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Apparel Purchasing with Consideration of Eco-labels among Slovenian Consumers

Abstract
The increasing public awareness and sense of social responsibility related to environmental issues have led the textile and clothing industry to manufacture products with improved environmental profiles. During the 1990's, the industrialised world witnessed a growing number of environmental labels as a way of encouraging consumers and industries to alter their consumption patterns and to make wiser use of resources and energy in the drive for sustainable development. In this exploratory study, environmental knowledge among Slovenian consumers regarding the most popular current eco labels was examined. Data were collected through a structured online survey from a simple random sample of 535 consumers. Responses to an online questionnaire indicated that the largest share of participants consider clothing composition the most, while only a small percentage consider eco labels and the environmental impact. Consumers are willing to pay no more than 10% for a textile product with an ecological label attached. The largest proportion of respondents identified themselves as average eco-conscious,, although they didn't show any knowledge of eco labels. The study revealed that it is necessary to increase the level of awareness of sustainable materials as well as trust in eco labelling systems with transparent standardisation and certification systems.

Key words: *sustainable consumption, purchase apparel, recognition, consideration, eco labels, willingness to pay more.*

The purpose of this research was to explore the consumption of apparel among Slovenian consumers, their willingness to pay a higher price for more sustainable products, and their knowledge of eco labels attached to textiles and other products in general, also to look at the sustainability challenge in the textile and clothing industry.

There is a wide range of sustainability issues associated with textile and clothing production. The priorities for a sustainable development agenda in the clothing and textile industry have emerged as:
- improving water and energy efficiencies, particularly during textile processing and clothes' washing;
- cutting pollution and waste, especially from dyeing, and concerns arising from genetically modified cotton,
- establishing social justice, such as raising standards for workers, particularly children [3].

One of the several moves towards more sustainable approaches in the textile and clothing industry involves environmental labelling or eco-labelling.

Eco labelling
Eco-labelling is a type of environmental labelling which identifies the overall environmental preferences of a product (i.e. good or service), within a product category, based on life cycle considerations, awarded by an impartial third party to products that meet established environmental leadership criteria [4].

Eco-labelling seeks to fulfil three objectives:
- protecting the environment– to influence consumer's decisions and encourage the production and consumption of environmentally preferable goods,
- encouraging environmentally sound innovation and leadership – through the awarding and promotion of an eco-label,
- building consumer awareness of environmental issues and of the implication of their choice, generating a change towards more environmentally friendly consumption patterns [4].

The International Standards Organisation (ISO) has developed standards for three types of environmental product claims, termed ISO Type I, II and III., which contain general guidelines for the operation of ecolabeling programs including:
- transparency in the setting of criteria used to evaluate products,
- open access to all licensees of all sizes from all countries,
- a periodic review of criteria that takes into consideration technology and the marketplace.

Those types are the following:
- Type I (ISO 14024:1999) claims are based on criteria set by a third party and are multiuse based on the product's life cycle impacts. The awarding body may be either a governmental organisation or a private non-commercial entity. Official eco-labels can be classified as type I labels. Exam-

Introduction
Since the late 1960's and once the increasing pressure of production systems on the environment was recognized, several attempts have been made to move towards more sustainable and environmentally friendly approaches in the textile and clothing industry. One of the approaches involves environmental labelling or eco-labelling. Environmental labels have emerged to resolve the information asymmetry between the consumer and seller of a good, but have been as yet unsuccessful. Numerous surveys show that consumers are generally concerned about the environment but that this does not always lead to actions, such as the purchase of environmentally responsible products [1, 2].

ples include the EC Eco-label, Nordic Swan and German Blue Angel;

■ Type II (ISO 14021:1999) claims are based on self-declarations by manufacturers or retailers. There are numerous examples of such claims e.g. "made from x% recycled material" and

■ Type III (ISO/TR 14025: 2006) claims consist of quantified product information based on life cycle impacts, which are presented in a form that facilitates comparison between products e.g. a set of parameters. However, there is no comparing or weighing against other products inherent within the claim [5].

Including these programs, there are currently 26 members of the Global Eco labelling Network (GEN), established in 1994 as a non-profit interest group, composed of environmental labelling organisations throughout the world [6]. There are also numerous single-issue labelling schemes, granted by a third party certification agency, that refer to a specific environmental or ethical characteristic of a product (for example, certified organic clothes, fair trade clothes). The majority of environmental labels are single-issue.

