



LOGISTIC SERVICE PROVIDERS AND SUSTAINABLE PHYSICAL DISTRIBUTION

Stef Weijers, Hans-Heinrich Glöckner, Reinder Pieters

HAN University of Applied Sciences, The Netherlands

ABSTRACT. Background: Logistic Service Providers main concern was to ensure reliability for a low price (Christopher, 2005). Dutch Logistic Service Providers still have these two aspects at the top of their list, but also have to take in a new aspect: sustainability. 88% Of the investigated Logistic Service Providers have included sustainability in the company's goals. These Logistic Service Providers have developed different strategies to achieve a higher level of sustainability. This paper presents the results of a study into what Logistic Service Providers say what they are doing, or intend to do, to improve sustainability for their transport services. In this way insight is given in the attitude of Dutch Logistic Service Providers towards sustainability and how they intend to translate this into business practise: internal solutions or new methods incorporating external partners.

Methods: Various methods of the investigations were used, among which the analysis of the statements about the sustainability on the websites of various companies as well as the questionnaire per Internet. The research covered 50 largest logistics companies operating in the Netherlands and 60 companies that competed for the award "Lean and Green" advertised in the Netherlands. In addition, the Internet survey was answered by 41 companies that belong to the network of our university.

Results: The investigation has shown that sustainability is handled by the logistics company as an integral part of the corporate strategy. In contrast, shippers depend in the choice of logistics services primarily on such classical aspects as the reliability or the price and the sustainability play a minor role.

Conclusions: Trying to find methods to improve the sustainability, Dutch logistics service providers, in the first place, look for solutions that increase the efficiency and therefore the cost reduction potential. Solutions, which require the involvement of clients, were less often implemented, although there is a willingness of the cooperation among other logistics service providers, to reduce the transport kilometers. There is very little willingness on the side of logistics service providers to involve clients into their environmental programs. Further researches on this topic are planned.

Key words: Logistic service providers, sustainability, strategy.

INTRODUCTION

Sustainability is becoming an important aspect for Logistic Service Providers anywhere. But how do the Logistic Service Provider and the shipper work together to make the chain more sustainable? This research investigates how (Dutch) Logistic Service Providers handle the practical aspects of sustainability in order to achieve a higher level of sustainability. Do they opt for internal solutions (e.g. fleet replacement or ensuring that their chauffeurs drive more environmentally friendly) or for external solutions (e.g. setting up new networks or improving the cooperation with shippers or business competitors)? Our assumption is that solutions involving external partners require more effort than internal solutions but are more constructive.

RESEARCH METHODOLOGY

To answer these questions this research focuses on the leading Dutch Logistic Service Providers, due to their size or because they are forerunners in making transportation more sustainable. The first group consists of the fifty largest Logistic Service Providers operating in the Netherlands and were found in the top 50 of 2011 (Dijkhuizen, 2011). The second group consists of 60 Logistic Service Providers who participated in the award scheme "lean and green" between 2008-2010 (website Connekt).

The first group covers those Logistic Service Providers who, due to their size, can be considered to dominate the Dutch market and the second group covers the frontrunners for sustainable freight transportation in the Netherlands. First the websites of these Logistics Service Providers were scrutinized for information on sustainability. If no information was found, specific questions were asked by email on their standpoint on sustainability. All emails were quickly responded and the answers provided covered the questions

These results were compared with the answers respondents have given to a web survey which was held to investigate Logistic Service Providers and their attitude on sustainability in 2010. A request to participate in this survey was sent to 82 Logistic Services Providers, who have connections with our University through work placements schemes etc. 61 Accepted this request and of these 41 successfully filled in the survey completely. There is an overlap between the three target groups: 22 of the top 50 also participated in the "lean and green" award and 9 of the top 50 were also respondents of the survey. The web survey contains 14 respondents who were also in the top 50 and 18 who participated in the lean and green award scheme. 12 participants were part of both lists at the same time. The results are what the Logistics Service Providers say what they are doing to increase sustainability; what they are actually doing will be the subject of a next research.

