Promotion of Crayon Painting Made of Natural Colors with Competitive Advantage Strategy

Aries Budi Marwanto¹; Taufik Murtono²

¹Department of Crafts, Institut Seni Indonesia Surakarta, Indonesia ²Department of Design, Institut Seni Indonesia Surakarta, Indonesia Corresponding Author: Taufik Murtono

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Abstract: In the era of increasing environmental awareness, eco-friendly products, such as painted crayons made of natural colors, are becoming an attractive option for consumers, especially parents who care about the health of their children. However, the challenge in promoting this product is how to differentiate it from conventional products made of synthetic materials. This research aims to develop an effective promotional strategy for natural color painted crayons by taking advantage of their competitive advantages, as well as increasing brand awareness among consumers. The methods used in this study include SWOT analysis to identify the strengths, weaknesses, opportunities, and threats faced by the product. Furthermore, a promotional strategy is designed based on the results of the analysis, focusing on educational, entertainment, promotional, and inspirational aspects. The results of the study show that promotional strategies that prioritize education about the benefits of natural products, as well as building strong relationships with consumers through social media, can increase brand awareness and differentiation from competitors. Engaging and interactive content also contributes to increased engagement with the audience. This research makes an important contribution to crayon manufacturers of natural color painting in formulating effective marketing strategies. By leveraging competitive advantages and responding to market needs, manufacturers can increase market share and support the sustainability movement.

Keywords: Eco-Friendly Crayons; Promotion Strategy; Competitive Advantage; Consumer Education.

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I. INTRODUCTION

Synthetic dyes that are widely used in painting paints come from chemical substances. Although most paint and crayon products are not toxic, they are classified as less environmentally friendly (Rahayu, Cahyana, and Rohandi 2017). Therefore, there is an urgent need to switch to safer and more environmentally friendly natural dyes (Tocharman 2009; Savitri and Safitri 2023). In tropical countries such as Indonesia, it is easy to find a diversity of plants that can be used as a source of organic dyes. This plant can be extracted to obtain color pigments from leaves, stems, and roots (Hikmah and Retnasari 2021). Before the existence of synthetic dyes, natural dyes such as stone, soot, and blood were used in painting (Paramitha 2017). Natural dyes are currently quite easy to obtain from plants that produce natural color pigments.

The production of crayons made from natural colors supports the goals of the SDGs, especially responsible consumption and production (Himmah et al. 2023). It aims to reduce the ecological footprint by changing the way of production and consumption (Rohmah, Anindyarini, and

Kedhaton 2024). Using natural dyes is not only environmentally friendly but also helps to preserve local culture and increase the added value of local handicraft products. This program involves local communities and can increase awareness and economic opportunities through the promotion of environmentally friendly products (Diba 2021). There is a growing interest in exploring natural sources of dyes from local plants for use in a variety of products, including crayons.

The current trend is towards the use of recycled materials for a wide range of products, which is in line with efforts to reduce environmental impact (Taswin et al. 2023). The marketing of eco-friendly products is increasingly utilizing social media and influencers to reach a wider audience, especially among young people and environmentalists (Mubin 2021). This research not only focuses on the technical aspects of organic crayon manufacturing but also on the social and economic aspects, with the aim of creating sustainable products and supporting local communities.

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One of the biggest challenges in the production of organic crayons and pastels is the stability of natural pigments (Irawati 2023). Many pigments extracted from natural sources tend to be unstable and can fade or change color over time, especially when exposed to light and moisture. This results in limitations in the use of these pigments for products that require high durability (Tamburini 2022). While there are many sources of natural pigments, the resulting color variation is often limited compared to synthetic pigments. This limits the ability of manufacturers to offer a wide color palette, which is crucial in the arts and crafts industry.

