHRISTIAN
MORDHORST**

CHIEF COMMERCIAL
OFFICER, MARCURA

CFOs and financial leaders have endless decisions to make, and each of these must ultimately support the financial performance of their business.

In recent years, CFOs have become increasingly involved in making decisions that support an organisation's digital transformation. This is especially true in maritime, where shipping companies are increasingly turning to digital solutions to optimise different aspects of a voyage. The value of these solutions might be clear to one working in the operational department, but for the finance team, the benefits may be less clear-cut. This is especially the case within the turbulent maritime landscape and unpredictable economic climate. Deciding which solutions to invest in, and which to avoid, can be far from straightforward.

This report showcases how digitalising different aspects of a voyage can generate substantial financial gains, helping financial leaders steer their way through the complex maritime digital solutions landscape.

This report showcases how digitalising different aspects of a voyage can generate substantial financial gains, helping financial leaders steer their way through the complex maritime digital solutions landscape. Digital crew payments, vendor payments, procurement, port call management, laytime and claims management and disbursements - the smooth and error-free completion of all of these processes are critical to the success of a voyage, and ultimately the financial performance of an organisation.

This guide begins by dissecting what digital transformation entails and explores how these technologies can maximise profits and impact a company's financial year. It also tackles the often-overlooked issue of alignment between business and financial teams—a crucial aspect that, if mishandled, can lead to suboptimal implementation of technologies and, consequently, financial underperformance.

By answering critical questions and offering insights into informed decision-making, this guide stands as an essential tool for financial leaders who are not only looking to keep pace with the rapidly evolving digital landscape but also aiming to leverage these advancements for optimal financial success.

We're delighted to be supporting this research from Thetius. Through our digital solutions covering procurement right through to payment, we support shipping leaders to digitise, digitalise, automate, and optimise their voyages to ensure safe, efficient, compliant, and financially rewarding operations.

We believe that this guide is more than just a handbook but a strategic partner for CFOs and financial leaders in the maritime sector, aiding them in their journey toward effective and profitable digital transformation.


In the last few years, we've seen a change in roles and responsibilities among financial leaders and Chief Financial Officers (CFOs). No longer are they confined to traditional financial roles; their involvement in procuring and implementing digital solutions is becoming clear.

If you are involved in making financial decisions and you want to better navigate the complex maritime digital solutions landscape, this guide might be for you.



INTRODUCTION

Prior to the 2000s, the role of a CFO was primarily centred around traditional accounting and financial management. However, a 2020 survey by Oracle highlighted a shift in these responsibilities. Today, CFOs are tasked with a broader range of strategic decisions, but economic volatility because of factors like the pandemic, geopolitical instability, and market fluctuations makes it a difficult landscape to navigate.



This is also true for the maritime industry, where digital transformation is having a substantial impact on the efficiency and performance of shipping operations, and as a result, the company's overall financial success.

Despite their growing influence in technology decisions, CFOs often encounter a gap in information tailored to their needs. Many resources today are geared towards the operational or IT teams, and understanding the financial impact digital solutions will have on their organisation isn't always clear-cut.

Digital solutions are abundant in the market today, and it can be challenging to identify the best tools for the job. Financial players face the daunting task of navigating rapid technological changes and the complex regulatory landscape. These are just two of the many issues that quite often keep a CFO awake at night. They need to stay abreast of evolving technologies and digital trends and understand exactly how their implementation could affect their organisation's financial year.

Financial players face the daunting task of navigating rapid technological changes and the complex regulatory landscape.



As part of this exploration, it's essential to highlight the role of comprehensive digital solutions providers in the maritime industry. For example, ShipServ, part of the Marcura Group, offers a suite of digital solutions covering procurement right through to payment, supporting shipping leaders in their efforts to digitalise, automate, and optimise their voyages. By ensuring safe, efficient, compliant, and financially rewarding operations, such tools stand as strategic partners for CFOs and financial leaders seeking effective and profitable digital transformation in the maritime sector.

Moreover, a lack of alignment between business and financial teams can result in solutions being implemented without considering the requirements of other, often interlinked, departments. This can also impact the company's overall financial success.

This guide aims to showcase the most common concerns felt by maritime financial leaders and offers guidance on the digital solutions landscape. It answers several key questions, including:

The ultimate goal of the guide is to demonstrate how digital solutions can optimise shipping operations from the pre and post-voyage fixture stages, through to the voyage itself, to ensure financial success.

WHAT IS DIGITAL TRANSFORMATION?

- ▶ What challenges are CFOs and financial leaders facing?
- ▶ What is the potential of digital solutions to transform shipping operations and maximise profit?
- ▶ How can the implementation and operation of digital solutions be improved for the future?
- ▶ How can financial leaders better navigate digital transformation in the future?

The ultimate goal of the guide is to demonstrate how digital solutions can optimise shipping operations from the pre and post-voyage fixture stages, through to the voyage itself, to ensure financial success.



A FRAMEWORK FOR DECISION-MAKING

More than 35,000 decisions are made by any individual in the space of one day.¹ Decision fatigue is a real issue and one that financial leaders often experience.

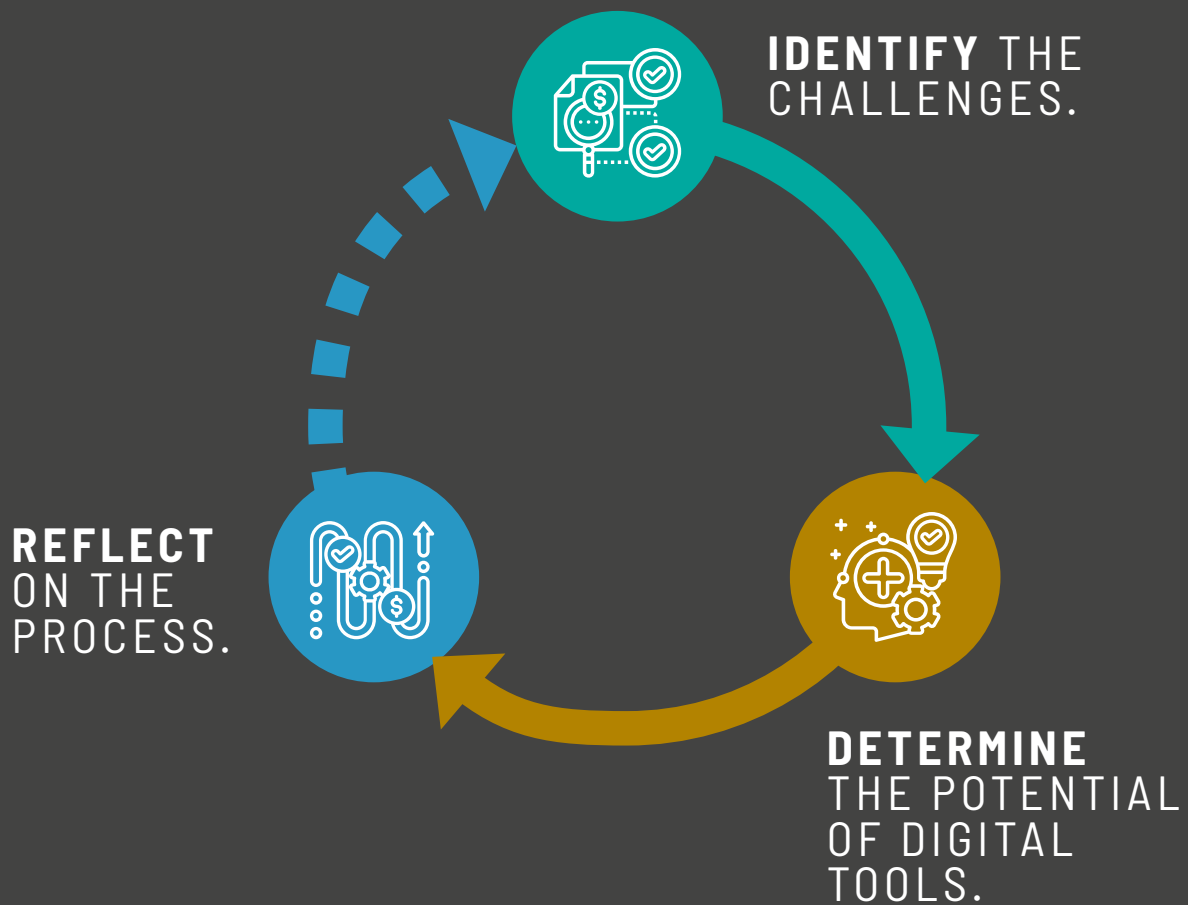
This framework is designed to simplify the process and help financial leaders to make digital solution investment decisions to maximise profit.

