



An Analytical Study on the Relationship between Skincare Knowledge and Product Consumption Patterns

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<http://dx.doi.org/10.47814/ijssrr.v8i9.2845>

Abstract

The present research examines how consumer awareness affects purchasing habits in the skincare sector at a time when conscious consumption is changing the skincare industry. The goal of this study was to find out the differences in consumer awareness and buying habits according to the daily usage of skincare. A structured questionnaire was sent to 125 people. Descriptive statistics, ANOVA tests, and visual tools like bar graphs were used to assess how aware consumers were of something and how that affected their buying behaviour. The graphs showed that moisturizers were the most popular skincare products, followed by sunscreens and cleansers. Contrarily, exfoliants were the least popular, with only 13.6% of people saying they used them. Vitamin C was the most well-known ingredient, with 91.2% of respondents saying they were familiar with it, followed by Retinol and Hyaluronic Acid. Also, online shopping was the most popular way to buy things, with 68% of respondents saying they bought their things online. Moreover, doctors are the primary source of recommending these products. It was also found that the primary reason to use skincare products is to protect the skin from external factors and maintain hygiene. The statistical analysis showed that people who use a higher number of skincare products have higher knowledge and exhibit more buying habits. People who buy and use more skincare products daily tend to know more about the ingredients in those products. Also, people who use skincare products more often are more likely to pay more attention to things like checking the product information, such as the brand name, ingredients, and manufacturing date, before they buy it. So, these results show that there is a need for clearer labels and more information for consumers so they can make better choices about their skin care.

Keywords: Awareness; Buying Behavior; Ingredients; Skincare; Usage; Vitamin-C

1.Introduction

1.1. General Background

The global skincare industry has witnessed exponential growth in recent decades, with consumers becoming increasingly proactive and discerning about the products they use. The expected revenues from the global skincare market in 2024 amount to USD 189.50 billion. Furthermore, the annual growth rate of the skincare market from 2024 to 2029 is predicted to be 3.65%. In 2024, every individual was expected to account for USD 24.46 of the total revenue of the skincare market per capita (Statista, n.d.). With improved awareness among consumers and the growing importance of personal care, skincare is not just a luxury but also a part of daily self-care routines. In India, the skincare industry is growing. The Indian skincare market is likely to earn revenue valued at USD 9.96 billion in the year 2024. On top of this, the industry is anticipated to grow annually with a growth rate of 2.57% from 2024 to 2029 (Statista, n.d.-a). This growth is driven by increasing consumer demand for transparency, personalization, and evidence-based formulations in skincare products. Today's skincare emphasizes the use of scientifically validated ingredients for targeting specific concerns without compromising efficacy or safety. Among these, retinol, vitamin C, and hyaluronic acid are the most well-known; each of which offers distinct advantages for skin health (Guest, 2023). Studies have proven that these three play an important role in maintaining the safety and health of the skin, contingent upon usage in proper concentrations or combination with complementary formulations (Watts, 2022). For example, though retinol is incredibly potent in reducing the appearance of aging, improper usage can irritate the skin (Sharkey, 2020). Similarly, the antioxidant potential of vitamin C is maximized if used in conjunction with stabilizing agents to prevent its susceptibility to oxidation (Bhatia, 2022). Safety in skin care relies on the proper concentration of active ingredients, their formulation, and compatibility with other products (Rao et al., 2009). While active components do offer high advantages, misusing them could mean overexposure or blending of incompatible constituents that can trigger irritation, hypersensitivity, or even harm for a period (*Chronic Skin Conditions*, n.d.). Salicylic acid may work by helping the skin to shed dead cells from the top layer and by decreasing redness and swelling (inflammation). This decreases the number of pimples that form and speeds healing; however, overuse can lead to redness, peeling, and dryness (Johnston, 2024).

Formulation transparency and endorsement by dermatologists are critical in assuring the safety and efficacy of skincare products. Consumers are much more mindful of what they put on their skin. With immense amounts of information available, one can search ingredient lists to fit their view of how safe, effective, and aligned products meet their guidelines (Huong et. al., 2024). Some chemical types include parabens, sulfates, skin irritants, and potential health risks (Healthians, 2023). Awareness of skincare products impacts safety, effectiveness, and individual suitability. Information technology, in particular, is helping consumers take notice of skin-related problems. In addition to this, consumers are aware of the risks of various ingredients, such as skin irritation and damage over time. Nevertheless, there is still a gap between awareness and action. This gap exists because individual care is not prioritized, compounded by marketing influence, price sensitivity, low regulatory sharpness, and limited understanding of labeling. To foster proactive consumer awareness regarding skincare, the focus has to be on bridging the gaps between awareness and action.

