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“THE ROLE OF THE PURCHASING
DEPARTMENT IN SHIPPING COMPANIES:
SELECTION CRITERIA AND APPRAISAL OF
SUPPLIERS”

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ABSTRACT

One of the most important parts in shipping companies is the Purchasing Department, as the purveyance on the vessels is a major part of the current expenses and a top priority for each business. Purchasing is usually defined as obtaining the right quality material, at the right time, in the right quantity, from the right source, at the right place (Lysons and Gillingham 2003; Baily et al. 1998). Van Weele (2005) also defined purchasing as the management of the company's external supply of goods, services, capabilities necessary for running, maintaining, and managing the company's primary and support activities is secured at the most favorable conditions. Although, there is no agreed definition of purchasing from literature, these definitions indicate that there is need for supply requiring to determination of specifications, supply continuity by choosing a suitable supplier, efficient buying (worth the value), and relationship to ensure supply at the right time to manage inventory and monitor efficiency of suppliers thereby defining the purchasing function. This happens as even a short delay in supplying vessels with necessities can affect not only the profitability but also the reliability of a shipping company. Therefore, it is necessary to organize and operate the Procurement Department according to each company's business policy. The main purpose of this desertification is to record and analyze the procedures followed by the Purchasing department of shipping companies, its operation and interaction with rest departments and to clarify the criteria which are used to choose and evaluate the suppliers. In order to achieve such a result, each department of a shipping company will be briefly described focusing on the connection with the Purchasing Department. Afterwards, the procedure that is followed depending on the company's business policy and the types of goods needed to be supplied will be explained. Last but not least, the selection criteria for suppliers will be specified so as to conclude to "proper" suppliers for each company.

1. INTRODUCTION

Merchant shipping is the physical process of transporting commodities and goods by sea referring also to services provided for the carriage of goods by sea. Shipping market is no single, but a set of separate markets that differ in the type of cargo, the vessel, the sea route requirements, and geographical distribution. However, under certain conditions, it can be regarded as one single entity. In this thesis, what we want to research is not the shipping industry in its full spectrum but the location of the shipping business in the market. In this respect it is advisable to provide more information about the shipping market.

It is clear that the shipping market has changed radically through the last few years since new changes in technology are constantly taking place, such as the number of competitors, the transport services and the legislation. The consequence of all these is that the shipping market is becoming more and more competitive and demanding. So, it is reasonable for shipping companies to constantly set new goals and design different marketing strategies to survive under new circumstances.

Today the shipping companies are trying to find out the way to fulfil the wishes of their customers, to adjust the charter policy according to their needs, to provide the appropriate transportation services in order to meet the requirements, to negotiate the fare accordingly as well as communicate effectively with the target market so as to achieve the most profitable and longest employment of their vessels.

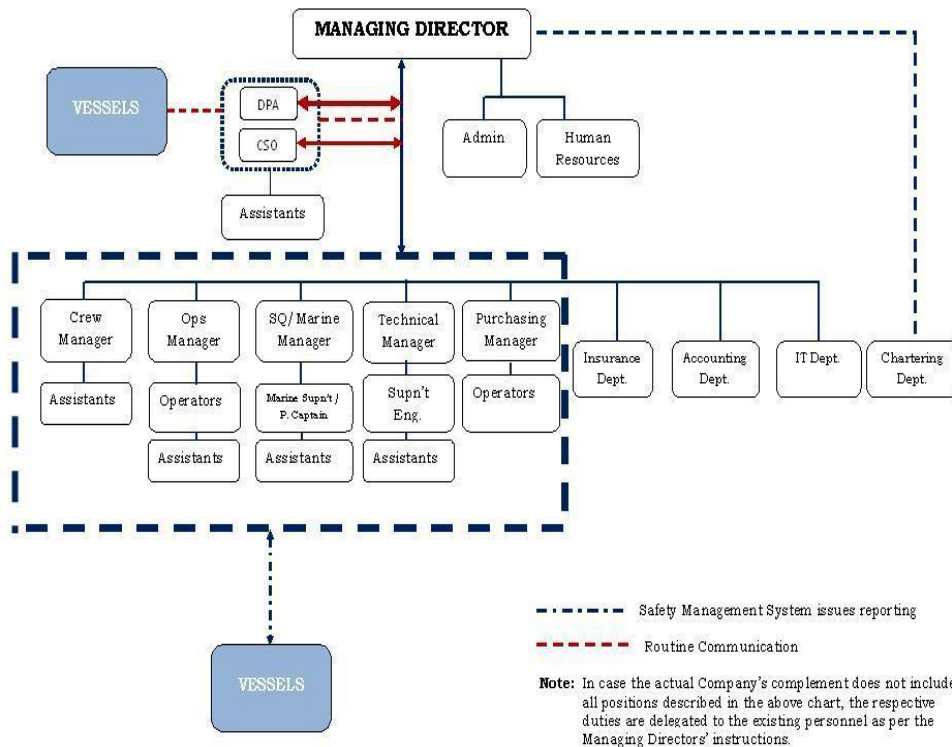
It is particularly important for every shipping company to secure its smooth operation of their vessels as one day of delay on their itinerary can prove to be quite damaging not only for their profitability but also towards their credibility concerning their customers. This is certainly not always an easy task to accomplish because of the distance that separates the administrative unit (headquarters) of the company from its production unit (vessel). Its company's management purpose is to provide everything needed in order to carry out the continuous operation of production without obstacles. For achieving the above purpose, a significant share of responsibility lies to the procurement section of each shipping company.

Globalization, extreme competition, and great financial fluctuations in the prices of products and services, have resulted in enhancing the Procurement management as one of the company's most important influencing factors. It is now recognizable that the need to improve the operation of supplies exists. In the maritime space and especially in the field of catering and supply for vessels with both consumables and spare parts, supplies are one of the fundamental running costs. The difference and each company's approach derive from enhancing the business strategy. Nevertheless, key business priority is to reduce the expenses as much as possible to save resources.

It is obvious that technology has now transformed the shipping agency into a perfectly equipped and well-organized business center, where specialized maritime executives have the ability to control, guide, and support every activity of the vessels and their crews. To achieve the best possible coordination, each shipping company is structured into different departments where everyone undertakes a different important task to complete.

According to William (1996), the organizational structure of a shipping company is the business which defines the way in which the various tasks should be distributed, who refers to whom, as well as the formal coordination mechanisms and standards of professional cooperation that must be followed.

The sections of each Shipping company are listed as per below chart:



Img.1 Company's Organizational Chart

1.1. GENERAL MANAGEMENT

It is the center of maritime business and where all strategic decisions for each shipping company start from. It is the department which provides directions, coordinates, and cooperates with all rest departments of the company. It defines the company's relationships with the wider shipping industry (flag state, banks, insurance agencies etc.). Usually, it is headed with one experienced executive, who can be the owner himself, framed by staff with global perception of the maritime market. Overseeing the shore/ship implementation of the Company's stated policies, as per the SQ& EMS Manual and encouraging awareness and compliance by all personnel is one of the fundamental responsibilities of the General Manager. At the same time, coordinating tasks among the Company's Departments as well as communication with the Operations, Legal and Chartering Departments and with external advisors and ensuring that all correspondence passes through him in order to be distributed to the appropriate departments is considered to be fundamental priorities. Moreover, he/she is responsible for ensuring the proper manning of the Company's shore/onboard operations with qualified personnel and crew and all vessels fulfill all National, International, Industry and Company requirements and standards. By providing full

support, consultation and guidance to the SQ&EMS designated person ashore during the development, implementation and corrective action-taking of the Company's Safety, Quality & Environmental Protection Management System and monitoring, motivating and encouraging all Company's personnel who are related to SQ&EMS for their active participation in the implementation of the Company's Safety and Environmental policy and other issues outlined in the SQ&EMS Manual, General Manager can be sure that he/she is acting considerably for the company. In addition to this, their responsibilities also include following-up all new developments that take place in the various Maritime Organizations and all technological innovations related to Shipping, establishing good relationships with Classification societies, Shipyards, Sub-contractors, Suppliers, and Charters, approving realistic annual budgets, and overseeing Company's results and finally following developments of IMO, USCG, Classification and Flag Requirements.

1.2. OPERATIONS DEPARTMENT

The Operations Department is responsible for the monitoring of the fleet's performance and taking care of vessels' needs while at sea or in port. The Operators try to foresee and provide solutions to all the problems that may arise and can have an adverse effect on the smooth operation of the ships. The department maintains continuous communications with master's and agents worldwide and takes all the appropriate steps to keep satisfying their every need. Moreover, it monitors the daily operating costs of the fleet and it is in close co-operation with the Supply Department in order to make sure that all vessels are provided with the necessary deck stores, provisions, paints, etc.

In addition, the Operations Dept. has the overall supervision of the Company's Crew Department. Last, but not least, this department is charged with the safety of the ships and their crew members, by making sure that all necessary safety items are provided on a regular and scheduled basis by upholding a quality control system using the International Safety Management (ISM) Code as its backbone. It contributes smoothly to the efficient operation of the company's vessels in accordance with their contractual obligations to the Charterers. The vessels are usually monitored by an experienced crew member who was formerly staffed as master on the same vessels.