One way to ease the decision-making process is to implement a framework. This is designed to simplify the process and help financial leaders to make digital solution investment decisions to maximise profit.²

This report uses this framework to provide guidance to financial leaders on how to identify current digital opportunities, deploy them to ease pain points, and reflect on their performance for continuous improvement to an organisation's bottom line.

¹ CNN (Apr, 2022) Decision fatigue drains you of your energy to make thoughtful choices. Here's how to get it back

² Please note that this framework serves as a guide and should not be solely relied on to make critical investment decisions.



CONSIDER THE FOLLOWING DURING EACH PHASE:

IDENTIFY THE CHALLENGES.

- ▶ What problems or inefficiencies are you as a financial leader facing?
- ▶ Are these inefficiencies due to people, processes, or systems?
- ▶ Do you have access to real-time information and if so, do you have the right people and systems to create value from it?
- ▶ Poor performance can be due to a lack of knowledge and/or skills, or due to a lack of systems and technologies. Identifying where and why inefficiencies exist is the first vital step before deciding how to tackle them.
- ▶ Advanced digital solutions could be in place but if the users lack the knowledge and skills to operate them efficiently, the risk of poor performance is heightened. Alternatively, the knowledge and skills may be there, but processes are still being completed manually, leading to human error.
- ▶ It's also useful to identify the knowledge work that needs core knowledge workers to complete and the work that could be automated. This helps to determine where digital solutions could be deployed and where people are key.
- ▶ How is regulatory uncertainty affecting your investment decisions?



DETERMINE THE POTENTIAL OF DIGITAL TOOLS.

- ▶ What are the impacts on the business as well as current employees?
- ▶ Digital tools often require additional training of staff. Has this been accounted for?
- ▶ What is the maturity of the digital solution? Market assessment is key.
- ▶ What is the required investment? The cost of the digital solution and/or subscription services might be clear, but what about the cost of maintaining the solution?
- ▶ Will the solution need an upgrade to the infrastructure? What will this cost?
- ▶ Do you want to customise the solution? While sometimes this is beneficial, it can often lead to unnecessary costs.
- ▶ What is the installation time and how will this affect current operations?
- ▶ Is the solution compliant in all areas where it might be used?
- ▶ How well will it integrate into legacy systems and future systems?
- ▶ How will the deployment of a digital solution in one department impact another? For example, it might benefit the operations team, but will it impact the IT department in a positive or negative way?

One CFO we spoke with said one of the cheapest implementations he'd experienced were also the most successful. "A global system across multiple locations was standardised, up and running, and stabilised within six months. We didn't customise anything so it was much cheaper than it could have been but was hugely successful."



REFLECT ON THE PROCESS.

- ▶ How well did the solution perform and are there any changes you would make in its future roll out? Was it implemented too fast without giving people the time to adapt and learn from it?
- ▶ See whether the vendor is willing to modify and tailor their solution to meet your current and future needs. This is especially important in today's rapidly evolving digital environment where no sooner has a digital solution been deployed, an upgrade is available.
- ▶ Evaluate whether sufficient training was delivered to optimise the use of the new tool, or whether this is something that could be improved in the future.

DIGITAL TRANSFORMATION VS DIGITAL OPTIMISATION

Businesses can undergo both digital business transformation and digital business optimisation. These concepts are often used interchangeably, but they are slightly different.

It's important to differentiate between the two to understand how digital tools and solutions can benefit different parts of the business and help to achieve a competitive advantage.

Before we explore the potential of digital solutions to improve shipping operations, it makes sense to first differentiate between digital transformation and digital optimisation.

It's important to differentiate between the two to understand how digital tools and solutions can benefit different parts of the business and help to achieve a competitive advantage.

DIGITAL TRANSFORMATION

Digital transformation aims to create new value for customers and transform organisational culture. At large, it reinvests how an organisation serves its market and makes existing processes more efficient by avoiding disruption and unlocking new revenue streams and business models.³

It's important to note that digital transformation requires more than simply deploying new technologies. Instead, it requires an organisation to rethink how its people, processes, and technology integrate and interact to improve business performance.

Digital transformation is more than a single IT project. It includes multiple projects that change several aspects of the organisation to become digital-first.



DIGITAL OPTIMISATION

Digital optimisation works to improve existing processes and customer experiences.⁴ Ultimately, it is the implementation of tools and capabilities that facilitate optimal ways of working, rather than a complete transformation of the business.

Gartner points out that mixing both optimisation and transformation is necessary to achieve optimal business improvements. It's ambitious for an organisation to undergo a complete digital transformation without first optimising different areas of the business. Doing so is unlikely to achieve the desired results.

Gartner points out that mixing both optimisation and transformation is necessary to achieve optimal business improvements.

For a CFO looking to invest in new technology or upgrade current systems, being able to identify whether they will optimise or transform is a good place to start.

WHY IS IT IMPORTANT TO DIFFERENTIATE BETWEEN THE TWO?

For a CFO looking to invest in new technology or upgrade current systems, being able to identify whether they will optimise or transform is a good place to start. This will help to determine what solutions are needed and in which part of the business they should be implemented. This should help to avoid investing in platforms and solutions just because they are simply available, a problem that is common today.

⁴ Gartner (accessed Dec, 2023) Where and how to target your digital business transformation





IDENTIFY THE CHALLENGES

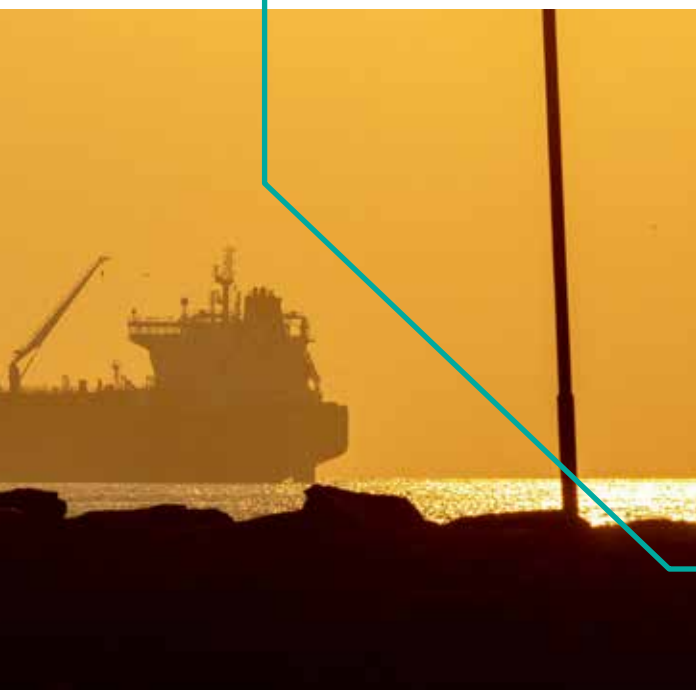
If you're a maritime financial leader, you likely share some of the same concerns and challenges as your peers. Or, perhaps, they are quite different.

It's useful to know whether the issues that keep you up at night are similar to others working in the same field.

It's useful to know whether the issues that keep you up at night are similar to others working in the same field. This can help you to learn from the experiences of others and identify ways to overcome these challenges.

