THE LOGISTICAL APPROACH OF PUBLIC EDUCATION

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Abstract. The basic goal of logistical work tasks, processes, mechanisms is to totally satisfy the needs of the partners (customers) in the competitive environment of supply – which is present in the field of education as well. This goal must be the same in public education as well. Nowadays, logistics can be found in every domain of our life and its importance is constantly growing. In our accelerated, globalized world, the logistical way of thinking and the logistical-minded work have become the organizing tools of our life.
The starting focus of the research is the fact that the diverse logistical activities and tasks, as well as the logistical functions and processes based on them, aim at reaching a business goal. This applies both in the competitive sector, and also in public education. In this case, the business goal can be interpreted in a special way, and it is differentiated in the aspect of the different actors of public education. The final objective is to achieve the pedagogic and educational goal. The aim of the study is to draft where the take-off points are in the operation of public education through a logistical approach. The results of the study create the basis for the operation of public education through a logistical approach, as well as for the harmonization of its processes. The result of the research provides a general idea about how the logistical approach prevails in the processes, functional units and hierarchic levels of public educational institutions in Hungary.

JEL Classification: M30, M31, M37, M38, M39

Keywords: elementary school, logistical processes, the logistical way of thinking, public education.

1. Introduction

Firms can reorganize and modernize the execution of logistical tasks and processes in order to increase their competitiveness. In a fast-changing and hardly predictable economical environment, knowledge sharing, lifelong learning, continuous development and updating – along with the retention of values - are essential for every institution, including public educational institutions too. There are very few studies to read on logistics-oriented education or the logistics-oriented approach to educational

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processes, one of them is Sokolova (2011). However, the relationship between public education and logistics is an area to be researched, and the quantity of reference literature is limited.

The study rests on two pillars:

- on the one hand, the theoretical part of the study presents comprehensively the logistical approach of the competitive sector, thus pointing out the items in the research which are shared by the logistical system of the competitive sector and that of public education;
- on the other hand, it reveals the logistical working methods (in connection with the issue) of the examined elementary school, with the help of structured interviews and a case study based on the interviews.

During the research, mainly the terms public education, public educational system, public educational institution, elementary school, logistics, logistical approach, supply chain are used. These terms will be defined in the following:

- *Public education:* (2) „Public education is a public service, which provides the conditions of the long-term development of the Hungarian society, in favour of the growing up generation, and of which the general framework and guarantee is provided by the state. Knowledge, justice, order, liberty, fairness, moral and intellectual values of solidarity, equal treatment, tutoring for sustainable development and healthy lifestyle determine the whole of public education. Public education collectively serves the common wealth and the personal goals respecting others' rights." 3. § (1) „The child, the student, the teacher and the parent stand in the centre of public education, whose obligations and rights create a whole" (CXC law of 2011).
- *Public educational institution:* A public educational institution can be established and maintained by the state, by a nationality's municipality (within the framework of this law), by a church (registered according to the law about the freedom of liberty of conscience and religious freedom and the law about the legal status of churches, communions and religious communities), or its internal religious person (both in the following: church legal personality), and by any other person or organization if they acquired the right to perform the activity according to the conditions cited in the statute. A nursery school can be established and maintained by a settlement's municipality (CXC law of 2011).
- *Elementary school:* „10. § In an elementary school, education is carried out in eight grades, according to nationally unified requirements. The elementary school prepares the student for secondary school by their interests, abilities and talent" (CXC law of 2011).
- *Logistics:* „Logistics is the planning, realizing and controlling process of the efficient and cost-effective flow of input materials, semi-manufactured goods, end products and the related information from the provenance to the site of use, all with the aim to satisfy consumer needs" (Szegedi, 1998).
- *Logistical Approach:* can be described with various characteristics: the overall cost approach, system approach, flow orientation, the aim to reach high standard consumer service and cross sectional functions.

Now, we are going to review the most important literature that is in connection with our topic.

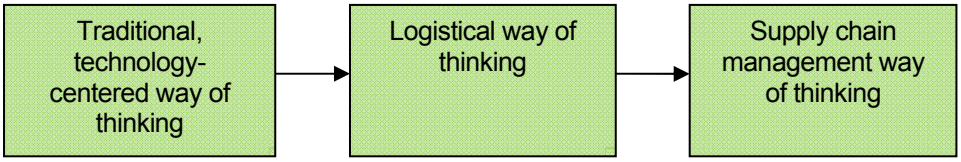
2. Review of the literature

In the course of reviewing the related literature, those items of professional literature were presented that show the logistical and supply chain management in public education and that are essential for this study.
The starting point of our study comes from the domain of supply chain management, as it analyses logistics and logistical processes – comprising the field of research - from a " bird's-eye perspective ".
The 7R definition of logistics defines logistics through the seven „rights". According to this theory, the task of logistics is the disposition of: the right product, in the right quality, in the right condition, at the right place, at the right time, to the right customer, at the right cost.

