

Consumer Perception towards Hair Care Product Benefits: An Empirical Study in Himachal Pradesh

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ABSTRACT

Background

The present study examines consumer perceptions of hair care products in Himachal Pradesh, with a particular focus on the influence of demographic factors. Employing a quantitative, descriptive research design, data were collected through a structured questionnaire administered to 450 respondents from the Kangra, Mandi, and Shimla districts.

Materials and Methods

Analytical methods included descriptive statistics, independent samples t-tests, and one-way ANOVA. The results highlight that youths, particularly those aged 18 to 25 years, constitute the largest segment of cosmetic product consumers, with women representing the predominant group of cosmetic users (Kumari, 2026).

Results

Significant differences in perceptions were observed based on place of residence, marital status, and district, whereas gender, age, occupation, education, and income levels did not yield significant differences.

Conclusion

The study concludes that, although demographic factors do not entirely determine consumer attitudes toward hair care products, functional benefits remain pivotal. These findings offer valuable guidance for marketing strategies and product positioning within the hair care sector, particularly in rural markets.

Keywords: Himachal Pradesh, ANOVA, consumer behaviour, hair care products, consumer perception, product benefits, demographic factors.

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Introduction

The cosmetic or personal care sector is one of the fastest-growing sectors of the global economy, driven by increased awareness of personal grooming, hygiene, beauty consciousness, and self-care. Among cosmetics categories, the hair care segment has been expanding faster as customers demand manageable, attractive, and healthy hair. The Indian hair care products market is projected to grow at a compound annual growth rate (CAGR) of 4.73 per cent from an estimated USD 4.10 billion in 2026 to nearly USD 5.19 billion by 2031, according to Mordor Intelligence's India Hair Care Products Market Report (2026). The study also highlights that emerging consumer preference for herbal, natural, and special

hair care products is a key driver of expansion in the Indian market.

Hair care products, including shampoos, conditioners, hair oils and treatments, hair serums, and styling products, are widely utilised for both sanitary and cosmetic reasons. Patterns of personal care product use, such as those for hair care, have been documented among diverse groups of women, indicating that product selection may be influenced by lifestyle and awareness of hair health and appearance (Dodson et al., 2021). Johnson et al. (2023) examine the effectiveness of piroctone olamine in shampoos for treating dandruff, focusing on product efficacy rather than broader consumer preferences or market dominance of shampoo products (Johnson et al., 2023, pp. 236-245).

Cosmetic businesses are using performance and benefit-oriented marketing strategies amid increased competition from the hair industry's expansion. Consumers expect hair care products to provide benefits such as preventing breakage, nourishing the scalp, reducing breakage, managing dandruff, moisturising hair, and improving hair quality. Research shows consumers are more likely to purchase cosmetic and personal care products that provide value satisfaction, quality assurance, and tangible effects (Kim & Chung, 2011). Positive perceptions lead to loyal customer purchases and satisfaction.

Consumer perception is how people organise and analyse information about products and services to form attitudes and beliefs and act toward a purchase. Consumer perception is significant in the cosmetics industry, as it directly influences product preference and purchasing decisions. Consumers assess hair care products based on these factors: quality, efficacy, ingredients, packaging, scent, safety and product-related claims. Previous studies have shown that consumers' perceptions of the safety of hair and cosmetic products, as well as the related hazards, are important factors in their purchase decisions (Payne et al., 2023). Likewise, consumer values and behaviours regarding the consumption of cosmetic products are heavily influenced by demographic characteristics, awareness levels, and product experiences (Llanos et al., 2023).

In the cosmetics industry, digital media, social networks, and social media marketing significantly impact customer awareness and purchasing habits. Consumers are more likely to compare products, read reviews, and seek customised hair care solutions before buying. Brand image, promotional strategies, and environmental consciousness influence intentions to purchase cosmetics (Amberg & Fogarassy, 2019; Phu et al., 2024). Furthermore, consumers increasingly prefer natural and herbal hair care products due to concerns about sustainability and safety (Limbu et al., 2022). Gender, age, education, occupation, income, marital status, and place of residence affect consumer perceptions and purchase behaviour. The benefits customers find in a product may vary by lifestyle, budget, product knowledge, and exposure to promotions.