Thetius analysts found the following five issues to rank top among CFOs and financial leaders' current concerns:

- 1. RAPID TECHNOLOGICAL CHANGE.** Technology advances fast, but adoption by organisations can be slow. Sourcing the right technology and implementing it before a newer version comes along can be a challenge.
- 2. LACK OF ACCESS TO REAL-TIME INFORMATION.** According to Thetius' research, maritime CFOs sometimes struggle with making investment decisions because of a lack of access to real-time information.
- 3. BALANCING FINANCIAL CONSTRAINTS WITH THE DEMANDS OF THE BUSINESS.** There is often a lack of alignment between IT and other business departments. The CFO might have one goal in mind and the CEO another.
- 4. LACK OF DIGITAL SYSTEM INTEGRABILITY AND OPERABILITY.** Systems need to be agile and integrable with others. They also need to adapt to change. It's not always easy to find flexible solutions that meet different business requirements and adapt as the company's needs change.
- 5. RAPID REGULATORY CHANGE AND UNCERTAINTY.** Maritime regulation can be complex to understand. This rings especially true when it comes to decarbonisation, which many digital tools are used for today.



From managing risk and compliance in a volatile market to balancing the financial constraints with the demands of the business, it's a complex world for maritime leaders working to maintain the financial competitiveness of their businesses. The ever-changing digital and regulatory landscape doesn't make it any easier.

The fast pace of technological advancement means that digital solutions can quickly become outdated. Financial leaders face the challenge of procuring technology that will remain relevant and offer value over time.

1. RAPID TECHNOLOGICAL CHANGE

The fast pace of technological advancement means that digital solutions can quickly become outdated. Financial leaders face the challenge of procuring technology that will remain relevant and offer value over time.

One CFO of a shipping company a Thetius Analyst spoke with said, "This makes it hard to choose the right tool for the right job and work out its ROI. It is hard to know if it will do the job we want it to and what its limitations are and whether these are a major problem."

The rapid pace of technological change further exacerbates existing digital language barriers. Among the CFOs Thetius spoke with, there was a feeling that digital and data literacy could be improved. For financial leaders who also work in accounts, there can be a lack of understanding of the benefits and limitations of digital tools and how they are likely to affect the financial performance of the business. "There's still a lot of CFOs in the world which I would say are accountants and have a focus limited to the accounting role," a CFO from a large shipping company told a Thetius Analyst.

Outside of the maritime industry, this trend rings true. A 2020 survey run by Gartner found that digital investments were at the top of CFOs' agendas, but at the same time they are unclear about what digital business means and how different technologies will impact the business.⁵

As the maritime CFO becomes more involved in digital transformation, it is imperative they have access to real-time information.

2. LACK OF ACCESS TO REAL-TIME INFORMATION

As the maritime CFO becomes more involved in digital transformation, it is imperative they have access to real-time information. But this is not always the case. According to our research, maritime CFOs sometimes struggle with making investment decisions due to a lack of access to real-time information. This is often tied to the issue of data silos where different departments work in isolation and have data locked up that cannot be easily and quickly accessed by other departments.

In more technologically advanced organisations, this may not be the case. Departments may be better connected. But in businesses where digital transformation is in the very early stages, accessing real-time information necessary to make digital investment decisions is sometimes lacking.

Further investigation reveals that these pain points are not isolated to maritime CFOs. In fact, a 2020 Oracle survey found that 29% of respondents said that lack of access to accurate real-time information is a major challenge for them.⁶



Having access to the right information at the right time is not an issue felt by maritime CFOs in isolation. It is a global pain point.

This suggests that having access to the right information at the right time is not an issue felt by maritime CFOs in isolation. It is a global pain point. In combination, these issues can lead to poor investment decisions being made or a lack of buying into a solution because they don't have the required information to understand and assess its potential cost benefits. This causes a headache for the CFO in knowing what and how to procure digital tools.

⁶ Oracle NetSuite (2020) State of the CFO role


3. BALANCING FINANCIAL CONSTRAINTS WITH THE DEMANDS OF THE BUSINESS

The role a CFO or financial leader plays in the procurement of digital tools and technologies varies depending on the size and structure of the organisation. Nonetheless, financial leaders are faced with budget constraints and need to balance these constraints with the demands of the business.

This is a challenge itself and one made harder by the lack of alignment and collaboration across departments. “There’s definitely a misalignment between departments. The CFO wants one thing and the CEO another,” one CFO of a shipping company explained.

In addition, the silos of departments mean that CFOs might have difficulty accessing the information they require. “A lot of the time the data is not available in a single system and by the time the CFO has got the information, changes may have happened and it might be out of date,” another CFO said of his experience.

CFOs need to assess not only the direct and immediate financial benefits but also the long-term value such as increased efficiency, better data analysis, and competitive advantages that new solutions can bring. But these silos make it difficult to truly understand the ROI of a tool or technology and thereby nearly impossible to balance the short-term benefits with the long-term gains.



CFOs need to assess not only the direct and immediate financial benefits but also the long-term value such as increased efficiency, better data analysis, and competitive advantages that new solutions can bring.

“We are only 150 people and so it’s very difficult to keep up with all the changes in regulations that are coming. We don’t have lots of people working on compliance, so it’s hard. I read the news and various reports, and we have meetings with lawyers who give us the updates on regulatory changes, but we’re relying on many different sources. It takes time and there’s manual work in digesting it and then finding out what it means for our company.”

4. LACK OF DIGITAL SYSTEM INTEGRABILITY AND OPERABILITY

Another headache that CFOs and financial leaders face is the integration of new tools and solutions into existing systems. In some cases, this may be straightforward. But where not, often compatibility issues can arise, resulting in a further financial burden. “Digital solutions need to be agile enough to accommodate the decisions we make. How agile and open can they be? This is one question we always ask, as it is so important for us,” one CFO explained.

Another CFO Thetius spoke with warned that too much flexibility and customisation can be just as dangerous as none. Too many demands can be made and the end result is a system that is far more complex than it needs to be, misses meeting the core needs of the user or business, is difficult to implement, and is more costly than anticipated. In one case, the implementation of a system with zero customisation ended up being the cheapest and most successful. “We ended up with a standardised system that was up and running and stabilised within six months,” a CFO explained to Thetius.

5. RAPID REGULATORY CHANGE

Maritime regulation is complex and ever-changing. There’s uncertainty about what the future holds and the types of fuels and technologies that will be used by ships and ports to comply with environmental legislation. This makes it difficult for financial decision makers to evaluate the pros and cons of different solutions and make low-risk investment decisions.

Interview research revealed many CFOs spend more time than they have available trying to understand the regulatory landscape and the role digital tools will play in meeting these requirements now and in the future.

Besides these major worries, there are, of course, other concerns such as the cybersecurity and compliance of new solutions.

WHAT DOES A CFO WANT TO KNOW?

John⁷ is a CFO for a ship operator. He used to work on the commercial side before switching to the business side. He then started educating himself about various financial matters in maritime.

"The most important thing for us is that our company has the right tools available to make the best possible decisions."

He reads the maritime news and tries to keep up to date with the regulatory landscape and new technologies. Ultimately, he wants to make better decisions, but this is hard given the complex landscape that is embedded with uncertainty. It takes time to understand the changes that are taking place in the maritime world, why these changes are happening, and the specific drivers behind them. He sees new digital tools and solutions being brought onto the market every day, but while technology advances fast, adoption is slow. Choosing the right solution that has long-term potential is quite the challenge.

"The most important thing for us is that our company has the right tools available to make the best possible decisions. If we invest in something that saves us a bit of time, it's nice. But it's not going to change our cost structure dramatically. We are a small company and if we save a bit of time, that makes sense, but to be a sales driver, it has to improve our earnings and make more business."

His three main concerns when it comes to digital solutions are:

- ▶ How well can the solution integrate?
- ▶ Is the solution an add-on, or a replacement?
- ▶ Will it improve efficiency, which can lead to time and cost savings?

He wants to know how digital solutions will make financial sense both in the short and long term. It's not an easy task.