However, nowadays due to the increased demands, more and more economists and lawyers are recruited. The Operations Department takes over the charter party as soon as it is signed from the Chartering Department and monitors it by providing support and advice to crew until the vessel completes its duties accordingly. The Operations Department is subsequently the heart of the Shipping Company.

1.3. TECHNICAL DEPARTMENT

The Technical Department is charged with all matters that involve the proper maintenance of the fleet's vessels. It is responsible for all engines' room and deck machinery as well as the equipment running smoothly and remaining problem-free. Frequently scheduled maintenance operations, supplying (in direct cooperation with

our Purchasing dept.) the necessary spare parts and supervising dry dockings and other repairs are the main responsibilities of this department.

Also, in accordance with the Operations Dept. The Tech Department is responsible for the renewal of all ship certificates whenever necessary, for reviewing technical reports, and appraising the overall performance of the engines. All above are made possible in various ways, such as the dispatch of Superintendent Engineers on board the vessels in regular intervals, the monitoring of inventories of all engine spares and stores, the chemical testing of bunkers and lubricants and the selection and dispatch of specialized teams on board to carry out necessary onboard repairs.

The Technical Department focuses on the maintenance of the company's ships. Generally, it has the responsibility of monitoring the good functioning and maintenance of vessels so ships can always be in full operation readiness. It's the part where the computerization is required as many technical terms are involved with much importance for the operation of the vessel and each engine, as well as the part where it requires the highest funds.

1.4. CHARTERING DEPARTMENT

The Chartering Department is responsible for utilizing the fleet in the best way possible. Through a worldwide ship broking net, the chartering team tries to locate the most suitable business for the vessels and negotiate the best hire rates and terms for their disposal. Not to mention that this department is responsible for the selling of existing units and the purchasing of new ones.

It is usually staffed by executives specialized in chartering matters. But there are also large naval offices, which are engaged exclusively by chartering ships of various companies, the so-called freight forwarding agencies. The field of their business is the promotion and conclusion of ships which provide profitable freight agreements relating to the exploitation of a company's fleet. There are shipping companies that find it more profitable to outsource the chartering to other companies which specialize on just that. Of course, this has to do with staffing each company and its capabilities to manage its own fleet.

1.5. MARINE & SAFETY DEPARTMENT

Nowadays, this is one of the most crucial departments in every shipping company. This department was established approximately by the mid-1990s in order to comply with the quality standards and procedures set out in the International Code of the International Maritime Organization (IMO), well-known as ISM Code. It deals with various issues including coordination of the invitations for the tanker inspections by oil companies, providing guidance and instructions to masters and/or officers for the inspections, internal vetting and visits prior and during vetting inspections. The department follows up any observations that might have been noticed during vetting inspections and has to update the management and the crew onboard vessels about latest regulations concerning oil companies' requirements. The manager of the marine and safety department often visits oil companies' offices and discusses matters relating to the managed vessels. Not only follows up the certification process of the

ISM code and revises the SMS of the shipping company and performs internal and external audits both onboard and offshore but also updates the management and the vessels for all matters related to safety as per flag states, IMO, Class Societies etc. and conducts training seminars for the office staff and seafarers. At the same time, the Department monitors the safety and pollution prevention aspects of each ship's operation, ensuring that adequate resources and shore based support are applied as required, ensures that the requirements of the International Safety Management code (ISM) and the company's Safety Management System (SMS) are implemented, maintained and wherever possible improved as well as the investigation of accidents and the accurate reporting of hazardous occurrences and organizes management review meetings and revises whenever necessary the company's-controlled documentation system.

It is staffed mainly by people with knowledge of all company's activities, including experienced masters and engineers. This is a relatively new section which in cooperation with other departments implements the Community quality assurance and safety guidelines, quality control of all procedures performed on the shipping company but also on the vessels' themselves.

1.6. INSURANCE & CLAIMS DEPARTMENT

This department has two functions. Firstly, with regards to the Insurance aspect, it is responsible for the process of insuring the vessels, the cargo and the crew members. This process entails the careful examination of all insurance policies and the relevant invoices, as well as the monitoring of the strict adherence to their clauses. Furthermore, it is responsible for advising the top management about the annual insurance expenses both per vessel and per fleet, keeping the other departments up to date about the effects of possible moves that may not be covered by insurance. Secondly, with regards to the Claims part of the department's duties, it is responsible for all the necessary actions that need to be taken in cases of claims (e.g., Hull & Machinery and Cargo Claims). These include finding evidence and closely monitoring the relevant developments. The department also follows up on claims that may arise from stevedoring damages, stowaways, injuries, accidents etc. For this purpose, it is in close cooperation with all the other departments and especially the Technical and Operations' Departments as well as legal offices and P&I clubs.

The Insurance and Claims Department is most commonly staffed by lawyers specialized in maritime law and maritime insurance. Their main responsibilities include following developments of IMO, OCIMF, USCG, Classification and Flag Requirements, abiding with Company's Policies and negotiating contracts with insurance brokers – if required, keeping the insurance coverage as well as ensuring that insurance cover copies are available onboard the ships. In addition, this Department ensures that ships are fully covered regarding, Hull & Machinery, P+I, Cargo Insurance, War Risk, FD&D, and cash to Master and briefing vessel's Senior Officers about insurance matters and claims procedures. At the same time, they are conducting insurance claims whenever these arise including but not limited to initiation, following up, and closure and maintaining proper correspondence with insurance brokers.

1.7. PURCHASING DEPARTMENT

The Purchasing Department is charged with the task of supplying the fleet's vessels with the necessary spares, stores, paints, lubricants, chemicals and cover any other needs supply-wise which may arise. Moreover, the Department's management negotiates the purchasing prices and terms once every year with the Company's major suppliers. Finally, the Purchasing operators prepare and monitor the annual budget, keep detailed statistics and submit the final results to the top management.

It is usually staffed by a master or a chief engineer as well as executives experienced in seafaring supplies and other materials. This section can be either standing alone or in the field of his work to have undertaken the Technical Department. Its purpose is to control and purchase vessels' machinery, spare parts and tools.

Department's key responsibilities include acting in accordance with Company's Purchasing Policies and liaise with the Managing Director/Technical and Accounting Managers, dealing with requisitions received from Company's vessels through the Technical Department, obtaining quotations from various Manufacturers and Suppliers, evaluating the different offers received from various suppliers and placing the orders in cooperation with Technical and Accounting Department. At the same time, following-up the delivery of goods to the ship, verifying invoices issued by the Suppliers prior to submitting them to the Accounting Department, following-up and updating vessel's inventory, maintaining proper records of suppliers and manufacturers of the vessel's equipment are not to be excluded. Final activity not to be underestimated is assisting the Technical Manager in Annual Budget preparation.

1.8. HUMAN RESOURCES DEPARTMENT

This department is mainly occupied with the responsibility of finding the right employee for the right ashore based job opening. It works in conjunction with other staff towards achieving each Department's stated principles and objectives. The personnel have to implement Company's procedures regarding the manning management of the Company's Office as per Company's SQ & EMS Manual and Managing Director's instructions, managing the recruitment and dismissal process, coordinating Company's training schedule and collection and filling of all CV's. Furthermore, filling all Personnel Department activities, providing Administrative support for organizing different company events, maintaining the personnel records and monitor absences and duty cycles and providing notification of personnel, recording all attendees and training, and certification distribution. At last, holidays arrangements, medical and sick leaves, accident records, pension and insurance are considered their part of the role in a shipping company.

1.9. CREW DEPARTMENT

Crew department main responsibility is to ensure that ships are manned with adequate qualified, skilled, certificated and medically fit seafarers in accordance with national and international requirements, as well as in line with the high standard the company has set up. Monitoring manning level and forecasting manning needs for all vessels, identification of hiring and promotion needs as well as the determination of required

qualifications and skills, the final selection, engagement, administration, and training of all seagoing personnel in cooperation with Operation and Technical departments are main responsibilities. Furthermore, Crew departments' activities include hiring of all shipboard personnel, directly, via authorized Manning Offices or via subcontracted Crew Managers, controlling and evaluating the performance of Manning Offices and sub-contracted Crew Managers, consistently evaluating the performance of all seafarers to ensure the above requirements, maintaining updated records for all seafarers employed by the Company, following up of Industry wages and setting and control of the annual Crew Budgets.

Most commonly, people with experience in human management potential and also a previous master of the company's vessels. Crew department is the one that controls the Master General Accounts, and it is intended for staffing vessels with suitable crew, whether new or replacement.

1.10. ADMINISTRATION DEPARTMENT

It deals with the handling of correspondence and communication of the company with vessels and other organizations and companies. Administration as a department usually exists for supporting reasons in large shipping companies. This department's responsibilities include supporting tasks for convenience of the rest departments and employees such as cleaning arrangements for the office once a week, decoration for the offices or during meetings, repairs, maintenance and renewals for telephones, typewriters, photocopiers or stationery. Once meeting or training sessions are arranged, catering and beverage arrangements are usually provided from the Administration department. Not to mention, company cars or taxi hiring, staff and office protection, updating of first aid facilities, hotel, and travel arrangements for principals. Finally, the Administration department is providing messenger services in cooperation with the IT department and under circumstances covering managing Director's personal assistant position.

