

THE ROLE OF LOGISTICS SERVICE PROVIDERS IN INTERNATIONAL TRADE

Helga Pavlić Skender

University of Rijeka, Croatia

Faculty of Economics

E-mail: helga.pavlic.skender@efri.hr

Alen Host

University of Rijeka, Croatia

Faculty of Economics

E-mail: alen.host@efri.hr

Melisa Nuhanović

University of Rijeka, Croatia

Faculty of Economics

E-mail: melisa.nuhanovic@gmail.com

Abstract

Logistics service providers are an important factor in the business success of companies engaged in trade activities at national and international level. They play an important role in achieving competitive advantages of business entities directly involved in the buying and selling in international trade. The main objective of engaging logistics intermediaries, such as logistics service providers, is to facilitate the operation of companies that deal with the buying and selling at international level in regards to the organization of shipment and / or delivery of goods. As the business processes and business entities in international trade are becoming more complex, it is becoming increasingly difficult to manage all of the activities on one's own. Logistics intermediaries are, on the other hand, qualified to manage certain areas of business operations.

Logistics intermediaries come in different forms and under different names, but they all have the same goal: to provide help to companies in the transportation, storage, shipment and the distribution of goods from the seller to the buyer or the final consumer, of course, for a certain fee. This research revolves around logistics intermediaries in international trade such as international freight forwarders, 3PL, 4PL or LLP. The objective of this paper is to, based on the analysis of the different types of logistics intermediaries, their classification, functions, the ways they facilitate business operations for international companies, indicate the benefits of their engagement and the differences and similarities among them.

Key words: international trade, intermediaries, international freight forwarders, logistics service providers

1. INTRODUCTION

Logistics is one of the most essential parts in companies' operations whether at national or international level. Namely, it is becoming quite difficult to manage all of the activities now that the companies are becoming larger and larger on international scale. On the other hand, intermediaries are qualified to manage specific fields of the business and even though, intermediaries come in different forms and under different names around the globe, they all have the same main objective: to help the companies arrange the transport, warehousing, shipping, distribution of goods and services from the company to the end consumer. The main goal of hiring logistics intermediaries is to facilitate the companies' operations related to the shipment and / or delivery of goods whether nationally and internationally.

The aim of this paper is to analyse the different types of logistics service providers/intermediaries, the manners in which they are classified, their functions, the way in which they facilitate the business operations for international companies and most importantly, their influence the international trade. The goal of the paper is to analyse the most important logistics service providers/intermediaries and to clearly identify their tasks and goals.

In formulating and analysing the research problem, the authors used different combinations of scientific methods such as: the method of analysis and synthesis, the classification and comparative method, the method of induction and deduction and the method of description.

The paper is organized in five chapters. After the *Introduction*, the second chapter titled *The main characteristics of intermediaries in international trade* introduces the concept of intermediaries in international trade and their classification. In the third chapter, *Logistics intermediaries in international trade* focuses on and introduces logistics intermediaries i.e. freight forwarders, third-party logistics, fourth-party logistics and fifth-party logistics service providers whereas the fourth chapter provides for the *Differences and similarities between logistics service providers*. In *Conclusion*, the synthesis and explanation of the results of this research are given based on the collected information and data.

2. THE MAIN CHARACTERISTICS OF INTERMEDIARIES IN INTERNATIONAL TRADE

An intermediary is a person or a company that acts as a mediator between different parties with the goal of achieving a certain business deal. Most commonly, intermediaries specialize in one specific field among the various logistics functions. It should be noted that the terms describing this concept have varied during time i.e. these intermediaries were also known as middleman or as facilitators. Facilitators perform a huge number of different tasks and try to improve the overall efficiency of the logistics process.

2.1. The Concept of Intermediaries

Intermediaries are very useful in situations when buyers, sellers, importers and exporters or any other participants who have a need for the international exchange of goods and/or services cannot agree or reach a deal, and things get out of hand. The intermediaries then act as a certain type of link between them. Large companies that are taking part in international business mostly rely on some types of intermediaries. Companies usually start off by doing business on the domestic market and once they reach success and accumulate the needed experience, competence and confidence they decide to spread worldwide. Very few of these companies have the knowledge, expertise and experience to commit to all of the logistics tasks on such a big global scale. This is when intermediaries and facilitators come in help. Intermediaries come in different forms or may be called by different names; they perform similar tasks but in different ways around different countries (Gourdin, 2006, p. 215).