He's deployed digital solutions to optimise and automate the disbursement process and port call management. While these have made significant financial improvements to the organisation, he's always on the lookout for more tools and solutions that can improve the company's bottom line. That's his ultimate goal.

He's always on the lookout for more tools and solutions that can improve the company's bottom line. That's his ultimate goal.



DETERMINE THE POTENTIAL OF DIGITAL SOLUTIONS

Your chartering team is working on fixing the next cargo for MT Thetius. The Aframax tanker is currently in ballast, sailing in the North Sea, waiting for instructions. They have two options; voyage A or voyage B.

In times of high rates, analysis like this can make the difference between a good year and a great year. In times of low rates, analysis like this is the difference between staying in business and not.

Both voyages will have the vessel on charter for six weeks, both involve a transatlantic voyage, both have a predicted time charter equivalent (TCE) of \$30,000 USD per day and both involve discharging at terminals in the Gulf of Mexico. Which should the charterer choose? Given that the financial outcome will likely be the same either way, does it matter? The team chose voyage B.

A couple of months go by and the voyage is long finished, claims between all the parties are settled and the final commercial results of the voyage are in. The vessel earned just \$18,000 per day. The variance between what the voyage should have earned and what it actually earned was more than \$500,000.

What went wrong? Would voyage A have been a better choice? Why was there such a discrepancy between the forecasted number and the actual numbers? How can the team make better decisions going forward?

In times of high rates, analysis like this can make the difference between a good year and a great year. In times of low rates, analysis like this is the difference between staying in business and not.

USING DIGITAL TOOLS TO IMPROVE DECISION-MAKING

It is often assumed by other members of an organisation that the role of a finance leader is to think in dollars and cents and make decisions about costs. In reality, it should be to think in terms of percentage points. What can we invest in that will make a 20% improvement to our processes? How can we equip our teams with the tools they need to make a 5% improvement in decision-making?

Digital tools have a role to play in improving accuracy, speed of execution, and availability of information, which all play a part in making better decisions.

Every organisation is the sum of its decision-making. Every shipping organisation has to make multiple decisions every day across a multifaceted operation. Finding marginal improvements across the entire chain is critical to creating compounding improvements across overall performance.

This section examines how digital tools play a part in transforming and optimising cost, compliance, and efficiency from pre-fixture, to post-fixture, to the voyage itself.

Finding marginal improvements across the entire chain is critical to creating compounding improvements across overall performance.



Often, the decisions that impact the overall profitability of a voyage are made at the pre-fixture stage in conversations between the shipowner, the broker, and the charterer.

DEFINING PRE AND POST-FIXTURE ACTIVITIES

In shipping operations, pre-fixture refers to all activities and processes that take place before the charterparty agreement is finalised. Post-fixture refers to activities and operations that occur after the charterparty agreement has been finalised and signed. Anything that happens in between is part of the voyage itself. All elements require effective management to drive competitive shipping operations.

Often, the decisions that impact the overall profitability of a voyage are made at the pre-fixture stage in conversations between the shipowner, the broker, and the charterer. When the details of a potential voyage come through, the shipowner's chartering team needs to be able to quickly build a picture of the potential profitability of the voyage and respond before the opportunity goes elsewhere.



But responding quickly, competitively, and accurately is a challenge. Getting basic details wrong, such as port fees or restrictions, bunker prices, or even weather forecasting, can turn a profitable voyage into a loss. For example, for certain dry cargoes such as grain, the impact of rain on the port call could have an enormous impact on the overall profitability. How likely is it that discharge operations will be impacted by rain stoppages? How will that impact the voyage's profitability and how should you model that in your calculations?

Traditionally, picking up the phone or sending an email to a network of port agents has been the way to understand port fees, restrictions, and get the inside track on congestion. However, tools such as Marcura's PortLog platform provide the data to users on an on-demand basis. PortLog has over 38.2 million digitised events,⁸ making it one of the most complete and accurate port cost databases available with real Statement of Fact (SoF) data.

For many, a freight contract will be negotiated by phone, email, or WhatsApp, and once the terms are agreed in principle a fixture recap will be sent round by email. This is another area where digital tools are improving speed, accuracy, and governance. Sea/, the digital arm of Clarksons, has developed a tool to take the entire fixture negotiation process online. The freight negotiation, charterparty, and recap management all sit within a single platform that all parties have access to. This enables higher levels of automation, better transparency, and reduces the likelihood of human error at a time when small errors can have a big impact on financial outcomes.

But responding quickly, competitively, and accurately is a challenge. Getting basic details wrong, such as port fees or restrictions, bunker prices, or even weather forecasting, can turn a profitable voyage into a loss.

Once the charter is agreed in principle, a range of other checks should be carried out, including counterparty compliance, KYC (Know Your Counterparty) checks, and an audit of the charterparty itself. Such checks help to ensure maritime compliance and reduce the risk of fraud.

There are a whole host of solutions that can offer counterparty risk management, but consideration should be made to the ability to unite compliance into existing workflows so that it doesn't become a burden for the team. Trade compliance and sanctions are rapidly changing and are often misaligned and conflicting. Enormous data volumes also mean additional workload and increased opportunities for error and oversight. High-quality data is difficult to access, and cleaning and validating data is time-consuming.

Solutions such as Marcura's MCaaS (Maritime Compliance as a Service) offer bank-grade maritime compliance services for cargo, vessel and third-party screening. Using a specialist solution such as MCaaS reduces risk whilst freeing up internal team members to concentrate on higher-value knowledge work.

⁸ PortLog (accessed Dec, 2023) PortLog is integrated with the Veson IMOS Platform

A vessel's port call process is tied up in many inefficiencies, all of which cost time and money.

LAYTIME AND CLAIMS MANAGEMENT

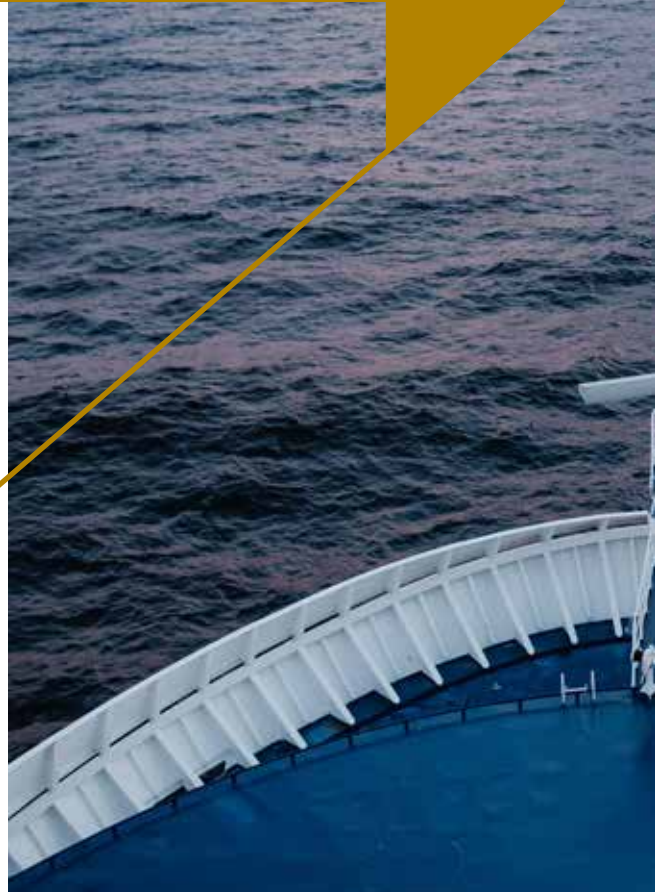
A vessel's port call process is tied up in many inefficiencies, all of which cost time and money. Laytime allowance refers to the time set out in the charterparty contract for a vessel to load and discharge its cargo.