1.11. FINANCE & ACCOUNTS DEPARTMENT

Finance & Accounts Department consists of highly educated and experienced people, who are involved in every aspect of controlling debit and credit, the suppliers' payments, as well as producing the associated balance sheets. The department oversees preparing annual and periodical reports, as well as yearly budget, well in advance, and submits them to the management in order to assist for crucial decision making.

The financial aspect of the department deals with the control of the company's cash flow, the financial feasibility of a project, the relevant negotiations with financial institutions, the follow up of loan outstanding and various other financial products. The Financial Department's role includes planning, organizing, auditing, and controlling the company's finances. It monitors the fiscal activities of the company and it is responsible for seeking (and carrying through) the necessary funding for these activities, either with traditional bank financing or alternative sources. Furthermore, it evaluates the financial viability of prospective investments of the company's clients and keeps up with the progress of the existing ones. It manages,

allocates and invests the company's cash reserves and working capital and other assets and suggests the appropriate alternatives. Moreover, its planning role primarily includes formulating the company's annual budget and budget projections for the upcoming years.

The Financial Department finally follows up and informs the Senior Management on the economic developments around the world.

Accounting is one of the main parts of one business, as it controls the income and expenses of the company. It is the one that is responsible for the proper and timely keeping of the company's accounts. The department also manages all available financial resources of the company, monitors the inflows and outflows, schedules payments to suppliers, shipyards, agents, etc. It also oversees the prompt repayment of the company's loan obligations. Finally, the Accounting Department issues the annual financial statements in co-operation with internationally acclaimed accounting firms.

1.12. I.T. DEPARTMENT

It is a department that has been added to all shipping companies in order to coordinate with ERP systems and failures as well as supporting the rest departments with any problems that may occur during the day. The maintenance and upgrading of shipping company's hardware and software and the implementation of shipping company's ship management software in the office and onboard ships are considered departments fundamental responsibilities. Not to mention the continuous training of shipping company's Staff on IT matters and updates on the ERP system used which is part of their role. In some cases, IT departments has to work with shipping company's purchasing departments as an Electrical Engineer consultant, to handle all shipping company's ship communication equipment masters in liaison with the operation department. Finally, this department must report to the shipping company's Manager for any problems or requirements regarding above mentioned matters.

2. PURCHASING DEPARTMENT AND PROCEDURES

In all types of entities, the management of activities is related to the management of inputs, outputs and all kinds. Supply chain by-products have multiple impacts on competitiveness and efficiency. These activities occur on the one hand at the stage of acquiring each type of inputs (materials, equipment and services) for the production of products and services, and on the other hand at the stage of supplying the corresponding outputs to customers. These individual activities are consolidated under one umbrella called 'supply management'.

Logistics management aims for better coordination and minimization of their total costs by input the production of high-quality products and services with the lowest possible cost. Shipping industry supply management is facing unprecedented difficulties, since the distance between the administrative and organizational authority, which refers to its company's offices, and the production unit, which is the vessel, makes their work difficult in supplies. It becomes clearer because of the global nature that distinguishes her. The maritime industry is not conducive to the creation of stable, timeless, and exclusive relationships between the shipping company and the suppliers.

Supplies of goods and services are of the utmost importance for all enterprises of the industrial and financial sectors, but in particular those which belong to shipping. This is because the vessel's sustainability of itself and of its crew too, depends entirely on the proper Procurement Process of the Shipping Manager.

First, it is common for land trips not to occur or even not to be approached for long periods of time, which consequently arise the fact that the vessel should have adequate supplies for its proper operation against the duration of the journey and being on alert for emergencies, since its supply to the high seas is particularly difficult. On this framework, while taking into account cost minimization, the shipping department of each shipping company should be well organized.

2.1. STRATEGIC OPERATION

Strategic planning involves identifying its goals within the organization, selecting the strategies needed to achieve them, striving to achieve a long-term, sustainable competitive advantage, examining internal strengths and weaknesses, detecting the environment for opportunities and threats, guides decisions, and helping to invest in the resources.

Developing an effective supply strategy requires alignment and its integration with the strategies of other important functions of one business. Supply strategies are designed to continually increase competitive advantages, which besides price include frequent integrating innovations, shortening the times for new products, quality, and high-quality services. Among the activities of the supply strategy, Identifying and understanding the business needs that should be addressed in order to satisfy the operation of the supply, determining the organizational structure of the business and

responsibilities of supply executives, applying formation of a 'supply board' for the analysis of strategies as well as supply and support of his individual choices are to be included. Besides above, targeting and planning actions (e.g., procurement of sourcing), capacity management and design of organizational structures (e.g., concentration / decentralization, coordination of project groups), identifying and satisfying the needs of its users or customers supply operations, including training, support, authorizations and representation and defining policies (e.g., standardization, analysis, supplier development and corporate social responsibility) are key responsibilities. Design and implement up-to-date technologies (e.g., information technology), ERP and electronic business resource management systems transactions, monitoring performance and implementing continuous programs for improvement and developing a strategic supply chain requires setting goals for all supplies, such as quality and delivery times must be considered part of the role.

In other words, the supply strategy determines which or how the objectives are achieved because the inputs purchased are usually different in cost, the importance and risks of supply. Choosing the right strategy is essential to consider issues such as the supply market segments, the number of affiliated suppliers with the business, the relationships, and types of contracts with suppliers and the functional organization of purchasing activities. Exercising a strategy for product and service markets assumes that the business is at a satisfactory operating level performance as well as sound strategic perception on the part of executives of supply.

2.2. PROCUREMENT MARKET

Organizations adopt many different structures for their operations, with the most common described as: i) National companies – which only work within their home country , ii) International companies- which have facilities in different countries but they are centered on the home country, iii) Multinational companies – where largely independent companies working in different countries and iv) Global companies – which see the world as a single market moving materials anywhere in the world and using the best locations for any operations.

The emergence of stronger collaboration with suppliers and the system known as supply chain management has revolutionized 21st century merchandise systems. Companies have cut down on the number of suppliers they use to form more mutually beneficial partnerships. People tend to oversimplify the differences between sourcing manufacturing materials and finished products either locally or internationally. Procurement market provides two different types of sourcing; The most straightforward transaction involves an organization buying materials from suppliers working in the same country, which is the Domestic purchasing and the International purchasing, where a buyer is in a different country from the supplier. This is usually more complex than a domestic purchase and buyers must deal with more demanding negotiations, longer lead times, more complex laws and regulations, currency fluctuations, varying requirements, and a host of other variables such as language and time differences.

On the one hand, domestic sourcing can provide the Purchasing department with lots of advantages. For example, if a shipping company's headquarters is in a country with a weak currency compared to overseas regions, it would be cheaper to source

materials locally. Not to mention that domestic purchasing is saving time and money in comparison with shipping locally as it is typically faster and much less expensive than shipping from international suppliers. Moreover, trucking carriers can be leveraged, while ocean carriers will largely be inflexible in terms of costs and timeframes. The other benefit of sourcing materials locally is that it will likely have better production control oversight to ensure that the suppliers are meeting deadlines and quality requirements. If all of manufacturing is conducted overseas, it will be very time-consuming and costly for the purchase operator to control the process and ensure everything runs smoothly. Therefore, domestic sourcing will make inventory control much easier as there will be a full oversight of the stock.

Many local communities have their own histories, traditions, and culture, often encapsulated, and preserved by local businesses – whether they are taking advantage of a region’s particular produce or qualities or not. Using local partners allows shipping companies to stay afloat and evolve, strengthening the characteristics that define a community and helping to maintain diversity in the face of globalization and widespread outsourcing to overseas suppliers. Furthermore, if a small business relies on local suppliers, a relationship is built on trust, familiarity, and personalized service. The advantages of this include the establishment of new networks and contacts, speed, and efficiency of service thanks to a supplier’s familiarity with the purchasing operator or manager, and the possibility of special discounts and savings.

Finally, especially nowadays where environmental issues and awareness is cultivated, any carbon footprint will be vastly reduced by using local suppliers. Delivery and collection can become a matter of a short, personal journey rather than trans-hemispheric flights. Both supporting sustainability and showing a commitment to maintaining local character can have a significant impact on a business’s image and reputation, potentially attracting new customers.

However, there are obvious negatives to domestic purchasing depending on the circumstance, as sourcing locally can be much more expensive. Highly developed countries like America, for example, have much higher labor and production costs than many overseas countries, and therefore sourcing locally would potentially be significantly more expensive.

On the other hand, shipping companies have numerous various reasons for formulating and implementing strategies that initiate, continue, or expand involvement in business operations across national borders. Perhaps the greatest advantage is that firms can gain new customers for their products and services, thus increasing revenues. Growth in revenues and profits is the most common company’s objective.

First of all, one international purchasing advantage is of course the possibility to gain new customers for their products as competitors in foreign markets may not exist, or competition may be less intense than in domestic markets. Foreign operations can absorb excess capacity, reduce unit costs, and spread economic risks over a wider number of markets, not to mention that they can allow companies to establish low-cost production facilities in locations close to raw materials or cheap labor. In addition, international purchasing may result in reduced tariffs, lower taxes, and favorable political treatment. A shipping company’s power and prestige in domestic

markets may be significantly enhanced if the vessels travel globally. Enhanced prestige can be translated into improved negotiating power among suppliers and purchasing operators.