These rights appear not only in the field of logistics but in the field of human resource management as well (Pató, 2015; Pató, 2014b; Garbacanová; 2012; Pató, 2013). It is important to define the differences between the traditional, technology-centred and the logistical way of thinking (Table 1). The differences between these two are the following:

1. "It widens the borders of the system and it views processes on a system-level. It tries to focus on processes beyond the limits of the firm's legal borders, and tries to take the whole logistical chain into consideration.
2. Consequently, it takes notice of the conflicts in costs and the synergical effects of sub-systems.
3. Communication between the subsystems becomes essential.
4. It demands the application of up-to-date technologies.
5. "Resulting from the world trade competition, the importance of indirect economic factors in connection with market judgement (quality, reliability, services) is increasing" (Kovács, 1998)

Table 1: **Broadening the borders of the traditional, technology-centred way of thinking**



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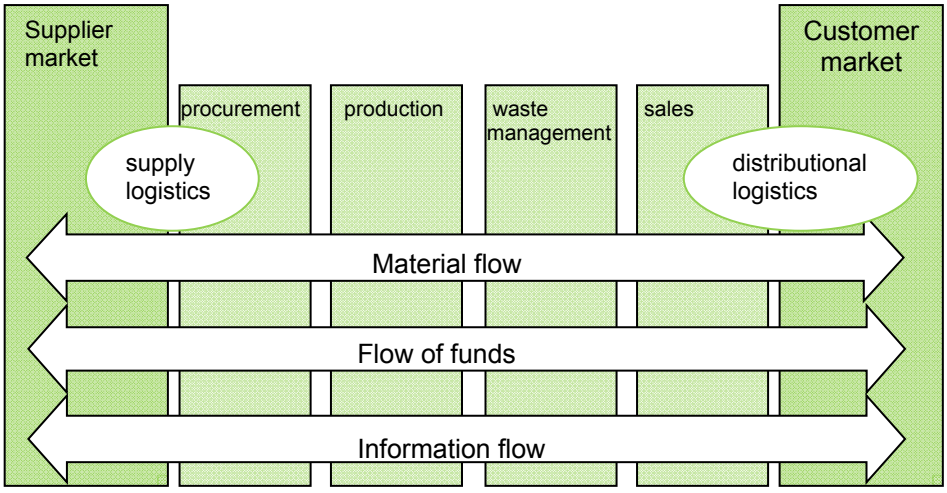
Nowadays, the logistical way of thinking is extending its borders, leading to supply chains (Erturgut and Soysekerci, 2011; Erturgut, 2012; Cetinkaya et al, 2011, Scott; 2011; Monczka, 2010; Christopher, 2005), which can be noticed in public education as well. The cornerstones of the creation of supply chains are confidence, modern information technology and risk-sharing.

The interpretation of the term “supply chain” is inevitable for the presentation of the logistical point of view. It is inevitable, as the actors of the economy try to gain competitive advantage through cooperating (in supply chains) with their suppliers and clients, along with exploiting their own factors of competitiveness. Therefore, they are intent on broadening the boundaries of the system.

The definitions of the supply chain (SC) and supply chain management (SCM) show a broad picture. We define the supply chain in this study according to Ballou (2004). According to Ballou (2004), the supply chain comprises every activity that passes and transforms products and services to the final consumer, along with the information flow that accompanies these processes (Ballou, 2004 in Pettersson-Segerstedt, 2013).

Table 2. ***The cross-sectional function of logistics***



Source: based on Prezenszki, 1999

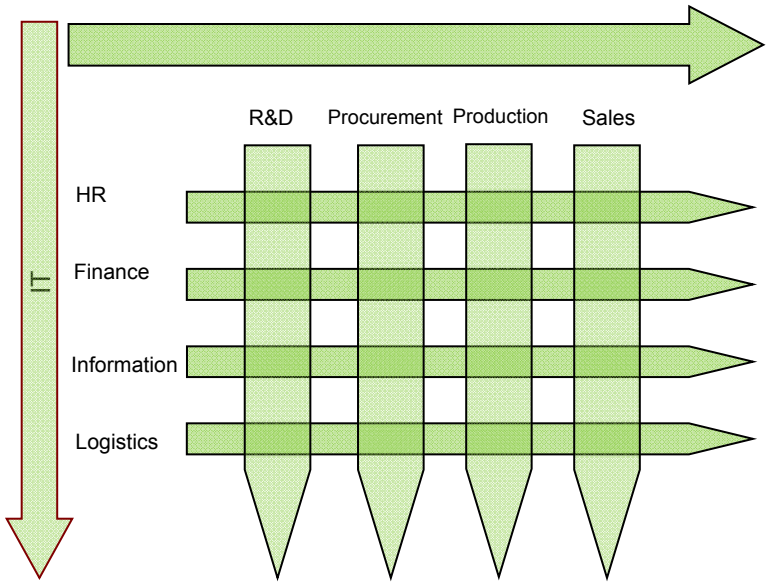
IT back-up is indispensable to the proper functioning of supply chains. Successful supply chains can only work well if the adequate information is available. If we analyse the information supply of supply chains, first we have to examine in which functional units real time information is needed. (Table 2)These fields are procurement, input material supply, goods distribution, inventory management, stock management, transportation, forwarding, order processing and communication (Arnolds, et al, 2013; Knight, 2014; Caniels, 2005; Ruston, 2010).