One costly problem for charterers that can arise during the port call process is if the vessel overstays its contracted laytime in a port or terminal. If this happens, the charterer must pay a fee, known as demurrage. The charterer and ship owner negotiate and decide the fee. It varies depending on carriers, terminals and contractual agreements but can range from \$10,000 - \$30,000 per day and stretch into multiple six figures for larger vessels. Beyond a few days, charges can grow significantly.




Laytime and demurrage are perceived as a constant source of disagreement for minor issues due to the multifarious nature of the supply chain and a third variation of the charterparty. Furthermore, complex terminology in charterparty clauses is often misinterpreted, and calculating laytime is costly. Short timeframes to make a claim and often unstructured documents means that claims often lead to time-consuming negotiations.

This means that a thorough evaluation of the risks associated with the port side of ship operations is critical.

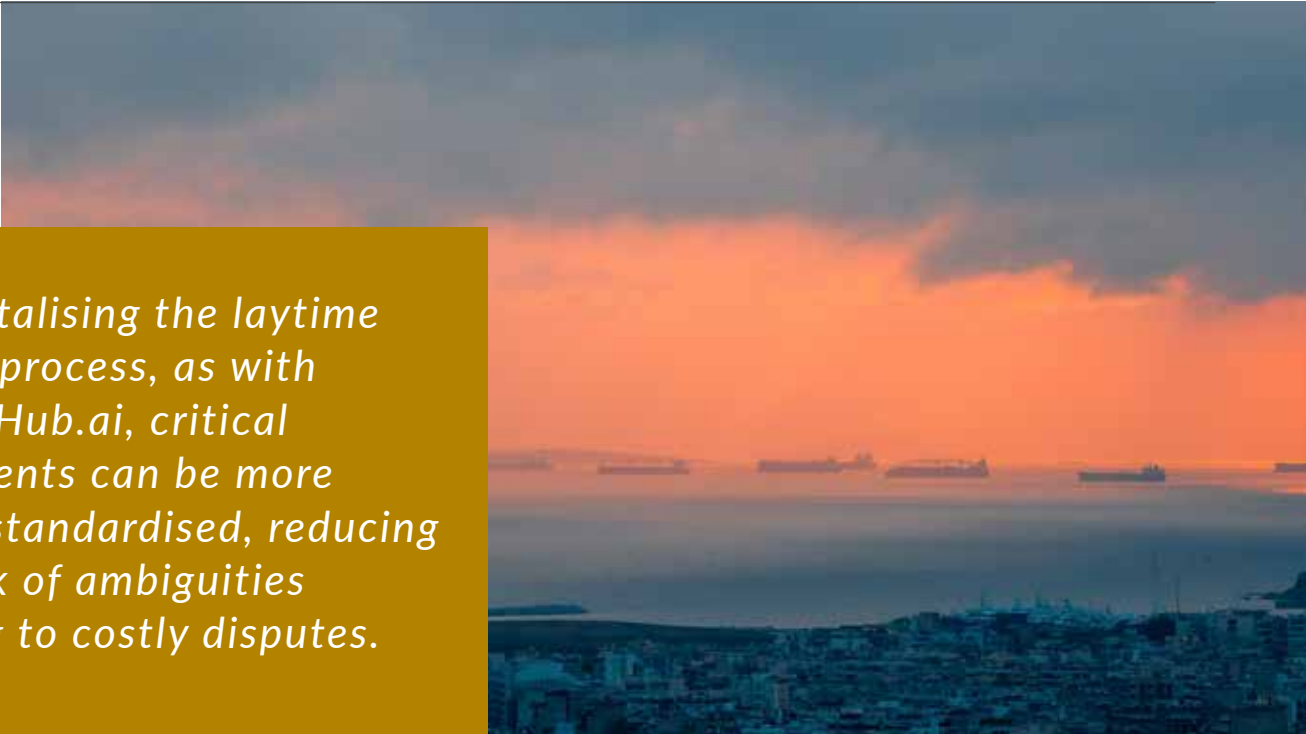
Complex terminology in charterparty clauses is often misinterpreted, and calculating laytime is costly.



LAYTIME, DEMURRAGE, AND UNPAID TIME: WHAT DO THEY MEAN AND WHY DIGITALISE THEM?

Process	Definition	How can digital solutions help?
Laytime 	<p>The period agreed between the ship owner and the charterer for the cargo to be loaded and unloaded.</p> <p>No additional charges are required as long as the activities are completed within the specified time (set out in the charterparty agreement).</p>	<p>Digital solutions, such as Marcura's PortLog, can help to accurately estimate laytime so that the required time is given and not underestimated.</p>
Demurrage 	<p>If the loading and/or unloading period is exceeded and the laytime is exceeded, the charterer must pay demurrage charges.</p> <p>Demurrage is intended to compensate the ship owner for the loss of time when their vessel is unable to leave the port due to delays caused by the charterer.</p>	<p>Digital solutions, such as Marcura's ClaimsHub.ai, can help to improve visibility and transparency during the demurrage claims process so that learnings can be made, and the process can be optimised in the future.</p>
Unpaid time 	<p>The time during the chartering cycle that is not compensated for.</p>	<p>Digital solutions, such as Marcura's PortLog, leverage the world's largest port cost database to enable accurate estimation of unpaid time at pre-fixture stage to better understand and reduce risk.</p>

Digitalising laytime calculations and the claims management process can make tracking, understanding, managing, and negotiating laytime claims easier and more efficient. In doing so, the financial implications of extended and unnecessary time in port can be reduced. ClaimsHub.ai, by Marcura, digitalises and standardises the entire laytime claims process for all involved parties, leading to improved accuracy and faster cash conversion of claims.



By digitalising the laytime claims process, as with ClaimsHub.ai, critical documents can be more easily standardised, reducing the risk of ambiguities leading to costly disputes.

THE COST OF CHARTERPARTY AMBIGUITY

Charterparty contracts are never error-free. Even small spelling mistakes or nuances in words can have detrimental consequences when it comes to legal contracts, such as the charter agreement. It's also quite common for the contract to be based on a previous fixture and may not be adjusted for each new fixture. This often leads to errors.

In more severe cases, errors in a charterparty can lead to disputes, financial losses, or legal challenges.

Let's say a charterparty includes a very ambiguous description of laytime as "about 5 days". There's no clear definition of what "about" means or a precise start and end date for the laytime calculation. This kind of error is common in a charterparty. Then, the vessel arrives in port and takes 6 days to unload its cargo rather than the "about 5" specified. The charterer argues that "about 5" means there is some flexibility due to factors such as port congestion so 6 days isn't seen as a problem. They refuse to pay the demurrage for the additional day.

The ship owner however believes that "about 5 days" means 5 days and wants the demurrage fee to be paid. This kind of ambiguity could ultimately lead to legal proceedings, incurring additional costs and potential financial losses.

Prevention is better than cure. The terms of the charterparty need to be 100% understood by all stakeholders involved in the voyage. To avoid misinterpretation, the contract should be meticulously checked and ambiguous terms such as "about" should be removed. In this case, a clearly defined laytime would have avoided the dispute.

However, checking charterparty documents is a manual and onerous task and therefore subject to human error itself. By digitalising the laytime claims process, as with ClaimsHub.ai, critical documents can be more easily standardised, reducing the risk of ambiguities leading to costly disputes.

When it comes to the port call process, often there is a discrepancy between what is predicted to happen, and what actually happens.

PORT CALL MANAGEMENT

THE PRICE OF POOR PREDICTIONS

Unpaid time is another issue that puts unnecessary financial strain on shipping companies.

Put simply, unpaid time is money wasted. When it comes to the port call process, often there is a discrepancy between what is predicted to happen, and what actually happens. For instance, a ship could arrive at the port a little earlier or later than expected due to weather conditions and find that there is no berth to dock at. The ship then ends up idling outside the terminal, wasting fuel and emissions and not getting paid for its time. Or the vessel could end up staying longer in port due to unplanned downtime.

This is a huge pain point for financial leaders. One CFO told Thetius, "Incorrectly estimating or assuming that there's going to be a designated time spent in port...could make the difference between a profitable voyage or a loss-making voyage."