The availability, depth, and reliability of economic and marketing information in different countries vary extensively. Consequently, there are also numerous potential disadvantages of initiating, continuing, or expanding business across national borders. For instance, foreign operations could be seized by nationalistic factions. Weaknesses of competitors in foreign lands are often overestimated, and strengths are often underestimated. Keeping informed about the number and nature of competitors is more difficult when doing business internationally. Furthermore, shipping companies confront different and often little-understood social, cultural, demographic, environmental, political, governmental, legal, technological, economic, and competitive forces when doing business internationally. These forces can make communication difficult especially since language, culture, and value systems differ among countries, which can create barriers to communication.

For a Procurement operator considering where to build the supply base, source components, and source of finished products, the prevailing idea seems to be that domestic sourcing allows for better quality control and shorter time to market, but international sourcing is cheaper. While these can be true, the lines become blurred as to when to choose one over the other, and these vast oversimplifications can lead to poor strategic decisions. The key to any informed strategic decision is agreeing to and measuring the decision drivers. Thus, it is imperative to take into account all quality, technical, timing, cost, and commercial drivers when comparing your sourcing options.

In many circumstances, there are drivers that encourage localized sourcing and manufacturing. If the shipping company is headquartered in a country that has a weak currency relative to the supplier's country, it is probably cheaper to source locally. Logistics are typically quicker and less costly when shipping domestically, as trucking carriers can be leveraged as opposed to ocean carriers. When working with local manufacturers, it is usually easier to provide production control oversight to ensure the suppliers are meeting deadlines and quality requirements. Local sourcing also minimizes the time and monetary cost of communicating with and traveling to suppliers, which often falls through the cracks in an all-in cost and feasibility analysis. When sourcing internationally, it is important for a purchaser to be aware of common supply chain disruptions in the region in order to mitigate risk. Volatile currency, trade protectionism, emerging new suppliers and technologies, economic disruptions, and regulatory shifts can reveal themselves as unseen costs over time. International shipping can increase the risk of freight damage and product modification requirements. In-hand delivery timelines for international purchasing can also change due to delivery delays; that lost time translates to money being left on the table.

Certain costs are common to both domestic and foreign purchases. Although these are incurred for both types of purchases, they are certainly not equal. For example, there is always a delivery charge, but this is likely to be considerably higher for imported materials than locally sourced ones. The main two costs are: purchase price, including quantity discounts, minimum quantities, the effect of emergency orders and any surcharges and extras specified by the supplier and transportation costs including

packaging, insurance and mode of transport, routes taken and the effect of buying at the factory gate rather than having the supplier organize transport.

All in all, each of these decision drivers should be taken into account when comparing domestic and international purchasing decisions. Whether local or global, unfavorable purchasing decisions can cost you valuable time and money, so careful analysis of key decision drivers is vital for ultimate purchasing success. Generally, the movement from domestic to international purchasing either because suitable domestic suppliers no longer exist or because they have to keep up with competitors who are gaining an advantage through their international purchasing, is very common nowadays.

2.3. SUPPLYING STAGES

The purchasing process in the business environment generally follows four phases. These can be described as groups of actions which evolve along the outline of a circle. The sequence of actions is completed upon receipt by the vessel of the product or service purchased. In particular, the main phases are distinguished in the purchasing cycle:

- i. Requirement Description: This phase is mainly about recognition, and in the description of purchasing need – demand, it includes actions such as issuing market applications, planning specifications, price and purchase time preferences, training budgeting and planning of purchasing operations.
- ii. Sourcing research: It is about research and evaluation of potential suppliers and includes actions such as tracking suppliers, interviews with suppliers, review and enrichment supplier lists, supplier evaluation and pre-selection, visits to spectral exhibitions, related literature research and studies outsourcing or self-construction.
- iii. Selection and commissioning of procurement - Issue of purchase order: This phase concerns the choice of the final supplier and how it will be carried out which includes supplier's evaluation, selection of pricing methods, setting evaluation and performance criteria, negotiations, assignments, contracting and issuing purchase orders.
- iv. Order Processing: The phase of processing purchase orders includes contract management and monitoring, acceleration of orders, receipt, inspection, storage, release to users, supplier accounting and invoice checking.

The Procurement section is important to assist in planning for the requirements of the desired quality level; reliable technology is used, and easily accessible items are selected at the market. However, to achieve the above objectives, they should compile the market description correctly so that the completion of the purchase by the Procurement department according to their goals is pursued. A proper market description drastically reduces the costs of the supplies and the total time needed to meet the needs.

Successful completion of the purchase order or contract awards the purchase of a purchasing company depending on its suitability selected method of market description. Undoubtedly, its accurate description has a significant impact on the successful outcome of the process of supplies. The description of the market is a tool to serve perform many actions, such as describing to the purchaser what to buy,

describing to the prospective supplier what is required, serving as a basis for evaluating bids, being the main part of the resulting purchase order and establishing the methodology for transfer, receipt, post-assignment inspections, tests and quality audits order.

The procedure followed when executing a purchase varies depending on the type of material purchased and the service. However, a larger volume of a business's purchasing activity is very repetitive and can be standardized. The exact format of the forms can vary. Moreover, the process itself and the way of communication between the parties involved are shaped depending on the available communication technology (e.g., phone, fax, email or direct connection to his computer buyer and supplier), using or with electronic supplies, and installed information management system for its operational resources business.

2.4. CATEGORIES OF GOODS

Purpose and role of the Procurement department is to confirm that the product and the service arrangements comply with the requirements specified by the Company. Under the effort to apply waste reduction methods such as buying bulk to reduce packaging volumes, led to encouraging initiatives for recycling and using non-perishable equipment.

The application of this procedure is limited to the following categories of products purchased by the Company for the needs of the ship management:

1. Supplies (including machine consumables, consumables for deck, cabin, and welding materials)
2. Spare parts and equipment
3. Chemicals / Paints
4. Lubricants
5. Bunkers
6. Critical Supplies

2.4.1 Supplies procurement process

The captain (Master) is responsible for monitoring and confirming the availability of the necessary supplies needed during his voyage, as appropriate, by filling in and sending to Headquarters in time forms for demand. Inquiry lists are redirected to the director of the procurement department, who inspects, supervises appropriateness of specific requirements, redesigns the inquiry list (if necessary) and approves the items and quantities requested. The request form should clearly describe the type of product that will be purchased, indicating where it can be made either locally or internationally using the IMPA directory reference code number or the description and any other specific identification or even the quantities available or the quantities required.

Once the supply operator receives the request it is responsible for completing the design of the procurement markets. The request will be sent for bidding to suppliers selected by "Supplier List". From the offers that the purchasing manager/operator will

receive the procurement department should create a comparison list and decide on the choice of supplier. The authorized procurement operator will place the order with the selected one supplier. After the order is made, the manager of the procurement department must inform the captain and agent of the company at the port of delivery for the order.

At this stage, the part of the forwarding procedure should also be included. The service that carries out the operation of making the goods available at the right place, at the right time, and in the right quantity is known as freight forwarding and logistics. The logistics department of a company ensures the timely distribution, storage, and transportation of the required goods. On the other hand, freight forwarding services are third-party logistics companies specialized in making the goods available at a particular place by charging a certain amount known as carriage charges.

Logistics plays a key role for the business to prosper. If the goods are not delivered on time, it may lead to consequences, which may not be favorable for the maritime company. As already mentioned, logistics ensures that the goods are available at the right place and at the appropriate time. Hence, logistics removes the hindrance of place while at the same time, perishable goods will not be able to be stored for a long time. They need to be dispatched as soon as possible. For example, food products. The logistics department ensures the dispatching of the goods as earliest as possible, depending upon the demand and requirement of the product. Finally, a good operating logistics department can remove geographical barriers as if the goods are to be transported abroad, the goods can be made available easily. If the goods are made available to the customer at the right time, it builds goodwill of a firm in the market.

On the other hand, freight forwarding is most used in the maritime industry. Logistics departments are not easily endorsed in the maritime industry. As a result, the procurement department arranges the transport with external companies. The types of freight forwarding companies are the rail freight services which allows the goods to be transported to vast distances. The railway freight forwarders ensure that the goods are transported safely. The sea freight services in which the goods are transported through cargo ships in large sea vessels. It helps in transporting goods across countries. It is also an economical means of transport for transporting goods. Air freight which is the fastest freight service. It saves a lot of time. It has a drawback that it is a costly means of transporting goods as both the airlines and the customs are overrated. Last but not least, the Road freight services. This is the most common freight service. The goods are transported through delivery trucks and vans. The time taken depends upon the traffic and the road conditions.

Upon delivery of the purchased supplies to the ship the captain (or sent employees - from each department respectively) must check the supplies in relation to the proof of delivery for the accuracy of the type and quantity received. Any deviation from proof of delivery - the type or quantity of products which have been provided - should be indicated on the acknowledgement of receipt known as "delivery note" (and on invoices if this is the case). Receipts and invoices, if so, they shall be signed and stamped by the captain.

Upon completion of the delivery the Master should inform the office, upon departure from the port of order by message emails, showing problems (deviations from genre

requested, shorter delivery etc.). The invoices, when received at the office, are checked against the original order with receipts approved by the captain.