The production of organic crayons and pastels is often more expensive than synthetic products (Evitasari, Mufrodi, and Robi'in 2023). This high cost is due to the extraction and processing process of natural ingredients, as well as the need to ensure that all materials used meet safety and sustainability standards. This can be a barrier to the widespread adoption of organic products in the market. There are challenges in meeting strict regulations related to the use of chemicals in art products. Organic painting crayon manufacturers must ensure that all materials used are not only safe for users, but also meet applicable environmental standards. This often requires

additional research and testing, which can slow down the production process. While there is great potential for the development of organic colors (Hikmah and Retnasari 2021), these challenges need to be addressed to improve product quality, sustainability, and competitiveness in the market.

The purpose of this study is to analyze the competitive advantages of crayons made of natural colors and the development of promotional strategies based on the competitive advantages obtained. To analyze competitive advantages, product advantage identification, market assessment, and competitor analysis are required (Benzaghta et al. 2021). Meanwhile, to be able to develop a promotional strategy based on competitive advantages, marketing messages are prepared and promotional channels are selected.

II. METHOD

The method of designing promotions based on competitive advantages is used to achieve the research objectives that have been set. Furthermore, the development of a promotion strategy is carried out based on the competitive advantages obtained (figure 1).



Fig 1. Research procedure

A. Competitive Advantage Analysis

This analysis involves the stages of product advantage identification, market assessment, and competitor analysis. Product advantage identification involves literature studies and interviews with users of natural color crayons to identify product advantages. The use of SWOT (Strengths, Weaknesses, Opportunities, Threats) analysis methods at this stage of identification can help in identifying the advantages and weaknesses of the product. The output of this stage is in the form of a list of product advantages that includes aspects of safety, sustainability, and quality.

Market Assessment by conducting consumer surveys to collect data on their preferences and perceptions of natural color crayons. Data analysis is carried out using statistical methods to understand trends and patterns in consumer preferences. The output of this stage includes market segmentation, consumer needs, and market potential for the product.

Competitor Analysis by conducting competitive analysis through gathering information about similar products in the market. These methods can include product analysis, pricing, distribution, and competitor marketing strategies. The output is in the form of a comparison matrix that shows the position of natural color crayon products compared to competitors.

B. Promotion Strategy Development

The stages of promotion strategy development involve the preparation of marketing messages and the selection of promotional channels. The preparation of marketing messages uses brainstorming techniques and focus group discussions to develop interesting and informative marketing messages. The message should emphasize the product's superiority and relevance to consumer needs. The output nys are in the form of clear and engaging marketing messages, which can be used in various promotional channels.

The selection of promotional channels is carried out by analyzing existing distribution and promotion channels, as well as evaluating the effectiveness of each channel. This method can include surveys to find out which channels are most frequently used by the target market. The output is in the form of a promotional channel plan that includes social media, influencers, offline campaigns, and community events.

C. Implementation and Evaluation

The last stage involves the implementation of promotional strategies as well as evaluation and adjustment. Implementation of promotional strategies through the development of an action plan that includes timelines. budgets, and responsibilities for each promotional activity. Involve the marketing team and related stakeholders in the implementation process. The output of this stage is a detailed action plan for the implementation of the promotional strategy. Meanwhile, evaluation and adjustment use performance measurement methods such as return on investment analysis and consumer satisfaction surveys to evaluate the effectiveness of the promoted strategies implemented. Gather feedback from consumers and marketing teams to make necessary adjustments. The output is in the form of an evaluation report that includes recommendations for future improvement of promotion strategies.

III. RESULTS AND DISCUSSION

A. Competitive Advantages of Natural Color Crayons

Before you begin to format your paper, first write and save the content as a separate text file. Keep your text and graphic files separate until after the text has been formatted and styled. Do not use hard tabs, and limit use of hard returns to only one return at the end of a paragraph. Do not add any kind of pagination anywhere in the paper. Do not number text heads-the template will do that for you.

Finally, complete content and organizational editing before formatting. Please take note of the following items when proofreading spelling and grammar:

The aspect of competitive advantage is known from the search for reference sources, interviews with users of crayons made of natural colors, and SWOT analysis. Searching for references provides a better understanding of natural color crayon products, their benefits, and the challenges faced in their production.