Consumer awareness is an individual's knowledge of what is in a product, their skin type, what a product is supposed to do, and what side effects or improvements to expect. As more consumers are exposed to ingredient information from online channels, they become more aware of the things they put on their skin. This awareness informs their inclinations; that's why they read product labels, verify certificates, and prefer not to use harmful ingredients like parabens, sulfates, and allergens. But information isn't always conducive to good decision-making. This is what consumer practices are all about. These are real behaviors like reading labels, checking expiration dates, patch testing, reading reviews, and product claims. There is frequently a large difference between what consumers understand

and what they do. For example, one may be aware of the hazards associated with certain ingredients and still purchase a product due to its price, trendiness, or convenience.

1.2. Literature Review

In recent years, there has been an increasing scholarly and commercial interest in comprehending how consumer awareness affects purchase behavior, especially in the skincare sector. A study conducted by Nayak et al. (2023), FRCP aimed to assess the awareness level among female patients regarding adverse reactions caused by cosmetic products. All female patients who visited the dermatology outpatient department were the source population. The sample size was 400 respondents selected through the Convenience sampling method. Based on the results, they concluded that the most common facial adverse effect was acne in 60 respondents (15.25%), followed by redness of skin in 29 (7.50%) respondents. The difference between cutaneous side effects in 93 and facial side effects in 100 was attributed to the fact that some women were unclear as to whether the facial side effects were entirely cutaneous or systemic. The study found that while most participants used cosmetic products regularly, their awareness about potential adverse reactions and harmful ingredients was generally low

Another similar study by Khan & Khan (2013) was done to determine consumer buying behavior through the awareness of product ingredients in skin care products by Women users living in Madhya Pradesh, India. The questionnaire was self-administered to 250 respondents, and the Chi-square test was used in the study as a statistical technique. Based on the results, it was implied that the awareness level among women skincare consumers is contributed to by education, exposure to media, and advertisements showing the use of unique ingredients in their products. According to the responses acquired from the buyers, 66.80% of Women's Skincare Consumers agree that the fact that products should not have side effects is the most important variable that impacts the purchasing of skincare products. Additionally, the study noted a growing awareness among consumers about the side effects of skincare products.

Using a similar technique of data collection, Al-Sheyab et al. (2023) undertook research to identify the level of health literacy about the use of retinol creams among female undergraduate students of the Faculty of Artificial Intelligence in Salt, Jordan. This study used an analytical descriptive research methodology by designing and applying the data from 221 female undergraduates. The findings led to the conclusion that at a moderate level, the students did not apply retinol creams to avoid such complications that arise, like burning and itching. In addition, there was an average level of perception concerning the concept of prevention shown by the respondents, which denotes awareness of care measures, while on the use of retinol creams. Medical and health-related information about the cream, however, proved to have average knowledge that these students carry, but a much weaker aspect lies in the harmful side effects upon use.

Specifically for Malaysia, Tay and Toh (2024) aimed to determine the public's knowledge of facial skincare products as well as their level of awareness regarding them. Based on the results, they concluded that the general knowledge of respondents regarding facial skincare products was moderate, while the respondents' level of awareness was high. Besides, respondents' age, gender, monthly household income, and profession are associated with their level of knowledge and awareness of facial skincare products. Younger individuals and women tended to exhibit higher awareness and greater engagement with skincare information, likely due to increased exposure to social media and beauty trends. Similarly, respondents with higher household income and professional occupations were more likely to have better access to quality products and information, leading to enhanced knowledge and more informed skincare decisions

Apart from awareness regarding skincare products, Sujith.C (2024) aimed to identify other factors influencing people to buy skincare products. Using a survey, this study examines different drivers of the demand for skincare products, including dermatologist consultation, previous experience, weather or

climate, social media, brand ambassadors and celebrities, attractive packaging and presentation, product quality, brand or company reputation, and price. Weather influences product preference: people prefer lightweight products in the heat because they feel cooler and drier. There is a powerful emotional and psychological appeal of social media, celebrity endorsers, and pretty packaging. Product quality and brand reputation drive loyalty, while price influences initial purchase and perceived value.

Hence, from the evidence of the literature, it is apparent that there exists a different level of awareness among consumers regarding skincare products in different regions. Moreover, the examined literature constantly emphasizes that consumer awareness, especially concerning substances and possible adverse effects, significantly influences skincare purchasing behavior, particularly among women. Elements including educational attainment, media exposure, and health literacy serve as significant determinants of this awareness, highlighting the increasing desire for transparency and safety in skincare products.

1.3. Literature Gap and Rationale of the Study

Although consumer awareness has been widely examined in relation to purchasing behavior, limited research focuses specifically on the skincare market. Furthermore, while some studies elaborate on general skincare awareness, there remains a significant gap in research focusing on ingredient-specific awareness, such as consumer knowledge of retinol, vitamin C, hyaluronic acid, and other ingredients. In addition, there is a lack of focused research in urban areas, often due to the assumption that individuals in these regions are already highly educated and well-informed about skincare products. Lastly, most existing studies have explored the dimension of consumer awareness, but have not thoroughly examined the actual practices and behaviors undertaken during the skincare purchasing process. Therefore, there is a need for research to fill out all these gaps in the literature. Along with this, the skincare industry has witnessed rapid growth, driven by increasing consumer interest in product safety, ethical sourcing, and ingredient transparency. As consumers become more informed, their awareness significantly shapes purchasing behavior. Given the rapid changes in skincare trends, new product launches, and shifts in consumer awareness, there is a need for updated research reflecting current industry trends and consumer preferences post-pandemic. Hence, this study aims to address the gaps by examining how consumer awareness and purchasing practices influence buying decisions in the skincare market, providing valuable insights for both academic research and marketing strategies.