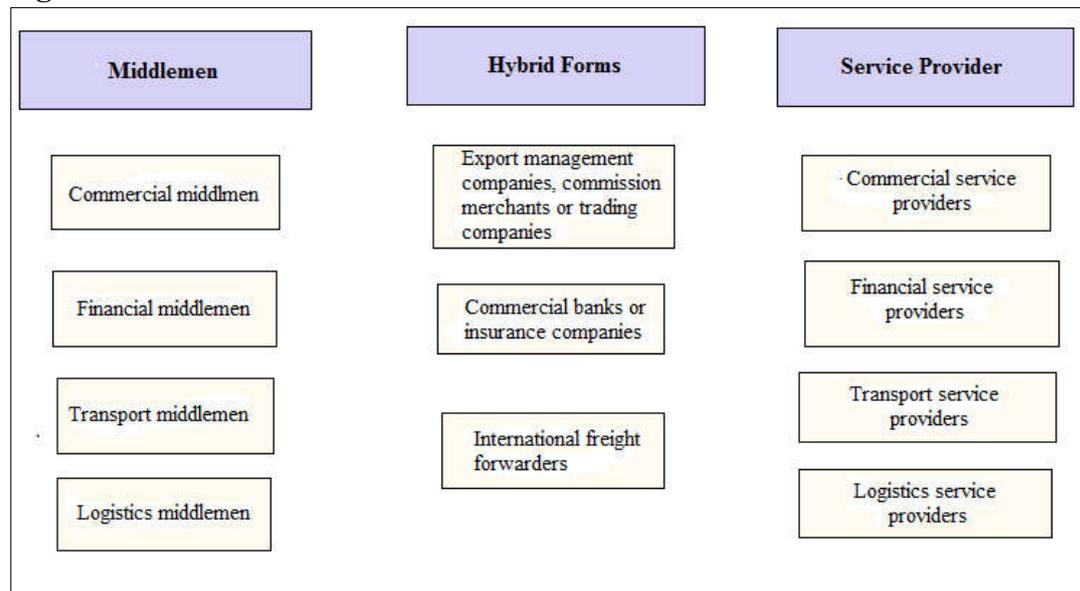
Logistics intermediaries are parties who on behalf of the companies arrange transportation, warehousing, shipping, distribution of goods and services from the producers to the final consumers. Logistics service providers (LSPs) add value to company's products. They have the expertise in performing shipping services whilst minimizing possible risks. LSPs have an important role in the company's supply chain because they dispose of all relevant information. Companies have to have confidence in their level of expertise. Once the terms middlemen and service providers have been introduced we can pass to making a distinction between different intermediaries.

2.2. Classification of Intermediaries

In the world of logistics processes, there are different classifications of logistics intermediaries. Many authors make a distinction between different types and forms of intermediaries (Schramm, 2012, Gourdin, 2006, Bloomberg et al., 2006, Waters, 2003, Hickson et al., 2008, Stefansson, 2006, Jensen, 2010). However, their classifications are almost always very similar and introduce similar roles.

The distinction between intermediaries is very important for the creation of the theoretical framework behind intermediaries. There are different types of intermediaries who have different objectives but one common goal – that of facilitating international trade of goods and services (Schramm, 2012, p. 147) Intermediaries are classified under three forms presented in the following figure.

Figure 1. Three forms of intermediaries



Source: Schramm, 2012, p. 147

According to Schramm (2012, p. 147) “*Middlemen* facilitate market transactions of goods and services as brokers or agents without holding stock or even taking title on them whereas *service providers* actually engage in these market transactions or offer means of handling, transporting, storing and warehousing of physical goods being transacted.”

K.N. Gourdin (2006, p. 215-216) introduces similar but still somewhat different forms of intermediaries into the logistics world. According to his classification, the most important intermediaries included in logistics processes are: international freight forwarders, non-vessel common operating carriers, export management companies, export trading companies, export packers and customs brokers.

The most significant intermediaries in international trade, from a logistics point of view, are transport and logistics middlemen and service providers, and international freight forwarders, which Schramm defines as a hybrid form, which represent a very important link in the supply chain.

As their name would suggest, transport middlemen and service providers take care of the physical movement of goods. Transport middlemen are grouped into agents (shipper’s agents for shippers, ship agents, shipping agents, IATA cargo agents) and brokers (transport brokers, ship brokers or air freight brokers), whereas, transport service providers, include trucking companies, railways, airlines and shipping companies i.e. those that actually perform the movement/transportation of goods (Schramm 2012, p. 152-153).

Logistics middlemen and service providers, unlike the transport ones, are responsible not just for the spatial movement of goods in time, but also for other related operations as well. According to Schramm (2012, p. 153) this category includes terminal operators (at seaports) and ground handlers (at airports), public or private warehouses as well as export packaging firms are also included here as they are responsible for adequate packaging and the arrangement of goods in containers

before their movement. Third-party logistics providers (3PLs) and fourth-party logistics providers (4PLs) integrate all of the above mentioned services.

On the other hand, we have international freight forwarders as a hybrid form of intermediaries as they do not just provide transport services, but also provide other logistics services, financial intermediation, etc.

3. LOGISTICS INTERMEDIARIES IN INTERNATIONAL TRADE

Intermediaries involved in logistics processes in international trade are an important link in each and every supply chain. This chapter presents the features of international freight forwarders, third-party logistics, fourth-party logistics and new party logistics, the fifth-party logistics.

3.1. International Freight Forwarders

International freight forwarders are one of the most common forms of intermediaries and are a very important link in international trade (Turner & Savitskie, 2008, Ramberg, 1998; Pavlić Skender, Grčić Fabić, 2013). Without a system of international freight forwarding, international trade and international transport could not function optimally. International freight forwarding is very important as it is incorporated in the distribution and exchange of goods thus connecting production and consumption, supply and demand (Zelenika et al., 2000, p. 1).