There are many studies that identify several weaknesses of labelling systems that relate to issues included in the first category. Some of these are:

I) problems in setting the criteria - attitudes toward the environment may differ widely across countries. All parties included in the criteria identification process have to seek agreement at all stages. If parties dissagree, negotiations will take place and the final criteria may not be as high as it could have been [7].

II) the difficulty of setting product category boundaries, since no two goods are perfect substitutes for one another and some products may have many different uses;

III) the arbitrariness of the process of selecting and updating criteria, as it is not possible to estimate accurately all the damage that the entire life cycle of the product can have on the environment [8,9]; the lack of estimable demands for labelled goods;

IV) the lack of real rewards for environmental improvements (the awards are restricted, in most cases, to the best products)

V) the shortness of the validity period of the label before its revision, especially problematic for capital intensive industries [9];

VI) eco-labels do not generally require specific, systematic life cycle assessment of multicriteria eco-label products [10];

VII) programs rely on consumers' ability and willingness to include environmental considerations in their purchase decisions;

VIII) because they cover different attributes, consumers cannot compare the specific qualities of all products in a given category;

IX) the increased number of voluntary eco-labels has resulted in consumer confusion between third-party certified and self-declared labels, which results in the lack of consumer trust [11,12];

X) the complexity of the information may hinder the customer's clear and well-informed purchase choice [13, 14].

On the other hand, the arguments most commonly used to favour labelling schemes are the following [9]:

I) since consumers spend little time discovering the environmental impact of products, it is necessary to develop one recognised label they can trust;

II) labels can improve the image and/ or sales of the company;

III) encourage firms to account for the environmental impact of their production;

IV) can also make consumers more aware of environmental issues and problems, which might help in the protection of the environment [15];

The main advantage is their convenience, visibillity and simplicity, since consumers prefer information attached to products and labels [16]. In previous research the best known and most effective label was the EU Ecolabel, followed by GOTS [16]. Targosz-Wrona [17] found out that for consumers the main information were properties describing human-ecological qualities, while only a small percentage of consumers identified eco-labels as confirmation of »environmentally friendly« technology having been used.

Almost half (47%) of EU citizens said that eco-labelling plays an important role in their purchasing decisions, especially in those of over 38 year-old self-

employed higher educated woman [18]. It was also found that label dissatisfaction was higher in older and middle age respondents [19, 20]. The French respondents are the most positive in the use of eco-labels, while the Norwegian and English respondents are the least [21].

"Green" consumerism

"Green" consumerism is defined as "the purchasing and non-purchasing decisions made by consumers based, at least partly, on environmental or social criteria" [22].

Numerous surveys show that consumers are concerned about the environment, but this does not always lead to actions, such as the purchase of environmentally responsible products [1, 2, 23]. Researchers have attempted to profile green consumers using demographic (gender, education, place and ownership of home) and psychographic (the influence on values, goals and rewards) variables. In general, green consumers were profiled as younger, better educated, with a higher income and politically liberal [2, 24].

Cervellon identified three main types of eco-consumers [2]:

I) the health-conscious consumer, who purchases for his own health benefits;

II) the environmentalist, who buys green as a contribution to the protection of the earth;

III) and the quality hunter, who is persuaded that green products have superior quality or performance.

Consumers might have a mix of these motivations, but nonetheless, one predominates in purchase contexts [2].

Trademarks provide, through a symbol, information in summary form so that consumers identify with a specific combination of features. However, the person who buys a good does not always correctly interpret these symbols, hence it is important for any discussion of green demand to acknowledge the (mis-) perceptions that eco-labelling may create.

Consumer willingness to pay a higher price for a sustainable product

Many eco-conscious products carry higher prices than conventional ones, making them unaffordable for many consumers. It was shown that consumers are not willing to pay more than 10% more for sustainable clothing. They are prepared to pay 5 to 10 pounds more for clothing

with an eco-label than for conventional clothing. [25, 26]. Even half of the respondents who were familiar with recycling and preferred apparel made from recycled fibres claimed that they would purchase the lower priced apparel item, regardless of its environmental impact [25].

Eco labels are particularly in demand in wealthier Western Europe, while Eastern Europeans are simply concerned about the social and environmental impact of their purchase decision. Looking at Western and Eastern Europeans, we can observe that they hold similar views on environmental and social issues, however when concrete purchasing decisions are analysed, then differences between them become quite distinct [27]. Studies done in Switzerland [28] and Germany [29] have shown that consumers are willing to pay a premium for environmentally benign production techniques. Ecologically and socially sensitive consumers, who understand how apparel products affect the environment, and who have experience in purchasing eco-labelled products, are women, married and still have children living at home. They are willing to pay the most [24, 27, 29 - 33].

