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# ENVIRONMENTAL PROTECTION IN CONTEMPORARY MARKETING – THEORETICAL BACKGROUND AND MARKET PRACTICE ON THE EXAMPLE OF PACKAGING

**OCHRONA ŚRODOWISKA WE WSPÓŁCZESNYM MARKETINGU**

**– PODSTAWY TEORETYCZNE A PRAKTYKA RYNKOWA NA PRZYKŁADZIE OPAKOWANIA**

**ABSTRACT:** This paper presents theoretical and practical aspects of packaging compliant with the environmental protection principles in marketing communication. There were indicated models valid from the perspective of technical knowledge, such as recyclability, biobased materials, biodegradability, compostability and upcycling. Focus was placed on the attitudes, level of knowledge and awareness of the buyer, which translate into the effectiveness of various ways of communicating about a product or brand.

**Key words:** environmental protection, effectiveness of marketing communication, buyers' attitude, purchasing decisions

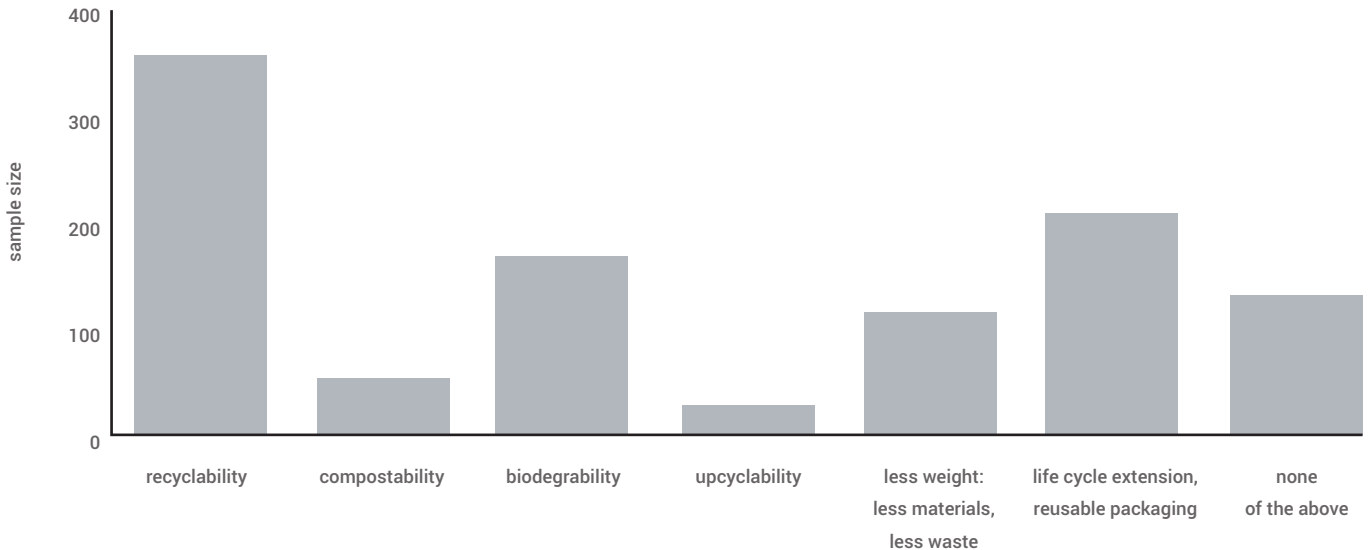
**STRESZCZENIE:** Analiza prezentuje teoretyczne i praktyczne aspekty stosowania opakowania zgodnego z zasadami ochrony środowiska w komunikacji marketingowej przedsiębiorstwa. Wskazano uprawnione z perspektywy wiedzy technicznej modele takie jak przydatność do recyklingu, biopochodność, biodegradowalność, kompostowalność czy upcycling. Szczególnie skupiono się na postawach, poziomie wiedzy i świadomości nabywcy przekładających się na efektywność rozmaitych sposobów komunikacji dotyczącej produktu czy marki.

**Słowa kluczowe:** ochrona środowiska, efektywność komunikacji marketingowej, postawy nabywców, decyzje zakupowe

## 4. DISCUSSION

The 2022 study was preceded by earlier analyzes conducted in the Department of Market, Marketing and Quality (Katedra Rynku, Marketingu i Jakości) in previous years by the same research team, also related to the environmentally compliant packaging as an element of marketing communication. Therefore, it was decided to supplement this study to some extent with the previous results relevant to the discussed topic, which was marked in the text.

In the case of the analysis of the significance level for the buyer of individual packaging features when making a purchase decision, the most desirable solution is undoubtedly recyclability. Over one third of respondents considered this feature to be the most desirable and positively influencing the purchasing decision. The area of average values includes extending the life cycle by ensuring multiple use of the packaging and its biodegradability. On the other hand, the possibility of upcycling is almost irrelevant for the buyer, which results directly from