As they provide a wide range of services, it is rather complex to fully define them. Freight forwarders are an intermediary, organizing goods movements and providing other related services along a chain of transport and logistics operations (Schramm 2012, p. 9-10). They reduce the time and costs for their clients by finding solutions to the biggest complexities in international shipments and combining together many small shipments into a one large shipment. They actually take care of everything; selection of the mode of transport, the route, the payments, international shipping requirements and documentation. International freight forwarders are the most known and common type of logistics intermediary or facilitator. They appear in day-to-day logistics and freight forwarding business and their importance is negligible.

FIATA (International Federation of Freight Forwarders Associations) introduces a number of different functions related to freight forwarders. It defines freight forwarding services as “services of any kind relating to the carriage, consolidation, storage, handling, packing or distribution of the Goods as well as ancillary and advisory services in connection therewith, including but not limited to customs and fiscal matters, declaring the Goods for official purposes, procuring insurance of the Goods and collecting or procuring payment or documents relating to the Goods.” Later on, FIATA has expanded its definition on logistics services: “Freight Forwarding Services also include logistical services with modern information and communication technology in connection with the carriage, handling or storage of the Goods, and de facto total supply chain management. These services can be tailored to

meet the flexible application of the services provided.” (FIATA, 2016, FIATA Model Rules for Freight Forwarding Services)

It can be said that freight forwarders are the “architect of transport” (FIATA 2016). They book space on all transport modes; they may own some warehousing and transport assets; they are the custodians of cargo and they collaborate with its customers and carriers, etc. (Baluch, 2006).

It is quite interesting to mention some of the most important freight forwarders on the global scale. The first ten places are held by DHL Supply Chain & Global Forwarding, Kuehne + Nagel, DB Schenker Logistics, Nippon Express, Panalpina, Sinotrans, Expeditors, SDV, DSV and CEVA Logistics (Burnson, 2015).

The main task of the international freight forwarder is to release its client of the efforts and problems of shipping, transportation and delivery of goods in international trade. Many freight forwarders have expanded their volume of services and activities and they turned into logistics operators or integrators. Some of the freight forwarders started with a small volume of business doing a handful of activities, but today they offer complete logistics solutions. According to Schramm (2012, p. 32) “at least two new fields of activity added value to the traditional freight forwarding: an emerging segment of courier, express and parcel services and contract or third party logistics. The first grew from forwarder’s traditional services with a focus on small and standardized shipments. The second seems to be a natural extension to existing transport, handling and warehousing operations of freight forwarders that lead to contract or third party logistics provision.” It can be said that they have evolved into third-party logistics providers (3PLs), or even further: into fourth-party logistics providers (4PLs).

3.2. Third-party Logistics

Third-party logistics (3PL) mostly deal with basic logistics activities, and may be of huge help in developing a client’s supply chain. In this way, 3PLs are included in the client’s business. “3PL have a growing importance worldwide as they enable the provision of fast pace and varied services to companies from all sectors in order to encourage them to reduce costs, to focus on their core differentiating activities and, consequently, to allow them to achieve higher levels of performance” (Domingues et al., 2015).

Due to this, 3PLs are today the most often engaged type of intermediary. Third-party logistics service providers coordinate carriers, logistics intermediary firms, and other service suppliers. These service providers play the role of a middleman between the seller and the buyer, render transportation, warehousing services and engage in performing other services such as consolidation and deconsolidation; cross-docking; picking and packing; custom clearance; track and trace information; insurance services; payment services; tendering and contracting carriers; and forwarding services (Stefansson, 2006). 3PLs have similar duties as freight forwarders but are not limited to these.

According to the Terms and Glossary of Supply Chain Management (2008) third-party logistics provider is defined as a “firm which provides multiple logistics services for use by customers. Preferably, these services are integrated or ‘bundled’

together by the provider. These firms facilitate the movement of parts and materials from suppliers to manufacturers, and finished products from manufacturers to distributors and retailers. Among the services which they provide are transportation, warehousing, cross-docking, inventory management, packaging, and freight forwarding.”

Lieb and Bentz (2003, p. 24) argue that “the use of third-party logistics services is an important option to be considered by large manufacturers as they develop supply chain strategies. 3PL providers offer such companies a broad range of services, not only in the domestic marketplace, but in the international arena as well. The industry continues to evolve, and it is important to both 3PL providers and users of their services that industry dynamics be documented to facilitate the development of corporate supply chain strategy.” Tezuka (2011) in his paper propose a conceptual framework for evaluating 3PL utilization in supply chain management, “in which it is assumed that shippers may enjoy advantages derived from four contributory sources of 3PL specialization: scale, know-how, searching ability, and IT skills” and “that shippers may particularly benefit from 3PL when facing uncertain business environments”.