Informational systems will assure the necessary IT support for information forwarding. „The aim of an informational system is to connect the user with the matching information source the user really needs, so the user will be able to reach the information satisfying their needs” (Burt, 2012 in Sasvári, 2012).

Corporate logistics derives from the interlocking of the horizontal and the vertical set-up of the company.

It can be seen on the third image that information travels through all the functional logistical units and all the hierarchic levels.

Table 3. ***The cross-sectional function of logistics***



Source: Pfohl, 1996

The cross-sectional functions of logistics are to be interpreted as the connection between the various fields (R&D, procurement, production, sales) of the enterprise. (Table 3) The smooth running of these functions requires integrative approach and the development of appropriate procurement (Knight et al., 2014; Sartor, et al, 2013).

The integrating view and role of logistics should be underlined as the total cost approach The dynamic flow of material and information can be derived from this role. However, the total cost approach and the seamless flow of information is not only to prevail, at the level of an organization but in the entire supply chain. (Ellegaard- Koch, 2012; Esposito- Passaro, 2013; Hartmann et al, 2011; Spina et al, 2013; Costantino et al, 2012) Nevertheless, sustainability plays an increasingly important role in the logistics chain and supply chain management (Giunipero et al. 2012; Schneider- Wallenburg, 2012).

All the fields of logistics have to be arranged to a clear connection network through the information flow among the fields. It is based on trust-based information sharing in supply chains (Lotfi et al., 2013). If there is no cooperation between the fields of the enterprise, we can speak of „territorial egoism" or concurrence, which can lead to the scattering and fragmentation of logistic activities. This can cause the decrease in efficiency and competitiveness on the scale of the enterprise.

3. Methodological considerations

The search has to be carried out in the field of revealing research. Although the knowledge and literature concerning the field of the study is available, it is not from the public educational aspect.

Information was gathered through primary information collection in the course of the research. The case studies based on the interviews were prepared by application of different methodologies collaterally and intertwined, so that they can serve the realization of research objectives together. The interviews were perfectly complemented by the methodology of observation as well. The interviews, the results of observation and the document analysis were presented in the form of a case study.

It was an important point in the choice of the test sample that we should be able to map the majority of the processes in connection with logistics in the examined public education institution. That is why an institution that allows this became the centre of the research. The research goal itself was to focus on an institution where the presence or identification of the logistical way of thinking is not obvious, ordinary "and straightforward". This was evidently identifiable in the case of primary schools among the Hungarian public educational institutions, which is why this type of school has been chosen as the research focus. Simultaneously, the characteristic logistical way of thinking in Hungarian primary schools can also be shown on the test sample.

Structured personal interviews were carried out, where some meetings had to be repeated in order to make some data clear.

The interviews were conducted with the Director of the Veszprém School District and the deputy headmaster of the primary school examined. In order to clarify the results, one meeting with the school district director and six meetings with the deputy headmaster were necessary. 45 institutions belong to the school district, the school district maintains 45, operates 18, takes part in the professional management in 11 of these institutions. There are schools where the school district is responsible not only for maintenance but operation as well.

The examined primary school is one of the renowned, prestigious schools in Veszprém (Hungary). It employs 32 teachers, one teacher assistant, one IT administrator and one school secretary. The school headmaster, the deputy headmasters and heads of departments are concerned in the management of different hierarchical levels.