THE ECOLOGICAL IMPACT OF THE TRANSPORT SECTOR

What makes freight transportation services sustainable is altogether not clear. So it follows that what makes a Logistic Service Provider more sustainable is not clearly cut. This could be due to a lack of a generally accepted definition of sustainable transportation (Pezzey, 1997). The definition of the Brundtland Commission (World Commission, 1987) is often taken as the basis for a definition (Jeon and Amekudzi, 2005), but this is difficult to translate into hard, measurable facts. As most trucks still employ an implosion engine, it could be stated that every litre of gasoline used for transportation today will not be available for future generations. So the Brundtland based definitions fail to be realistic and usable (yet).

When discussing sustainable transportation, the attention focuses on reducing exhaust gases. The main exhaust gases are carbon dioxide (CO₂), sulphur dioxide (SO₂), nitrogen oxides (NO_x) and particulate matter (PM) (Francke, Annema and Wouters, 2009). There are more polluting exhaust gases concerning transportation like carbon monoxide (CO) and hydrocarbons (HC) (Meulen and Kindt, 2010), but these two gases were never mentioned on the research websites or by the respondents of the survey.

When discussing sustainable transportation, almost all attention in literature on sustainable freight transportation, (Dutch) government information on this subject and in the researched target groups is concentrated on CO₂ reduction. The other gases are hardly mentioned. As for the transport sector itself, just two Logistic Service Providers mention the four main gases, but do not show how they are trying to reduce all of them. As for this research, it was decided to follow this lead as well and to concentrate on CO₂.

In 2008, transportation is responsible for 21% of all CO₂ production within the Netherlands. The main part (79%) of this figure is taken up by road transport (private and freight). The remainder is divided amongst inland shipping (5%), air transportation (2%) and sea transport (14%). Within road

transport, freight transport has a share of 36% (Meulen and Kindt, 2010). These figures show that the Dutch freight transport sector does produce a considerable amount (6%) of CO₂ and that Dutch Logistic Service Providers should consider their responsibility to control, or even better lower, the amounts of CO₂ produced. This responsibility is certainly taken up by the transport sector. Within the top 50 41 (82%) Logistic Service Providers mention sustainability as one of their company's goals on their websites. Those who did not mention sustainability were contacted and asked if they could provide additional information. Three of them did reply and based on their information the number of Logistics Service Providers who endorse sustainability has risen to 43 (86%). This equals the results of the web survey. Here 36 respondents (88%) stated that they endorse sustainability. These numbers are high! It can be stated that sustainability has become one of the major aspects influencing Logistic Service Providers' behaviour. It also shows that within the transport sector sustainability is not a unique selling point anymore. It has become a common feature.

SUSTAINABILITY AND SHIPPERS

But how important is sustainability for the customers of Logistic Service Providers?

Table 1. Main selection criteria according to shippers
Tabela 1. Główne kryteria wyboru według przewoźników

Selection criteria	Weight price =100
Price	100
Reliability	94
Service	72
Sustainability	45
Innovation	33

A survey of Van der Meulen and Kindt (2010) amongst shippers found that they used certain criteria when selecting a Logistic Service Provider. The main criteria were price, reliability, service, sustainability and innovation. When asked to rank these criteria, the results were in favor of price with sustainability far below (see table 1). This choice is supported by literature which often states that the choice for a logistic aspect, such as transportation, is usually determined by two things:

1. effectiveness like speed and reliability and
2. efficiency (low cost) (Christopher, 2005, Visser, 2010).

The web survey gives a similar impression. 32 (78%) of the respondents say cost is the most important issue with transportation and 34 (83%) do not think that the customer is willing to pay for sustainability.

Simply put, the customer especially requires "more value for less money" (Dorp, Kempe and Commandeur, 1992 p 23). The question is whether in the current era this is still valid. There is a trend amongst (final) customers to demand a higher level of socially responsible behavior from the supply chain partners (Maloni and Brown, 2006).

The portfolio model of Kraljic (1983) can be used to understand the shipper's choice better. Kraljic determines an item purchased by four criteria, as shown in Table 2.

Transportation cost takes up 10% till 25% of the overall costs for a product (Goor and Ploos van Amstel, 2009). The higher this percentage, the more transportation will become a leverage item with price as the main determining factor. Reliability is a quality aspect and makes transport a strategic purchase item. Transportation is rarely seen as a bottleneck item. Only if a transport requires vehicles with very specific conditions, due to the size or weight of the transported item. So this aspect can be

ignored. For those shippers for whom transportation is not determined by these three aspects, nothing specific can be said.