2.4.2 Procurement of spare parts and equipment

Requirement of spare parts can be set either by the first engineer onboard or directly from the engineer supervisor (Superintendent Engineer). By identifying the need for a replacement part (or equipment) the supervisor or first engineer provides an inquiry list using the Spare Parts List of the company which shows the description of the item with an explanation of the requirement, the spare part code, the amount remaining onboard as well as the quantity needed.

The spare parts request list is directed to the supervising engineer who inspects, checks their suitability and specific requirements, redesigns the inquiry list (if necessary) and approves the items and quantities requested. The manager of the procurement department leads the case and sends a bid request to suppliers selected from the "Suppliers List». When several bids are received, the Purchasing department's Manager is cooperating with the Technical Manager and approves his signature before placing an order. After ordering, the procurement manager will contact the supplier and when the spare parts are ready for shipment they are forwarded in the appropriate port.

The ship is informed of the desired delivery by receiving a copy of the "Order Form" by the Company through the agent of the company, while the company's agents are informed in advance of its detailed shipping. When receiving the purchased spare parts from the ship the first engineer is responsible for confirming that there are no spare parts omitted which have been checked on the "Order Form" provided from the company. Upon completion of the confirmation, the first engineer must acknowledge the delivery of spare parts that have been ordered to the vessel by sending the updated EXCEL file to the Company. Until the order confirmation is shipped back to the Company, the Supply department keeps the demand in the "Active" archive.

2.4.3. Procedure for the supply of chemicals and paints

The demand for gas and chemicals can be set either by the captain or by the first engineer and sent to the technical department manager who inspects and checks the appropriateness of the particulars. Redesigns the inquiry list (if necessary) and afterwards the technical manager approves the items and quantities requested. The forms of the inquiry should clearly state the type of product which will be purchased, indicating where the description or other specific identification, the quantities available and the quantities required.

The request will be sent for bidding to suppliers selected by "Supplier List". From the offers that the purchasing operator will receive the procurement department should create a comparison list and decide on the choice of supplier. The Supply Manager will place an order with the selected supplier. When ordering, the Procurement

manager should inform the captain and agent of the company at the port of delivery for the order.

With regard to paint colors, the above procedure should be followed by the Operations Manager who will be responsible for the approval of inventory colors and its technical managers for the colors needed to repair each vessel.

Upon receiving the items from the ship, the captain or the first engineer confirms delivery as always by providing the delivery notes signed and stamped.

2.4.4. Procedure for the supply of lubricants

Inquiry list for lubricants can either be set by the vessel (captain or first engineer) or from the offices (technical or operations department). In the first case, an inquiry list is directed to the technical department which inspects, checks the suitability of the specific requirements, redesigns its list (if necessary) and approves the requested objects and quantities. The inquiry's form should clearly describe its type of the product to be purchased, indicating where it can be used, the description or other specific identification, the quantities available and the quantities required.

The request should be sent by the purchasing department to a supplier who is responsible for the supply of that vessel. After receiving order confirmation, the appropriate department should inform the captain and agent of the company in its port delivery, so they know about the upcoming order and organize smooth delivery with suppliers.

Upon receipt of items on board, the captain or the first engineer confirms delivery by email. The delivery notes should be forwarded as recommended by the Director of the Procurement and if any comments needed should be clearly stated.

2.4.5. Fuel supply procedure

Bunker inquiry differs from the rest as there is no type to specialize unless the vessel reaches an area with no bunker stock. When this inquiry is provided to the office, the procurement department is responsible to request for a sufficient number of offers-quotations from a specific supplier list. A list of fuel suppliers with a history of working with the company is held by the procurement department. Then the best offer is selected.

When the bunker is received, the captain is consulted accordingly to follow the fuel procedure according to Tech. Circular. One sample to be kept onboard and another should be sent after each bunker delivery for testing of the product. Procurement department is in charge of informing the local agent where these samples should be sent in order to acquire the requested results within specific time limits.

2.4.6. Procurement of critical supplies and equipment

Critical species are predefined and defined by the P.M.S system (Performance Maintenance System). Their condition and service history is monitored and recorded in a special list which is displayed using a specific program selection. The references describe specific actions and processes that take place as part of the project of critical equipment and will be specified within the system and will appear each time to the user who prepares a critical maintenance project or other equipment.

In the event of critical equipment failures or serious safety deficiencies, which cannot be directly corrected by the vessel's crew, reports must be immediately provided in order to notify the Quality and Safety Manager and other responsible Managers. In those cases what needs to be made, is a full assessment of the situation and corrective moves. These must be initiated by the offices in cooperation with the vessel's crew. In cases where it is considered necessary for security reasons the operation of the ship may be postponed until corrective action has begun in order to resolve security issues. The purpose of this system is to ensure that all relevant failures, deficiencies, and technical problems identified will be monitored until completion of the required repairs. The Technical Department in collaboration with other responsible departments follows the actions taken until the corrective actions are confirmed and approved. The purchasing department at this stage is a lever which operates under everyday's needs with continuous requests from both vessel's crew members and office managers and orders need to be accurate and without delays.

3. SUPPLIERS SELECTION

In shipping companies nowadays, a supplier's or ship chandlers'-as domestically known- selection is a key factor for the most important activity of the supply department. Results in recent research shows that supplier selection is having an impact significantly in business performance. In order to achieve the quality goals, price, availability and service, the selection of the right suppliers is a necessary precondition. Suppliers providing to a company critical material are a capital, a source of know-how which is too valuable to the specialized staff employed by the company itself.

Suppliers offer a significant time advantage. It is a well-known global trend to reduce the number of suppliers in usage. Businesses having a supplier base with reputable suppliers are more certainly able to offer their customers high value products and services. Choosing the right suppliers is especially important if we measure that over 75% of chain functionality of a business is secured by suppliers, which demonstrates how critical the choice of suppliers is.

3.1. Criteria

First step for efficient supplier selection is the evaluation criteria and its definition that each Procurement department uses or should use in order to choose the correct supplier depending on the vessel's requirements. Supplier selection criteria for a particular product or service category should be defined by a cross-functional team of representatives from different sectors of the shipping company. Eventually, apart from the Procurement department, the Technical, Marine and Operation department should have an opinion before starting or stopping cooperation with suppliers.

In general, the selection criteria must derive from the description of technical and commercial requirements for each material category. For this reason, suppliers' ratings are usually based on a mix of criteria, with which assess the supplier's capacity and commitment to satisfy a requirement. A capable, but unbound, supplier is just as well ineffective as an incompetent but committed supplier. Selecting a vendor is probably one of the most nerve wracking but crucial activities a business must undertake. A shipping company's vendors will be delivering the direct purchases which include those that are used to produce the products sold and the indirect purchases and those that keep the business running effectively.

By choosing a potential supplier, the purchasing operator is actually choosing a partner of the shipping company and vessel itself. The Purchasing department needs to trust them to work with them in a professional and profitable manner. It is important that the chosen supplier can provide the requirements anytime requested.

The criteria for evaluating a supplier's competence are classified on areas of quality, availability, service, and cost, while further specialize according to category whether technical or commercial characteristics of each purchased item. More specifically, in each category purchasing items by a specific portfolio, the criteria to evaluate a supplier's capacity are different.

A supplier's willingness can have a significant impact on commission's critical or fearful species. It is therefore a key element of evaluation. Without willingness, even the most capable supplier may not provide satisfactory levels of service. The way one perceives a supplier's potential partnership with a purchaser depends on some key consideration parameters. Firstly, the trading value is determined by the share of the purchaser's transactions in total vendor sales, "The more the better". However, not all suppliers value the same amount of transaction as they are not of the same size. Consequently, what for a small supplier may seem an attractive transaction, for a large supplier can be insignificant. Secondly, the overall attractiveness of transactions is expressed by the influence of qualitative factors that characterize purchasing and supplier business strategy compatibility such as ease of cooperation with the purchaser (e.g., communication links, business culture, decision making, transparency and ethical standards, interpersonal relationships, etc.), stability of supplier financial position and payment history of the purchaser. Furthermore, it is of much importance to have a boundary relationship with the suppliers. When the volume of purchases is low, the frequency of orders is small and when the purchaser presses for price reductions, the supplier's tolerance does not devote resources to build good relationships. Even if the buyer seeks to create partnerships, it is unlikely to receive a response from the supplier.

However, the supplier may still consider the purchaser to be an unattractive customer, even though the volume of orders can be significant. The supplier can take advantage of the situation by offering high prices or dedicating inadequate resources resulting in low product quality and services. In addition to all the above, the supplier believes that the purchaser can become an important future customer and will strive to develop partnerships by proving to the shipping company and vessel's crew that there are mutually beneficial business prospects. It is possible to dedicate resources and make a significant effort in order to increase purchaser orders. Last but not least, the transaction costs are high and cooperation with the purchaser is attractive. The vendor makes great efforts and invests significant resources in order to maintain the relationship with the buyer and to increase transactions between them. As far as the purchasers are concerned, the way they are treated by potential suppliers at the evaluation stage, help them understand the prospects for developing partnerships, excluding suppliers who are possible to exploit or seek to improve their image by their cooperation if necessary.