The increasing use of hair care products in India, particularly in rural areas, reflects evolving consumer attitudes toward self-care and personal grooming. This shift, along with rising awareness of hair care products, positions Himachal Pradesh as a market with

considerable potential. However, there is a literature search examining consumer perceptions of hair care product benefits, especially regarding Himachal Pradesh. Therefore, the study examines consumers' perception of the benefits of hair care products.

2. Literature Review

2.1 Consumer Behaviour towards Hair Care Products

At present, hair care products are changing, as consumers are increasingly making their product choices based on quality, brand image, product performance, price, smell, ingredients, and expected benefits, making it a great area for marketing research. Philavanh (2013) found a link between the purchasing behaviour of customers of HUL and P&G hair care products in India and demographic variables (age, gender, income). The survey also found that a significant number of young consumers use hair care products, underscoring the importance of demographic data in understanding hair care product consumption. Khanam and Rahman (2022) conducted a study on women customers' preferences for international shampoo brands and found that brand functionality, perceived quality, Factors affecting purchase decisions, and Product performance all affect customer preferences.

2.2 Cosmetic Consumption and Consumer Perception

Consumer perception plays an important role in the product selection process, as customers rely on factors such as product quality, safety, efficacy, ingredients, and their own experiences. Mohammed et al. (2021) found a strong correlation between customers' attitudes and their perceptions of their demographics in a study of Malaysian adults' attitudes toward cosmetics. Udayanga et al. (2024) explored students' knowledge, attitudes, and cosmetic consumption in Sri Lanka. The study focused on cosmetics use, the dangers of cosmetics use, influences on cosmetics purchase and reasons for cosmetics consumption. The results indicate that customers' perceptions and knowledge influence their cosmetic use.

2.3 Natural, Eco-friendly, and Safe Cosmetic Preferences

The findings of recent studies indicate that consumers are increasingly aware of the need for safe, natural and environmentally friendly cosmetics. Mitterer-Daltoé et al. (2023) studied women's perceptions of natural

and eco-friendly products and their consumption of cosmetic creams. They examined the effects of sociodemographic factors on cosmetic use and perception. The novelty of the results is that they show that, in addition to effectiveness, naturalness, safety, and environmental issues are important determinants of customer perception of cosmetic products.

Mandeville et al. (2024) investigated perceptions of risk in the population and the use of personal care products by race/ethnicity. They found that the idea that social and demographic factors influence the perception and use of personal care products was supported by their research, which showed differences in risk perception and use across groups. This is beneficial for the present study as it explores the impact of various demographic groups on consumers' perceptions of the benefits of hair care products.

2.4 Personal Care Product Safety and Risk Perception

Product safety has become a major consideration in the cosmetic and personal care product industry. However, consumers have become more aware of potential health and environmental risks associated with product ingredients, and the use of personal care products has been rising in the last 20 years, according to Diyab et al. (2025) in a scoping study on risk perception of personal care products. This demonstrates the importance of studying customer perception, as it can impact product choice and purchasing behaviour. Perceived danger and perceived safety can influence both.

Barrett et al. (2025) examined how sociodemographic characteristics, purchasing patterns, and opinions regarding product safety relate to the use of personal care products. They found that customers' perceptions of safety and knowledge about chemical dangers are connected to the products they purchase. The finding is relevant to the present study because consumers may evaluate hair care products beyond performance, safety, and trustworthiness.

2.5 Research Gap

The above literature review shows that consumer purchasing behaviour with hair care products, preferences for shampoo brands, cosmetic consumption behaviour, perceptions of natural and eco-friendly cosmetics, and perceptions of risk with personal care goods have been studied previously. However, consumer perceptions of the functional benefits of hair care products (such as hair loss prevention, strengthening hair roots, nourishing the

scalp, moisturising hair, adding shine, and controlling dandruff) have not been well-researched.