**CHART 1. THE LEVEL OF SIGNIFICANCE FOR THE BUYER OF INDIVIDUAL PACKAGING FEATURES WHEN MAKING A PURCHASING DECISION.**

SOURCE: MILLER ET AL. 2020

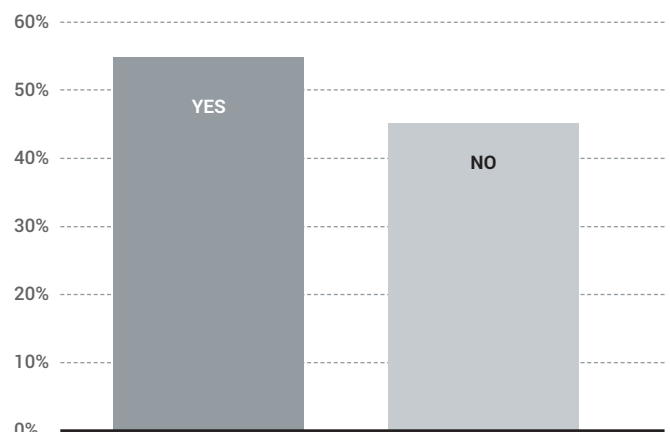
the relatively low level of knowledge of this concept observed in the research (Chart 1.).

Compliance of packaging with the principles of environmental protection as an important element when making a purchasing decision is declared by 55% of respondents (Chart 2.), which is a surprisingly good result for a representative sample. It means that more than half of Polish consumers are not only interested in environmental issues, but also take them into account when making purchasing decisions.

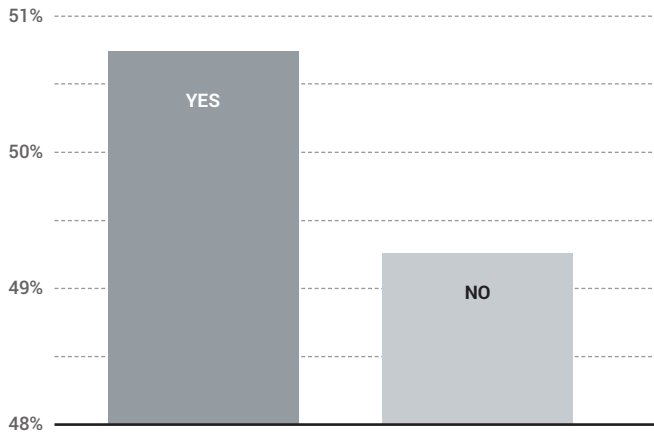
The results divided into individual cohorts are relatively even, which means the general interest and positive attitude towards packaging with environmental values appears regardless of demographic characteristics, and thus also the practical basket of purchased products. What's more, discrepancies are noticeable in the division into individual age groups and place of residence, these results were higher than those recorded for the entire study population. A particularly high percentage of respondents declaring a high importance of environmental protection issues can be observed in the age group of 55 (62%) and more and among inhabitants of medium-sized cities (65%). Half of the respondents notice the information provided by the producers on the environmental value of packaging: the results range from 52% to 49% and are relatively similar in the case of individual groups of respondents (Chart 3). Again, the result for the representative group is better than expected by the

authors of the study and confirms the generally good situation of the Polish market.

The answers to the question whether the respondent has seen product advertisements on the Internet, in the press, on television or in any other place in recent months, mentioning the environmental friendliness of product packaging, are 33% for yes and 67% for no (Chart 4.), so despite the increasing more messages of this type (campaigns Żywiec – Po stronie natury, Nałęczowianka – Uwierz w recykling, Rossmann – Czujesz klimat?), they are noticeable only to one third of the

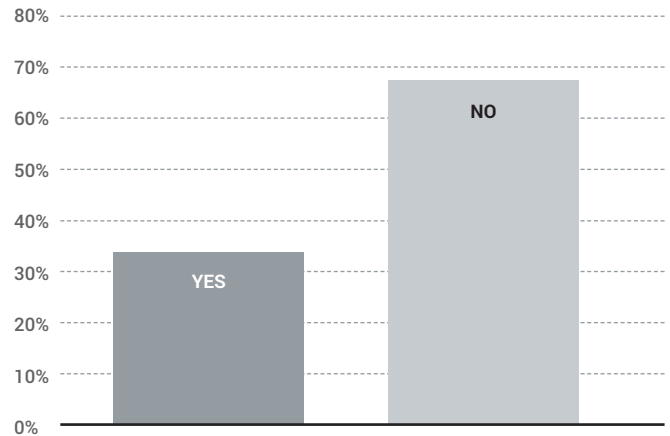


**CHART 2. IS THE ENVIRONMENTAL PERFORMANCE OF THE PACKAGING IMPORTANT TO YOU WHEN CHOOSING THE PRODUCT YOU BUY? – TOTAL RESULTS**