Table 2. Purchasing transport service and the portfolio model of Kraljic
 Tabela 2. Model Kraljica port folio i usług transportowych

Kraljic's label	Main selection criteria	Decision
Leverage Items	Price	the product or service purchased determines the final price of the end product substantially. The purchaser will opt for the lowest cost.
Strategic Items	Quality	one specific aspect needs absolutely to be fulfilled by the item or service purchased.
Bottleneck Items	Availability	this product or service will not (always) be available. The purchaser will have to acquire potential sources for this product or service.
Non Critical Items	Nothing specific	As nothing specific determines this purchase, the purchaser's decision is not clearly cut.

Sustainability could make transportation more expensive (specific engines, new software may have to be bought etc.) or lengthen the delivery time (alternative modes for road transportation can take longer). Both aspects conflict with the two main aspects for transportation as seen by the shipper (Christopher, 2005). For sustainability to become an aspect of a strategic item some things will have to change:

- sustainability is enforced by government regulation;
- sustainability is set as a priority by the (final) customer or
- sustainability is taken to the top of the shipper's company values.

If nothing really will change, sustainability will just be a side aspect beside the main two criteria when drawing up Service Level Agreements (SLA) when selling or purchasing transport services.

AWARD SCHEMES

Hardly any specific information is to be derived from the information on the websites of the Top 50 on how the Logistic Service Providers want to achieve their goals on sustainability. What can be found are the networks or award programs in which they cooperate. Many awards programs have been set up to encourage and support sustainability within the transport sector. They offer the participants a chance to be compared to a standard and competitors. For customers and interested stakeholders an award scheme creates trust on the Logistic Service Provider's performance in the field of sustainability. The web survey found that 22 (54%) of the respondents believe award schemes form an essential part of the shipper's appreciation for Logistic Service Providers' level of sustainability.

For the transport sector, the website of the Environmental Forum registers 61 awards schemes for the UK alone. In the Dutch top 50, many Logistic Service Providers have joined international environmental award schemes like e.g.: Dow Jones Sustainability World and Europe Index (8%), World Business Council for Sustainable Development (14%) or United Nations Global Compact (24%). Other schemes which were mentioned are the FTSE4Good Global Index (2%), FLEXpledge (2%), Carbon Trust Standard (2%), Green Supply Chain Award (2%), Electronic Industry Citizenship Coalition (2%) and Responsible Care® (2%). Some awards are linked to specific industries. For example, the goal of Responsible Care® is to seek continuous improvement in health, safety and

environment of the chemical industry's stakeholders (website ICCA). Five companies (10%) have joined more than one international environmental award scheme. Taking this into account, there is a participation rate of 42% for the top 50 Logistic Service Providers for international environmental award schemes.

For the top 50 companies, the involvement rate in international environmental award schemes is for the numbers: 1-10 (90%); 11-20 (50%); 21-30 (40%); 31-40 (20%) and 41-50 (10%). It seems that award schemes are particularly interesting for the larger Logistic Service Providers. Looking at the national origin of the Logistic Service Provider 14 (74%) of the 19 Non-Dutch companies have joined an international award scheme compared to 7 (23%) of the 31 Dutch companies. Beside these award schemes, 14 Logistic Service Providers (28%) mention they have an ISO14001 certification. This should indicate an environmental awareness within the company.

In the Netherlands an interesting award scheme "lean and green" was introduced in 2008. This scheme focuses on shippers, transporters (1PL to 4PL) and city councils. Lean and green wants to encourage businesses to grow to a higher level of sustainability. They hold that becoming greener will reduce the environmental impact, while simultaneously saves cost. Since the introduction in 2008 the award scheme has gained popularity and 28 shippers, 59 Logistic Service Providers and 1 City council have joined the award scheme (April 2011). It is expected that this group will increase in time and it has the potential of becoming the leading standard for sustainable transportation in the Netherlands. Members have to write a plan, which contains precise CO₂ targets for 2012/2015 and determine green key performance indicators (website Connekt).