Natural dyes are not only safe for children but also have a lower environmental impact compared to synthetic dyes (Gumulya and Gunawan 2023). The study also highlights the process of extracting natural dyes and the challenges faced in maintaining color consistency. The use of natural crayons can increase creativity and environmental awareness in children. The study also noted that parents are more likely to choose products that are safe and environmentally friendly (Gumulya 2021).

There is a market trend for eco-friendly art products (Purwanto et al. 2024), including crayons made from natural colors. The report includes data on demand growth for ecofriendly products, competitor analysis, and market projections for the next five years. It was found that consumers are increasingly concerned about sustainability, which encourages manufacturers to innovate in their products. The world today demands sustainable practices in the art paraphernalia industry (Asmara 2020), including the use of natural materials in the manufacture of crayons. The report also discusses the challenges faced by manufacturers in adopting sustainable practices and provides recommendations to improve sustainability in the supply chain. The use of natural materials in arts and crafts, including crayons is increasingly important today. The use of natural materials not only reduces environmental impact but also supports the local economy (Yana, Nengsih, and Hanum 2024).

This literature study shows that natural color crayons have many advantages, including safety, sustainability, and positive impact on child development. Despite the challenges in production and marketing, market trends show that consumers are increasingly concerned about eco-friendly products. With a better understanding of natural color crayons, manufacturers can develop more effective strategies to meet the ever-evolving market demands.



Fig 2. Promoted natural color crayon products

The results of the interviews show that users of natural color crayons generally have positive experiences and realize the importance of sustainability. They value the safety of the product, although there are expectations for more color variety and increased distribution. Users are also willing to pay more for eco-friendly products, reflecting a market trend that is increasingly prioritizing sustainability (Table 1).

Table 1. Results of interviews with users

Question (Q)	User 1	User 2	User 3	User 4	User 5
1.1. What motivates you to choose natural color crayons?	Want to give the best for	Support eco- friendly	Set a good example for	Using more natural	Support sustainability.
	children.	products.	children.	materials.	-
1.2. Since when did you start using	About one year	Six months ago.	One month	Three months	Two months
crayons made from natural colors?	ago.			ago.	ago.
2.1. What was your experience when using natural color crayons?	Very positive, easier to use.	Very fond, gives a different	Very good, kids prefer.	Good enough, giving it a	It's a lot of fun, the drawing

Question (Q)	User 1	User 2	User 3	User 4	User 5
		texture.		different feel.	experience is different.
2.2. Do you feel that natural color crayons are safer for children?	Yes, no worries.	when teaching children.	Very safe, no worries.	Yes, it is more convenient to use this product.	Yes, it's safer in art class.
2.3. What is the quality of the color produced by crayons made of natural colors?	Very good, softer.	Unique, giving it its own character.	Good enough, not as bright as regular crayons.	Good, hope it can be brighter.	Good enough, hope for more variety.
3.1. How important is it for you to use environmentally friendly products?	It is very important, wanting children to learn.	Essentially, contributing to sustainability.	It is very important, wanting children to learn.	Essentially, contribute to sustainability.	Very important, want to contribute.
3.2. Do you feel that the use of natural color crayons can increase children's awareness of the environment?	Yes, it can help them understand.	Yes, often explaining to children.	Yes, we often discuss the environment.	Yes, sharing information with peers.	friends.
4.1. Where do you usually buy natural color crayons?	From a colleague who sells this product.	Online.	Peer-to-peer production	Online.	My friend offers the product.
4.2. Are you willing to pay more for natural color crayons?	Yes, an investment in children's health.	Yes, value quality.	Yes, for children's health.	Yes, it values sustainability.	Yes, for health and the environment.
5.1. Do you experience any difficulties or challenges when using natural color crayons?	Sometimes it is difficult to find color variations.	Desired color not available.	No difficulty.	Sometimes it is difficult to find the color you need.	No difficulty, hope for more color choices.
5.2. What is your advice to natural color crayon manufacturers?	Add a variety of colors and attractive finishes.	Improve distribution and availability.	Do more promotion in schools.	Increase color variation.	Do more promotion on campus.
6.1. Would you recommend natural color crayons to others?	Of course, I have recommended.	Yes, to colleagues and artist friends.	Of course, to the parents of students.	Yes, to fellow designers.	Of course, to friends.
6.2. Is there anything else you would like to say about your experience using natural color crayons?	Hope more people are aware of the benefits of this product.		Hope more parents are aware of the benefits of this product.	Hope they can expand the product range.	Hope they can develop more products made from natural ingredients.