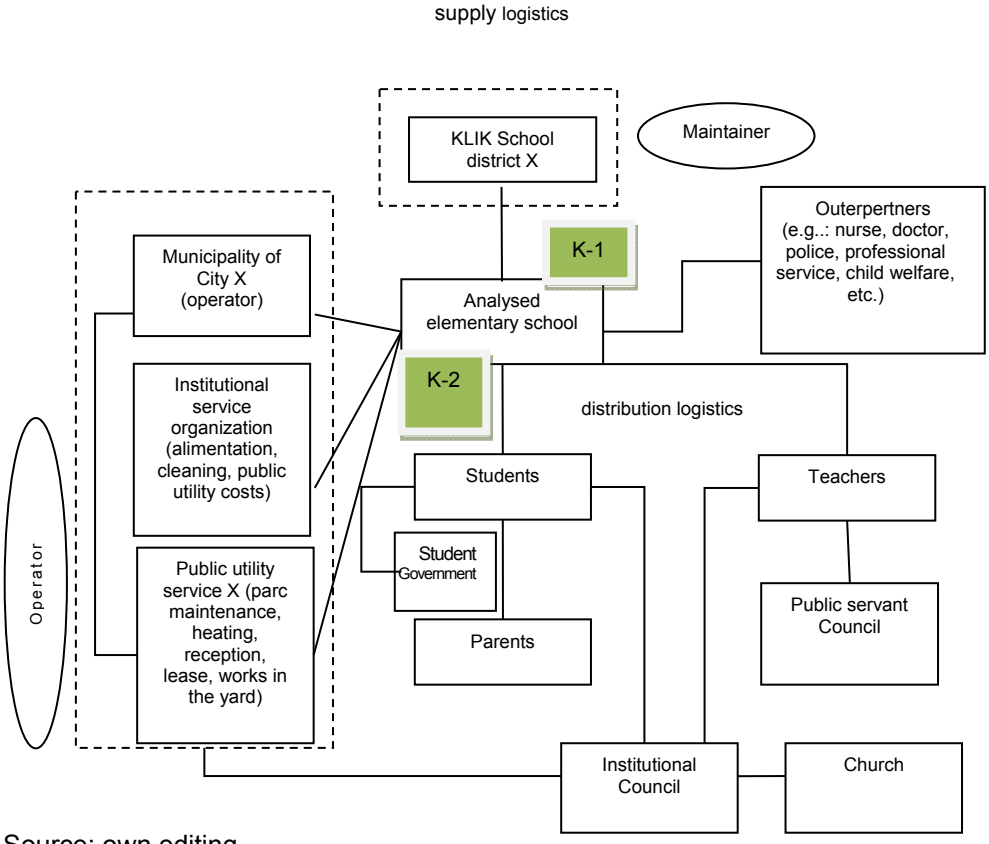
The interviews were conducted along the interview questions in Appendix 1. This paper does not address the presentation of all the information and results obtained from the interview questions. Secondary sources were also important in the study, along with primary information collection. That's why the SZMSZ (abbreviation for Szervezeti és Működési Szabályzat (meaning: Institutional and Operational Rules

ROO) and school policy of the concerned public educational institution were examined via the institutional papers handed over and via websites as well. The observation was carried out during a practice program at the school.

The point of departure was based on Pató's (2014a) idea, that a research model is designed to provide perspicuity of the understanding of the research problem and field for the user. "The aim of creating the model is to see through and not to lose data, from which important information can be extracted. This model is especially significant, in the early period of research, when the negligence of important factors can eventuate that the research has to be repeated" (Pató, 2014a).

So this research model (Table 4) serves to show the connections of the research:

Table 4: ***Research model***



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The research question:

K-1. What kind of comparison can be seen between the functional units of public education (the examined elementary school) and the functional units of logistics of the competitive sector? How can this appear in logistical thinking?
What kind of structure do the functional units of public education form and these are in what kind of relationship are these with logistical thinking?

Presentation of the examined institution:

The headmaster manages the school and is personally liable for management. The most important assistants of the headmaster are the two deputy headmasters. The heads of the form teachers, the head of the day-care teachers, the head of the maths and literature teachers, the teachers helping the work of the student government, the institutional council and the public servant council all take part in bringing about the most important institutional decisions. The headmaster makes the final decisions, keeping in mind the laws and the authoritative measures, and the headmaster is responsible for the execution and supervision of these decisions. Before deciding, the headmaster, as a democratic leader, asks for the opinion of the teacher's board, the organizations concerned, the parents and the students, thus helping thinking together.

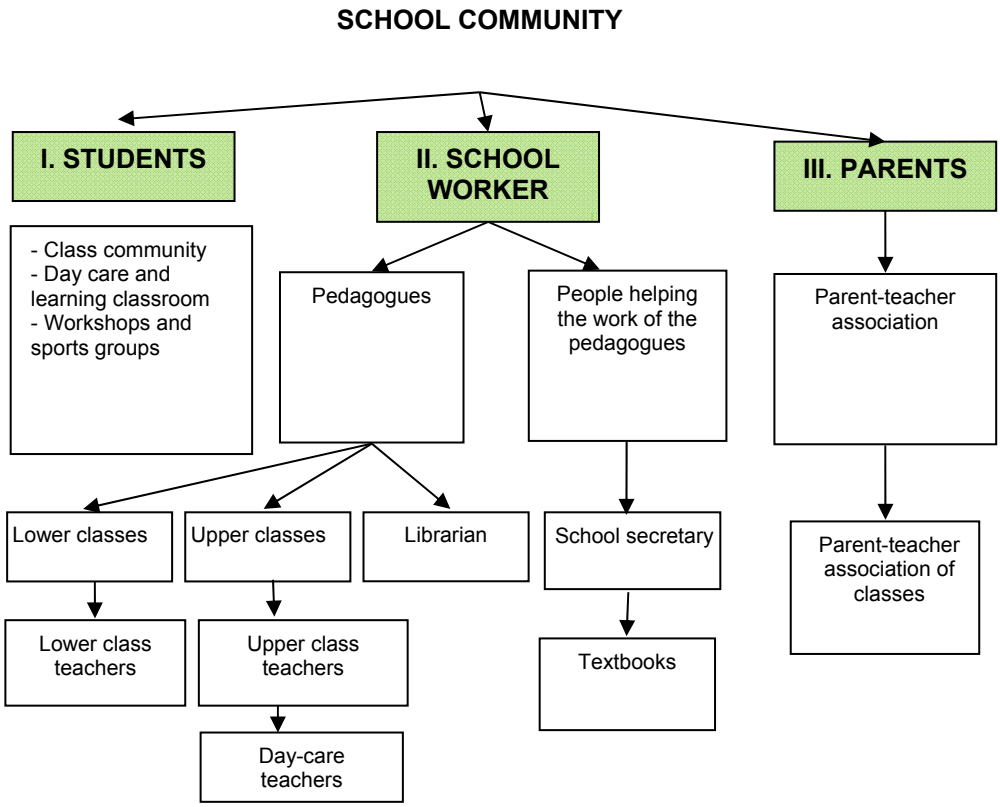
There are certain cases that belong to the decisive authority of the body. In these cases, the headmaster does not make decisions alone, but a board decision is reached. These cases are for example the pedagogic program, disciplinary situations, modification of the rules of the house and the SZMSZ (ROO), etc.