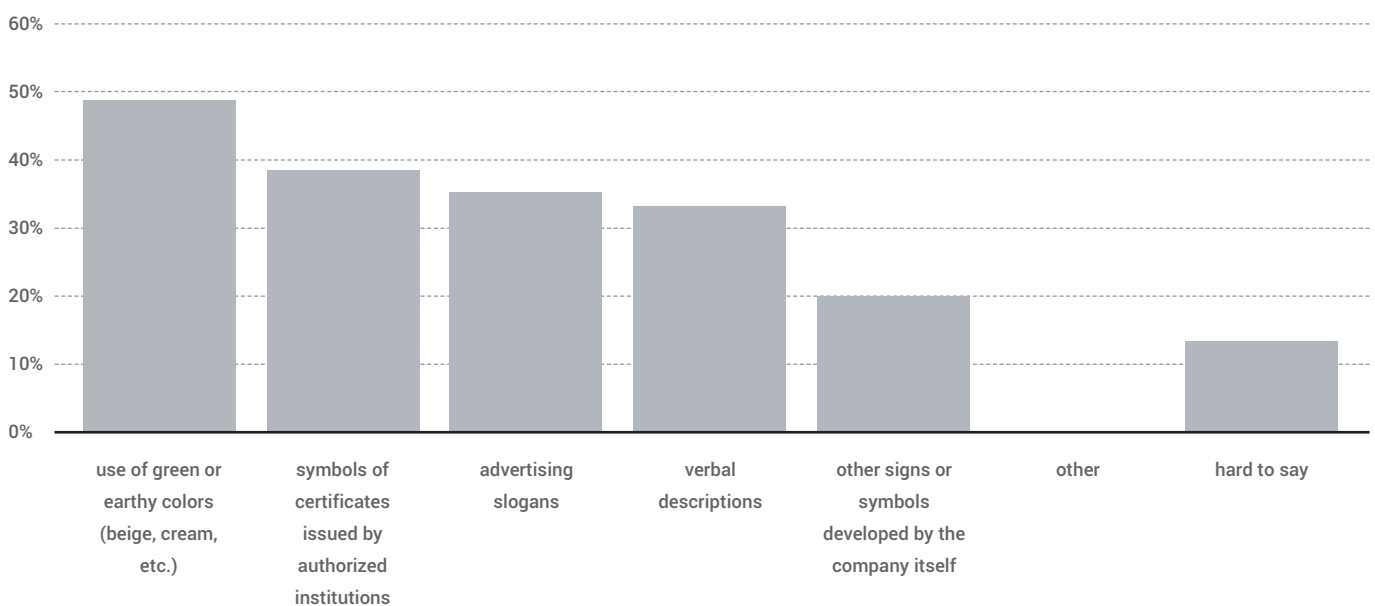
**CHART 3. DO YOU THINK THAT THE PACKAGING PRESENT IN POLISH STORES CONTAINS INFORMATION ABOUT THEIR ENVIRONMENTAL FRIENDLINESS? – TOTAL RESULTS**

respondents. In addition, the results for the group of 55 and older are slightly lower in this case, which may lead to the conclusion that the products that these buyers are interested in are promoted to a lesser extent through environmental values or communication is focused on younger groups and, in the first place, it builds brand awareness for them. This is not a desirable phenomenon in the context of the particularly high level of interest of this group in environmental protection issues – it can be called a wasted opportunity.

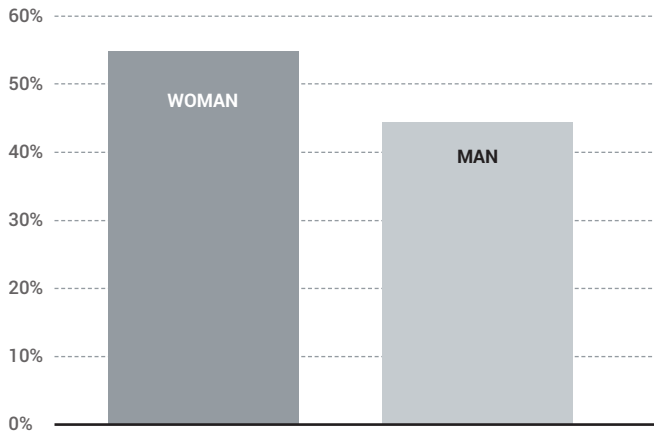


**CHART 4. IN THE RECENT MONTHS, HAVE YOU SEEN ON THE INTERNET, IN THE PRESS, ON TELEVISION OR IN ANY OTHER PLACE PRODUCT ADVERTISEMENTS THAT MENTION THE ENVIRONMENTAL FRIENDLINESS OF THE PACKAGING OF THESE PRODUCTS? – TOTAL RESULTS**

The next question was filtered: it was asked only to respondents who gave a positive answer to the previous one. It concerned the elements of the above-mentioned advertisements, which they particularly paid attention to or remembered – chart 5. Undoubtedly, the colors used turned out to be the strongest stimulus here, which attracted the attention of 49% of respondents. Differences in this matter between the sexes were also quite clear: color was noticed by 54% of women and 43% of men, which may indicate the need to differentiate stimuli in



**CHART 5. WHICH INFORMATION IN THESE ADS CAUGHT YOUR EYE FIRST, I.E., YOU PAID THE MOST ATTENTION OR REMEMBERED IT – TOTAL RESULTS**



**CHART 6. WHICH INFORMATION IN THESE ADS CAUGHT YOUR EYE FIRST, I.E., YOU PAID THE MOST ATTENTION OR REMEMBERED IT? – RESULTS DIVIDED INTO WOMEN AND MEN**

the case of products intended specifically for each gender – chart 6.