2. Methodology

2.1. Research Aim and Objectives

This research paper aims to study the effects of consumer awareness and purchasing practices on the buying behavior of consumers in the skincare market. The following objectives are explored in this study.

- To explore the most common types of skincare products used by consumers.
- To identify the primary reasons for using skincare products.
- To evaluate the purchasing channels and sources of recommendations for skincare products.
- To determine the familiarity and usage of specific skincare ingredients among consumers.
- To evaluate the differences in consumer knowledge of skincare ingredients based on the daily skincare product usage, comparing individuals who use more skincare products with those who use fewer.

- To analyse the differences in purchasing practices based on the daily skincare product usage, comparing individuals who use more skincare products with those who use fewer.

2.2. Research Hypotheses

The research objectives were investigated through graphical analysis and statistical tests. The following research hypotheses were assumed under the statistical analysis.

- Null hypothesis 1: There exist differences in consumer knowledge (CK) of skincare ingredients based on the daily skincare product usage.
- Null hypothesis 2: There exist differences in purchasing practices (PP) while buying skincare products based on the daily skincare product usage.

2.3. Scales, Tools Used, and Process of Data Collection

The data for this research were collected using a survey. The questionnaire was divided into a few sections. The first section incorporated demographic questions such as age, gender, education, occupation, and income. The second section includes general multiple-choice questions regarding the usage of skincare products and practices while purchasing skincare. A standard scale for these purchasing practices, sourced from Udayanga et al. (2024), was used to evaluate consumer behavior while purchasing skincare products. Participants were asked how frequently they engaged in specific practices such as reading ingredient labels, checking for production license, and reading the manufacturing and expiry date. The scale ranged from Very Rarely (1) to Always (5), allowing respondents to express the regularity of their habits. This helped identify whether informed practices like checking for active ingredients were part of their purchasing behaviour. Finally, the last section tested the respondents' knowledge related to the specific skincare ingredients, including retinol, vitamin C, hyaluronic acid, niacinamide, and salicylic acid. Herein, participants were provided a series of false/true statements to assess their awareness related to skincare ingredients. These statements covered both accurate and inaccurate information about these ingredients. Respondents had to identify whether each statement was true or false. Each correct answer was awarded 1 point, while incorrect responses received 0. Furthermore, the data for the research was collected through Google Forms. The survey link was spread widely across a myriad of platforms like WhatsApp, Instagram, email, and social media platforms for a varied demographic of respondents.

2.4. Sampling and Sample Characteristics

The method employed for sampling in this study was non-probability convenience sampling. The number of responses received was 125, primarily from New Delhi, India. The sample comprised 72.8% females and 27.2% males, reflecting the dominant gender distribution in skincare consumption. In terms of age distribution, there was a wide coverage of consumer preferences across different age groups. Participants were also classified in terms of their education, level of occupation, and income to see how socioeconomic factors influence their skincare purchase behaviors. 33.6% have a bachelor's or equivalent, 25.6% have a master's or equivalent, 24.8% have education below or equivalent to high school, 11.2% hold a professional degree, and 4.8% have education higher than a master's. Moreover, 5.6% are students, 24.0% are business owners, 21.6% are professionals, 19.2% are housewives, 8.8% are private employees, and 0.8% are government employees. Lastly, out of the total sample size, 31.2% earn 20 lakhs and above, 20.0% earn 5-10 lakhs, 9.6% are not earning, 8.0% earn 10-20 lakhs, and 5.6% earn below 5 lakhs.

2.5. Statistical Tools and Techniques

To analyze the collected data, a combination of descriptive and inferential statistical tools was employed along with appropriate visuals such as graphs. This paper used means and standard deviations

to get a good sense of the typical behaviors and how much people differed from each other. Additionally, an ANOVA test was employed, which is a statistical test used to analyze the difference between the means of more than two groups (Stoyle & Wold, 1989). This test allowed us to determine whether the average scores among the different groups are genuinely different or if the differences are simply a result of chance. The results were considered to be significant if the p-value was less than 0.1, which indicates that there is a statistically significant difference between the groups. Moreover, the Eta-squared (η^2) value was used to measure the proportion of variance in the dependent variable explained by the independent variable or effect being studied. Its value ranges from 0 to 1 and can be interpreted approximately as follows: a value around 0.01 indicates a small effect, around 0.06 suggests a medium effect, and 0.14 or higher represents a large effect (Bobbitt, 2021). Lastly, to determine which specific groups differ significantly, the Bonferroni post hoc test is used (*Dunn-Bonferroni Post-hoc Test*, n.d.).