"The headmaster is a pedagogic leader, an educational leader, an HR leader in one person, he or she is responsible for the functioning and management of the school." (Kalicz-Mezei, 2012) Since 2013, this is different, as according to the new (now valid) Hungarian public educational law, the leader of the institution is only responsible for the professional work with full authority. They can have a word in HR questions, the leadership of the school can choose a new colleague via tenders (that the school proposes a candidate to KLIK (stands for Kebelsberg Intézményfenntartó Központ (Klebelsberg Institution Maintainance Centre, which is currently the maintainer of public educational institutions in Hungary) with a recommendation), they are responsible for the efficient and smooth operation of the institution, for the productive work, but their tasks do not comprise management. This is important in a logistical aspect, as several management tasks can be connected to logistics.

4. Research outcome

During the first steps of the research, the organizational construction and its logistical interrelations were explored. The configuration and structural pattern of the institution were determined from the SZMSZ, which is the following (Table 5):

Table 5: **Organizational structure of the examined institution** (Source: SZMSZ)

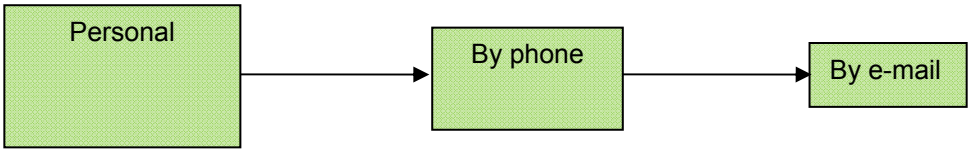


The basis to the realization of efficient logistical processes is information. That is the reason why the information flow of the institution was examined as well. Different structures can be found concerning the information flow between the members of the organization.

The examined organization tries to deal with its partners on a whole-system basis, which is reflected in everyday communication as well. This is essential for the efficient operation, and it is extended to the parents and the students as well. The school is in an everyday personal relationship with their maintainer (KLIK) and with their operator (the municipality) in order to work efficiently. This makes it possible to reach harmony with their partners – including the colleagues as well. The information distribution of the institution involves all the information in connection with its life. The institution itself requires information or asks for it, if they are in a decision-making situation, and they need help with it. The deadlines concerning data retrieval towards the maintainer are fully respected; they even try to provide these data to the school district earlier than expected. Data sharing is usually made by Excel tables or reports. Lots of information is uploaded to the system KIR (stands for Köznevelési Információs Rendszer (meaning: Public

Educational Information System) as well. Information is shared via formal and informal ways inside and outside the organization. One of the most important informational places of the examined institution is the website of the school, which is updated daily. Data sharing is preferred and mostly carried out personally by the school, as – according to the interviewee's experience – immediate reflections, solutions, corrections can be performed this way. Information sharing by phone or by e-mail follow this modality of communication (Table 6).

Table 6: **The preferences of the school in the field of information sharing**



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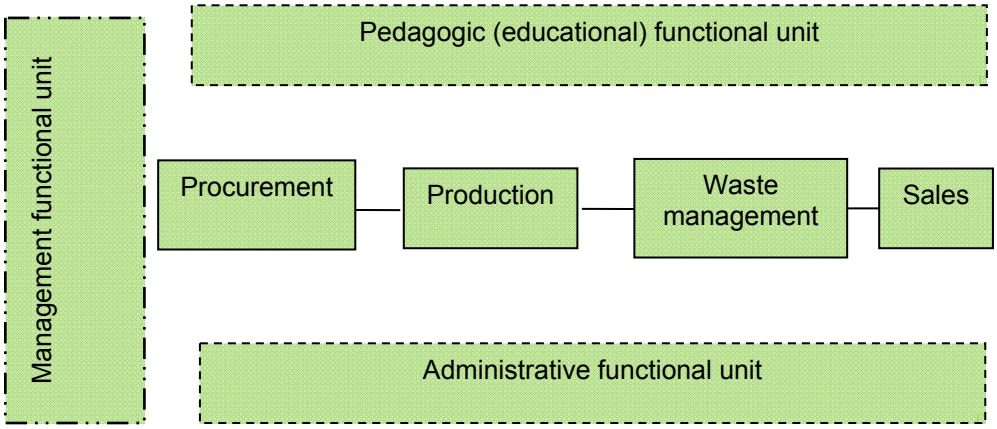
Ad-hoc information requirements are not rare in the life of the school. These requirements often have really short (even few hour) deadlines. *Comparing diagram 7 (The functional units of the examined school in connection with logistics) with diagram 2 (The cross-sectional function of logistics.) shows that all the logistics functional area can be identified in the examined public educational institution, the same way as in the private sector.* Besides the functional units present in the competitive sector, the pedagogical (educational) functional unit, the administrative functional unit, and the management functional unit were defined at the school. It is interesting that though the institution does not dispose of its own management, particularly on administrative levels, this unit is still an important part of the organization (Table 7).