The eco-labels development in EU market

European eco-label - "EU Flower"
A European eco-labelling scheme was introduced by the European Commission (EC) in 1992. It is a voluntary scheme that aims to promote products with reduced environmental impacts throughout their life cycle and to provide consumers with better information about the environmental impact of products. "Textile products" are taken into account in 2 groups: "Clothing" and "Home and garden" in the following categories: textile clothing and accessories, interior textiles, fibres, yarn and fabrics [34].

In general, the criteria for textiles in different labelling programs are based on the EU Flower programme for ecolabelling textiles in accordance with the Commission's Decision 2002/371/EC of 15 May 2002 (**Figure 1.a**) [35]. Every four years, on average, the criteria are revised to reflect technical innovation. Criteria for a specific product group are developed by the application of life cycle assessment (LCA) to gauge the impact on the environment at every stage of the product's life cycle. For textiles, criteria are developed for different types of fibres in the following life cycle steps:
1. manufacturing of fibres:
   a) types of fibres - all types of fibres, with the exception of inorganic, fibres can be used;
   b) limitations of toxic residues in fibres (limit values for residues of certain pesticides, organotin compounds, antimony, lead based pigments, …);
   c) reduction of air and water pollution during fibre process (N_2O, VOC's, heavy metals like Zn and Cu, ...);
2. manufacturing (processes and chemicals): limitations of the use of substances harmful for the environment (no cerium compounds, halogenated carriers, heavy metals and formaldehyde in stripping and depigmentation, no chlorine agents in bleaching yarns, …);
3. use – performance and durability – dimensional changes during washing and drying and colour fastness to perspiration (acid, alkaline) [36].

Despite well-funded information campaigns, a 2006 study that interviewed over 24,000 people in the 25 member states of the Flower program found that nearly half (48%) of respondents did not know what the EU Flower label means [37].

OEKO-TEX® Standard 100, 100 plus and 1000
The OEKO-TEX® Standard 100 was introduced by the Hohenstein Institute and the Institute for Ecology, Technology and Innovation ÖTI (Vienna/Austria) in 1992 as an independent testing and certification system for textiles at all stages of production.

The aim was to make textile products from conventional production having undergone laboratory testing for:
■ illegal substances such as carcinogenic colorants;
■ legally regulated substances such as formaldehyde, plasticisers, heavy metals or pentachlorophenol;
■ substances which, according to current knowledge, are harmful to the health, but which are not yet regulated or prohibited by law, such as pesticides, allergenic dyes or tin-organic compounds;
■ parameters such as colour fastness and the skin-friendly pH value, which are precautionary measures to safeguard consumer health.

The extent and requirements of Oeko-Tex testing depend on the intended use of a textile product – the more intensive the skin contact, the stricter the limit values that may not be exceeded. There are four product categories:
1. I – Items for babies and infants (up to 36 months of age);
2. II – Items with direct prolonged or large-area skin contact;
3. III – Textiles without or with little skin contact;
4. IV – Furnishing materials (for decoration purposes).

After successful laboratory testing and signing of a declaration of conformity the manufacturer receives the Oeko-Tex certificate for their product, which is valid for one year. After a repeat test, existing certificates can be extended for a period of one year in each case [38].

OEKO-TEX® Standard 100 applies to products. Its complement OEKO-TEX® Standard 1000 is a testing, audit and certification system for environmentally friendly production sites. In addition there is also the product label
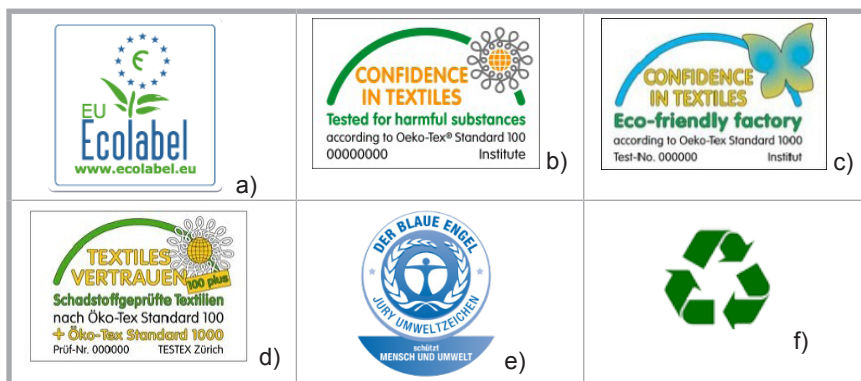

Figure 1. *a) EU Ecolabel, b) Oeko – Tex Standard 100, c) OEKO-TEX® Standard 1000, d) OEKO-TEX® Standard 100 Plus, e) The Blue Angel, f) Mobius loop.*

OEKO-TEX® Standard 100 plus for companies that have successfully certified their products in accordance with OEKO-TEX® Standard 100 and which have demonstrated that all production sites involved in making the item comply with the requirements set by OEKO-TEX® Standard 1000 (*Figures 1.b - 1.d*) [38]. The Oeko-Tex approach is based on costly tests of the finished products, while the EU labelling scheme uses more a complete approach based on a life cycle analysis of the product.