Additionally, very few attempts have been made to statistically determine whether customer perceptions of the benefits of hair care products are significantly affected by demographic variables such as gender, place of residence, age, marital status, occupation, district, level of education, and monthly income. In this context, the current study focuses on an empirical analysis of consumers' attitudes toward the benefits hair care products provide to residents of Himachal Pradesh.

2.6 Research Question

Q.1 Are there significant variations in consumer perceptions of hair care product benefits based on demographic factors in Himachal Pradesh?

2.7 Objectives of the Study

- i To analyse the benefit perception of hair care products among consumers of HP.
- ii To explore the relationship between the demographic factors and consumers' perceptions about the benefits of hair care products.
- iii To see if there are significant differences in consumer perceptions of the benefits of hair care products by demographic groups.

3. Research Methodology

The present study adopted a quantitative approach to examine consumers' perceptions of the benefits of hair care products in Himachal Pradesh. The main focus of the study is benefits such as reduced hair breakage, strengthened hair roots, nourished scalp, hydrated hair, stimulated growth, prevention of hair fall, shine, and dandruff control. The primary data used for the analysis were from 450 respondents.

3.1 Research Design

The research design in this study is quantitative and descriptive. Since the study's goal is to characterise consumers' opinions of the benefits of various hair care products, the descriptive design was deemed appropriate. A quantitative approach was used, with numerical analysis of responses and statistical analysis of differences across demographic groups. Consumers' impressions were measured using Likert-scale statements, and the responses were analysed

descriptively and inferentially using statistical methods.

3.2 Data Collection Method

A two-part structured questionnaire was used to gather primary data. The first section contained demographic information such as gender, residence, age, marital status, occupation, district, level of education and monthly income. The second part evaluated consumer perception of certain benefits of hair care products, including reduced hair breakage, strengthened hair roots, nourishment of the scalp, moisturization, increased hair growth, prevention of hair loss, shiny hair and dandruff control. A five-point Likert scale was used to measure the perception statements, where:

- 1 = Strongly disagree
- 2 = Disagree
- 3 = Neutral
- 4 = Agree
- 5 = Strongly agree

Higher mean scores indicate a more favourable consumer perception towards hair care product benefits.

3.3 Sampling Technique

Convenience and stratified sampling methods were employed to select respondents from both rural and urban areas in the districts of Kangra, Mandi, and Shimla in Himachal Pradesh. The sample included customers from various socio-economic backgrounds, and demographic factors such as age, gender, marital status, profession, place of residence, education, and monthly income were considered in the study (Kumari, 2026).

3.4 Sample and Participants

The study sample consisted of 450 respondents from the districts of Kangra, Mandi and Shimla of Himachal Pradesh. The respondents included several demographic categories, such as gender, place of residence, age group, marital status, occupation, educational level, and monthly income. The sample included 406 rural and 44 urban respondents, and included 162 male and 288 female respondents.

3.5 Data Analysis Techniques

The data collected were analysed using statistical methods suitable for quantitative research. Descriptive statistics (mean and standard deviation) were used to assess consumers' general perceptions of the benefits of hair care products. These descriptive metrics

facilitated understanding of the general consumer response towards different product-related benefits.

Inferential statistical techniques were applied to determine whether there was significant variation in consumer perceptions across a small number of selected demographic characteristics. The variables analysed with independent-samples t-tests included gender and place of residence, while one-way analysis of variance (ANOVA) was applied to demographic characteristics with more than two categories, such as age group, marital status, occupation, educational level, and monthly income (Kumari, 2026).

The data were analysed using SPSS software, employing descriptive statistical tools such as frequency distribution and percentage analysis (Kumari, 2026). The differences observed were considered statistically significant when the p-value was < 0.05 and not significant when the p-value was > 0.05.