Procurement is an activity in public educational institutions as well, which is meant to provide a specific organization (such as the primary school examined) with all the goods it needs to sustain its operations and which it cannot produce itself. An organization must be supplied with many things, such as labour (teachers in this case), energy, basic materials (educational tools, chalk, textbooks, etc ..), information (eg. educational program) etc, which are required to be obtained from various markets. Therefore, procurement is a complex process. It only adds to the complexity that public educational institutions are not authorized to do their own purchasing, each decision is made by the maintaining institution (KLIK) and purchasing is done centrally. The maintaining institution may obtain the opinion of the educational institution about procurement decisions, and the final decision may be reached based on this. During procurement, as well as in different fields of the private sector (Hallikas et al, 2012), quality, price, reliability, deadlines, flexibility, communicative and innovative skills may be taken into account.

The following functional area is production. Production is an important step in the flow of material and information. From a logistical point of view, production is a step in material flow in which material transformation occurs. In the public educational system, however, production has a different meaning from the one in the private sector. Education is mainly service, so its value-creating "productive" aspects be taken into account here. As for the teachers, production means the process of education, while students gain knowledge, for parents and future employers it means the acquisition of competitive, marketable knowledge and skills.

Logistics is generally extended on the life of the product. Thus, the environmental profile of logistics cannot be left out. The approach of the theory and practice of cleaner production in terms of a product's life cycle means that every step of the production process needs to be considered, bearing in mind the idea that hazards that pose a threat to humans and the environment at a certain stage or during a process should be reduced or eliminated. The preservation of the environment has become a competitive factor. It also applies to the field of public education.

Table 7: **The functional units of the examined school in connection with logistics**



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The majority of the information in the information flow can be related to logistics, more particularly, to the procurement functional unit. The 7R definition of logistics describes logistics through the seven „rights". According to this definition, the task of logistics is the disposition of: the right product, in the right quality, in the right condition, at the right place, at the right time, to the right customer, at the right cost. In the examined institution, this definition can be interpreted as the following.

Instead of the *right product,* right service was determined during the interview, which means an educational-pedagogical work that was laid down in the pedagogic program and in the institutional mission statement.

The *right quality* criterion is always present at the school, and its sufficient level is essential to be maintained.

The *right condition* criterion comprises several factors, such as the students' family background and situation, his or her state of mind, approach and attitude to studying. Besides, the deputy headmaster cited here the provision of adequate supplies, the ability to react to different situations immediately and the pedagogic examples that should be followed.

The *right place* criterion can be interpreted at the school as providing the required circumstances, the students being in their own classroom, or, in the case of special subjects (physics, chemistry, art and physical education), they migrate between classrooms. Cleanliness and order were mentioned at this criterion, as, for example, the students have to check if there is any rubbish left in their desks after each class.

The right time means the order of teaching in the school, which involves the starting time of classes, the definition of breaks, the time for breakfast and lunch.

The *right customer* criterion was markedly defined as the parental expectations. Namely, its application to secondary schools is clearly controlled but the parental expectations are diverse and need to be reacted to immediately.