LOGISTIC SERVICE PROVIDERS AND SUSTAINABILITY

The websites of the top 50 companies were not very informative on how the Logistic Service Providers wanted to enhance sustainability. But all participants of the lean and green award scheme have to describe how they want to achieve their goals. The list of tools Logistic Service Providers intend to use include aspects like:

- "Het nieuwe rijden" (new driving style), a training for truck drivers to enhance awareness how driving (gear changing, braking, speed etc.) has an impact on the level of CO₂ production;
- Buying new and less polluting vehicles;
- Reducing energy consumption in warehouses;
- Controlling tire pressure;
- Monitoring driving speed;
- Using more alternative modes of transportation;
- Using more bio fuels;
- Improving loading capacity;
- Buying electric vehicles;
- Increasing efficiency;
- Reducing kilometers driven;
- Avoiding empty hauls
- Etc.

It is not surprising to see that Logistic Service Providers take a variety of approaches to reach sustainability. It is wise to identify and take these aspects which have the greatest impact on sustainability. These are unique to every Logistic Service Provider and its business (Szekely and Knirsch, 2005). So solutions for this aspect may also be expected to depend on the actual situation.

In order to get a better grasp on all these aspects, four categories were created:

- Internal approach - Aspects which can be organized by the Logistic Service Provider himself.
- External approach - Aspects which need cooperation with others outside the own organization (e.g. shippers, governments, competitors, stakeholders etc.).
- Innovating - Aspects previously unknown to the Logistic Service Provider.
- Optimizing - The Logistic Service Provider aims at improving and achieving better results.

With these four categories a two-by-two matrix can be constructed with the approach (internal or external) on the Y-axis and the X-axis whether the knowledge and skills already exist for improving the present situation (optimizing) or not (innovating). After categorising the approaches mentioned by the Logistic Service Providers in the lean and green award scheme the result as shown in figure 1 was achieved.

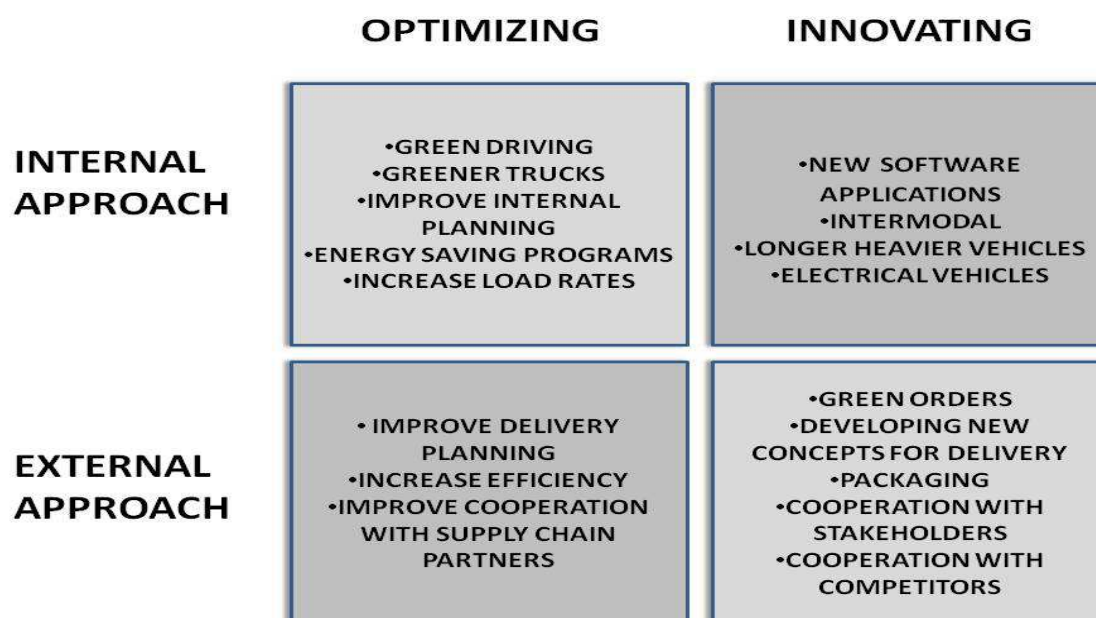


Fig. 1. Sustainability activity matrix
 Rys. 1. Macierz działań zrównoważonego rozwoju

This model could be made three dimensional by including an extra level with the aspects Structural and Incidental:

- Structural - The chosen method will be used for a long time and could be used for any situation.
- Incidental - The chosen method will be used just once.