List of selection criteria

- i. Previous experience and past performance with the product/service to be purchased: Purchasing Operator needs to know that the supplier's company is well-established and ready to service the requirements. Not to mention that the supplier knows the vessel's needs and understands the difference between products requested.
- ii. Ability to meet current and potential capacity requirements on the desired delivery schedule: It is compulsory to know that products and services as per vessel's requirements can be provided on a regular basis. A supplier that has any issues through the whole process will affect the ability to supply vessels and this is an important factor when selecting a vendor.
- iii. Ability to supply all the products required or the complete solution: This is particularly necessary when purchasers are looking for the one business

solution such as a new computer system. Being attempted to rationalize the number of suppliers to deal with or wish to purchase a product line from one vendor only. It would be particularly difficult to obtain good terms if the quantity for purchase is a small range from another supplier, since the chosen supplier is unable to supply the complete range.

- iv. Flexibility to allow changes in orders or product line: All businesses need to change their orders sometimes – if the suppliers heavily penalize the shipping company for changes after order confirmation – perhaps they are not the ones needed, so move on with selecting another vendor.
- v. Substantial catalogue of products or range of services: This not only indicates an established supplier of size, but also means that there is flexibility in ordering. As the shipping company grows, the same supplier can be kept for cooperation. It also means that the purchasing department is unable to minimize the number of vendors that it is dealing with.
- vi. Appropriate supply of internal experts that can answer questions that may occur: This is very pertinent while purchasing a high value service, but everybody needs experts at some time or other even technical experts as technology develops rapidly.
- vii. Testimonials and references: These are valuable in order to check that the supplier is reliable as they are supposed to be.
- viii. Sustainability and financial stability: The last thing needed is to have to change the suppliers very quickly because one of them has gone out of business.
- ix. Prices: Discounts on the price list are always negotiable, but they are also an important part of selecting a supplier.
- x. Delivery times: Need to be known so as deliveries can be made where and when wanted. The number of deliveries per week or month may also be important.
- xi. Terms of business: Payment terms are particularly important as they impact upon a shipping company's cash flow.
- xii. Customer service: Always an important part of any relationship. What is the availability of ordering and helping staff? Are they cordial, professional, and easy to contact? No one likes hanging on the end of the phone talking to an automatic voice mail.
- xiii. Relative level of sophistication of the quality system, including meeting regulatory requirements or mandated quality system registration (e.g., ISO 9001)

3.2. Search

The constant search for new capable suppliers is an integral part for the duties of the purchasing department, especially in conditions of competition. The efforts should be particularly intensified in the search for suppliers with high priority in order to identify a sufficient number of suppliers that guarantees healthy competition. Locating suppliers requires systematic analysis of the supply markets depending on countries located, technology options or supply channels.

In this way a first reduction in the number of suppliers is achieved, which saves time and effort. Of course, simpler ways of locating suppliers can be used. The purchaser

can expect suppliers to seek contact with the shipping company themselves. Suppliers that contact a shipping company on their own initiative may seek business partnerships, but that does not mean that they are the most appropriate supplier for the purchaser. In fact, some of them may be pursuing them to place orders and then disregard them. Another way to attract suppliers is by disclosing the requirements with advertisements on the written form or electronic form, on the business website or in specialized online purchases.

Leaving behind the method of detection, the disclosure of requirements must be made in an efficient and professional manner. The procurement operator should seek to attract the most suitable suppliers using marketing techniques. For example through the shipping company's website, a well-managed business image must provide clear vision and policies that will make her a good customer.

Regardless of the effectiveness of the above detection methods, in the case of critical items, the purchaser should not allow suppliers to make the most of the outreach effort. After all, competent suppliers easily ensure large volumes of work so customers themselves can choose who best serves their business interests. When the purchasers identify the most appropriate suppliers, they should try to prove that their businesses are model types and well desired by customers.

Generally, information about potential suppliers is focused in the areas of technicality, financial status, marketing appreciation and suitability. To be more specific, technical issues of products that are available on the market and meet the necessary specifications is an issue to be checked before starting working with a ship chandler. Financial data and forecasts of product supply and demand is a consideration to be taken into account from both ends before coworking begins or any contract is signed. Commercial information containing prices and terms of delivery products and services should be offered to the procurement department of a shipping company too. Finally, to identify suitable suppliers in its current environment or traditional methods can be successfully fulfilled based on the use of electronic procurement tools.

Once the procurement operator has the selection criteria in place, it should create the pool from which the supplier will be chosen from. During this part of the process, there are five key sectors to be underlined and followed from the purchaser. First of all, a current supplier is the first group to be checked. Starting with suppliers you have previous experience with and established relationships is generally a good idea, especially if you are a junior purchaser or assistant. It is the safer and most convenient way to proceed with the supply process in a shipping company. The second group to check is the one of past suppliers. Depending of course, upon the reasons why they are 'past' and not 'current'. The reasons may differ from product to product and from supplier to supplier. However, as time passes by, lots of suppliers enhance themselves and a second chance should be provided. Another group to be followed in industries groups as many of which are non-profit and maintain databases of member companies. In addition, recommendations and prior business relationships may perhaps be created while working at other companies. This is a case of prior experience in the department of procurement. Nevertheless, technical managers and colleagues will always have previous relationships to share. Last but not least, the internet is the source for everything. The Internet offers the most and from cases to cases the best opportunities to find, research, and contact potential suppliers.

3.3. Screening of suppliers

Once a potential supplier has been identified to cover specific types of requirements, the purchasing department should collect information to demonstrate in-depth evaluation, which requires significant committed human resources. The information collected includes all following; Variety of products / Minimum quality, Minimum / Maximum delivery quantities, Delivery time, Prices & terms of payment, Reputation and any problems occurred, Business relationships with competitors, Location & Export experience, Type of Company (manufacturer, wholesaler, etc.), Balance Sheet of recent years, Catalogs of production and inspection machinery, Quality management procedures and number of quality auditors, Extension programs, Using e-commerce, Foreign language support.

Sources for gathering information are the vendor's website, brochures and manuals, consumer guides, industry magazines, the financial press, the stock exchanges, business directories, as well as online credit rating companies and legal data. Information is also collected by sending questionnaires to suppliers. Obviously, the speed and diligence of the answer shows the supplier's degree of motivation for future collaboration with the sender. The questionnaires must be properly designed so that it will be easy to collect the necessary information. Finally, the supplier must be willing to provide any additional documentation if required. To increase the effectiveness of the responses, it is appropriate to create questionnaires according to the category of requirements needed to be covered.

3.4. Evaluation

Choosing the right supply strategy defines the scope and the depth of research for new suppliers, the type of the relationship and the business characteristics of the transaction. Shipping company's ranking requirement in the appropriate supply portfolio can facilitate the definition of the specific supply criteria and the specification of the information needed for the evaluation. It usually starts with surveys, but also with extracting additional data from easily accessible sources of information (balance sheets, chambers, sectorized bodies, etc.). At this early stage, aim is to significantly reduce the number of potential suppliers to facilitate evaluation. Then, the suppliers that stand out are evaluated in depth with cross-sectional visits to their site. The purpose of these checks is to collect information on the spot examination of procedures and equipment. Their final conclusion for the supplier file can require refinement to consider productivity, quality and management ability to upgrade and comply with customers' standards.

Supplier evaluation is a term used by many businesses and organizations to evaluate and approve their existing and potential suppliers through a series of assessments. One of the best ways is to create a supplier evaluation form. This evaluation consists of a series of questions based on parameters like competency, capacity, consistency, quality etc. With a view to assessing the suppliers to ensure a portfolio of best-in-class vendors. This evaluation form is essential to monitor and measure the supplier's performance for businesses to reduce the cost associated with the activities, analyze

risk management, and maintain scope for constant improvement in selecting the suppliers.

Evaluating suppliers can be challenging. Hence, the best practice is to create an evaluation form that will help the maritime company and the operators required of one to organize and evaluate the suppliers more efficiently. One of the best models investigates the aspects of evaluating the supplier before being appointed.

These are the Cs:

- **Capacity** – Does the supplier have the bandwidth to deliver?
- **Competency** – Is the supplier diligent and can complete the task in each period?
- **Consistency** – Is there a consistent output from the supplier?
- **Control of process** – Does the supplier offer flexibility and have systematic control over his/her process?
- **Commitment to Quality** – Is there a system established by the supplier that works constantly for quality management checks?
- **Cash** – Is the supplier financially independent or is there a third-party involvement?
- **Cost** – Are the products and services offered by him/her cost-effective?
- **Culture** – Does the supplier have a good work culture and market reputation?
- **Clean** – Does the supplier have a legal license, does not favor uncertified professionals and is risk management certified?
- **Communication efficiency** – Does the supplier have the latest means of communication to answer queries put forth to them?

Based on these important parameters the evaluation form can be created and the supplier organization can be asked to furnish all the details right after the screening process is completed.