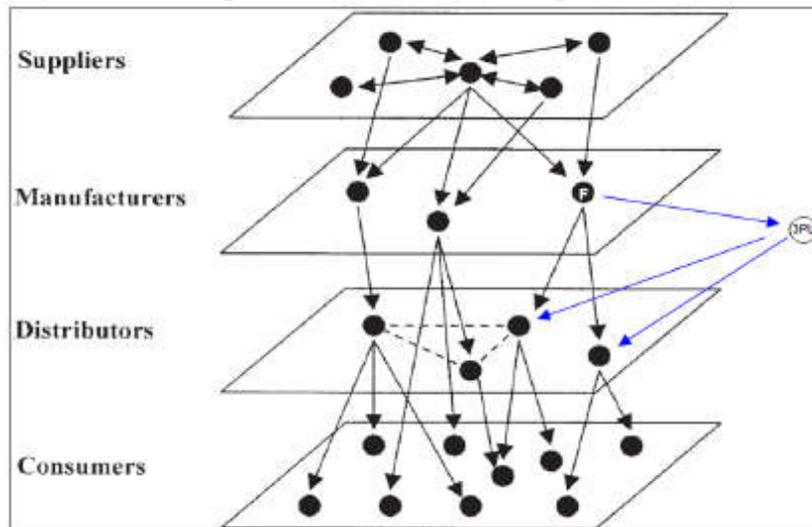
Berglund, van Laarhoven, Sharman and Wandel (1999, p. 59) define 3PLs as “activities carried out by a logistics service provider on behalf of a shipper and consisting of at least the management and execution of transportation and warehousing.” The same authors say that other activities such as inventory management, information related activities like tracking and tracing, value added activities, secondary assembly and installation of products may also be included in this list. Therefore, companies tend to use the services of 3PLS because they either lack the necessary knowledge, resources, experience and/or time.

They are of help to small companies, but also to those large. When it comes to smaller companies, they may help set up supply chain relationships and in case of large companies, they may take care of large quantities of goods that are sometimes quite hard to manage. The decision on which third party logistics provider to choose depends on different factors. Some of the factors driving the company's decision are costs, offered services, infrastructure and technology, network, location, former experience by other companies in regard to 3PLs' quality and expertise and the history of their business. Costs may be viewed as the most important factor, but it should not be the only factor. The cost of a certain 3PL may be low and cost-effective, but if the services are not of a good quality or if their technology is not up to date it is not very fortunate to opt for such a provider. It is also important that the logistics service provider has a great network of relationship with other companies /clients as it may serve as a proof of their expertise, knowledge (whether it is general, technological or legal), good communication and trust.

Logistics and freight forwarding are becoming ever more demanding and this is why there is a need for an improvement in services offered by 3PLs to clients. “In order to survive, 3PLs must provide value added services that comprise a significant portion of the customer's total logistics costs. Quality, value-added service is based on consistently providing customers with ever improving solutions to their supply chain needs.” (Baluch, 2006, p. 2).

3PLs are in close collaboration with the various links in the supply chain. The following figure shows the relationship network between 3PLs, suppliers, manufacturers, distributors and customers.

Figure 2. Third-party logistics relationships



Source: Camargo et al. 2012, p. 8

Suppliers offer goods and services to manufacturers for further processing. Once the manufacturer produces the goods, they are given to the distributor who distributes the products around the world to different customers. What is the role of third-party logistics provider in this example? Their main role is to receive the goods from manufacturers and organize all activities connected with delivering these goods to distributors. "If the 3PL is well connected in the market, has good and numerous relations with its pairs or is part of LSP associations, probably this company will be able to learn the best practices to improve its own business and, consequently, the role supply chain. The quality of the relationships (the strength of the tie) is important because is not always that a competitor will share its procedures and best practices to other companies" (Camargo et al., 2012, p. 9).

The services offered by 3PLs are constantly evolving and changing to meet new market conditions. The following table provides for a classification of 3PL services.

Table 1. 3PL services and activities

| Logistics function | Activities |
|---------------------------|--|
| Transportation | Shipping, forwarding, (de)consolidation, contract delivery, freight bill payment, household goods relocation, load tendering, brokering. |
| Warehousing | Storage, receiving, assembly, return goods, marking and labelling. |
| Inventory management | Forecasting, location analysis, network consulting, layout design. |
| Order processing | Order entry, fulfilment. |

| | |
|---------------------|--|
| Information systems | EDI/VANS, scheduling, artificial intelligence, expert systems. |
| Packaging | Design, recycling. |

Source: Sink et al., 1996, p. 41

In 2003, the top 10 global 3PL suppliers were: Excel Plc, Kuhne & Nagel, Schenker, DHL Danzas, P&O Nedlloyd, TPG&TNT, Panalpina, UPS, Nippon Express and C.H. Robinson Worldwide. As for 2013, ten years later, the first few global 3PL suppliers are presented with their most important logistics characteristics in the following table. These 3PL suppliers are listed according to their profit, i.e. gross logistics revenue from 2013.