This additional level could give a better insight into the question whether the Logistic Service Provider can use the experiences gained to improve other (similar) situations at a later date. It is our intention to interview the participants of the lean and green award scheme for the purpose of understanding where long term/multi applicable measures will differ from short time/one time measures.

When studying the intentions of the 60 Logistic Service Providers participating in the lean and green award scheme, it was found that most measures for improvement are sought within the own company. For example 58 (97%) participators use measures of an internal optimizing character and 29

(48%) mention measures of an internal innovative character. External measures are less popular. 22 (38%) intend to improve efficiency in cooperation programs. 8 (13%) Logistic Service Providers mention cooperation with shippers. These programs include ideas like:

- Awareness programs like informing shippers of the CO₂ footprint of their shipments;
- Discussing delivery time schedules;
- Bundling deliveries to avoid empty hauls.

14 (23%) Logistic Service Providers mention cooperation with other Logistic Service Providers by sharing delivery routes. 5 (8%) Logistic Service Providers mention separate programs for both shippers and competitors. No further details are given.

The remaining 5 (8%) Logistic Service Providers take the whole value chain into perspective. They specifically mention that they want to include all partners in the value chain in their new programs.

It can be concluded that most companies hope to find improvement inside their own company and seem less willing to include partners. Logistic Service Providers also seem to be reluctant to turn to fellow Logistic Service Providers for cooperation. Perhaps cooperation with fellow Logistic Service Providers is not always easy. For instance, a project in Leiden (the Netherlands) to build a central warehouse for city distribution failed due to the unwillingness of the Logistic Service Providers involved to work with competitors (Quak, 2008).

This reluctance for cooperation with shippers is also shown by the web survey. Here 23 (56%) of the respondents state that shippers will not make any concessions if this includes changing the time schedule of deliveries or the use of alternative modes of transportation. According to 31 (76%) of the respondents, the shipper will not make any concession on delivery speed. Apparently, Logistic Service Providers feel that sustainability on its own merit is not a decisive factor for shippers to choose for a specific Logistic Service Provider. The main selection criteria for shippers of transport services are definitely price and reliability. This could indicate that Logistics Service Providers have to come up with new ideas of how to make transportation more sustainable if they want to keep the interest of shippers.

The web survey also provides an interesting view on the ideas of cooperation amongst Logistic Service Providers. Asked if they would be willing to share rides with competitors, 27 (66%) of the respondents answered yes. A smaller group of 18 participants (44%) thinks that their competitors will be willing to cooperate with them. These figures could indicate that there is potential for cooperation between competitors in the transport sector. When split up into the function of the respondent, a difference between these two groups becomes apparent: 13 of the 14 general managers (93%) say they are willing to combine rides with competitors against 6 of the 14 (43%) respondents working on an operational level. Asked if competitors would be willing to cooperate with them to improve sustainability, 8 of the 14 general managers (57%) say yes as opposed to 4 of the 14 (29%) respondents working on an operational level. Apparently top management has a more positive view on cooperation with competitors than those working on an operational level.

CONCLUSIONS

Sustainability has definitely become an integral part of the mission and vision of the leading Dutch transport sector. But shippers do not treat sustainability on an equal footing as classic aspects like reliability and price. These two aspects still dominate the choice for a particular Logistic Service Provider.

Trying to search for ways of improving sustainability, (Dutch) Logistic Service Providers look primarily for schemes which increase efficiency of existing (internal) programs and therefore having the potential of lowering costs. Schemes which include outsiders are less popular, but there is a willingness for cooperation with fellow Logistic Service Providers in order to reduce kilometers transported by combining hauls. Logistic Service Providers seem reluctantly willing to include

customers in environmental programs, but the main underlying goal remains improving efficiency. None of these actions are tested on actual fulfillment, therefore further research is needed to investigate what the real actions of Logistic Service Providers are to promote sustainability and how these actions relate to Service Level Agreements and relationships with customers.