2.6. Ethical Considerations

Ensuring the ethical integrity of this study was a primary concern. Before participation, all individuals were informed about the purpose of the study, the type of data being collected, and how their responses would be used. Moreover, to ensure the privacy and protection of all participants, responses were collected anonymously without recording any personally identifiable information such as names, contact details, or IP addresses. Lastly, all data were stored securely and treated with strict confidentiality, following established ethical research standards and guidelines. Therefore, personal information was not shared or disclosed to any third party.

3.Results

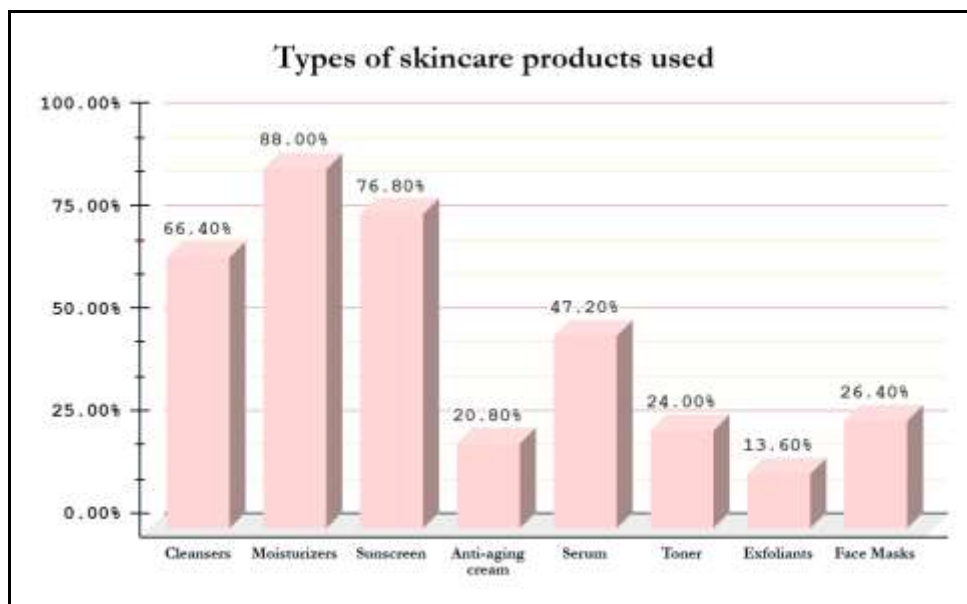


Figure 1: A Column Chart representing the types of skincare products commonly used

The graph in Figure 1 shows the different types of skincare products commonly used by respondents. The x-axis lists products such as cleansers, moisturizers, sunscreens, anti-aging creams, serums, toners, exfoliants, and face masks. The y-axis represents the percentage of respondents who reported using each product. The data shows that moisturizers were the most frequently used skincare item (88%), being used by nearly nine in ten participants. Sunscreens (76.8%) and cleansers (66.4%) followed in popularity. In contrast, exfoliants were the least popular, with only 13.6% reporting their use.

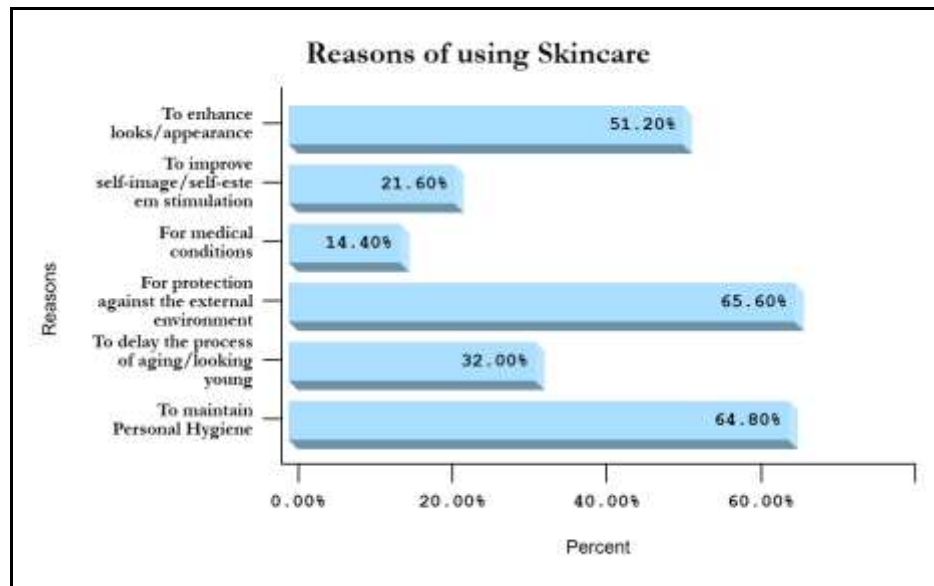


Figure 2: Bar Graph depicting primary motivations behind the use of skincare products

Figure 2 illustrates the primary motivations behind respondents' use of skincare products. The y-axis lists various reasons such as protection from environmental damage, hygiene, enhancing appearance, improving self-esteem, addressing medical conditions, and delaying aging. The x-axis represents the percentage of respondents who endorsed each reason. The most common motivation was protection against the environment, cited by 65.6% of participants, followed closely by hygiene at 64.8%. Furthermore, enhancing appearance ranked third, with 51.2% indicating it as a key factor. In contrast, only 27.2% of respondents attributed their skincare use to medical conditions, while delaying signs of aging was the least common reason, reported by just 21.6%.