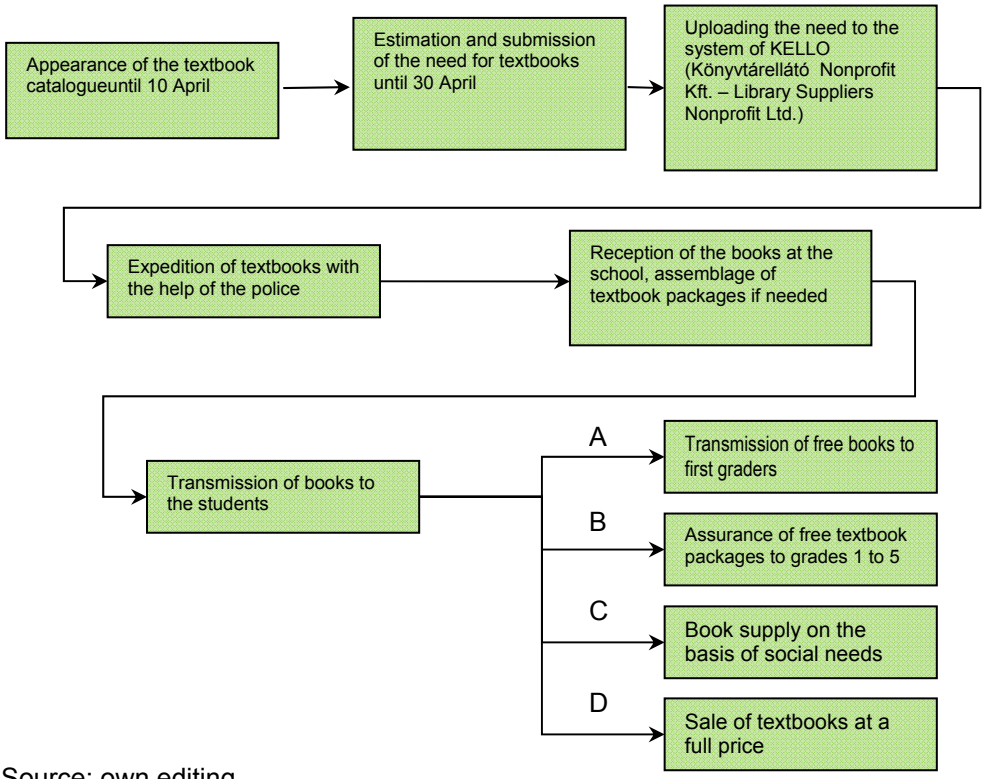
The *right cost* criterion cannot be interpreted, as the institution does not have its own budget. The equipment needed for everyday operation are assured by the ISZSZ (abbreviation for Intézményi Szolgáltató Szervezet, which equals Institutional Service Organization). The school has its own pay desk, but its importance is quite small. The school can raise money through its foundation along defined principles, where the "right cost" principle is indispensable.

In the course of the competition that developed in the field of education, the institution sets off with the pedagogic program and tries to form a unique appearance that makes the school appealing.

From the functional units of logistics, procurement is present in the school in the form of textbook acquisitions, which result in a material flow as well.

Table 8 shows this process.

Table 8: **The process of textbook acquisition**



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Furthermore, procurement can be found in children alimentation too, but this activity is realized via outsourcing, the school does not take part in it.

From the functional units of logistics, waste treatment can be identified as communal waste treatment. The selective waste collection is realized in the school, to which paper collection is connected, which is organized twice a year (in autumn and in spring). It involves used battery collection in the framework of the hazardous waste collection as well.

The sales functional unit appears in the form of the sale of the collected paper during paper collection.

The production functional unit was not identified during the interviews.

Now we are going to answer the research question based on the research outcome.

K-1. Which is the relationship between the functional units of public education (the examined elementary school) and the functional units of logistics of the competitive sector? How can this appear in logistical thinking?
What kinds of structure do the functional units of public education form and what kind of relationships do they have with the logistical thinking?

The 7R definition of the logistical way of thinking can be found at schools, and at school districts, based on the results of the research. All the functional units of logistics could be found as well, along with three additional functional units, which are in connection with the school's professional work and logistics too.

The functional units of public education form a special supply chain. In today's competitive sector, it is unquestionable that a competitive advantage (success) cannot be enhanced on a single enterprise level, that is why the firms form supply chains to satisfy the needs of their customers. The supply chains, or rather networks could be found at the examined schools as well, and they work in the operation of school districts and the maintenance by KLIK too. With the presence of logistical thinking, the goal of education is realized in the form of supply networks to satisfy needs.

5. Conclusions

Logistics is nothing else but cooperation. It can be seen through the example of the examined school that several factors have to be taken into consideration in the formation of a well-functioning organization. These factors have the influence on the performance of the organization and on each other as well, so they are in interaction with each other. The goal is the synergy of these factors.

The results of the research show that in today's Hungary, stabilizing steps have been taken in the processes at schools after changing the maintainer of public schools (KLIK – Klebelsberg Intézményfenntartó Központ – Klebelsberg Institution Maintenance Centre) – though only by a continuous dynamic development. Along with this fact, the opportunities given by the logistical way of thinking in maintenance, operation and everyday functioning of public education institutions have to be reconsidered.

As the research shows, diverse work connections of public education can be identified during the logistical operations, and these connections can provide a kind of competitiveness as well. The creation of supply chains in public education can be perceived through the new and much-needed work connections. This can result in rationalization too. In this case, supply chains mean that the institutions step out of their own boundaries and establish tight connections – even partnerships – with other institutions. These connections can work only on the basis of reliable and real-time information sharing, immediate reactions and, based on the experience from the competitive sector, confidence.

Based on the interviews, the short time trends of the logistical thinking of public education institutions are:

- the rationalization of information flow,
- the definition and solidification of process protocol,
- flexibility in time and in space,
- fast reactions to the occurring demands.

Looking far into the future, it can be stated with the help of this research, that the logistical way of thinking is present and consciously applied in not only the competitive sector, but in public education as well. Moreover, as it can be seen

through the operational framework noticed with the help of the interviews, with the broadening and abolition of the borders of the institution, institutions without borders can be formed, which leads to rational operation in the future.