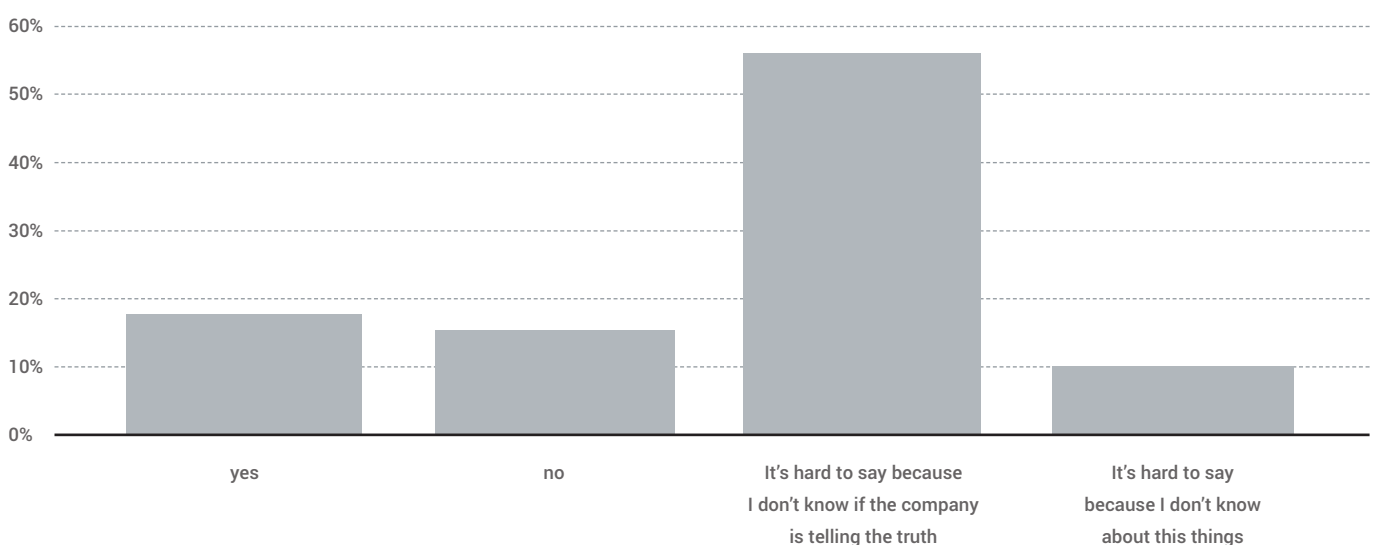
The second group of questions included in the study concerned the credibility of the elements of environmental marketing communication used by enterprises from the consumer's perspective. The initial question about the general credibility of the information about the environmental value of the packaging placed on the products gave interesting results. In all cohorts, a negative answer prevailed, however, mainly motivated not by

the lack of knowledge, but by the lack of trust in the producer and the uncertainty as to the ethical behavior of the producer – Chart 7.

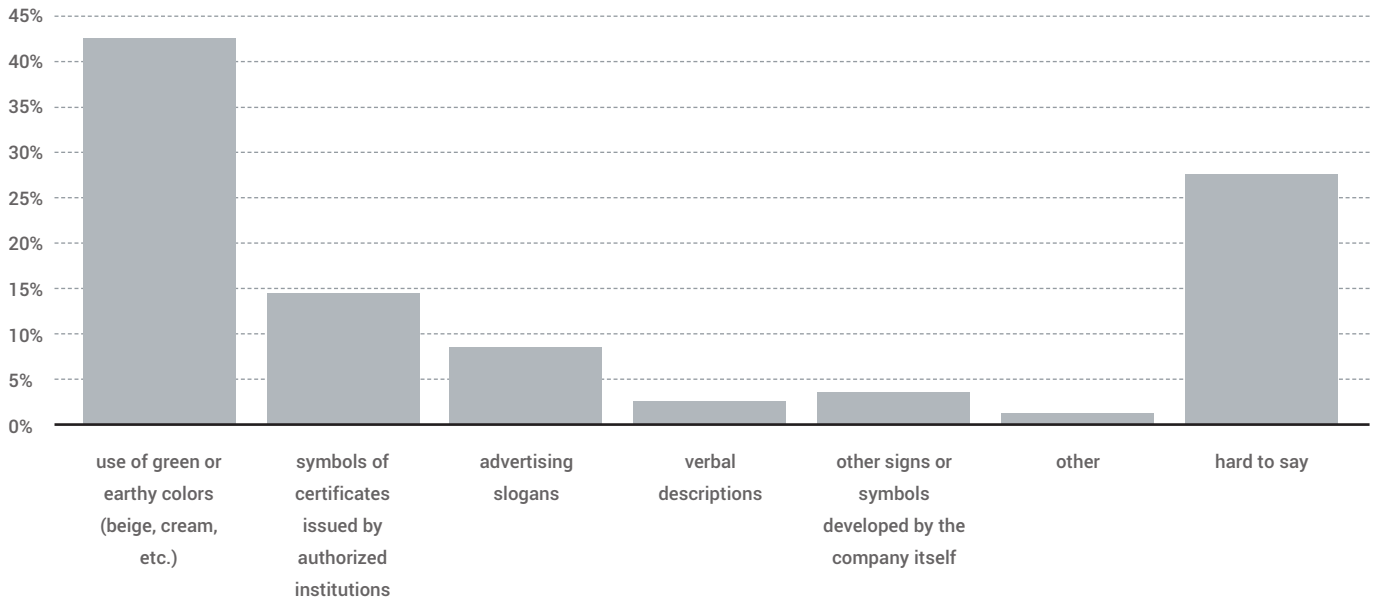
The respondents considered the markings of certificates issued by authorized institutions to be the most reliable element (Chart 8). An interesting observation here concerns a relatively small percentage of respondents who consider the color of the packaging to be the most reliable, compared to the answers to other questions of this study, clearly confirming that although in theory buyers do not consider the color to be the most reliable, in practice they often focus on their assessment of the environmental value of the packaging.