The Statement of Facts (SoF) is a key document in a ship's port call. This traditionally paper-based record details and timestamps every activity of the vessel during its time at the port. It serves as a foundational document for establishing facts in matters of demurrage and despatch. Conventionally, the SoF is filled out by hand and then sent as a PDF attachment via email to the concerned parties.

However, this method of recording and sharing information is not only inefficient but also susceptible to human error. The lack of a standardised format for the SoF also tends to result in each involved party producing their own version of the document. This leads to significant variations in the documents across different parties.

Commercial operators of dry bulk tonnage require port data (cost, restrictions, turnaround times, insights), such as that available in Marcura's PortLog, for the purpose of producing higher-quality voyage estimates. Having access to port data via a digital platform enables users to produce voyage estimates that price freight faster, without having to wait for agents or having to refer exclusively to historical data or tacit knowledge.

Having access to port data via a digital platform enables users to produce voyage estimates that price freight faster, without having to wait for agents or having to refer exclusively to historical data.

By having access to real-time accurate information about vessels and port/terminal restrictions, the changing weather conditions, and other factors, the shipping line avoids overstays, reduces financial and reputational risk, and minimises fuel burn and emissions.

PortLog leverages the world's largest FDA-based port cost database to provide cost benchmarks for the purpose of voyage estimation. Uniquely, PortLog Pro simulates the laytime impact of a given set of CP terms for a voyage estimate, allowing the user to directly estimate the time covered and not covered by demurrage (paid vs. unpaid time) for a prospective voyage, based on the port call ETA and seasonal impact.

Instantly-generated and higher-quality voyage estimates enable chartering managers and freight traders to more effectively evaluate potential voyage fixtures against options (including walking away from business), leading to better freight trading decisions and more profitable fixture outcomes. By having access to real-time accurate information about vessels and port/terminal restrictions, the changing weather conditions, and other factors, the shipping line avoids overstays, reduces financial and reputational risk, and minimises fuel burn and emissions.

MAKING PAYMENTS

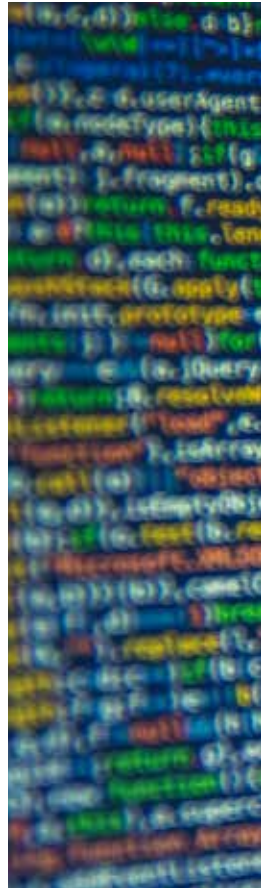
DIGITAL DISBURSEMENTS

Disbursement management is part of the post-fixture process. Disbursements are the payments of expenses that are incurred during a vessel's port call. For example, port and agency fees.

Disbursements must be accurately forecasted, planned for, and made on time and in compliance with regulatory requirements. Delays in payments can cause operational delays to the vessel. Accurate disbursement forecasting is a vital part of financial planning as mismanagement of these payments can significantly impact cash flow and the overall profitability of a voyage.

Disbursement payments have traditionally been completed manually. A paper-based invoice would be sent from the agent to the operator, forwarded to appropriate departments, and once approved, signed off. As with many manual processes, it's time-consuming, prone to human error, and often results in late payments. Various stakeholders trying to follow a paper trail means that it's embedded with uncertainty and there is little transparency.

In April 2023, a case of a vessel being detained by agents due to unpaid disbursements at Rosario, Argentina, hit the headlines. The ship owners claimed the charterers did not pay the agents, resulting in the agents demanding \$59,869 USD. The charterer still made no payment and the vessel was arrested in New Orleans. The agents continued to demand payment with additional fees of \$30 USD per hour set.⁹



⁹ Charter Party Disputes (Apr, 2023) Agents arrested the vessel due to unpaid disbursements at Rosario

THE COSTLY DANGERS OF LATE DISBURSEMENTS

Late disbursement payments can be financially catastrophic. Here's why:

1. OPERATIONAL DELAYS

The vessel may be detained or unable to access services it requires, such as pilotage or tug assistance. If the vessel cannot enter or leave a port, its entire voyage will be delayed.

2. LATE FEES MAY APPLY

In many aspects of life, late payments incur a penalty charge. Shipping is no different.

3. REPUTATIONAL DAMAGE

A vessel that is detained due to untimely payments doesn't look so good. Relationships between owner, operator, charterer, and agent can be put under strain. Furthermore, the owner or operator may experience widespread reputational damage and face hurdles in securing services in the future, or may even face higher payments.

4. NON-COMPLIANCE

Lack of timely payments can cause the vessel to be in breach of the charterparty. If this escalates, the vessel could be arrested and only released once substantial payments have been made. If the courts are involved, the reputation of the vessel is further affected.

5. FINANCIAL BURDENS

Late payments not only cause administrative headaches for those involved but also put additional financial strain on the stakeholders.

Digital solutions can lend a hand by moving the disbursement payment process from manual paper-based to electronic and automated.

Digital solutions can lend a hand by moving the disbursement payment process from manual paper-based to electronic and automated. Software that automatically calculates, checks and pays disbursements not only eliminates manual time-consuming tasks but ensures that these payments are made on time and reduces risks.

There are several solutions on the market today that can do this; Wilhelmsen Ships Service, Marcura and Veson Nautical are just a few.

DA-Desk by Marcura has been widely rolled out among many shipping players. The platform offers an end-to-end digitalised service from agent appointment to voyage closing, including payments, and integrates directly with your Voyage Management System (VMS).

For one shipping company, DA-Desk has replaced the manual work of at least five different people, the CFO confirmed.

With DA-Desk, every disbursement account you receive is checked automatically against more than 1,800 validation criteria. Whether it's basic status information like vessel and port identifiers or complex analysis of existing agreements and payment stipulations, DA-Desk provides reassurance that everything is as it should be. It provides complete transparency between all stakeholders involved.

For one shipping company, DA-Desk has replaced the manual work of at least five different people, the CFO confirmed. "Without the solution, you'd have to find five people who actually want to do that job and can understand the different languages. DA-Desk helps us a lot. It makes the payments happen automatically after we have approved it. It would be hugely problematic for us if we didn't have that solution," he explained.

DIGITAL CREW AND VENDOR PAYMENT

In addition to port payments post-fixture, crew wages need to be paid and vendor invoices need to be settled. These are also resource-intensive processes. But again, making payments is time consuming, prone to human error, likely to result in delays, and ultimately can be very costly for the organisation.

Particularly when it comes to paying crew, timely and accurate transfers are essential to ensuring crew morale is maintained. The industry is already experiencing a crew retention issue and seafarers that are not paid on time are more likely to leave. The payment process is about much more than paying salaries. It's about keeping those at the core of the vessel's operation happy, giving them a sense of security, and providing them with a place of work they do not want to leave. Finding and hiring new staff is another costly process and one that can be minimised by paying crew on time and in a way that makes it easy for them to transfer money home.

The payment process is about much more than paying salaries. It's about keeping those at the core of the vessel's operation happy, giving them a sense of security, and providing them with a place of work they do not want to leave.



HOW STANDARD PAYMENT PROCESSES IN SHIPPING IMPACT ORGANISATIONS

Payments are time-consuming and complicated. Paying 20 different people is a challenge, but imagine a vessel with more than 100 staff to pay. Here's why standard payment processes should be improved:

A. IT'S TIME-CONSUMING AND PRONE TO ERROR.

Manual data entry and processing of payroll takes time and often results in errors. It adds an additional burden to the administrative team. Incorrect payments and/or delays cause financial disputes, and administrative headaches, not to mention the impact on crew if they are not paid on time.