The needs and demands towards public educational institutions (in our research: elementary school) change dynamically. Expectations can be made by the "following" school, the parents, the maintainer and the operator as well. The institutions are in connection with several partners, which requires flexibility, the cornerstone of which is effective communication.

Time will tell and practice will prove if the opportunities drafted in the case study and the logistical way of thinking applied in the competitive sector will take root in public education and to what extent.

This research is useful not only for public educational institutions, but for the maintainer, the operator, the "user" and the partners too. The reason for this is that perfect cooperation is needed from all the participants to endorse the logistical way of thinking. For this reason, the interaction between the participants will be of vital concern.

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Appendix 1: Interview questions

Interview questions to the director of KLIK		Interview questions to te deputy headmistress of the examined elementary school	
1.	What kind of information sharing is done between the schools belonging to the school district and their partners? Which pieces of information can be connected to logistics?	1.	What kind of information sharing is done by the school and with whom? Which pieces of information can be connected to logistics?
2.	Can the information **provided** be grouped? (professional, priority, business, organisational management, etc…)	2.	Can the information **provided** be grouped? (professional, priority, business, organisational management, etc…)
3.	Can the information **required** be grouped? (professional, priority, business, organisational management, etc…)	3.	Can the information **required** be grouped? (professional, priority, business, organisational management, etc…)
4.	Is there a schedule for the sharing of information? (weekly, monthly, etc., given, received necessary information.)	4.	Is there a schedule for sharing and providing information? (weekly, monthly, etc., given, received necessary information.)
5.	How common is information sharing? What determines the frequency?	5.	How common is information sharing and providing? What determines the frequency?
6.	What is the way or protocol of information sharing?	6.	What is the way or protocol of information sharing?
7.	Does information sharing typically occur in a formal or informal way?	7.	Does information sharing typically occur in a formal or informal way?
8.	Is there electronic (internet) support for the sharing of information (website, intranet, e-newsletters, etc...)	8.	Is there electronic (internet) support for sharing and providing information (website, intranet, e-newsletters, etc...)
9.	Is information typically shared orally or in writing? What is the cause of one or the other solution?	9.	Is information typically shared orally or in writing? What is the cause of one or the other solution?
10.	Does information request from schools happen in an ad-hoc way?	10.	Does information request from the school happen in an ad-hoc way?
11.	If yes, how many times has it happened, with what deadlines, concerning what topics since the school has been maintained by KLIK?	11.	If yes, how many times has it happened, with what deadlines, concerning what topics since the school has been maintained by KLIK?

12.	What induced this unplanned move?	12.	What induced this unplanned move?
13.	Characteristically, the following functional areas can be identified in logistics. (suppliers' market - procurement, production, waste management, sales - customer market). How can these be defined at the institutions in your maintenance and what other functional fields of logistics can be determined?	13.	Characteristically, the following functional areas can be identified in logistics. (suppliers' market - procurement, production, waste management, sales - customer market). How can these be defined at your institution and what other functional fields of logistics can be determined?
14.	What functional areas can be identified in public educational institutions?	14.	What functional areas can be identified in public educational institutions?
15.	What percent of the information during information flow related to the different functional fields of logistics? Please define the functional field and the rate of information.	15.	What percent of the information during information flow related to the different functional fields of logistics? Please define the functional field and the rate of information.
16.	Is there material flow between your organization and the school **maintained**?	16.	Is there material flow relating to your school? Where does this flow come from and go to? What materials are involved in the flow? With what purpose?
17.	Is there material flow between your organization and the school **operated**? (Municipality)	17.	
18.	Is there cash flow between your organization and the school **maintained**?	18.	Is there cash flow in your school?
19.	Is there cash flow between your organization and the school **operated**?	19.	
20.	Does the Veszprem KLIK consider the respective institutions on a total system level (involve processes outside its legal boundaries in its scope of attention and adopt the full logistics chain way of thinking? If yes, how does this show?	20.	Describe the school management and organizational structure; what logistical considerations may be identified in this area?
21.	There is increasing competition in the field of education and market value judgment related factors play an increasingly important role. These are for instance quality, reliability and service. How does this show in your work, especially in the areas related to logistics?	21.	Does Kossuth School consider the institutions which are in connection with it on a total system level (involve processes outside its legal boundaries in its scope of attention and adopt the full logistics chain way of thinking? If yes, how does this show?

22.	How can the 7R definition of logistics be interpreted in your work? The 7R definition of logistics defines logistics through the seven “rights”. According to this theory, the task of logistics is the disposition of: the right product, in the right quality, in the right condition, at the right place, at the right time, to the right customer, at the right cost.	22.	There is increasing competition in the field of education and market value judgment related factors play an increasingly important role. These are for instance quality, reliability and service. How does this show in your work, especially in the areas related to logistics?
23.		23.	How can the 7R definition of logistics be interpreted in your work? The 7R definition of logistics defines logistics through the seven “rights”. According to this theory, the task of logistics is the disposition of: the right product, in the right quality, in the right condition, at the right place, at the right time, to the right customer, at the right cost.