On the other hand, subsequent questions indicate that they often misinterpret the most important element for them, i.e., the certification symbols. Both observations may lead to the conclusion that there is a discrepancy between declarations and actual reactions, and the practical effectiveness of the most reliable forms is relatively low. This, in turn, requires corrective actions by the responsible institutions and organizations, especially regarding the answer to one of the following questions indicating a lack of trust in the company itself as the author of the communication.

In the next step, the comparison model examined the level of respondents' confidence in individual visual elements indicating



**CHART 7. IS THE INFORMATION ON THE ENVIRONMENTAL PERFORMANCE OF THE PACKAGING GENERALLY RELIABLE FOR YOU? – TOTAL RESULTS**

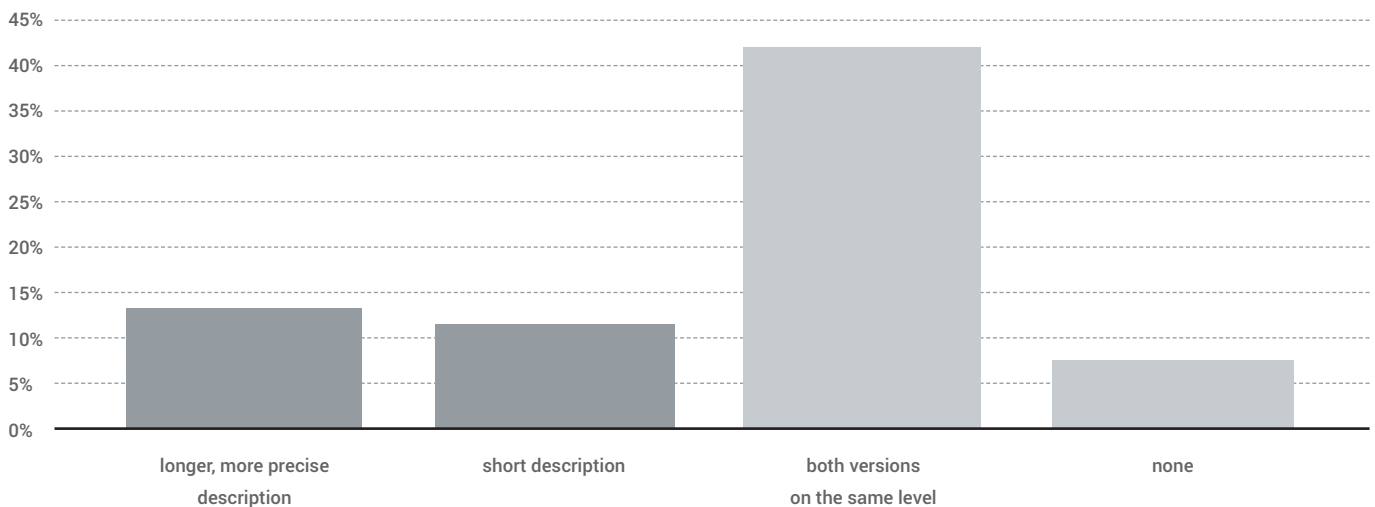


**CHART 8. WHAT IS THE MOST RELIABLE INFORMATION ABOUT THE ENVIRONMENTAL PERFORMANCE OF PACKAGING FOR YOU? – TOTAL RESULTS**

the compliance with environmental criteria, arranged in pairs of objects with slightly different specificity. The goal here was not only to observe general regularities, but also to indicate a more effective model from the buyer's perspective.

In the case of a verbal description, a short version is more credible than extensive, precise information. 15% of the respondents were in favor of the first option, while as many as 42% were in favor of the second (34% described them as equally credible, and 9% of respondents considered them

unreliable) – Chart 9. The distribution of these values is slightly different by age: in the group of respondents aged 55 and more, only 10% consider extensive information to be credible. The result allows to conclude that a condensed description is more credible, and therefore more effective in influencing the buyer, and not the extended, more precise version, but probably less understandable due to the accumulation of technical terms, especially for an older recipient. Therefore, the initial assumption that a factual, yet demanding, in-depth description is of significant value for the buyer was not confirmed.