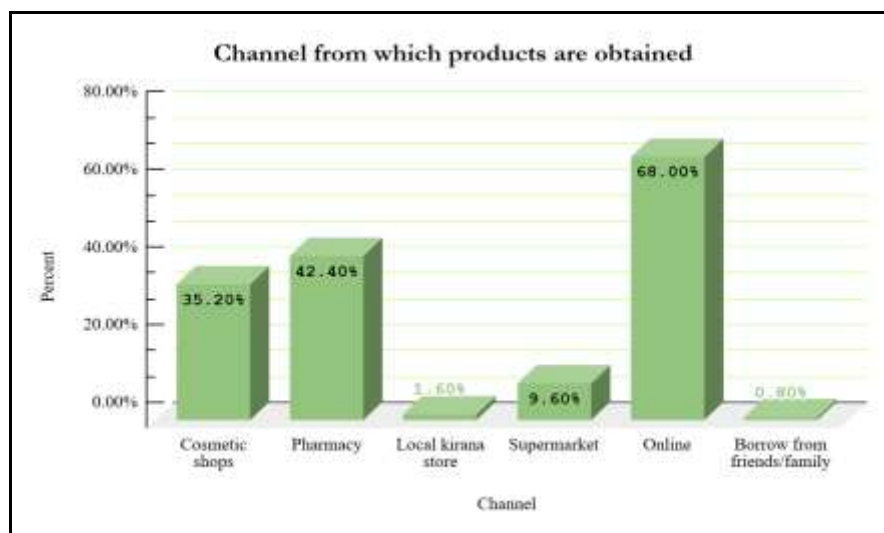


Figure 3: A column chart representing the various channels through which consumers obtain skincare products

The graph in Figure 3 highlights the various channels through which consumers obtain skincare products. It can be seen that Online shopping emerged as the most popular channel, with 68% of

respondents purchasing their products via digital platforms. Additionally, Pharmacies and cosmetic shops followed, at 42.4% and 35.2% respectively. Other physical retail sources, such as supermarkets (9.6%) and local kirana stores (1.6%), were far less common. Lastly, borrowing from friends or family was the least favored option, with only 0.8% of respondents relying on this channel.

Figure 4 shows the various sources of recommendations for consumers in the skincare arena. As expected, Doctors were the most trusted source, with 49.6% of respondents following their advice. Friends came next at 37.6%, followed by social media influencers at 28%. Parental input accounted for 15.2%, while beauticians and siblings influenced 12.8% and 9.6% of users, respectively. Partners/spouses (10.4%), children (7.2%), and pharmacists (2.4%) were the least relied upon sources for skincare product recommendations.

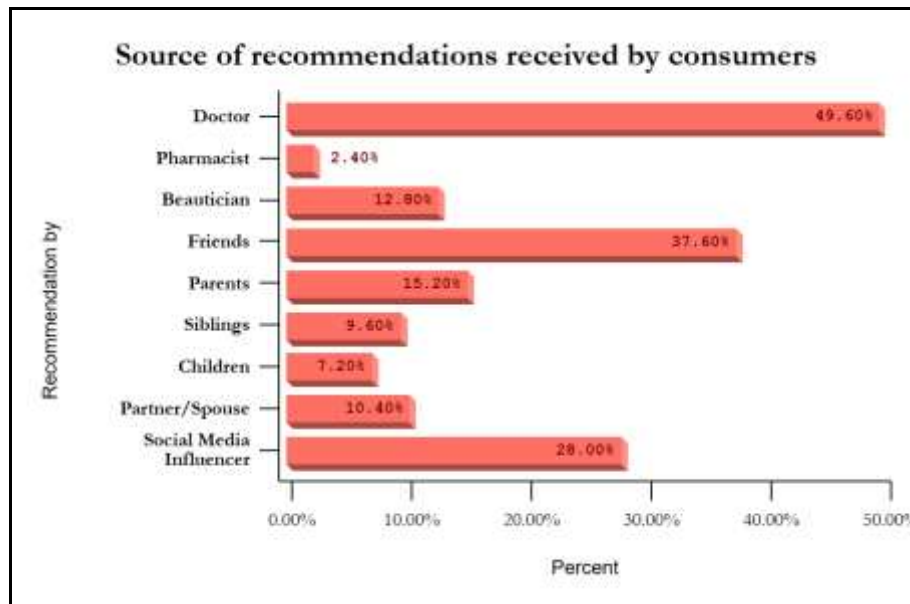


Figure 4: Bar graph highlighting the source of recommendations received by consumers