Supplier Evaluation Form

About Supplier
SUPPLIER INFORMATION

Supplier Name	Supplier ID
Business Title	Date
Review Period	Manager

EVALUATION

	1 = Poor	2 = Fair	3 = Satisfactory	4 = Good	5 = Excellent
Job Knowledge	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
Comments					
Work Quality	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
Comments					
Attendance/ Punctuality	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
Comments					
Initiative	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
Comments					
Communication/ Listening skills	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
Comments					
Dependability	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
Comments					
Overall Rating					

EVALUATION REPORT

FINAL COMMENT

SUPPLIER GOALS

REVIEWER'S SIGNATURE: _____

Img. 2 Supplier Evaluation Form Example

Collecting supplier information before finalizing them is a good practice. The questions asked in the evaluation form helps the operator to conclude whether the supplier should be appointed or not. Apart from this, there are other benefits of having an evaluation form ready for supplier or vendor evaluation. Firstly, if a maritime company is not aware of the supplier, getting an assessment done will help the organization know their supplier and they can assess any risk associated with hiring them. Secondly, through these evaluation forms, suppliers can be hired with a good market reputa and in turn minimize any risk associated with tampering their brand reputation. Finally, there are various cost factors associated with hiring the suppliers. A huge sum of money is invested by companies while finalizing on their suppliers. By having a systematic evaluation form the organizations can understand the overall ability of their vendors to fulfill the organization’s expectations and requirements.

The process of selecting and integrating suppliers into the power of a business does not begin with the receipt of bids, nor does it end with the conclusion of one order. Supplier evaluation and selection procedures apply at least five purchasing activities, which are described below.

3.4.1. Supplier evaluation through categorizing

Supplier evaluation is not an easy process. Many different formulas and techniques can be used. One effective method assigns suppliers to four basic categories based upon their level of performance in key areas, such as delivery, quality, and

responsiveness. A supplier is labeled as "full partner" if it meets all expectations. An "associate partner" is a firm that needs a little more persistence to be developed to full partner status. Additional categories include "high risk" and "incapable" suppliers. A "high-risk" source might continue to be utilized for current production only, based upon an internal risk assessment. But you might not want to award this supplier any future business. An "incapable" supplier should be dropped as soon as possible.

Elaborately, a Full Partner's goals are compatible with your organization's future. Demonstrates 100 percent on-time delivery performance and can participate in your organization's automatic ordering systems. Fully ISO 9000 or QS 9000 approved as requested from the maritime industry. This supplier provides full field response and support within 24 hours of notification, not to mention that he will aid with new designs and will provide proto samples within one week or less. Consistently meets the full partner criteria in five key areas: technology, quality, responsiveness, delivery, and lowest total cost.

An Associate Partner will meet most of the full partner's criteria but not in the same level or consistency. Supplier's management and its employees demonstrate an ongoing commitment to continuous improvement in quality and delivery. In addition, develops goals, objectives, and action plans to meet or exceed the goals and objectives of your organization. Supplier's services or products fulfill a strategic need in your organization. However, the associate partner will require little effort and expense to achieve full partner status.

Characterizing a vendor as High-Risk Supplier will most probably mean that supplier's goals and action plans are not compatible with your organization. No benefit will be provided in developing these sources to associate partner or full partner status. This type of supplier's efficiency can only state that current quality and delivery are acceptable to sustain present production but not economically feasible to move tooling for parts these sources are currently producing.

Finally, an Incapable Supplier can be elaborated as a supplier that does not meet quality and delivery goals, does not demonstrate a desire or a capability to improve deficient service areas and has no interest in obtaining ISO 9000 or QS 9000. This supplier should be dropped immediately.

Suppliers should be characterized as "full partners" if they meet the following key criteria:

Technology:

- Demonstrates an ongoing ability to assimilate state-of-the-art technology into their business.
- Demonstrates an ability to quickly develop new processes and modify existing processes as necessary to create a sustained competitive advantage for customer and self.
- Strong commitment to R&D.
- Demonstrates a willingness to invest in the business and grow.
- Willingness to pursue mutual product and process development.
- Complete understanding of process capabilities.
- Provides documented design guidelines usable by customer engineers.
- Full ISO 9000 or QS 9000 approved.

Quality:

- Consistently meets or exceeds your organization's quality goals.
- Knows whether the parts being produced for your organization meet or exceed the letter and intent of the specification.
- Does not ship out-of-spec parts.
- Has well-documented processes (both manufacturing and administrative).
- Demonstrates a willingness to say "no" and present alternatives to new designs that lack process capability.

Responsiveness:

- Demonstrates an ability to interact directly with your engineers and maintain ongoing business relationships.
- Actively supports your remote manufacturing sites.
- Provides timely responses to technical and business issues.
- Demonstrates a high level of commitment to your organization.
- Is a long-term thinker and is financially stable?
- Demonstrates flexibility to quick changes.

Delivery:

- Willingness to work with your organization to optimize lead times.
- Consistently meets delivery goals.
- Allows order flexibility within acceptable limits.
- Has business systems in place to accurately schedule product and procure material in an economical manner.
- Notifies your organization in advance of shipments delayed for any reason.

Lowest Total Cost:

- Demonstrates a commitment to continuous cost reductions.
- Willing to work with you to perform value engineering for new and existing designs.
- Openly shares cost structures and pricing models.

3.4.2. Evaluation for Potential Suppliers

New features are being evaluated to update the vendor file with potential suppliers that the company intends to develop some future cooperation. Naturally, this evaluation is not based in fact, but it is often using information that is derived from various sources in many ways such as the valuation process or rating of potential suppliers and interest. Their cooperation with the shipping company is completed with the help of indicators and measurement procedures that constitute an integrated system supplier appraisal.

If the procurement operator can find a supplier that offers products or services that match or exceed the company's needs, those will be the most effective to work with. Before starting to select suppliers, the operator should nail down the needs and what needs to be achieved by buying rather than simply paying for the item's suppliers are looking to sell to the company. For instance, if the aim is to cut down on the time it takes to deliver goods onboard, suppliers that can offer faster delivery will be more important than those who compete on price alone.

Consider how many suppliers are really required. Purchasing from a carefully targeted group could provide several benefits. The company will become more important to the suppliers. It will be easier to address supply chain management and maintain supplier relationships. While exclusivity may lead to suppliers offering a better deal or service, others may be complacent and decrease their standards.

Suppliers of low value and less critical items are not required to have extensive reviews. The supply executive can end up with one reasonable choice after simply examining the information and values that are available at the vendor file, the vendors' website, or another source of information. The situation changes in the case of supplies of high value and of strategic importance. Many prospective suppliers are trying to increase their sales by securing orders that they are unable to implement effectively. This can be either because of the lack of capacity or the lack of sufficient supply sources for materials that they buy themselves. A business achieves its best while working with suppliers with the necessary capacity, knowledge, qualifications, and resources supply. Under these circumstances, evaluation becomes particularly important.

3.4.3. Bid evaluation.

On the surface, it may seem that choosing the right supplier involves simply looking at their price list. However, the supplier selection process is much more complex and making the wrong choice can have a detrimental effect on your company.

After determining exactly the requirements of the company's vessels and the procurement operator has identified some potential suppliers, building a shortlist of the vendors should be a priority. Some quite common questions to be considered are the following: Can these suppliers deliver what we need when we need it? Are these suppliers financially secure? How long have they been in business? Is there anyone in our network who has used them and can recommend them? Are they on any trade association approved supplier list? Doing a bit of research, will automatically narrow the list down to no more than three or four potential candidates. It is a waste of time for the operator and the potential supplier if approached when there is little or no chance of them fulfilling the requirements. It is of much importance to ask questions about supplier's quality standards or ask them to provide case studies to show how they have helped their other clients.

Suppliers are evaluated during selection tenders for the supply of a single item. Of course, if it has preceded the evaluation of potential bidders, the bidding process is achieved without compromising its credibility. Each shipping company maintains a supplier record that needs to be updated in a specific way. The performance of active suppliers must be continuously recorded with reliable indicators of direct relevance with supply strategies. Such evaluation systems are known as vendor rating systems.

3.4.4. Evaluation for Corporate Partnerships

Evaluation for partnerships with suppliers requires conducting extensive evaluations that are not limited to a simple evaluation of their capabilities, but it involves processes with continuity and feedback. More in particular, in corporate partnerships,

the supplier after the original evaluation, is usually required to apply various necessary changes to the procedures and organization, following relevant instructions from the procurement operators who are subsequently re-evaluated.

By agreeing on service levels before you start working together, the purchasing operator will know what to expect from the supplier and the last one will know what to expect from the company cooperating with. Purchasing from a limited number of suppliers, it will be easier in order to manage the supply base, and more than likely more cost-effective. This is especially the case with low value-added suppliers. However, having just a single supplier should never be considered as an option. It is always worth having an alternative supplier ready to help in difficult times. This is especially important when it comes to strategic suppliers providing mission-critical goods and services.

Throughout the period of corporate cooperation, goals of continuous improvement are set. The achievement is subject to regular review.

3.4.5. Evaluation responsibility

It is the responsibility of the general management to evaluate the appropriate sources of supply departments. Supply managers after analyzing the factors involved in choosing the sources of supply proceed directly in the decision-making process. In other cases, the evaluation is the result of collaborative work of a cross-sectional team. For example, in the case of complex production machinery the evaluation can be done by a team consisting of representatives of departments of operation, supply, safety and quality, technical and financial services.

It is necessary to know what you need and to not allow sales pictures that do not match the requirements your company has set. Understand the difference to your business between a strategic partner who provides services or goods that are essential to the company compared to non-strategic suppliers who provide low-value supplies. Spend more time selecting and managing the strategic suppliers compared to the ones providing your basic office supplies.