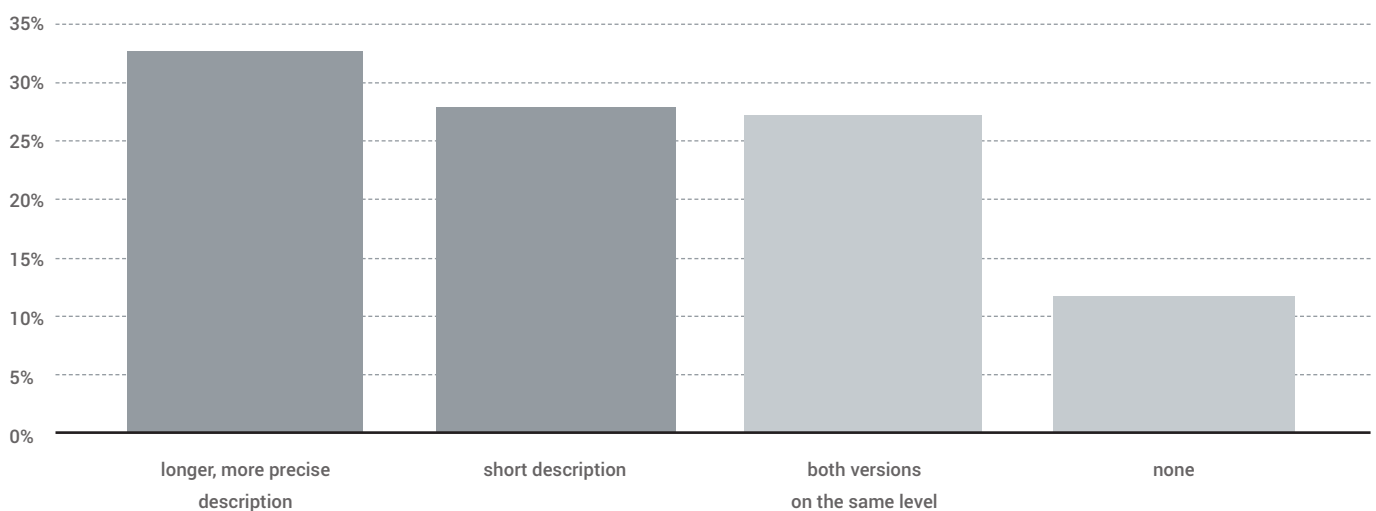
**CHART 9. WHICH OF THE FOLLOWING ILLUSTRATIONS, IN YOUR OPINION, PRESENTS MORE RELIABLE INFORMATION ABOUT THE ENVIRONMENTAL PERFORMANCE OF THE PACKAGING? – TOTAL RESULTS**

Regarding promotional slogans, it can be noticed the precise version is slightly more credible: it was indicated by 33% of the respondents, while the result for the more metaphorical version is 28% – chart 10. (27% of respondents indicated similar credibility, and the lack of credibility of both 12%), with the results for younger groups and people with higher education differing from the average for the entire group. In the 18-24 age group, a more precise password is credible for 41% (less precise for 22%, both for 14%, and neither for 23%), and in the 25-34 age group as much as 49% (less precise 24%, both 15, and none 13). Also, among people with higher education, a more precise password is credible for 41% (less precise for 25%, both for 24%, and neither for 10%). The values for the more precise solution are also higher in the case of inhabitants of a big city 40% (less precise 22%, both at a similar level 26%, neither 12%).

Thus, the feeling of credibility here is quite clearly correlated with age, place of residence and level of education: for younger buyers, residents of big cities and university graduates, greater precision is more important, which is worth considering in marketing communication addressed especially to these groups – in practice, for example, for products for young people.

The analysis of the color issue and the emotional (eliminating the effort associated with rational analysis in the circumstances

of limited time and data verification) reasons for the reaction to it clearly confirmed the initial assumption that buyers pay special attention to this element – even if initially theoretically they did not consider it the most important. In this case, two objects appeared in the list, in the case of which the only differentiating element is the color: green and purple. The English-language text, however, is identical, appearing first as a metaphorical slogan and then as a more extensive description (Picture 1.). The green version was considered the more credible version of the marketing message by 43% of respondents, while 3% were in favor of the purple one (the results for the options: both like credibility and both unbelievable are 27% each) – chart 11. No significant differences were observed in this case, broken down by gender, place of residence or level of education, such a result should therefore be considered universal for the entire population, regardless of additional individual conditions. Regarding certification marks and other occasional markings, the results of a more detailed analysis exclude the initial declaration of most respondents that they pay more attention to the first group. In practice, it turns out that in this pair of objects, the producers' own signs are more credible for a much larger percentage of respondents: 32% versus 15% (Chart 12.). This trend is particularly visible among younger respondents from the 25-34 age group: 42% versus 14%. This proves a clear discrepancy between the need or theoretical declaration of



**CHART 10. WHICH OF THE FOLLOWING ILLUSTRATIONS, IN YOUR OPINION, PRESENTS MORE RELIABLE INFORMATION ABOUT THE ENVIRONMENTAL PERFORMANCE OF THE PACKAGING? – TOTAL RESULTS**



**PICTURE 1. DIFFERENT COLOR VERSIONS OF THE SAME PACKAGING – COLOR AS THE KEY INFORMATION FOR THE BUYER**

SOURCE: PRODUCER'S PRESS SERVICE

acting in accordance with the principles of environmental protection and the practical knowledge of such solutions.