From the answers of the users, it is known that users choose crayons made of natural colors because they want to provide the best for children, support environmentally friendly products, set a good example, use natural materials, and contribute to sustainability (Q1.1). Users started using natural color crayons in the span of between three months and two years ago, with most starting about a year ago. This is enough to show that they have had enough time interacting with this product (Q1.2).

The user experience of using natural color crayons has been very positive, with many liking the ease of use, different textures, and fun drawing nuances, and children liking it more (Q2.1). Users feel that natural color crayons are safer for children, providing a sense of calm and comfort when used, especially in art classes (Q2.2). The color quality produced by natural color crayons is considered good and unique, although some users expect a brighter and varied variety (Q2.3).

Users consider it very important to use eco-friendly products as an effort to educate children and contribute to sustainability (Q3.1). Users believe that the use of natural color crayons can increase children's awareness of the environment through explanation, discussion, and information sharing (Q3.2). Users typically buy natural color crayons from a partner who sells them, online, or through a friend who offers the product (Q4.1). Users are willing to pay more for natural color crayons as an investment in children's health, value quality, and support sustainability and the environment (Q4.2).

However, users sometimes have difficulty finding the desired color variation when using natural color crayons, although some do not have difficulty and wish there were more color options (Q5.1). User suggestions for natural color crayon manufacturers include adding attractive color variations and packaging, increasing distribution and availability, and more promotions in schools and colleges

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(Q5.2). Users are willing to recommend natural color crayons to others, including colleagues, artist friends, parents of students, and fellow designers (Q6.1). Users hope that more people will realize the benefits of natural color crayons, and hope that manufacturers can develop more products and expand the range of such products (Q6.2).

From the results of user interviews, it can be concluded that users choose crayons made of natural colors because they want to provide the best for children, support environmentally friendly products, and contribute to sustainability. They started using this product between three months to two years ago, with the majority starting about a year ago, showing ample interaction with the product. The user experience has been overwhelmingly positive, with many loving the ease of use, different textures, and fun drawing feels, as well as feeling that the crayons are safer for children. The quality of the resulting colors is considered good and unique, although

there is an expectation for brighter variations. Users consider it important to use eco-friendly products as an effort to educate children and believe that crayons made of natural colors can increase environmental awareness. They typically buy these products from peers, online, or through friends, and are willing to pay more as an investment in children's health and sustainability.

However, some users have difficulty finding the desired color variation and wish there were more options. Suggestions for manufacturers include adding color variation, attractive packaging, increased distribution, and more promotion in schools and colleges. Users are willing to recommend this crayon to others and hope that more people realize its benefits, as well as hope that manufacturers can develop more products and expand their reach. To get an overview of development strategies based on competitive advantages, a SWOT analysis was carried out (Table 2).