B. LACK OF TRANSPARENCY WITH CASH.

Some cash payments lack a clear audit trail, making it hard to keep track of who's been paid what and when. Inefficient record keeping can have financial reporting and regulatory compliance implications.

C. POOR CURRENCY EXCHANGE.

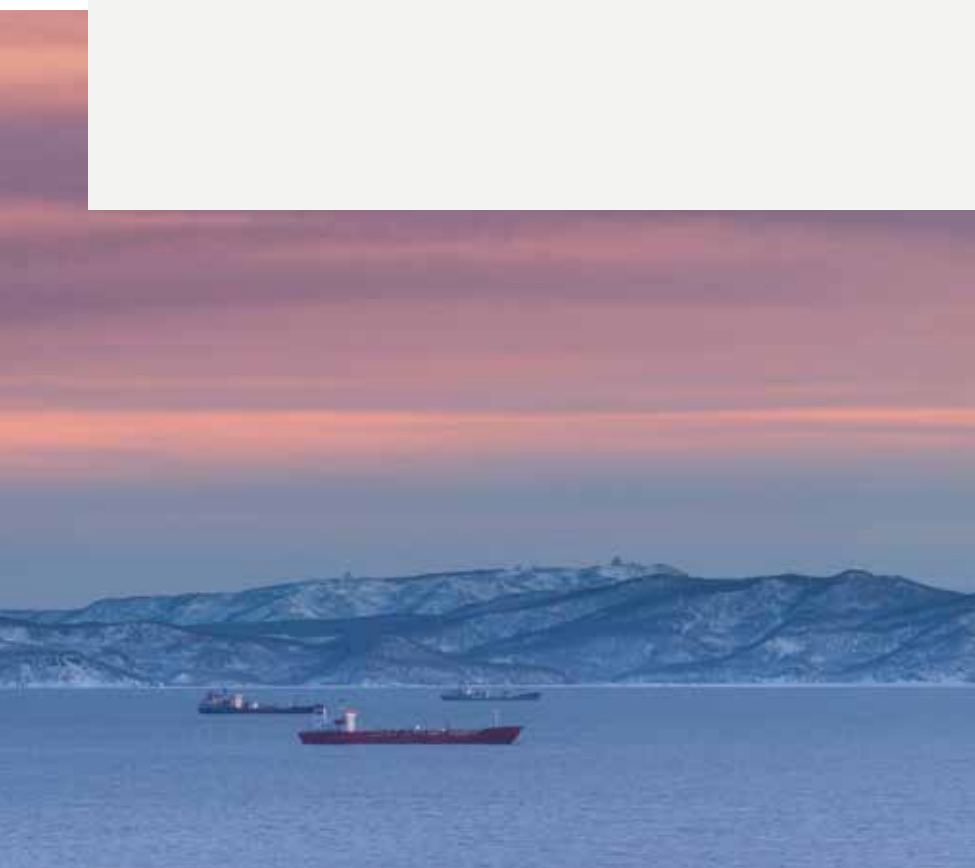
On the whole, crew transfer money to local currency if paid in USD, EUR or another currency used by the company. Inefficient currency conversions increase the financial cost to the crew in receiving their salary.

D. LACK OF FLEXIBILITY AND SECURITY.

Standard bank payments do not allow crew to access financial services and to transfer money while at sea. Not to mention the security risks of carrying around cash rather than in a digital wallet and accompanying card, for use when in port.

E. CREW RETENTION ISSUES.

Crew that are not paid on time or the correct amount are more likely to feel dissatisfied with their job. Not only is this likely to impact their morale, but financial stress is more likely to catalyse costly mistakes on the job. Repeated issues with payments could cause individuals to seek out other employment opportunities. A high turnover rate is extremely costly for a shipping organisation.



The E-Wallet and prepaid card enables crews to receive their payments much faster than traditional banking and is much safer than handing out cash.

This is where digital technology plays a key role. By improving standard processes, the crew can better manage their money, and shipping companies can avoid getting stuck in complex payment issues.

Bourbon Marine Services Greenmar, MOL, ABC Maritime, and Swire Shipping, to name a few, have digitally transformed their payroll payments by implementing a digital E-Wallet from MarTrust, a Marcura brand. The E-Wallet and prepaid card enables crews to receive their payments much faster than traditional banking and is much safer than handing out cash. By receiving payments in their chosen currency, they secure much greater control over their money.

For the ship owners and operators, the digital payment method reduces risk and lowers transaction costs.

In addition to crew payments, digitalising vendor payments can help save thousands during a ship's voyage. MarTrust's integrated payment platform facilitates digital business payments with industry-specific compliance and anti-fraud checks with every transaction.



For the ship owners and operators, the digital payment method reduces risk and lowers transaction costs.

George Pitaoulis, marine personnel & development director of ABC Maritime, said in a recent interview that the company is, "Saving funds in hundreds of thousands of dollars per year"¹⁰ as a result of switching to digital payments. He estimates around \$8-10,000 USD per year, per vessel on fees that are paid to the port agent. This makes the captains "a lot happier because they aren't carrying a lot of cash on board," he noted.

10 Marcura (Mar, 2022) In conversation with George Pitaoulis from ABC Maritime on the benefits of the MarTrust E-Wallet



BRIDGING THE GAP BETWEEN PRE-FIXTURE, POST-FIXTURE AND VOYAGE MANAGEMENT

Once the vessel is fixed, a whole new host of systems and processes to support voyage management exists. Suppliers such as Veson Nautical, ClearVoyage, Dataloy, and Mariapps offer digital platforms to enable more efficient voyage management.

Optimising the ship's intended and actual route, taking into account issues such as weather, tides, and changes of instructions. Being able to model different scenarios and make informed decisions can make a huge difference to overall profitability before the ship finally makes it to port to discharge its cargo.

It's of critical importance that there is integration between pre and post-fixture solutions and voyage management systems (VMS) provided by the likes of the aforementioned suppliers. However, one of the main issues many CFOs face that was drawn upon earlier in the report is the difficulty with integrating digital solutions. This can especially be a challenge when trying to manage multiple procedures from disbursement payments to voyage management.

One ship operator CFO interviewed for this research voiced the importance of this. When asked what the most important factor is when considering new digital solutions, he said, "First of all, I want to know how this system can be integrated. Can I take data out of the system? Can it send data to other systems? How well does it integrate? Does it have APIs and do I have full control over the data?" This is important to determine beforehand as it enables the user to determine whether the system will add on, replace, or work in

By integrating the systems, operators can create or cancel port calls and update estimated times of arrival (ETAs) within the voyage management systems.

conjunction with an existing system. "For me, I prefer a system that can do multiple things because we cannot keep adding solutions endlessly."

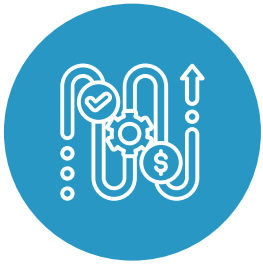
Several of Marcura's solutions can be integrated with voyage management systems to bridge the gap between pre-fixture, post-fixture, and voyage management. The DA-Desk Integration System (DIS) enables Voyage Management Systems (VMS), accounting systems, or any other approved system to push port call data to and/or retrieve disbursement account (DA) data from the DA-Desk System.

By integrating the systems, operators can create or cancel port calls and update estimated times of arrival (ETAs) within the VMS. DA-Desk automatically reflects these actions, eliminating the need for additional data entry.

Marcura's PortLog Pro is also integrated with the Veson IMOS Platform. The integration allows mutual customers to access PortLog's extensive data on port costs, time and restrictions. By having access to both voyage management data and port call data, the entire voyage can be more accurately planned and executed.

According to Marcura, 81% of its total port calls are integrated with its customers' VMS systems.¹¹

¹¹ DA-Desk (accessed Dec, 2023) Port cost management software that integrates seamlessly into all major VMSs



REFLECT ON THE PROCESS

Once the challenges have been identified and the solutions deployed, it's necessary to reflect on the entire process and determine what changes could be made in the future deployment of digital solutions.