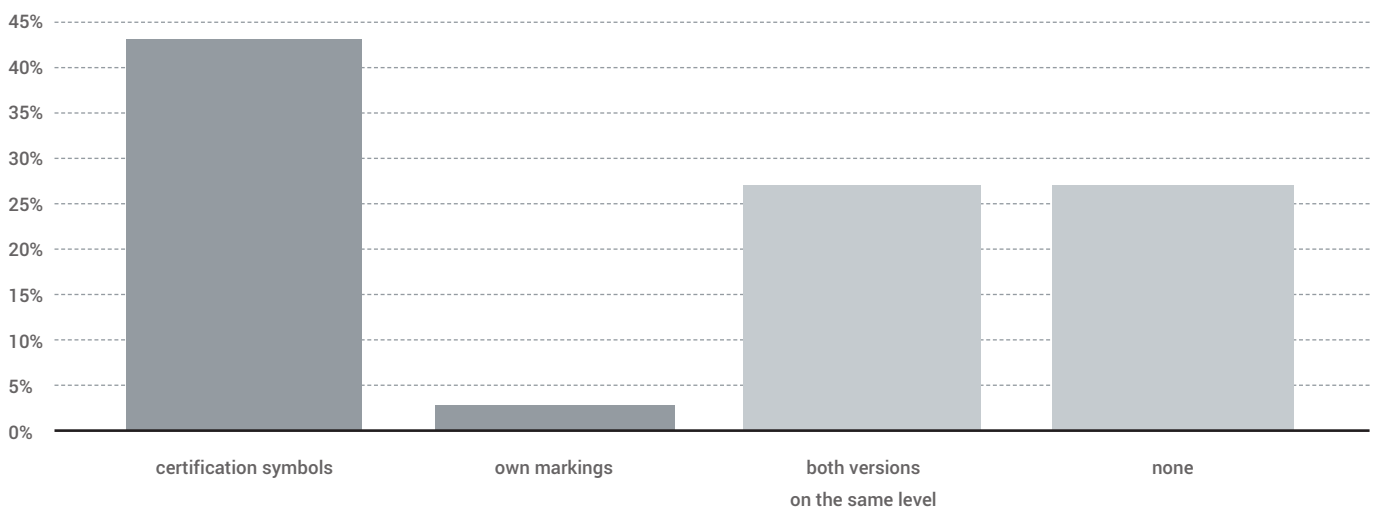
## CONCLUSIONS

The conducted analyzes confirmed that the most common models of packaging compliant with environmental criteria are recycling and the use of bioplastics. This conclusion is crucial for the marketing communication of enterprises related to the product or its elements compliant with the principles of environmental protection (Karwowska, Pawluk 2021).

Regarding the buyer and the consumer, a positive conclusion is the relatively high level of knowledge and acceptance of the respondents towards this type of packaging. Particularly important are the opinions on the use of packaging made of recycled material in the category of products perceived as sensitive and requiring a special level of safety: food, medicines, products for infants and young children (Karwowska, Pawluk 2021).

About bioplastics, the results are very promising. In the scale of the entire surveyed group, a product in a bio-based packaging would be chosen by 69% of respondents, including primarily people guided by the criteria of eco-friendliness (32%) and naturalness (31%). This is an interesting result, especially since 26% of the remaining respondents do not consider this issue, but do not exclude the purchase. Only 5% of respondents would clearly not choose this type of packaging, of which the clear majority (4%) due to the higher price, not the parameters – this situation may change with the dissemination of this type of solutions and a decrease in unit prices (Karwowska, Pawluk 2021).

For the buyer, the difference between packaging made of industrial bioplastics (and those of a less mass, artisan nature is relatively imperceptible and does not affect the attitude towards packaging. Clear differences in opinions can be



**CHART 11. WHICH OF THE FOLLOWING ILLUSTRATIONS, IN YOUR OPINION, PRESENTS MORE RELIABLE INFORMATION ABOUT THE ENVIRONMENTAL PERFORMANCE OF THE PACKAGING? – TOTAL RESULTS**

observed when divided into individual demographic cohorts. For example, women are a clearly more positive group towards bioplastics packaging. It seems, therefore, that products packaged in this way for them currently have a greater market potential. For all types of products, the highest percentage of respondents excluding their purchase in bio-based packaging was observed here in the group with primary/vocational education. Interestingly, while respondents with the lowest education are generally more skeptical about bioplastic packaging, their level of distrust clearly decreases in the case of food products and products for infants and young children, which directly affect the user's safety (Karwowska, Pawluk 2021).

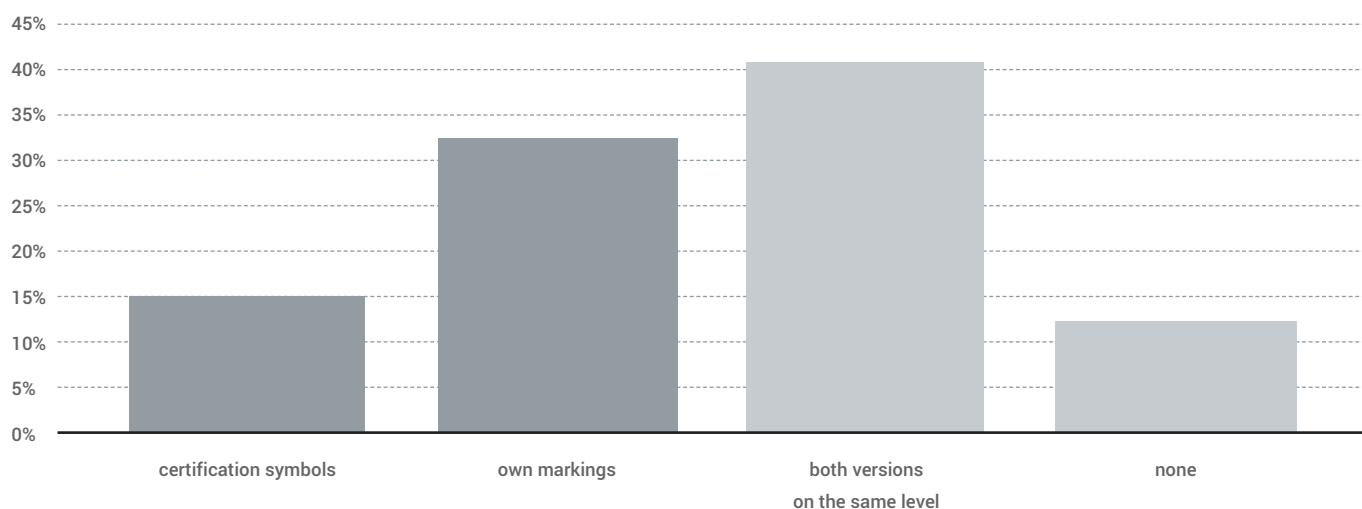
Interestingly, in the case of packaging made of recycled materials, the opposite pattern was observed: with an overall relatively high level of acceptance, packaging for products for infants and young children was the most sensitive respondents. It is in relation to the use of recycled materials in their production that they remain most skeptical. Therefore, a general conclusion can be drawn that, in the opinion of respondents, packaging made of bioplastics is safer than standard ones, while those made of recycled materials are less safe (Karwowska, Pawluk 2021).