REFERENCES

- Baumann H., Tillman A. M., 2004, *The Hitch Hiker's Guide to LCA, An orientation in life cycle assessment methodology and application*, Studentlitteratur, Lund, Sweden.
- Christopher M., 2005, *Logistics and Supply Chain Management: Strategies for Reducing Cost and Improving Services* Prentice Hall 3rd ed.
- Connekt: www.duurzamelogistiek.nl (assessed April 20th, 2011)
- Dijkhuizen B., 2011, "Poster met Top 50 LDV-ers is online" dd 12 april 2011 www.logistiek.nl (assessed April 20th, 2011)
- Dorp B. van, Kempe A.P.M., Commandeur en H.R., 1992, *Strategisch marketingmanagement in de transportsector [Strategic marketing management in the transport sector]*, Deventer, Kluwer Bedrijfswetenschappen.
- Environmental Forum: www.environmentawards.net (assessed April 28th, 2011)
- Francke J., Annema J.A., Wouters P., 2009, *Zuinig met goed op weg: beleid voor efficiencyverbetering in het goederenwegvervoer [Care for goods on the road: policy for the improvement of efficiency in freight transport]*, Kennisinstituut voor Mobiliteitsbeleid, Ministry of Infrastructure and the Environment, The Hague.
- Goor A.R. Ploos van Amstel en W., 2009, *Distributie logistiek: werken vanuit ketenperspectief [Distribution Logistics: working from a chain perspective]*, 3de druk Noordhoff Uitgevers, Groningen.
- ICCA: www.icca-chem.org (assessed April 29th, 2011).
- Jeon C.M. Amekudzi A., 2005. *Addressing Sustainability in Transportation Systems: Definitions, Indicators and Metrics*. *ASCE Journal of Infrastructure Systems*, Vol. 11, No. 10, March 2005.
- Kraljic P., 1983, "Purchasing must become supply management", *Harvard Business Review*, p 109-117.
- Maloni M. J., Brown M. E ., 2006, "Corporate Social Responsibility in the Supply Chain: An Application in the Food Industry", in: *Journal of Business Ethics*, Vol. 68, No. 1, pp. 35-52.
- Meulen S.J., Kindt van der en M.R.J., 2010, *Duurzame logistiek: met welke verladerseisen worden logistieke dienstverleners geconfronteerd [Sustainable logistics: what are the demands for logistic service providers]*, ING, Amsterdam.
- Quak H.J., 2008, *Sustainability of urban Freight Transportation: retail distribution and local regulations in cities*, PhD. Erasmus University Rotterdam.
- Szekely F. and Knirsch M., 2005, "Responsible Leadership and Corporate Social Responsibility: Metrics for Sustainable Performance", *European Management Journal* 23:6, 628-647.
- United Nations, 1987, *The Brundlant Commission, Our Common Future (the World Commission on Environment and Development)*.
- Verweij K., 2011, "Top-100 ldv-ers 2010: Handle with Care" dd 9 april 2010 www.logistiek.nl (assessed April 20th, 2011).
- Visser L., 2010, *Thresholds in Logistics Collaboration Decisions: A Study in the Chemical Industry*. BOX Press Uitgeverij, Oosterwijk.

USŁUGODAWCY LOGISTYCZNI A ZRÓWNAŻONA DYSTRYBUCJA

STRESZCZENIE. Wstęp: Niezawodność oferowanych usług dostawczych przy niskich kosztach to główny cel, do którego dążą dostawcy usług logistycznych (Christopher, 2005). Jest to również główne przesłanie holenderskich dostawców usług logistycznych, jednak coraz częściej przywiązują oni większą wagę do zrównoważonego rozwoju swojej działalności. 88% z grupy dostawców usług logistycznych, objętych tymi badaniami, uznało zrównoważony rozwój za jeden ze swoich celów korporacyjnych. Firmy logistyczne wypracowały różne strategie zrównoważonego rozwoju. W pracy przedstawiono wyniki badań na temat integracji zrównoważonego rozwoju w strategię firmy w holenderskich firmach logistycznych, jak i aspekty ich praktycznego zastosowania.

Metody: W trakcie badań zastosowano różne metody, między innymi analizę oświadczeń dotyczących zrównoważonego rozwoju na stronach internetowych firm oraz wyniki ankiety przeprowadzonej przez Internet. Badaniem objęto 50 największych firm logistycznych działających w Holandii i 60 firm, które rywalizowały o nagrodę "Lean and Green" reklamowaną w Holandii. Ponadto, ankieta internetowa została wypełniona przez 41 firm, należących do sieci naszej uczelni.