Table 2. The Top 10 Global 3PL in 2013

| 3PL Provider | Million \$ | Main Logistics Services |
|--------------------------------------|------------|---|
| DHL Supply Chain & Global Forwarding | 31.432 | Number one in the efficient co-ordination and movement of freight worldwide. |
| Kuhne&Nagel | 22.587 | Strong market position lies in the sea freight, airfreight, contract logistics and overland businesses, with a clear focus on providing IT-based integrated logistics solutions. |
| DB Schenker Logistics | 19.732 | Supports industry and trade in the global exchange of goods: in land transport, worldwide air and ocean freight, contract logistics and supply chain management. |
| Nippon Express | 17.317 | Serves as your logistics consultant, providing one-stop business solutions that connect people and companies beyond national and regional boundaries, through diverse logistics modes, integrating land, air, and marine transport. |
| C.H. Robinson Worldwide | 12.752 | Helps companies simplify their global supply chains. Skilled logistics employees apply a deep knowledge of market conditions and proven processes to solve transportation problems. Integrated technology gathers data from all parts of the supply chain and provides full visibility to orders and costs. |
| CEVA Logistics | 8.517 | Providing end-to-end design, implementation and operational capabilities in freight forwarding, contract logistics, transportation management and distribution management. |
| DSV | 8.140 | Global supplier of transport and logistics solutions. |
| Sinotrans | 7.738 | China's leading domestic logistics company and offers a comprehensive range of fully-integrated services and solutions: integrated services including warehousing, order processing, long-haul |

| | | |
|------------------------|-------|--|
| | | transportation, local distribution, repacking, labelling, and other value-added services. |
| Panalpina | 7.293 | One of the world's leading providers of supply chain solutions. The company combines its core products of air freight, ocean freight, and logistics to deliver globally integrated, tailor-made end-to-end solutions. |
| SDV (Bollere Group) | 7.263 | They offer a full range of services and industry expertise. Their solutions match the complete logistics needs of importers and exporters, upstream and downstream of production: organizing transport, customs and regulatory compliance, logistics, industrial projects and supply chain services. |

Source: 2013 Top 50 Global & Domestic Third-Party Logistics Providers, 2014

All of them have differences and similarities in their operations. 3PL suppliers are mainly logistics consultants that try to accomplish business and supply chain solutions for their clients. It is necessary to say that the 3PL industry has developed as a result of the ever so demanding need for advanced logistics services.

3.3. Fourth-party Logistics

It may seem that there is not much of a difference between the third-party logistics providers and fourth-party logistics providers. But, many authors say that there are a lot of differences between them (Hickson et al, 2008, p. 10, Norall, 2013). In many cases, it is said that 4PLs are superior to 3PLs. While 3PLs are mainly responsible for the logistics operations and activities, 4PLs are also responsible for the development and maintenance of all of the logistics projects. 4PLs perform the same tasks as 3PLs but in a more strategic way. They are focused on the maintenance, improvement and management of the company's supply chain. "4PLs can be considered as asset-free logistics middlemen offering expertise for the establishment and control of complex logistics systems, including logistics consulting and the organization of information infrastructure, transport, logistics as well as financial services that are needed." (Schramm, 2012, p. 154).

The 4PLs differ from 3PLs in the following ways: "1) 4PL organization is often a separate entity established as a joint venture or long-term contract between a primary client and one or more partners; 2) 4PL organization acts as a single interface between the client and multiple logistics service providers; 3) All aspects (ideally) of the client's supply chain are managed by the 4PL organization; and, 4) It is possible for a major third-party logistics provider to form a 4PL organization within its existing structure" (Supply Chain Management, 2013).

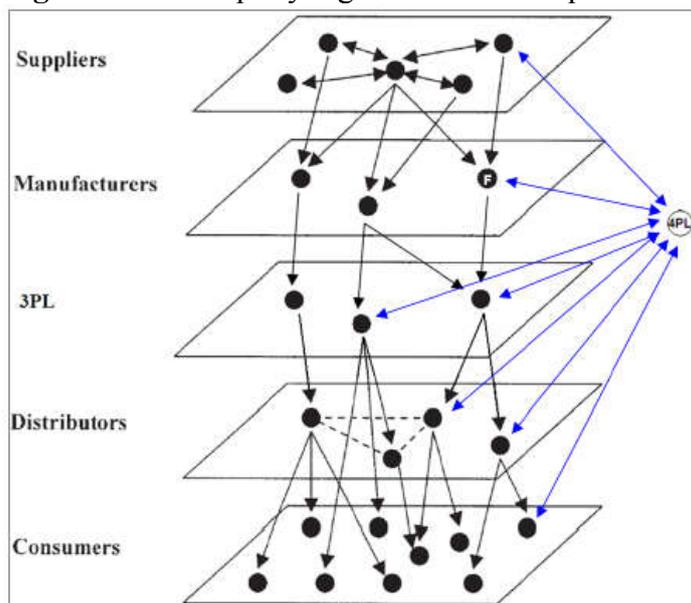
"The 4PL is a strategic activity which involves not only the management of a client's supply chain, but also the development and improvement of their supply chain strategy. 3PL service providers offer far more tactical services." (Hickson et al., 2008, p. 11). For example DHL, a well-known company explains 4PLs and their main

activities in the following way: “A successful 4PL provider is built upon a strong and effective partnership arrangement with customers to deliver value to their business, and encompass a whole range of skills and experience that they deploy to meet the needs. The services are: network analysis and design, consultancy, business planning, change management, project management, control tower and network management services, coordinating a wide supplier base across many modes and geographies, inventory planning and management, inbound, outbound and reverse logistics management.” (Fourth Party Logistics, 2016).