It should be stated that the compliance of the packaging with the principles of environmental protection as an important element when making a purchasing decision is declared by

55% of the respondents, and the information provided by the producers on the environmental qualities of the packaging is noticed by 52% of the respondents. Thus, more than half of Polish consumers (at least on a theoretical level) not only pay attention to environmental issues in relation to packaging but are also guided by them in making purchasing decisions, and this result is relatively similar for individual groups of respondents, with a slight advantage for buyers older (Karwowska, Pawluk 2022).

In contrast to this, advertisements about the environmental friendliness of product packaging on the Internet, in the press, on television or elsewhere have been noticed in the recent months by only 33% of the survey participants, and such a situation should be considered a waste of market potential by companies – the possibility of effectively reaching the buyer. In the noticed advertising materials of various types, the strongest eye-catching stimulus turned out to be color, which drew the attention of 49% of respondents, and broken down by gender – 54% of women and 43% of men (Karwowska, Pawluk 2022).

Particularly interesting are the opinions of the respondents regarding the credibility of the elements of environmental marketing communication. A negative assessment prevailed in all demographic groups: respondents are not convinced about the veracity of the company's declaration. It seems that



**CHART 12. WHICH OF THE FOLLOWING ILLUSTRATIONS, IN YOUR OPINION, PRESENTS MORE RELIABLE INFORMATION ABOUT THE ENVIRONMENTAL PERFORMANCE OF THE PACKAGING? – TOTAL RESULTS**



the role of other organizations external to the producer (authorities at various levels, including local authorities, non-governmental organizations and finally the certification bodies themselves) in the verification and, more generally, the promotion of knowledge and desirable patterns of behavior of buyers is crucial (Karwowska, Pawluk 2022).

The respondents considered the symbols of certificates issued by authorized institutions to be the most credible element of communication based on packaging compliant with the principles of environmental protection, i.e., the model considered by the authors of the study to be the most reliable. However, the high percentage of such answers raises serious doubts as to their credibility. On the one hand, such signs are rather not used in advertising, on the other hand, in subsequent questions, they were assessed as much less reliable than the manufacturer's own markings. Thus, a certain discrepancy can be noticed between the declarations of potential buyers and their practical implementation, which is probably primarily due to the lack of thorough knowledge and misinterpretation (Karwowska, Pawluk 2022).

In the case of a verbal description, a condensed description is more credible, and therefore more effective in influencing the buyer, than the extended version, more factual, but probably less understandable due to the accumulation of technical terms, especially for an older recipient. On the other hand, in relation to promotional slogans (i.e., shorter forms that do not require such a high level of involvement as a verbal description), the precise version was rated as more credible, and therefore also effective, and this regularity is particularly noticeable among the respondents from the younger groups. The analysis of the color issue confirmed the assumption that buyers pay special attention to this element. The green version of the same packaging considered to be the more credible version of the marketing message, but there were no clear differences broken down by demographic groups, so the regularity can be considered universal. Summing up the results of the analysis of the issue of certification marks and other occasional markings, the discrepancies between the theoretical declarations and the actual reactions of the respondents, probably due to insufficient knowledge, should be emphasized once again. It turns out that

ultimately, manufacturers' own trademarks are more credible for a much larger percentage of respondents, which is particularly visible among younger respondents from the 25-34 age group (Karwowska, Pawluk 2022).

The main conclusion is therefore a significant discrepancy between the declarations of the surveyed people and their actual opinions and reactions in a situation of having to make a choice. In general, it should be stated that the current models of environmental marketing communication based on packaging are relatively effective in the areas of creating attitudes, but insufficient in the areas of conditioning specific purchasing behaviors. In the latter case, the element of lack of trust in enterprises is also crucial – to raise the level of efficiency, it seems necessary to involve external organizations and institutions of various types, which are both a source of knowledge and a guarantee for consumers (Karwowska, Pawluk 2022).

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# WARSZAWA PACK

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