The Blue Angel (Der Blaue Engel)
The Blue Angel is German certification for products and services that have environmentally friendly aspects. It's the first worldwide environmental label. It has been awarded since 1978 by the Jury Umweltzeichen, a group of 13 people from environment and consumer protection groups, industry, unions, trade, the media and churches. After the introduction of Blue Angel, other European and non-European countries followed this example and introduced their own national and supra-regional environmental labels. The label covers some 10.000 products in some 80 product categories (*Figure 1.e*) [39].

Mobius loop – recycling symbol
The Mobius loop (*Figure 1.f*) is a universal recycling symbol that is recognised internationally and is used to designate recyclable materials.

■ Experimental

This study examined the amount and type of apparel purchased among Slovenian consumers, as well as their recognition and consideration of eco labels. In addition, willingness and reasons that justify the higher price of eco-labelled products were explored.

The data of the study were collected through an online self-developed questionnaire carried out in Slovenia in October 2012. The simple random sample of 535 consumers consisted of 80% women (number = 428) and 20% men (number = 107), including participants of all ages and socio-economic status levels. The majority of respondents (*Table 1*) were 21 to 40 years old (49%), followed by respondents from 41 to 60 years old (25%). The next largest group were from 61 and more years old (14%), while 12% of them were from 18-20 years old.

Table 1. Demographics of respondents.

		Categories	No. of respondents	%
Age	1	18-20	64	12.0
	2	21-40	263	49.2
	3	41-60	131	24.5
	4	61 or more	77	14.4
Status	1	In School	257	48.0
	2	Employed	209	39.1
	3	Unemployed	69	12.9
Education	1	Less than first degree	28	5.3
	2	First degree	254	47.5
	3	Second or third degree	253	47.2
Region	1	Pomurska	30	5.6
	2	Podravska	104	19.4
	3	Koroška	16	3.0
	4	Savinjska	45	8.4
	5	Zasavska	11	2.1
	6	Spodnjeposavska	12	2.2
	7	Jugovzhodna Slovenija	28	5.2
	8	Osrednjeslovenska	161	30.1
	9	Gorenjska	60	11.2
	10	Notranjsko-kraška	15	2.8
	11	Goriška	29	5.4
	12	Obalno-kraška	24	4.5

Table 2. Overview of questions used, the types of issues and the elements of sustainable consumption in Slovenia explored.

	Question	Type	Categories
1	To what extent do you identify yourself as an eco-conscious consumer?	Likert scale	1- I am; 5 – I'm not
2	How many pieces of clothing did you buy last year?	Table -one answer	-T-shirts and shirts - trousers and skirts - outerwear - socks and underwear - sportswear
3	Select which elements you consider the most during your purchases of apparel!	Category - multiple answers	- Material composition - origin - environmental labels - fashion trends - impact on the environment

A large group of the respondents were still at school (48%), employed 39% and 13% were unemployed. Respondents were relatively highly educated, with only 5% having less than a first degree education, while 47% had finished a first degree and the same percentage had finished second or third degree education. A very large proportion of them live in a house (54%) in rural areas (48%). Respondents were geographically distributed throughout the country (*Table 1*).

In all, 6% of the respondents worked with textiles professionally, 19% studied textiles, and the majority, 54%, had no professional connection with textiles.

The questionnaire included 2 parts:
- ■ the first part (3 questions) explored eco-conscious apparel acquisition and
- ■ the second part (6 questions) - recognition and consideration regarding eco- labels

The questionnaire included questions with closed and restricted answers (binary and multiple choices). A five-point Likert scale was used at the first question, which is an indirect scale for measuring attitudes and/or statements.

The proportion of men compared to females participating in the survey seems small, yet it reflects the real situation. Most of the existing surveys to date have examined only the female section of the population, as women are largely responsible for the consumption of textiles in society.