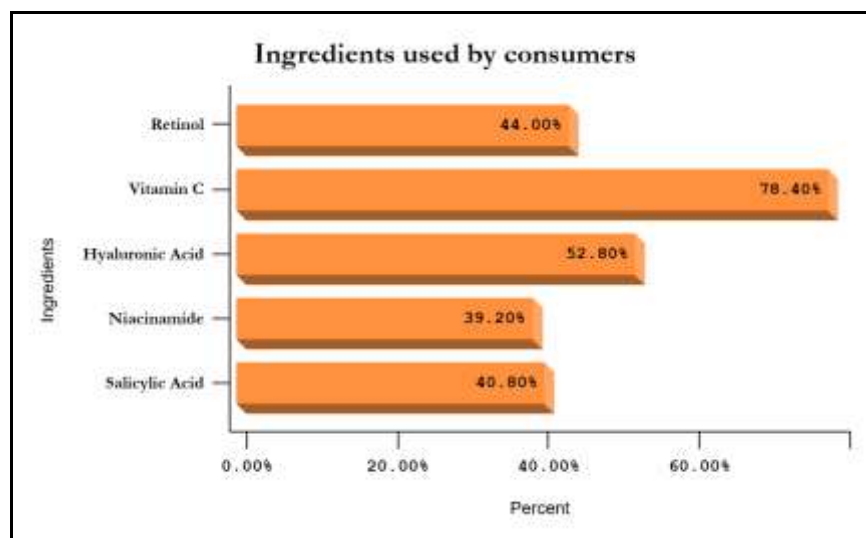


Figure 5: Bar graph illustrating the percentage of individuals using specific skincare ingredients

Consumers' usage of various skincare ingredients, including retinol, vitamin C, hyaluronic acid, niacinamide, and salicylic acid, is depicted in Figure 5. It is noticeable that Vitamin C was the most widely recognized ingredient, with 91.2% of respondents indicating familiarity. Retinol and Hyaluronic Acid followed closely, with 61.6% and 60% respectively. Finally, Salicylic Acid was known to 58.4% of participants, while Niacinamide was the least familiar, with only 45.6% of respondents recognizing it.

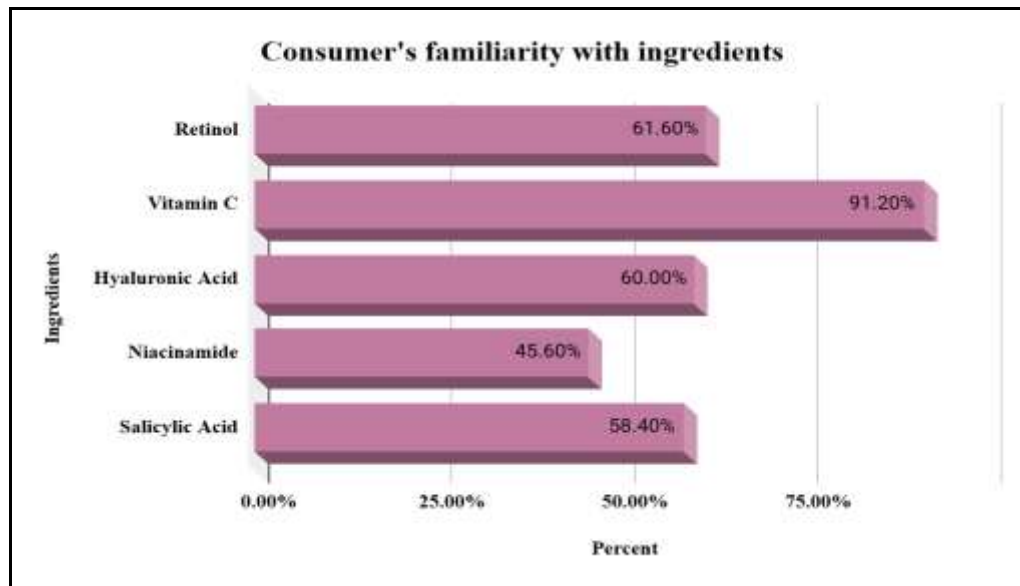


Figure 6: Bar graph illustrating the percentage of individuals familiar with specific skincare ingredients

The above chart in Figure 6 depicts the familiarity with skincare ingredients among respondents. Similar to the last graph, Vitamin C emerged as the most frequently used ingredient, with 78.4% respondents familiar with the ingredient. Moreover, Hyaluronic Acid and Retinol were also familiar among the individuals, reported by 52.8% and 44% of respondents, respectively. Lastly, Salicylic Acid followed at 40.8%, while Niacinamide was the least used, with only 39.2% of participants reporting its use. Specifically, the consumer's knowledge regarding these ingredients is shown using the descriptive statistics and ANOVA tests.