Table 3.6: Reliability Statistics for Consumer Perception towards Hair Care Product Benefits

Cronbach's Alpha	N of Items
0.873	8

Interpretation: The reliability analysis demonstrates a high level of internal consistency among the 8 items assessing consumer perception of hair care product benefits, with a Cronbach's Alpha of 0.873 based on survey data from 450 respondents in Himachal Pradesh (Kumari, 2026). Consequently, the Scale is reliable and suitable for further statistical analysis.

3.6 Hypotheses of the Study

A series of hypotheses was formulated to test the differences in consumer perception about the benefits of hair care products in relation to specific demographic factors:

Hypothesis	Description	Statistical Test	p-value	Decision
H1	Consumer perception towards hair care product benefits differs significantly between male and female	Independent samples t-test	0.381	Rejected

	respondents			
H2	Consumer perception towards hair care product benefits differs significantly between rural and urban respondents	Independent samples t-test	0.036	Accepted
H3	Consumer perception towards hair care product benefits differs significantly across different age groups.	ANOVA	0.094	Rejected
H4	Consumer perception towards hair care product benefits differs significantly across marital status groups.	ANOVA	0.027	Accepted
H5	Consumer perception towards hair care product benefits differs significantly across occupational groups.	ANOVA	0.663	Rejected
H6	Consumer perception towards hair care product benefits differs significantly across districts.	ANOVA	0.003	Accepted

H7	Consumer perception towards hair care product benefits differs significantly across educational levels.	ANOVA	0.421	Rejected
H8	Consumer perception towards hair care product benefits differs significantly across monthly income groups.	ANOVA	0.251	Rejected

Source: Author’s compilation from primary data.
 The results of this hypothesis test reveal that perceptions of the benefits of hair care products differ significantly across districts, marital status, and place of residence. The findings reveal that women and individuals in the 18-25 age group make up the largest share of cosmetic product customers, indicating that gender and age have a significant influence on consumer perception (Kumari, 2026).

Data Analysis and Interpretation

Table 1: Descriptive Statistics of Consumer Perception towards Hair Care Product Benefits

Variable	Number of Respondents (N)	Mean	Standard Deviation (SD)
Reduces hair breakage	450	4.24	.857
Strengthens hair roots	450	4.19	.896
Nourishes scalp	450	4.15	.920
Moisturizes hair	450	4.10	.875
Promotes hair growth	450	4.06	.965
Prevents hair fall	450	4.02	.966
Adds shine to hair	450	4.02	.909

Controls dandruff	450	3.93	1.009
Valid Number of Respondents (N)	450		

Interpretation: Table 1 presents descriptive statistics on the product-related benefits of 450 respondents. The highest mean score is observed for the statement "Reduces hair breakage" (4.24), which is in line with evidence indicating that 89% of users experienced reduced hair breakage (Almond Hair Oil – Nourishes & Strengthens Hair, 2026). In contrast, the statement "Controls dandruff" has the lowest mean (3.93), suggesting it is less widely endorsed among the surveyed advantages. The range of standard deviation values (.857 to 1.009) suggests notable variation in survey responses, with "Controls dandruff" showing the highest fluctuation and indicating greater diversity in consumer opinions on this benefit (Kumari, 2026). In general, the table indicates a very positive perception of the product's advantages among respondents, mostly related to breakage reduction, root strengthening, and scalp nourishment.

Table 2: Gender-wise Group Statistics of Consumer Perception towards Hair Care Product Benefits

Gender	Number of Respondents (N)	Mean	Standard Deviation (SD)	Standard Error of Mean (SE)
Male	162	4.0509	.68544	.05385
Female	288	4.1089	.66727	.03932

Interpretation: Table 2 presents the statistics for respondents by gender. The data show that women constitute the largest proportion of cosmetic users, suggesting that female respondents may be more attuned to or in agreement with the benefits of cosmetic products compared to their male counterparts (Kumari, 2026). Although the precise standard deviations reported (.68544 for males and .66727 for females) are not presented in Kumari (2026), the study does analyze demographic factors, including gender, in relation to consumer behavior for cosmetic products. This suggests that gender-based variations in responses may exist, which could affect the dispersion of survey data (Kumari, 2026). The table indicates that the general trend of the respondents' views (both men

and women) is positive, and there is very little difference between the male and female respondents.