■ Results and discussion

Eco-conscious apparel acquisition behaviour

For the first question, „To what extent do you identify yourself as an ecological consumer?", the largest portion of participants (44%) ranked themselves as a

Table 3. *Recognition, consideration, willingness and reasons to pay more for product with an eco label.*

|	Question	Type	Categories
1.	Mark which of the environmental labels presented you've noticed and which of them you perceive as trustworthy?	Table: multiple answers	- noted, - trustworthy/ Subcategories: - Oeko-Tex Standard 100, - Blue Angel, - Eco label and - Mobius loop.
2.	The EU Ecolabel can be assigned to...	Category-one answer	- I don't know; - products and services which have a reduced environmental impact compared with other products in the same product group; - products made from 75% organic fibre content and - textile products made in accordance with the Fair Trade policy.
3.	Oeko-Tex Standard 100 can be assigned to textile products that…		- I don't know; - don't contain harmful substances; - were made with "environmentally friendly" technologies and - were made from natural fibres and without the use of child labour.
4.	Blue Angel can be assigned to…	Categories-multiple answers	- I don't know; - environmentally friendly products and services.; - textile and shoes made from biodegradable materials; - textiles that doesn't cause allergies.
5.	How much more are you willing to pay for a product with an eco-label attached?	Category-one answer	- 10% more; - nothing more; - 10 to 20% more; - 20 to 50%; - 50% more.
6.	Why are you prepared to pay more for a product with an eco-label attached?	Table-one answer	- health reasons; - better properties; - environmental protection.
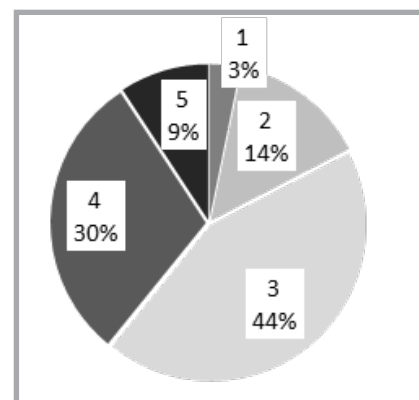
Figure 2. *Consumers identifying themselves as eco-conscious, using the five-point Likert scale (1 - I am not eco-conscious, 5 - I am an eco- conscious consumer).*

three on the five-point Likert scale (**Figure 2**). The average mark was 3, 3 (the standard deviation was 0.93).

In the past year, respondents bought mostly socks and underwear, with 53% of them buying more than 5 pieces; followed by T-shirts and shirts, with 53% buying more than 5 pieces; trousers and skirts (22%); sportswear (18%), and outerwear (13%) (**Figure 3**). Participants stated that they bought the least amount of sports clothing, with 16% of respondents not purchasing any pieces of sports clothing during the last year. Participants that bought only one piece of clothing a year tended to focus on outerwear (35% of them bought one piece), followed by 2 - 5 pieces of trouser and skirt (56%).

The largest share of participants indicated that when purchasing apparel, they consider clothing composition to be the most important consideration (83%), followed by fashion trends (59%), origin of apparel (29%) and environmental labels (21%). (**Figure 4**). Only 13% of the respondents stated that when buying clothing, they consider the environmental impact of the clothing production. These findings are consistent with the Birtwistle [40] survey, in which comfort, pleasure,

convenience, price and personal fashion needs were rated as the most important attributes when acquiring clothing. Environmental attributes such as "organic" or "made from recycled materials" were not evaluated as important when considering the purchase of apparel.

Similar were the findings of Hemmelskamp and Brockmann [41], with their list of exogenous factors that affect the "consciousness-consumption" pattern, especially with the first factor - consumer satisfaction, which is not always compatible with environmental consciousness. Many green products might not meet important consumer criteria such as price, performance and quality. It also supports Ottoman's theory [42] that a product which fails to measure up to consumers' needs and expectations, however good its eco-performance, will not succeed on the market. Consumers' preferences for eco-friendly apparel can, in due course, reduce the environmental impact of the apparel supply chain, because the supply of eco-friendly apparel is dependent on consumers' demand for these products. Consumers ultimately determine the type
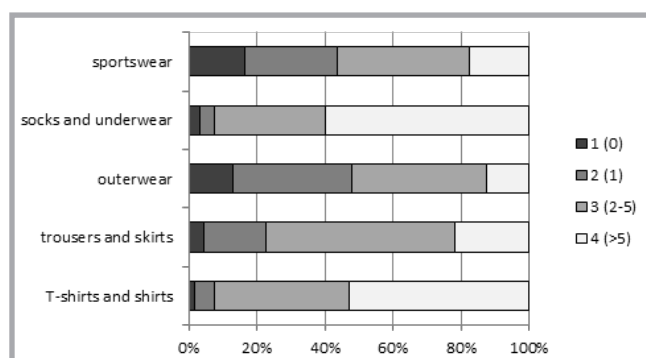