Opposed to 3PLs, 4PLs do not own physical assets. They possess extensive technological and knowledge-based assets and manage many other intermediaries that may be involved in the logistics process (Hickson et al., 2008, p. 11).

Fourth party logistics offer much more involvement, which may be a great advantage in comparison to other intermediaries. However, this may also mean that they have much more 'control' over company's business. This may in turn lead to loss of control, disagreement, loss of own expertise in fields performed by 4PLs and as these are usually long-term relationships they are hard to break. The following figure introduces the relationships of fourth party logistics providers with suppliers, manufacturers, 3PLs, distributors and customers.

Figure 2. Fourth-party logistics relationships



Source: Camargo et al. 2012, p. 11

As can be seen, when it comes to 4PLs, an additional layer – the 3PL is added between the manufacturer and distributor layer as its services are used by the 4PLs. The 4PL interacts with all of the layers as it provides and receives outputs from all involved in this network chain. The strongest tie in this network chain is evidently between the 4PL and the focal firm – the manufacturer (Camargo et al., 2012, p. 12) as it is the company that hired it. A company that finds a professional 4PL provider will certainly add value to its outputs regardless of the other actors involved in the

process. 4PL has the overall responsibility over the logistics process and has the ability to change the wrong direction of the company.

When talking about fourth party logistics, it is also important to mention that they are quite often termed as lead logistics provider (LLPs). According to Supply Chain Management (2013) and LLP is “an organization that organizes other third-party logistics partners for outsourcing of logistics functions. An LLP serves as the client's primary supply chain management provider, defining processes and managing the provision and integration of logistics services through its own organization and those of its subcontractors. The term was registered by Accenture as a trademark in 1996 and defined as ‘A supply chain integrator that assembles and manages there sources, capabilities, and technology of its own organization with those of complementary service providers to deliver a comprehensive supply chain solution.’”

According to Schramm (2012, p. 154) “the most advanced 4PLs are: (1) logistics management departments having the ability to offer their in house services to external clients, (2) transport integrators or postal services widening their range of value added services or so called (3) lead logistics providers (LLP’s), which are in effect, freight forwarders heavily engaged in dedicated contract logistics backed by heavy usage of modern information processing technology.”

3.4. Fifth-party Logistics

New trends in IT and overall international trade brought about a need for more developed service providers which lead to the emergence of the fifth-party logistics providers (5PLs). The 5PLs have not yet evolved so much in comparison to 3PLs and 4PLs, so the information on them is quite limited. Hickson, Wirth and Morales (2008, p. 12) write that the main focus of their work is on technology. They, like 4PLs, do not have physical assets, and are much more focused on technology in the supply chain management, i.e. on the strategic management of the supply chain. Fifth party logistics providers utilize new technology to manage the whole supply chain and logistics network. They organize and plan possible solutions in the logistics processes on behalf of the company by trying to find the appropriate technology. They cooperate with large companies whose networks are much more complex and aim to create an efficient environment. According to the Logistics Glossary (2016) a “fifth party logistic service provider develops and implements, preferably in close consultation with the client, the best possible supply chains or networks. Fifth party logistic is often linked to E-business.”

4. DIFFERENCES AND SIMILARITIES BETWEEN LOGISTICS SERVICE PROVIDERS

To summarize and compare the activities (offered services) of all logistics service providers presented above, the following table shows the main differences and similarities between freight forwarders, 3PLs, 4PLs and 5PLs.

Table 3. Differences between freight forwarders, 3PLs, 4PLs and 5PLs

| Intermediary | Freight forwarder | 3PL | 4PL | 5PL |
|---------------------|--|---|--|--|
| Typ of service | Tactical | Tactical | Strategic | Strategic – IT Supply Chain |
| Basic Idea | Arrange the transport and coordinate the movement of goods, prepare necessary paperwork, arrange storage and insurance | Performs multiple, or all, physical logistics functions on behalf of customer | Performs all supply chain functions for the customer; concerned with the management and improvement of the client's supply chain | Turns customer's supply chain into a function that is completely driven by technology |
| Resources | Usually owns few physical assets, knowledge and technology assets | May or may not own physical assets; mainly knowledge-based, technology for tracking shipments | Few physical assets, extensive knowledge and technology-based assets | Few physical assets, extensive knowledge and technology-based assets |
| Potential Benefits | Companies, especially smaller firms, who ship internationally, arrange most cost-efficient route for shipments | Companies who lack internal supply chain resources and knowledge | Companies with complex supply chains | Large companies with highly complex supply chains |
| Potential Drawbacks | Unknown | Focused more on moving freight than the management and efficiency of the supply chain | Loss of control and relationships with supply chain members, risk in long-term partnerships | Loss of control and relationship with supply chain members, risk in long-term partnerships |

Source: Hickson et al. (2008), p. 13.

A clear cut difference between freight forwarders and other parties may be the one given by Shay Scott, director of the Global Supply Chain Institute: “Third- and fourth-party logistics providers are always freight forwarders. But it’s never the other way around” (Burnson, 2011, p. 38).