Even if the time is limited, the purchasing operator should manage to take a bit of extra time to ensure the decision made is the right one and not to pick the first supplier to save time because a mistake will end up costing more time and money in the future. It is important to think about the total cost during supplier's evaluation because a cheaper unit cost with an astronomical shipping cost takes away some of the value. It may be worth more to work with a supplier that is priced higher but offers better shipping rates.

3.4.6. Evaluation of existing suppliers

The category selection technique for existing suppliers is the commodity teams. In this case, the requirements are grouped into categories and common features (e.g., packaging materials, technology equipment- IT, raw materials) and constant groups

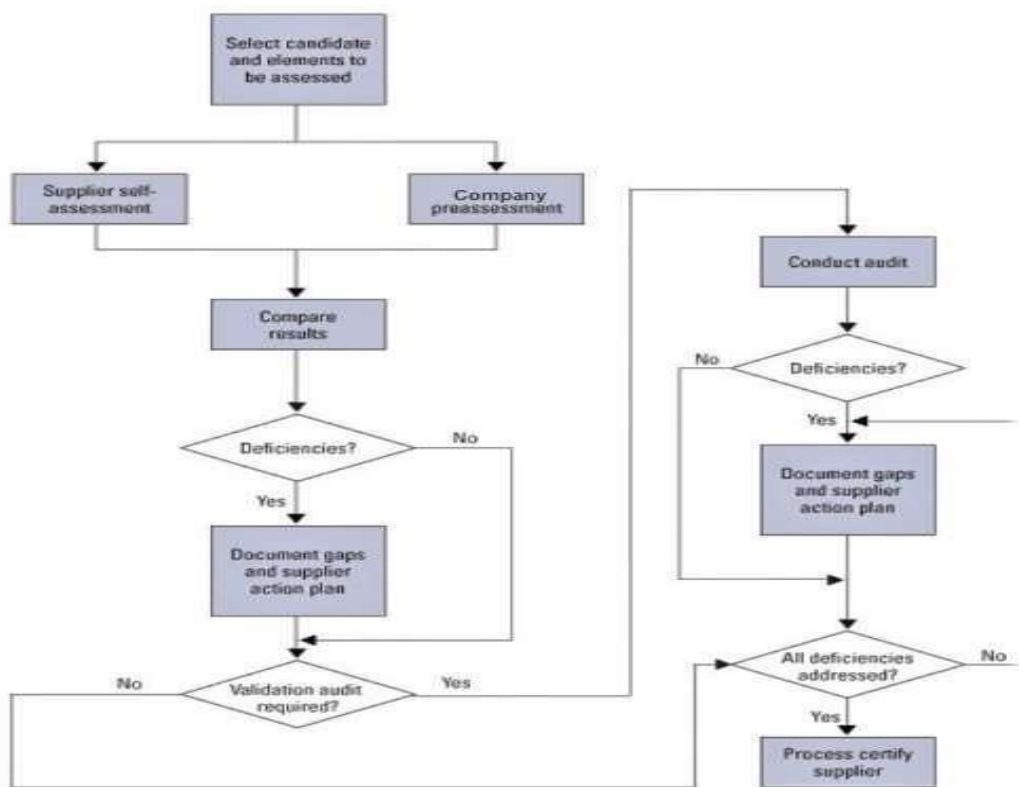
are created by key users and parts of quality, supply, programming, studies, and financial services, which have the responsibility of choosing, not to mention the general management of the respective categories.

When it comes to evaluating already existing suppliers the purchaser needs to look for Reliability, Supplier Quality, Value for the Money, Financial Security, Clear Communication upon Service and Partnership. The vendor can only be as reliable as the supplies delivered onboard. There may be some instances in which wrong supplies can be disregarded without noticing an issue, but we cannot always count on that being a possibility with every product or service. In addition, the suppliers need to provide consistent quality and while the lowest price may be tempting, it is not always the best value for the money. Not to mention that it is of much importance for some research to be done into ship chandler's history and financial stability. If the supplier does not have the necessary flow to deliver what vessel wants and when it is needed, then the result is inevitable. Consider running a credit check to reassure the company that they will not go out of business when they will be needed the most. At the same time existing suppliers need to be honest and provide to each purchasing operator plenty of warning if a situation arises, especially when they cannot deliver an order on time. The best suppliers will want to communicate with the company on a regular basis to find out if the vessel will call the port where they can deliver all needs at the earliest and the best quality. Ideally, these vendors will want a partnership approach. A strong relationship has benefits for both companies. To acknowledge how important the business is to them, so they make every effort to provide the best service possible.

In major markets, evaluation can include many stages by considering the crowd factors to assess the supplier's ability to supply as much and as good as requested and their degree of motivation for working with the shipping company. As mentioned above there are different types of evaluations which serve different purchasing activities. The definition of evaluation criteria is a critical stage of the whole process and it requires setting objectives for the evaluation and its implementation in an appropriate supply strategy. A business through its renewal record with suppliers may seek to reduce market prices for a category of species due to increased competition or reduction of its dependence on specific suppliers. Focusing on specific quality, availability, service and cost goals, weight of the respective evaluation criteria and the outcome of the selection will be provided.

3.5. Final selection

Once the market investigation is completed, the Procurement department has a list of potential suppliers. The most objective way to select the suppliers that the company will work with is to implement a system that is based on criteria and weightings, which are pre-selected and accepted by all parties involved in the department. It is well understood that the selection of criteria depends on the conditions and particularities of each business environment. However, all criteria relate to the following key areas of achievement goals for quality, price, and availability. Strategically thinking about each supplier in the network and investing the time to examine all available options, then the purchasing operation is set up for success.



Img.3 Supplier's network

With a manageable shortlist, approach the potential suppliers and send a request for quote or a request for proposal and if appropriate, a product sample. Ideally, giving to vendors a clear brief summary of what the purchaser's requirement is, how often will be needed, and what level of business needs to be provided, including the company's business objectives. Then, the operator who received quotations from all the potential suppliers, compared them in terms of what matters most to vessel's requirements. For instance, if the quality of the product or service is the most important and the location does not affect them straight away, the best option is for the highest quality affordable product. However, if their location is important because of delivery lead times, the operator may have to sacrifice a bit on quality. Therefore, it is important to determine the selection criteria ahead of time. Remember that while the price is important, it should not be the only reason to choose a supplier. Lower prices may indicate poor quality goods and services, which in the long run may end up costing more.

Be sure to check that the vendor chosen is the one that will be delivering the products. Some suppliers may outsource their work to subcontractors. If that is the case, the operator should also need to investigate the subcontractor to determine if this is a satisfactory arrangement.

If possible, an arrangement to meet potential suppliers face to face and to examine how their business operates would assist in the evaluation much more. Understanding how the vendor works will give a better sense of how it can benefit the company. After settling down the suppliers to work with, it's time to move into negotiating the terms and conditions and drawing up a contract with payment terms.

To create a network that is strong, reliable, and aligned with the shipping company's objectives, it would be much more efficient to create a supplier selection scorecard in order to identify the suitable suppliers and then rank the scorecard and the final step will be to negotiate and sign the contract. It is not uncommon for a purchaser to line up multiple suppliers for the same request of material, usually due to concerns about running out of stock or a desire to place suppliers against one another for price reductions. This is giving the way to work more closely with a smaller number of suppliers in longer-term, partnership-oriented arrangements.

4. CONCLUSION

The development in maritime over time has shown that there is a need by organizations to incorporate into their corporate policies purchasing strategy. Strategic involvement of purchasing for the overall aim of controlling prices, reducing costs, managing supply proactively, and improving quality to successfully deliver goods and services that will satisfy the end-customers and enable the organization to gain sustainable competitive advantage is essential. Purchasing department is gaining importance within the academia and the business environment. The need for reduction of costs, improvement of value-added into the business, better bottom line has led to the improved relevance of purchasing to the performance of a company. Purchasing has over the years developed from a non-strategic, transactional stage of procuring supplies to a strategic, integrated stage that focuses proactively on the total satisfaction of both internal and external customers of a company. Again, the change of purchasing to strategic purchasing, incorporating purchasing strategy into the corporate strategy, for achieving competitive advantage has changed the view of organization and has led to a rethink of the company's operation to decide the core competences and non-core competences and rather focus on the core ones and sources others from external sources. However, sourcing externally requires effective supplier relationship management. Purchasing in this aspect can select suppliers that will collaborate in meeting the organization's competitive strategy. Purchasing is also able to use tools and techniques like e-procurement and total cost of ownership approach along with their skills to manage purchasing costs and balance power and dependence between the company and supplier as well as work out strategies to use with different suppliers. Without giving a strategic importance to purchasing, a company's opportunities to gain competitive advantage may be missed.

On the surface, it may seem that choosing the right supplier involves simply looking at their price list. However, the supplier selection process is actually much more complex and making the wrong choice can have a detrimental effect on your organization. The supply chain is a critical part of business operations and if one part of that chain fails, the damage will only lead to problems. The supplier choice depends on a variety of factors such as quality, reliability, and value for the money. How a purchaser weighs each factor is based on its company's strategy and priorities.

The Purchasing and inventory management processes in a company are one of the determining factors that lead to a company's success. This is because purchasing and inventory management processes take the largest portion of a company's budget. If professionally managed, the company can obtain a recognizable growth and consequently, the ultimate development as dreamt by the founders.

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