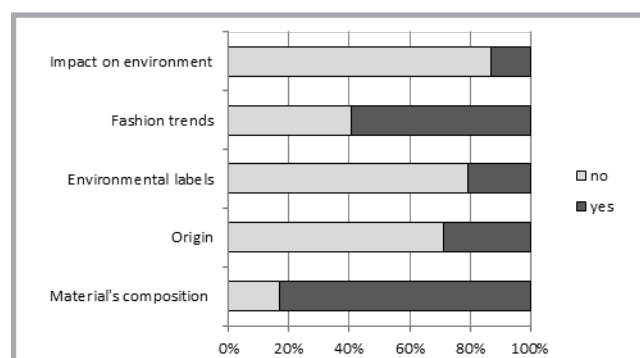**Figure 3.** *Amount and type of apparel bought in 2011 by Slovenian consumers.*

Figure 4. *Elements considered when purchasing apparel by Slovenian consumers.*

of apparel products made available to them.

Recognition and consideration of eco-labels among Slovenian consumers

The ecological label most recognised among Slovenian consumers appears to be Oeko-tex Standard 100, with a total share of 89% of consumers already having seen it, while 53% of them perceive it as trustworthy. The Oeko-tex label was followed in the ranking by German Blue Angel, which has already been seen by 85% of consumers, while only a small share (26%) believe it is reliable. The third label according to its recognition is the EU Ecolabel, which has been seen by 81% of consumers; here a little larger percentage of consumers think its trustworthy (43%). The same share of consumers have seen the Mobius loop (81%), while a slightly bigger share of consumers place trust in it (50%).

The widely recognised Oeko-tex standard 100 labels among Slovenian consumers can be addressed to a range of textile materials available on the Slovenian market, while the EU Ecolabel has only been adopted by 6 firms to date, not including any textile ones, hence not many products or services are available on the market. This finding does not support previous research, where the most recognizable eco label was EU Ecolabel [12].

It is obvious that people are aware that different eco labels exist. The problem is that eco labels frequently cause confusion as a means of communication with consumers. The over-use of one-sided declarations – terms such as bio or "green", have undermined the credibility of environmentally friendly product declarations and thus negatively affected consumer perceptions. Also the growing number of eco-labelling systems suggests that they are covering more and more sectors, which may confuse consumers having to cope with such a vast diversity of labels and brands, making them distrustful. The lack of transparency followed by the eroding credibility of labels has become one of the major problems affecting labelling systems. The large number of surveys and analyses has shown that consumers are frequently sceptical about the credibility of some of the labels and uncertain about their actual message [12]. Successful promotion of »green« consumerism requires that this credibility be repaired with transparent
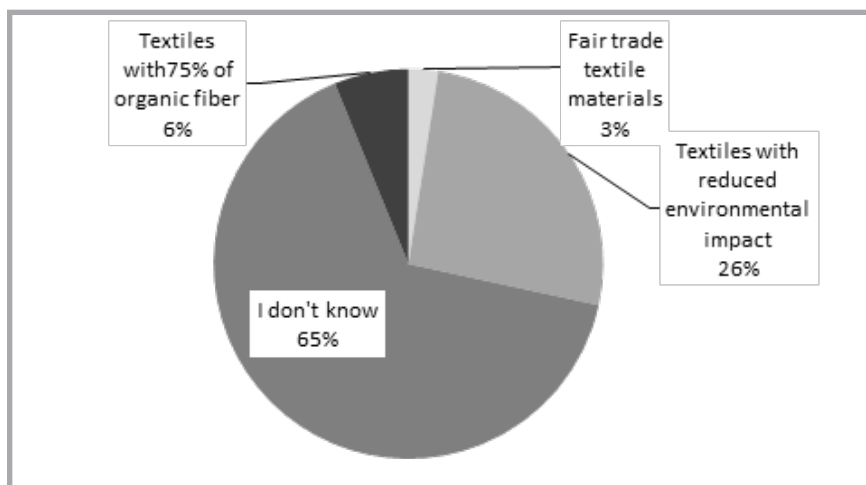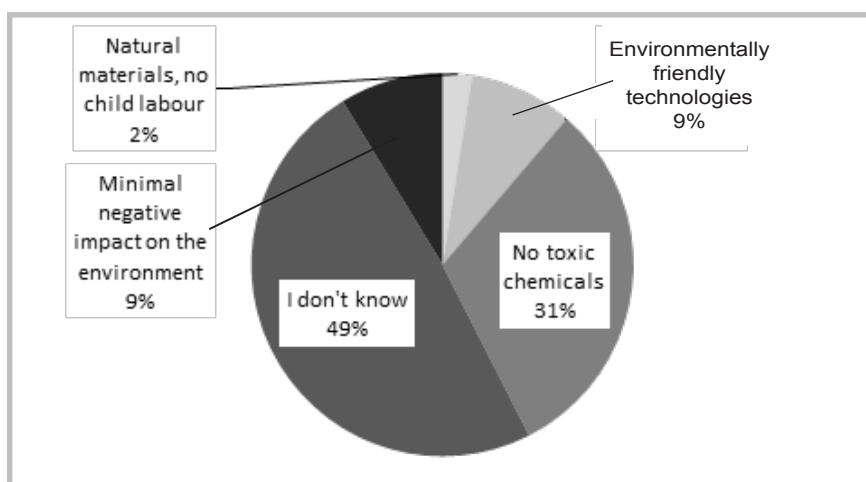