Table 1: Descriptive statistics showing consumer knowledge based on daily skincare **product usage**

Group	Mean	Standard Deviation
CK ₁₋₂	7.46	1.88
CK ₃₋₄	8.13	1.79
CK _{>=5}	8.43	1.34

Table 2: ANOVA Results for consumer knowledge based on daily skincare product usage

Sources of Variation	SS	df	MS	F	p-value	η^2
Between the Groups	19.32	2	9.66	3.12	0.048**	0.05
Within the Groups	378.33	122	3.1			
Total	397.65	124	12.76			
			Mean Difference	t-value	p-value	
CK ₃₋₄ - CK ₁₋₂			0.66	1.9	0.181	
CK _{>=5} - CK ₁₋₂			0.97	2.22	0.086*	
CK _{>=5} - CK ₃₋₄			0.31	0.69	1	

Tables 1 and 2 represent the descriptive statistics and ANOVA results for consumer knowledge based on daily skincare product usage. Herein, CK₁₋₂ refers to consumer knowledge of skincare ingredients among individuals who use 1-2 products daily. CK₃₋₄ represents consumer knowledge of skincare ingredients among individuals who use 3-4 products daily. CK_{>=5} refers to consumer knowledge of skincare ingredients among individuals who use more than and equal to 5 products daily. The ANOVA table shows that the p-value is 0.048, which is smaller than the common significance level of 0.05. This suggests that there is a statistically significant difference in consumer knowledge of skincare ingredients among the various groups. It can be seen from the descriptive statistics that the higher the number of skincare products an individual uses or buys, the higher their knowledge and awareness are. Specifically, individuals using more than five skincare products daily have an average score of 8.34, those using three to four products have a mean score of 8.13, while individuals using only one to two products report a lower average score of 7.46 under consumer knowledge. Moreover, the eta squared value of 0.05 suggests a small to medium effect size, implying that low variation in consumer knowledge regarding skincare ingredients can be attributed to the number of skincare products used by an individual. Finally, the Bonferroni post hoc test shows us that the difference in knowledge is primarily between those groups who are using more than 5 products and those who are using 1-2 skincare products daily, and the mean difference between these 2 groups is 0.97.

Table 3: Descriptive statistics showing purchasing practices based on daily skincare product usage

Group	Mean	Standard Deviation
PP ₁₋₂	26.91	8.27
PP ₃₋₄	30.94	7.88
PP _{>=5}	31.87	7.98

Table 4: ANOVA Results for purchasing practices based on daily skincare product usage

Sources of Variation	SS	df	MS	F	p-value	η2
Between the Groups	589.11	2	294.56	4.52	0.013**	0.07
Within the Groups	7945.96	122	65.13			
Total	8535.07	124	359.69			
			Mean Difference		t-value	p-value
PP ₃₋₄ - PP ₁₋₂			4.03		2.52	0.039**
PP _{>=5} - PP ₁₋₂			4.96		2.47	0.045**
PP _{>=5} - PP ₃₋₄			0.93		10.46	1

Tables 3 and 4 highlight the descriptive statistics and ANOVA results for purchasing practices based on daily skincare product usage. Herein, PP₁₋₂ refers to the purchasing practices while buying skincare products among individuals who use 1-2 products daily. PP₃₋₄ refers to the purchasing practices while buying skincare products among individuals who use 3-4 products daily. PP_{>=5} refers to the purchasing practices while buying skincare products among individuals who use more than 5 products daily. The results from the ANOVA tests show that the p-value is 0.013, which is smaller than the common significance level of 0.05. This suggests that there is a statistically significant difference in purchasing practices while buying skincare products among the various groups. It can be seen from the descriptive statistics that the higher the number of skincare products an individual uses or buys, the more likely they are to check the product information while buying any skincare product. Specifically, individuals using more than five skincare products daily have an average score of 31.87, those using three to four products have a mean score of 30.94, while individuals using only one to two products report a lower average score of 26.91 for these purchasing practices. Moreover, the eta squared value of 0.07 suggests a medium effect size, implying that medium variations in purchasing practices can be attributed to the number of skincare products used by an individual. Finally, similar to the consumer knowledge, the Bonferroni post hoc test shows us that the difference in the practices is primarily between those groups who are using more than 5 products and those who are using 1-2 skincare products daily, and the mean difference between these 2 groups is 4.96. Furthermore, the practices also differ in the groups who are using 3-4 products and those who are using 1-2 skincare products daily, and the mean difference between these 2 groups is 4.03.