According to Schramm (2012, p. 154), third party logistics along their general problem-solving activities also have the ability to adapt to the customers’ needs. Third-party logistics providers are, according to Schramm, separated in four subgroups: *standard third party logistics* - who offer highly standardised contracted logistics services, *service developers* – who offer dedicated logistics together with advanced value added services, *customer adapters* – take over their customer’s existing logistics facilities in order to run them as a subcontractor and *customer developers* - who take over their customers’ whole logistics operations. All of them are actually taking many types of logistics activities for their clients.

In order to survive, freight forwarders have to move and adjust their services according to the supply chain management needs. “The small forwarder who has not yet discovered a way to add value to the supply chain will be threatened by the entry

of other competitors into the market. The main difference between a traditional freight forwarder and an advanced logistics service provider is the value added services that they provide.” (Baluch, 2006, p. 3) The constant need to reduce the costs and at the same time increase efficiency has forced many freight forwarders to adjust their business activities and introduce new logistics functions and solutions.

Depending on the complexity of the supply chain, each company will decide which type of logistics provider is most suitable. It means the decision will be based on the scope of needed services. In this sense, Papadopoulou (2013, p. 66) suggests steps for the selection the most appropriate logistics provider, and specifically: to identify required services, to search for the type of logistics service provider providing the concerned and supplementary services, to study the role and basic features of each entity, to conduct a cost-benefit analysis, to decide on the most appropriate logistics partner, to evaluate the performance of the partnership, and to continue or break cooperation.

5. CONCLUSION

International companies are becoming more and more aware of the need to improve and adjust their supply chains to meet current market trends. As business processes are becoming more complex, it is becoming increasingly difficult to manage all of the activities on one’s own. Therefore, companies tend to engage intermediaries, such as logistics service providers, to facilitate their operations concerning logistics and supply chain management processes (e.g. transportation, storage, shipment and distribution of goods from the seller to the buyer or the final consumer etc.). The basic form of logistics service providers are freight forwarders, which have evolved during time providing more and more logistics services and thus adding value to the final product. These have become third-party logistics or even fourth-party logistics providers. IT development and new trends in international trade lead to the emergence of a newer form of logistics intermediary, the fifth-party logistics providers. However, the differences between these providers are not clear-cut and completely explained in literature and the business world.

Logistics service providers and intermediaries are an important actor in today’s business especially when it comes to international trade in which the delivery of goods has to be cost-effective, safe and in time. Logistics service providers are specialized in their field of business and have more experience in performing such tasks, as well as the needed expertise, knowledge and skills that focal companies (clients) do not possess.

By employing intermediaries i.e. by leaving logistical and transportation problems to be dealt by logistics providers, the companies have the chance to focus on their core business activities, save on capital investments, reduce their costs and risks and increase efficiency. Depending on the logistics needs, i.e. the complexity of the supply chain, each company will decide which type of logistics provider is most suitable. Their decision will be based on the scope of needed services i.e. whether it needs just the transportation and/or warehousing of goods (3PL or freight forwarder) or the entire supply chain design (4PL).

Therefore, there is a constant need to follow up on the new developments and trends in international trade and its influence on the development and emergence of new forms of intermediaries and the services they provide. Further research should thus focus on the analysis of the quantity and qualities of logistics services provided by different intermediaries, the cost-benefit analyses of their engagement into one's supply chain and provide guidelines for choosing the optimal service provider.

6. REFERENCES

- Baluch, I. (2006). The Changing Role of Freight Forwarders, [available at: www.elleryfreight.co.nz/files/links_sources/baluch_freightorward_role.pdf, access May 3, 2016]
- Berglund, M., van Laarhoven P., Sharman, G. & Wandel, S. (1999). Third-Party Logistics: Is There a Future? *The International Journal of Logistics Management*, 10(1), p. 59-70, [available at: <http://www.emeraldinsight.com/doi/abs/10.1108/09574099910805932>, access June 21, 2016]
- Bloomberg, D.J., LeMay, S. & Hanna, J.B. (2006). *Logistika*, Mate, Zagreb.
- Burnson, P. (2011). Freight Forwarding: Choosing the Best, *Logistics Management*, May [available at: <http://www.logisticsmgmt.com/>, access May 25, 2016]
- Burnson, P. (2015). Top 25 Freight Forwarders: Gaining momentum, *Logistics Management*, [available at: http://www.logisticsmgmt.com/article/top_25_freight_forwarders_gaining_momentum, access June 16, 2016]
- Camargo, J.J.B., Sacomano Neto, M., Ignácio Pires, S.R., da Silva, E.M., Vivaldini, M. & Correa, D.A. (2012). The Role of Logistics Services Providers in the Supply Chain Management: The Social Network Perspective', *2nd Congress Transformare 19-20 mars Paris*, [available at: <http://www.transformare.adm.br/anais/Joao-Batista-de-Camargo-Junior-et-al./The-role-of-logistics-services-provider.pdf>, access May 3, 2016]
- Domingues, M.L., Reis, V. & Macário, R. A. (2015). A Comprehensive Framework for Measuring Performance in a Third-party Logistics Provider, 18th Euro Working Group on Transportation, EWGT 2015, 14-16 July 2015, Delft, The Netherlands, *Transportation Research Procedia*, 10, p. 662 – 672, [available at: <http://www.sciencedirect.com/science/article/pii/S2352146515002070>, access June 20, 2016]
- FIATA (2016) Doc. CL04/06, 2004, [available at: http://www.fiata.com/uploads/media/CL0406_11.pdf, access June 15, 2016]
- FIATA Model Rules For Freight Forwarding Services, [available at: http://fiata.com/uploads/media/Model_Rules_07.pdf, access June 14, 2016]