Figure 5. "EU Ecolabel can be assigned to…".

Figure 6. "Oeko -Tex Standard 100 can be assigned to textile products that…".

standardisation of exsisting systems and new approaches to consumer education and information [12].

In the next series of questions knowledge of the environmental labels discussed was tested. The first question was testing if consumers know where Eco labels can be assigned (*Figure 5*). The largest proportion stated that they did not know (65%); followed by consumers who ticked the positive answer (26%) that a Eco label can be assigned to products and services which have a reduced environmental impact compared with other products in the same group. A total of 6% of consumers believes that a product awarded with an Eco label has to be made from 75% organic fibber content, while 3% thinks that the label represents Fair trade policy.

The next question was testing knowledge of Oeko-Tex Standard 100 certification (*Figure 6*). Again, the largest proportion stated that they are not acquainted with it (49%), which is strange considering pre-

vious results, where consumers marked that label as the most trustworthy. Hence can we state that trust has nothing to do with knowledge? 31% of consumers ticked the positive answer that stated that the label can be assigned to textile products that do not contain harmful substances (31%). A total of 11% of respondents did not gave the right answer 9% of them thought that the label can be assigned to products made with "environmentally friendly" technologies, while 2% believed that certification can be attached to products made from natural fibres and without the use of child labour.

The next question tested knowledge of Blue Angel label (*Figure 7* see page 26). Again the largest proportion of respondents stated that they did not know what it represents (72%). The same as in previous questions, the second largest proportion of respondents answered positively (18%), that the label can be assigned to environmentally friendly products
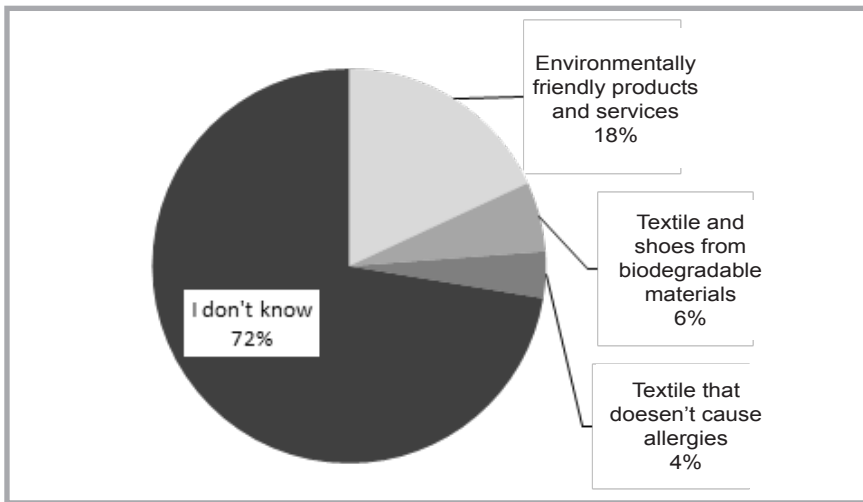
Figure 7. *"The oldest environmental label - Blue Angel can be assigned to…".*
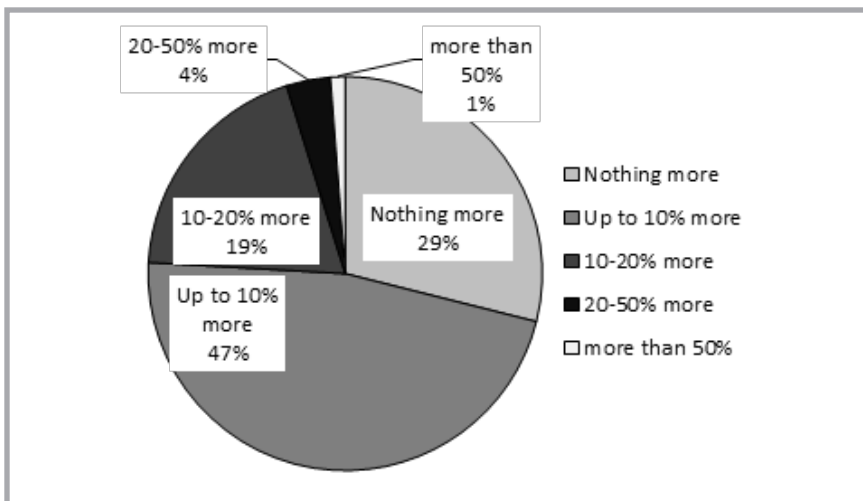