feeling that the crayons are safer for children. The quality of the resulting colors is considered good and unique, although	development strategies based on competitive advantages, a SWOT analysis was carried out (Table 2).				
Table 2. SWC	OT Analysis				
INTERNAL	FACTORS				
Strenghts	Weaknesses				
 Eco-friendly products that support sustainability 	 Limited color variations 				
 Safe for children and provides a sense of calm 	 Uneven availability of products 				
 Positive and easy-to-use user experience 	 Lack of promotion and awareness among consumers 				
 Good and unique color quality 					
EXTERNAL FACTORS					
Opportunities	Threats				
 Increasing awareness of eco-friendly products 	 Competition from synthetic crayon products 				
 The increasing demand for natural products 	 Rapid changes in consumer preferences 				
Potential to expand the market through promotion in schools	Economic uncertainty that can affect purchasing power				
Opportunities for collaboration with educational institutions					
DEVELOPMEN					
SO Strategy (Strengths-Opportunities):	WO Strategy (Weaknesses-Opportunities):				
• Increasing Promotion and Education: Using the power of	Product Diversification: Develop more attractive color				
eco-friendly products to raise awareness among parents and	variations and packaging to attract more consumers, as well				
children through promotional campaigns in schools and	as increase distribution to ensure product availability.				
educational institutions.	Distribution Improvement: Improve distribution				
Collaboration with Schools: Developing a partnership	channels by partnering with local stores and online platforms				
program with schools to introduce natural color crayons in art	to expand market reach.				
activities, thereby increasing use and awareness.					
ST Strategy (Strengths-Threats):	WT Strategy (Weaknesses-Threats):				
Improving Quality and Differentiation: Utilizing good	Market Analysis and Strategy Adjustment: Conduct				
product quality to differentiate from synthetic crayon products, as	regular market analysis to understand changing consumer				
well as emphasizing health and environmental benefits in	preferences and adjust products and marketing strategies				
marketing.	according to market needs.				

• **Product Innovation**: Developing new products that are more innovative and attractive, such as crayons with natural scents or that can be used in various media, to attract consumers' attention.

Based on the SWOT analysis that has been carried out, the most effective strategy to promote natural color crayon painting, taking into account the competitive advantages of the product, is the SO (strengths-opportunities) strategy by 1) leveraging the strengths of the product including environmental excellence: and safety for children, 2) responding to market opportunities driven by the opportunity of increasing demand for natural products and opportunities for education, 3) Build strong relationships with consumers through social media through promotions to increase brand awareness and differentiation from competitors and support

 Increased Brand Awareness: Invest in more aggressive marketing campaigns to increase brand awareness and respond to threats from competing products.

the sustainability movement. The SO strategy is the most appropriate because it combines the strength of the product with the existing market opportunity, creating a holistic and consumer-focused approach. By leveraging the competitive advantages of natural color crayons, manufacturers can increase awareness, build strong relationships with consumers, and ultimately, increase sales and market share. By implementing this strategy, natural color crayon manufacturers can effectively promote their products, increase awareness of their benefits, and expand market share.

B. Development of Promotion Strategy based on competitive advantage

The promotion strategy is compiled based on the content pillar which includes educate, entertain, promote, inspire, content ideas, and goals (Table 3).

Table 3. Content pillar crayon painted in natural colors

Content pillar Content ideas	Goal
<u> </u>	umer knowledge about the
	color crayons and build trust
crayons and their benefits for children's health.	the product.
A short video explaining the environmentally friendly Raising aware	eness of the importance of
	l educating consumers about
	stainability.
products that are safe for children.	
Education about Natural Products	
Blog posts or videos about natural product trends and	
how our crayons meet these needs.	
Tips for parents on how to teach children about Output in a hillien the words out.	
sustainability through art. Entertain Creativity and Fun of Drawing • Increase engage	ment and make interactions
, , , , , , , , , , , , , , , , , , , ,	ement and make interactions brands fun.
natural color crayons.	i brands fun.
Time-lapse video of the drawing process using our	
crayons.	
Funny memes or comics about the children's drawing	
experience.	
Promote Product Promotions and Special Offers • Increase sales	and attract the attention of
Posts about special discounts or product bundles.	consumers.
Announcement of drawing contest with attractive	
prizes.	
User testimonials highlighting positive experiences with	
the product.	
	unities that are inspired and
	ustainability movement.
Success stories from children or schools that use greyons made of natural colors.	
crayons made of natural colors.	
Profiles of artists who use our products and how they support sustainability.	
Inspirational quotes about art and the environment.	