Wyniki: Badania wykazały, że zrównoważony rozwój jest postrzegany przez firmy logistyczne jako integralna część strategii ich przedsiębiorstwa. W przeciwieństwie do tych przedsiębiorstw, odbiorcy ich usług, w wyborze usług logistycznych kierowali się głównie klasycznymi aspektami, takimi jak niezawodność i stabilność cen, natomiast fakt przyjęcia jako strategii firmy zrównoważonego rozwoju odgrywał przy tym wyborze mniejszą rolę.

Wnioski: Próbuąc znaleźć sposoby szerszego wdrożenia rozwoju zrównoważonego, holenderscy usługodawcy logistyczni zwracają uwagę przede wszystkim na rozwiązania zwiększające ich efektywność jak i ich potencjał redukcji kosztów. Realizowane są przede wszystkim rozwiązania wymagające mniejszego zaangażowania klienta, choć jednocześnie istnieje chęć współpracy z innymi firmami logistycznymi w celu zmniejszenia kilometrów realizowanego transportu. Jeszcze mniej wydają się dostawcy usług logistycznych być skłonni do włączenia klientów do swoich programów ochrony środowiska. Planuje się dalsze badania w tym obszarze.

Słowa kluczowe: dostawca usług logistycznych, rozwój zrównoważony, strategia.

LOGISTIKDIENSTLEISTER UND NACHHALTIGE DISTRIBUTION

ZUSAMMENFASSUNG. Einleitung: Das Hauptziel von Logistikdienstleistern ist es, Lieferzuverlässigkeit zu niedrigen Preisen zu bieten (Christopher, 2005). Auch bei den niederländischen Logistikdienstleistern rangieren beide Aspekte ganz oben, aber mehr und mehr berücksichtigen sie einen weiteren Gesichtspunkt: Nachhaltigkeit. 88 % der untersuchten Logistikdienstleister hat Nachhaltigkeit in die Unternehmensziele integriert. Die Logistikunternehmen haben verschiedene Strategien entwickelt, um Nachhaltigkeit praktisch umzusetzen. Dieser Artikel zeigt die Resultate einer Untersuchung zur Integration von Nachhaltigkeit in die Unternehmensstrategie bei niederländischen Logistikunternehmen sowie Aspekte ihrer praktischen Umsetzung.

Methoden: Zur Untersuchung wurden verschiedene Methoden angewendet, worunter die Analyse der Aussagen zur Nachhaltigkeit auf den Websites der Unternehmen und eine Befragung per Internet. Einbezogen wurden die 50 größten Logistikunternehmen, die in den Niederlanden tätig sind, und 60 Unternehmen, die sich um den Award "Lean and Green" in den Niederlanden beworben haben. Daneben wurde die Internetbefragung durch 41 Unternehmen beantwortet, die zum Netzwerk unserer Hochschule gehören.

Ergebnisse: Die Untersuchung hat gezeigt, dass Nachhaltigkeit von den Logistikunternehmen als ein integraler Bestandteil der Unternehmensstrategie behandelt wird. Dagegen orientieren sich Verlager bei der Wahl des Logistikdienstleister vor allem auf die klassischen Aspekte wie Zuverlässigkeit und Preis und spielt Nachhaltigkeit hierbei weniger eine Rolle.

Fazit: Bei dem Versuch, Wege zur Verbesserung der Nachhaltigkeit zu finden, schauen niederländische Logistikdienstleister in erster Linie nach Lösungen, die die Effizienz und damit das Kostensenkungspotential erhöhen. Lösungen mit Einbeziehung der Auftraggeber werden weniger realisiert, wobei es aber eine Bereitschaft zur Zusammenarbeit mit anderen Logistikunternehmen gibt, um durch die Kombination von Transporten Kilometer zu reduzieren. Noch weniger scheinen Logistikdienstleister bereit zu sein, Kunden in ihre Umweltprogramme einzubeziehen. Weitere Untersuchungen zu diesem Thema sind geplant.

Codewörter: Logistikdienstleister, Nachhaltigkeit, Strategie

Professor Stef Weijers
HAN University of Applied Sciences, Hogeschool van Arnhem en Nijmegen
Kapittelweg 33
6503 Nijmegen, The Netherlands
phone: +31(0)2691705
e-mail: HansHeinrich.Gloekner@han.nl