Figure 8. *"How much more are you willing to pay for a product with an eco label attached?".*
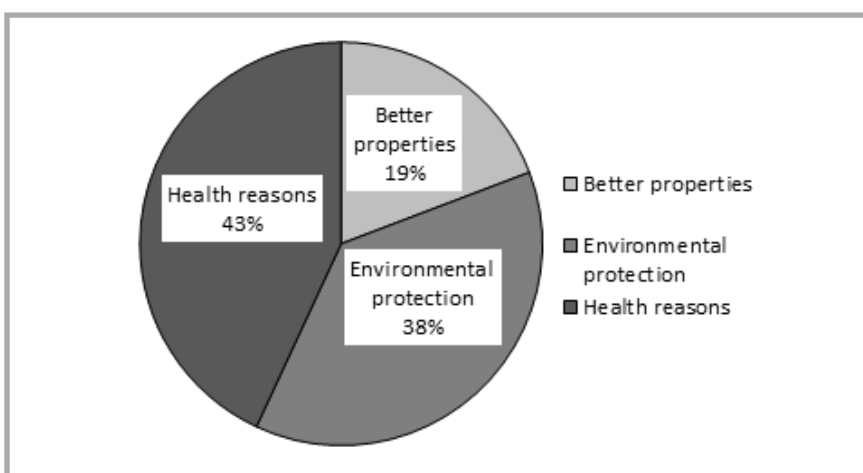

Figure 9. *" Why are you prepared to pay more for a product with an eco-label attached?".*

and services, while 6% of respondents thought it represents only textile and shoes made from biodegradable materials, and 4% believed it stands for textiles that do not cause allergies.

The last two questions explored how much consumers are willing to pay more for an eco-labelled product (as for the same conventionally made product) and the reasons for paying a higher price.

(*Figures 8, 9*). Most of them were willing to pay 10% more (47%), 29% - nothing more, 19% - 10 to 20% more, 4% - 20 to 50% more, while only 1% would pay more than 50% more for a product with an eco-label. This is consistent with previous research conducted, where Nakano [30] found that consumers are not willing to pay more than 10% more for sustainable clothing.

The last question included only the segment of consumers willing to pay more for a product with an eco-label attached. The results showed that 43% of respondents would pay more, due to health reasons, followed by environmental concern (38%) and because of the better properties of recycled materials (19%). This is similar to research, where consumers recognised mainly human ecology qualities for the labels presented [13].

It was found that consumers willing to pay the most for products with an eco-label attached in Slovenia are woman of middle age, employed and highly educated, which confirms the results from previous studies [2, 24].

■ **Conclusion**

Protection of the environment and the sustainability of consumer behaviour are the most important reasons that justify the introduction of eco-labelling schemes. However, the survey proved that it is necessary to increase the level of environmental knowledge regarding eco-labels used in textiles and that of eco-labelling in general. The results from the study show that sustainability labels within the textile and clothing sector have not experienced the success intended. The evaluations of consumer knowledge of environmental labelling presented indicate that some labels and product groups receive a great deal of attention, like Oeko Tex, while others remain in obscurity (EU Ecolabel).

The popularisation of eco-labels, more transparent and coherent labelling systems as well as the regulation of words such as 'green' and 'bio' may increase consumer willingness to choose more sustainable alternatives and consequently pay more for sustainable products. This study is intended to provide a framework for further dialogue regarding sustainable consumption of apparel purchasing behaviours.

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