Fourth Party Logistics (4PL) 2016, [available at: http://www.dhl.co.uk/en/logistics/supply_chain_solutions/fourth_party_logistics_4P_L.html], access June 18, 2016]

Gourdin, K.N. (2006). *Global Logistics Management – A Competitive Advantage for the 21st Century*, 2nd edition, Blackwell Publishing, Hoboken New Jersey.

Hickson, A., Wirth, B. & Morales, G. (2008). *Supply Chain Intermediaries Study*, University of Manitoba Transport Institute, [available at: [https://umanitoba.ca/faculties/management/ti/media/docs/scIntermediariesfinalwithcover\(1\).pdf](https://umanitoba.ca/faculties/management/ti/media/docs/scIntermediariesfinalwithcover(1).pdf)], access May 3, 2016]

Jensen, L.M. (2010). Opportunities and constraints for intermediaries in distribution: The challenge of variety, *The IMP Journal*, 4(3), p. 194-219, [available at: www.impjournal.org/getFile.php?id=365], access June 15, 2016]

Lieb, R.C. & Bentz, B.A. (2003) The Use of Third-Party Logistics Services by Large American Manufacturers: The 2003 Survey, *Transportation Journal*, 43(3), p. 24-33, [available at: https://www.jstor.org/stable/20713572?seq=1#page_scan_tab_contents], access June 22, 2016]

Logistics Glossary (2016). Fifth Party Logistic Model (5PL). [available at: <http://www.logisticsglossary.com/term/5pl/>], access June 14, 2016]

Norall, S. (2013). *3PL vs 4PL: What are these PLs, Anyway? Layers of Logistics Explained*, [available at: <http://cerasis.com/2013/08/08/3pl-vs-4pl/>], access June 22, 2016]

Pavlić Skender, H. & Grčić Fabić, M (2013). Logistički špediter u fokusu prometnog i gospodarskog sustava, *Pomorski zbornik* 47-48, p. 95-107.

Ramberg, J. (1998) Unification of the Law of International Freight Forwarding, [available at: <http://www.unidroit.org/english/publications/review/articles/1998-1-ramberg-e.pdf>], access June 14, 2016]

Schramm, H.J. (2012). *Freight Forwarder's Intermediary Role in Multimodal Transport Chains – A Social Network Approach*, Physica – Verlag, Springer Company, Vienna.

Sink, H.L., Langley, C.J. & Gibson, B.J. (1996). Buyer observations of the US Third-party logistics market, *International Journal of Physical Distribution & Logistics Management*, 26(3), p. 38-46, [available at: <http://www.emeraldinsight.com/doi/full/10.1108/09600039610115009>], access June 16, 2016]

Papadopoulou, E. M. (2013). Logistics Service Providers: Collaboration with IFFs, 3PL, or 4PL Providers? in Folinas, D. (Ed.), *Outsourcing Management for Supply Chain Operations and Logistics Services*, p. 52-77, Business Science Reference, Hershey.

Stefansson, G. (2006). Collaborative logistics management and the role of third-party service providers, *International Journal of Physical Distribution & Logistics Management*, 36(2), p. 76-92, [available at: <http://www.emeraldinsight.com/doi/pdfplus/10.1108/09600030610656413>, acces June 10, 2016]

Supply Chain Management (2013). Terms and Glossary, [available at: https://cscmp.org/sites/default/files/user_uploads/resources/downloads/glossary-2013.pdf , access June 14, 2016]

Tezuka, K. (2011). Rationale for utilizing 3PL in supply chain management: A shippers' economic perspective, *IATSS Research*, 35, p. 24–29, [available at: <http://www.sciencedirect.com/science/article/pii/S038611211000161>, access March 23, 2016]

Turner, W. & Savitskie, K. (2008). Freight Forwarding: Benefits and Implications for Managers, *The Icfai Journal of Supply Chain Management*, V(2), p. 58-67.

Zelenika, R., Pupovac, D. & Rudić, D. (2000). Špediter u funkciji logističkoga operatora, *Pomorski zbornik*, 38(1), p. 143-157, [available at: <http://hrcak.srce.hr/file/80167> , access May 3, 2016]

Waters, D. (2003). *Logistics: an Introduction to Supply Chain Management*, Palgrave Macmillan, New York.

2013 Top 50 Global & Domestic Third-Party Logistics Providers, (2014). [available at: http://www.supplychain247.com/article/2013_top_50_global_top_30_domestic_3pls , access June 16 , 2016]