Table 3: Independent Samples t-Test for Consumer Perception towards Hair Care Product Benefits based on Gender

Condition	Levene's Test Statistic (F)	Significance Value (Sig.)	t-Statistic (t)	Degrees of Freedom (df)	Significance (2-tailed) (Sig.)	Mean Difference	Standard Error of Difference (SE)	Lower Confidence Interval	Upper Confidence Interval
Equal variances assumed	.057	.812	-0.877	448	.381	-0.05802	.06618	-0.18807	0.07204
Equal variances not assumed			-0.870	326.371	.385	-0.05802	.06668	-0.18919	0.07316

Interpretation: Table 3 presents the results of an independent samples t-test on gender-based perceptions. Levene's test supports equal variances, showing a p-value greater than 0.05. The analysis produced a significance value of 0.381 and a t value of -0.877 with 448 degrees of freedom, indicating no significant difference in perceptions of the product's advantages between males and females. The mean difference of -0.05802 is minimal, with a confidence interval from -0.18807 to 0.07204, which includes zero. Thus, gender does not significantly influence respondents' views on the product's advantages.

Table 4: Residence-wise Group Statistics of Consumer Perception towards Hair Care Product Benefits

Place of Residence	Number of Respondents (N)	Mean	Standard Deviation (SD)	Standard Error of Mean (SE)
Rural	406	4.1099	.67217	.03336

Urban	44	3.8864	.66134	.09970
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Interpretation: The group data according to residency are shown in Table 4. The average score for rural respondents is 4.1099, while that for urban respondents is 3.8864, indicating that individuals residing in rural areas in Himachal Pradesh generally exhibit a more positive attitude toward the benefits of the hair care product compared to those living in urban areas (Kumari, 2026). The standard deviation values for both groups are nearly the same, suggesting a similar distribution of responses; however, due to the smaller number of urban respondents, the standard errors associated with this group are higher (Kumari, 2026). In general, the chart suggests that rural residents are more positive than urban residents about the product's advertised benefits.

Table 5: Independent Samples t-Test for Consumer Perception towards Hair Care Product Benefits based on Place of Residence

Condition	Levene's Test Statistic (F)	Significance Value (Sig.)	t-Statistic (t)	Degrees of Freedom (df)	Significance (2-tailed) (Sig.)	Mean Difference	Standard Error Difference (SE)	Lower Confidence Interval	Upper Confidence Interval
Equal variances assumed	.020	.887	2.099	448	.036	.22355	.10652	-.01421	.43289
Equal variances not assumed			2.126	53.096	.038	.22355	.10513	-.01269	.43441

Interpretation: The independent-samples t-test by residence is shown in Table 5. Since the Levene's test significance value is .887, it is assumed that variances are equal. The t-value is 2.099, and the significance value is less than 0.05 (.036) with a total of 448 degrees of freedom. This indicates that there was a statistically significant difference in respondents' perceptions of the product's benefits between rural and

urban areas. The study finds a mean difference of 22355, indicating that rural respondents have a higher mean score compared to urban respondents. Additionally, the confidence interval (.01421, .43289) does not contain zero, which further supports the significance of this difference (Kumari, 2026). This is largely due to residency's influence on perceptions of the product's benefits.

Table 6: Mean Values of Consumer Perception towards Hair Care Product Benefits across Age Groups

Age Group	Mean	Number of Respondents
18–25	4.1526	222
25–35	4.0548	171
35–50	3.9911	42
50 and above	3.7833	15
Total	4.0881	450

Interpretation: For the different age groups, the mean perception values are presented in Table 6. The respondents aged 50 and above have the lowest mean score (3.7833), and the youngest age group (18-25 years) has the highest mean score (4.1526). The above suggests a more positive attitude than a more negative attitude of the younger respondents as compared to the older respondents on the benefits of the product. Mean scores decrease as the age goes up, which indicates the possibility of an age tendency. The responses of the 50-year-old and above group have the highest standard deviation, which means that there is more variation in responses in this group. From the table, it can be concluded that there are generally favourable views for all age groups, with younger ones appearing to be more confident about the benefits of the product.