4. Discussion

From the results, it was found that for both consumer knowledge and purchasing practices, the average scores are higher for those individuals who use more skincare products in a day. As consumers use more skincare products such as serums, creams, sunscreens, and cleansers, their routines tend to become more complex, often involving the purchase of multiple products. This rise in use not only shows

that people are following more complicated skincare routines, but it also makes them more aware and deliberate about their choices. Specifically, for skincare products, purchasing is also linked to consumers being more value-driven, emphasizing product quality, ingredient transparency, and ethical considerations like sustainability and cruelty-free claims. This shift is particularly seen among Gen Z and millennials, who seek brands that align with their values and lifestyle choices (Bhardwaj, 2025). Higher purchase frequency correlates with more informed and cautious consumer practices (Mittelman et al., 2019). The likelihood of checking product compatibility, shelf life, and manufacturing dates to ensure safety and efficacy increases (Nohynek et al., 2009). Moreover, higher purchasing often leads to greater brand loyalty, especially when brands provide clear information about product freshness, batch numbers, and ingredient sourcing (Trinh & Dawes, 2020). When people buy and apply skincare products more often, they come across a larger variety of options, ingredient lists, and marketing messages (Ananda et. al., 2024). This consistent exposure helps them become more familiar with popular ingredients, understand what benefits they might offer, and recognize any potential side effects (Wong, 2023). Additionally, those who invest more in their skincare routines tend to look for information to make sure their choices are effective, safe, and match their values, like clean beauty or sustainability. As consumers become more aware of ingredients, they start paying close attention to product labels to steer clear of irritants or harmful chemicals, which boosts their understanding of what goes into the products they use (Lixandru, 2017). Brands increasingly focus on transparency regarding their ingredients, offering more detailed information and educational resources. This includes ingredient indexes and comprehensive product breakdowns, which help regular shoppers understand and compare the products more easily (Stelmaszczyk, 2024). This shift not only empowers consumers to make more informed choices but also builds trust, as they can see what is in the products they are purchasing.

Also, people who spend money on skin care usually want to learn more by reading reviews, getting advice from dermatologists, or watching how-to-use videos that brands make. This kind of behaviour promotes a culture of making informed decisions, where being honest about what is blended into a product and knowing the components in the product are important for brand loyalty. Because of this, manufacturers are giving customers more and more information about their products, like detailed ingredient lists, suggestions for how to use them, and online tools to help them make choices. Over time, this helps customers trust you more and gives them the power to choose products that work and also fit with their beliefs and skin health goals. So, using a product more often leads to a cycle of smarter purchases, better understanding of the ingredients, and more thoughtful consumer behaviour. This progression improves the results of individual skincare while also encouraging more accountability and openness in the skincare industry.

5.Conclusion

Consumer awareness is no longer a passive trait but an active influence in modern buying behavior. This study aimed to assess the impact of consumer awareness regarding ingredients on their buying behavior and usage of skincare products. For this research, a survey was formulated to explore the areas such as awareness regarding ingredients, practices during the purchase of skincare products, and purchase decision factors. 125 responses were gathered through the questionnaire. Using graphical representation and statistical analysis, including ANOVA and the Bonferroni test, the collected responses were analysed. From the charts, it was depicted that the most familiar ingredients in skincare products were vitamin C, followed by retinol, while the least known component is niacinamide. The charts also helped in determining that around 50 percent of individuals who participated in the survey would follow doctors' advice when it came to skincare products. Also, the key motivations for using skincare products by people were to protect the skin against exposure to the external environment, to maintain hygiene, and to enhance the looks of the individual. Additionally, ANOVA tables were created to determine if there was a significant difference in consumer awareness regarding skincare ingredients according to the daily

usage of skincare products. The results showed that there is a significant difference in consumer awareness regarding skincare ingredients based on the number of skincare products used by an individual daily. This implies that individuals who use more skincare products tend to exhibit greater ingredient awareness. Moreover, the key difference in consumer behavior is between individuals using over five products daily and those using just one or two. Similarly, consumers who use more skincare products every day perform practices to check the details of the product before purchasing it. Those who use more products, buy more products, and usually want to know about what they are applying to their skin. Customers' skincare routines often evolve into elaborate processes involving serums, toners, sunscreens, and additional products, with an increase in spending. With this newfound understanding and interest, customers examine ingredient lists, check expiration dates, and research whether products work well together. This is an outcome of increased spending, which drives customers to gather information from reviews, expert advice, company videos, and many other platforms. Such inquisitiveness promotes a culture that supports smart spending. Increased product familiarity and routine usage boost customer confidence and make shoppers more educated, leading them to know what their skin requires and what products are incompatible.

6. Limitations and Policy Implications

Despite the substantial results, this study possesses some drawbacks. The primary issue with this study is that it only looked at a small number of ingredients. The study examines only five ingredients, so it doesn't take into account how aware people are of other common ingredients that might also affect their choices. Second, the study only included people from the Delhi NCR area. This information might not be true for individuals living in other parts of the world, where culture and economy may be different. Lastly, the sample size was small, with only 125 people responding, which could make it harder to apply the results to a larger group of people.

This study offers useful information to many groups, such as industry brands, policymakers, and groups that advocate for the interests of consumers. This study can help product developers and formulators figure out which ingredients have the biggest effect on buying behaviour, which will help them come up with new ideas. Marketers and advertisers can make good campaigns by focusing on ingredients that people already know about and also bringing attention to ingredients that aren't as well-known. Advocacy groups can also push for clearer labelling of ingredients and campaigns that educate consumers about their choices. These insights can help skincare and personal care brands adjust their marketing strategies to meet the changing needs of consumers who are aware of what they are putting on their skin.

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