If the solution has not achieved what it was designed to, what changes can be made to ensure progress is made going forward?

Part of this is understanding how well a solution has performed or is performing, which requires continuous monitoring and measurement. If the solution has not achieved what it was designed to, what changes can be made to ensure progress is made going forward?

As this report has touched upon, there are many stakeholders involved in a ship's single voyage. This means that any digital solution implemented will have an impact on multiple people or departments. It's important to understand if and where it has helped and hindered operations, and how this affects the future deployment of digital solutions.

Some factors to consider when assessing the performance of a digital solution and its role in the future include:

The scalability and customisation of the solution

Is the solution able to be scaled to other departments? While it might work well in one area, it may work less effectively in another. The solution may also be less applicable if a ship's operational profile changes. It's important to determine whether the vendor can customise the solution to ensure its value remains, no matter if the operation or voyage of a vessel changes.

It's important to determine whether the vendor can customise the solution to ensure its value remains, no matter if the operation or voyage of a vessel changes.





It's important to reflect on the ease of integrating the solution, especially if you plan to scale or integrate with other legacy systems.

Future integration

It's important to reflect on the ease of integrating the solution, especially if you plan to scale or integrate with other legacy systems. Recognising these issues as early on as possible in the implementation process can reduce the risk of compatibility issues, data silos, and inefficient workflows.

Human factors

One of the most important factors in the success of a digital solution is the people using it. During the reflection phase, it is vital to ascertain the level of confidence users have with it. Was it received well immediately, or did it take some getting used to? How much training was needed and was it enough, or could more targeted training improve its performance? Making changes to the way people work is always going to cause some tension. However, if those who are expected to use the technology understand why, they are more likely to engage with it, thereby maximising its potential. If there is reluctance to engage with digital solutions, this should be addressed before any other solutions are rolled out.

RECOMMENDATIONS

The maritime industry's financial leaders are faced with a sea of rapid technological and regulatory change, a lack of access to real-time information, questions around digital system integrability and operability, and the ongoing challenge of balancing financial constraints with the demands of the business.



3 *recommendations for financial leaders that we believe could help them make more sense of the complex digital solutions landscape*

Combine this with the many stakeholders involved in a single ship's voyage and the niche environment that it operates in, and it can be a challenge to determine if and how investments in digital solutions will bring a good return.

This guide has sought to provide a brief dive into the various digital solutions used from pre-fixture to post-fixture, to improve efficiencies and ultimately cost. What follows is a list of 3 recommendations for financial leaders that we believe could help them make more sense of the complex digital solutions landscape.

01.

PEOPLE ARE THE MOST CRITICAL PART

It's important to remember that the most critical part of successful digital solutions deployment is the people. People need to be onboard with digital transformation, and that includes the solutions they are expected to operate.

Creating a culture that encourages people to be engaged and motivated in new solutions is imperative for their success.

Creating a culture that encourages people to be engaged and motivated in new solutions is imperative for their success.

One way of ensuring this happens is by implementing solutions gradually. This helps to ensure all those who will be affected by any changes as a result of these solutions are not only informed but also happy about it.

One CFO interviewed as part of this research said, "You've got to get the foundations in place first, then once they are stable build the next piece and the next and so on. If you break it down into bite-size chunks and build incrementally you are in a situation where you can stop at any time if you need to. If something isn't working or people aren't happy you can just stop and restart in 12 months."

This approach also provides the opportunity to align goals across departments. "Ideally, you want to find a solution that fits multiple people's needs. Implementing in a rush means that you might meet one department's needs but not others and trying to get them to work together is a big challenge. So getting that alignment is important. Understand the catalyst for the solution and explore how it can help the entire organisation, not just one department. Try to engage people in its selection and design.



02.

PRIORITISE SOLUTIONS THAT ARE HIGH-IMPACT, AGILE, AND SCALABLE

Digital solutions need to be integrable and scalable. If they aren't integrable, modifications to the existing infrastructure will be required and have a negative financial impact.


If digital solutions aren't scalable, they may bring immediate benefits, but further down the line become redundant. This will result in new solutions being implemented at an additional cost.

In order to select solutions that are scalable and integrable, you need to know what you want to make digital and why. This will enable better decision-making when it comes to digital solutions. There is no use going digital for the sake of it. As outlined in the decision-making framework, it's key to first identify the issues and potential for digital solutions to make a substantial impact. This will help to determine the level of scalability required in the future and if the solution is likely to meet increasing things asked of it. For instance, additional volumes of data, more rapid transfer of information, or greater analysis.

In order to select solutions that are scalable and integrable, you need to know what you want to make digital and why.

The digital scene in maritime is ever-changing. It's moving at an alarmingly rapid pace and there is an ongoing risk that shortly after a solution has been implemented, it will need upgrading. A way to limit costs here is to pick a digital tool that can be upgraded in phases. This allows for incremental investing. A solution can be implemented and monitored and if it's doing what it set out to do, then further investments can be made. Because of the pace at which digital tools and technologies evolve, this is one of the most critical considerations.





Digital solutions also need to be agile to meet the constantly changing regulatory requirements.

Digital solutions also need to be agile to meet the constantly changing regulatory requirements. The last thing you want is to invest in a solution and then find that due to regulatory ambiguity, that particular tool becomes non-compliant in certain situations. Digital solutions that are agile are more likely to respond well to new demands asked of them and will be a safer investment for the future.

This is especially true in an industry that is increasingly targeted by cyber-attacks. Does the solution support not just current but also future threats?

03.

COLLABORATE AND ADJUST

It's easy for different departments in an organisation to focus purely on their goals and progression towards these.

They may have forgotten to consider how other departments could benefit, or even be negatively affected by the introduction of a new digital tool.

This could lead to problems and drive further silos and departmental fragmentation. Driving a collaboration between IT, business, and other departments is essential to ensure that digital solutions are integrated effectively and support cross-functional needs. This is necessary for aligning financial goals with technical capabilities and operational requirements.

Be prepared to adjust strategies and investments in response to changing market conditions, technological advancements, and business performance.



Regularly review the performance of digital initiatives against set objectives and key performance indicators (KPIs).

Part of this requires consistent performance monitoring and adjustment. Regularly review the performance of digital initiatives against set objectives and key performance indicators (KPIs). Be prepared to adjust strategies and investments in response to changing market conditions, technological advancements, and business performance.

**FOR MORE INFORMATION ON
MARCURA'S DIGITAL SOLUTIONS,
VISIT WWW.MARCURA.COM**

REFERENCES

Charter Party Disputes
(Apr, 2023) [Agents arrested the vessel due to unpaid disbursements at Rosario](#)

CNN (Apr, 2022) [Decision fatigue drains you of your energy to make thoughtful choices. Here's how to get it back](#)

DA-Desk (accessed Dec, 2023) [Port cost management software that integrates seamlessly into all major VMSs](#)

Gartner (2023) [The IT roadmap for digital business transformation](#)

Gartner (accessed Dec, 2023) [Where and how to target your digital business transformation](#)

Gartner (Jun, 2021) [Gartner says more CFOs intend to increase digital investment than any other area in FY21](#)

Marcura (Mar, 2022) [In conversation with George Pitaoulis from ABC Maritime on the benefits of the MarTrust E-Wallet](#)

Oracle NetSuite (2020) [State of the CFO role](#)

PortLog (accessed Dec, 2023) [PortLog is integrated with the Veson IMOS Platform](#)



© Thetius 2024, all rights reserved.

This report contains opinions provided by third parties that may not reflect the views of Marcura. While the information in this document has been prepared in good faith, no representation, warranty, assurance or undertaking (express or implied) is or will be made, and no responsibility or liability (howsoever arising) is or will be accepted by the Marcura group or any of its officers, employees or agents in relation to the adequacy, accuracy, completeness, reasonableness or fitness for purpose of the information in this document. All and any such responsibility and liability is expressly disclaimed and excluded to the maximum extent permitted by applicable law.