This content pillar design provides a comprehensive approach to the promotion of natural color painting crayons. By combining elements of education, entertainment, promotion, and inspiration, brands can create effective and engaging social media strategies. This will not only increase brand awareness but also build strong relationships with consumers, support the sustainability movement, and differentiate the product from competitors in the market.

C. Implementation and Evaluation

In today's digital era, social media, especially Instagram, has become a very effective platform to promote products (Prautami 2022), especially among the younger generation [21] and young couples who care about the quality of the ingredients used in children's products. Therefore, the promotion strategy of Natural Color Painting Crayons is focused on using Instagram as the main channel.

The content uploaded on Instagram is focused on attractive and informative visuals. Photos of crayons used in various drawing activities by children were taken with good lighting and interesting compositions. Short tutorial videos

on how to use crayons and children's creations were also produced to capture the audience's attention. Hashtags such as #CrayonAlam, #LukisBersamaAnak, and #KreativitasAnak are used to increase the visibility of posts. The right use of hashtags helps to reach a wider audience and increase engagement.

Collaboration with influencers in the field of parenting and children's arts is carried out to expand the reach of promotion. Influencers are invited to try products and share their experiences through posts and stories on Instagram. The marketing team actively interacts with followers through comments and direct messages. Questions and feedback from users are answered quickly to build a good relationship with consumers. Paid advertising on Instagram is also used to reach a wider audience. Target ads tailored to relevant demographics, such as parents with early childhood.

After the implementation of the promotion strategy on Instagram, an evaluation is carried out to assess the effectiveness of the campaign. Some of the evaluation results obtained are as follows: The engagement rate on posts

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increased by 30% in the first three months. However, some posts with educational content did not get the expected response. This shows that while visually appealing, educational content needs to be tailored to make it more appealing to the audience. Feedback from consumers shows that they highly value the quality of the crayon material, but there is a demand for more color variety. Therefore, product customization by adding color variations can be considered.

Paid advertising showed positive results with a 20% increase in sales. However, further analysis showed that ads featuring tutorial videos had a higher conversion rate compared to static image ads. Therefore, more video content needs to be produced for future campaigns.

Based on the results of the evaluation, the content strategy needs to be adjusted with more focus on interactive content, such as quizzes or drawing challenges, to increase audience engagement. Evaluations are carried out periodically to monitor campaign performance. Strategy adjustments are made based on data analysis and feedback from the audience to ensure that promotions remain relevant and effective. With proper implementation and continuous evaluation, the promotion strategy of Natural Color Painted Crayons on Instagram is expected to significantly increase brand awareness and product sales.

IV.C ONCLUSION

This study shows that painted crayons made of natural colors have great potential to attract the attention of consumers, especially among parents who care about health and sustainability. By taking advantage of the product's competitive advantages, such as safety for children and positive impact on the environment, the designed promotional strategy can increase brand awareness and differentiation from similar products. Through an approach that prioritizes education, entertainment, promotion, and inspiration, manufacturers can build strong relationships with consumers and encourage the use of natural products. The results of this study emphasize the importance of a holistic and consumer-focused marketing strategy in increasing the market share of natural color crayons.

Further research can conduct surveys or interviews with consumers to gain a deeper understanding of their preferences and purchasing behaviors regarding eco-friendly products. Conduct a more comprehensive analysis of competitors in the crayon and similar products market to identify successful strategies and areas for improvement. Further research could focus on developing more interactive and engaging educational content, such as video tutorials or mobile apps that teach children about art and sustainability. Conduct longitudinal studies to evaluate the effectiveness of the promotional strategies implemented, including measuring the impact on sales and consumer loyalty. Researching the possibility of developing new products that are also made from natural materials, such as other art tools, to expand the product line and attract more consumers.

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