Table 7: Analysis of Variance (ANOVA) for Consumer Perception towards Hair Care Product Benefits based on Age

Source of Variation	Sum of Squares (SS)	Degrees of Freedom (df)	Mean Square (MS)	F-Statistic (F)	Significance Value (Sig.)	Eta Squared (η²)
Between Groups	2.901	3	.967	2.147	.094	.119

Within Groups	200.875	446	.450				
Total	203.776	449					

Interpretation: Table 7 shows the ANOVA results of perception by age, indicating a significance value of 0.094, which is above the 0.05 threshold, and an F value of 2.147. As a result, there is no statistically significant difference in consumer perceptions of hair care product benefits across different age groups (Kumari, 2026). Table 6 shows significant variation in the mean values, but the differences are not large enough to be statistically significant. The within-group sum of squares is larger than the between-group sum of squares, indicating that most of the variation occurs within the age groups. The results indicate that youths, particularly those aged 18-25 years, make up the largest proportion of cosmetic product customers, and women are the primary users; therefore, in this study, respondents' perceptions of the product's benefits are most strongly associated with younger age groups (Kumari, 2026).

Table 8: Mean Values of Consumer Perception towards Hair Care Product Benefits across Marital Status Groups

Marital Status	Mean	Number of Respondents (N)	Standard Deviation (SD)
Married	3.9640	111	.76042
Unmarried	4.1364	329	.62877
Divorce	4.2250	5	.32355
Widow	3.5250	5	1.21642
Total	4.0881	450	.67368

Interpretation: Table 8 presents mean perception values by marital status, indicating that divorced respondents had the highest mean score (4.2250), followed by single respondents (4.1364), married respondents (3.9640), and widows had the lowest mean score (3.5250). These differences in perception among marital-status groups align with findings from an empirical study examining the relationship between cosmetic product use and demographic factors, including marital status (Kumari, 2026). The widows exhibit the largest standard deviation, indicating

considerable variability in their responses; however, these results should be interpreted cautiously, as only five respondents were classified as divorced or widowed (Kumari, 2026). In general, the results suggest that single or divorced persons had generally more positive views than the other respondents.

Table 9: Analysis of Variance (ANOVA) for Consumer Perception towards Hair Care Product Benefits based on Marital Status

Source of Variation	Sum of Squares (SS)	Degrees of Freedom (df)	Mean Square (MS)	F-Statistic (F)	Significance Value (Sig.)	Eta Squared (η^2)
Between Groups	4.157	3	1.386	3.096	.027	.143
Within Groups	199.619	446	.448			
Total	203.776	449				

Interpretation: The results of ANOVA on perception by marital status are presented in Table 9. The F-value is 3.096, and the significance value is .027 ($< .05$). This indicates a statistically significant difference in perception among respondents across marital status groups. The variation between groups is not as great as the variation within groups, but it is still great enough to yield significance. The Eta squared value of .020 suggests that marital status has a minor effect size, indicating that respondents' perceptions of the product's benefits are influenced to a small but statistically significant extent by their marital status, consistent with findings that demographic factors can have a discriminating effect on perceived benefit (Soni & Soni, 2020). Therefore, the differences in the descriptions shown in Table 8 are statistically significant.

Table 10: Mean Values of Consumer Perception towards Hair Care Product Benefits across Occupational Groups

Occupation	Mean	Number of Respondents (N)	Standard Deviation (SD)
Government Employee	3.9851	42	.71844

Private Employee	4.1138	112	.72607
Businessman	3.9681	47	.72301
Others	4.1159	247	.63301
Total	4.0881	450	.67368

Interpretation: The mean perception values for several professional groups are shown in Table 10. The highest mean score is observed for the ‘Others’ occupational group (4.1159), closely followed by ‘Private employees’ (4.1138), while businesspeople (3.9681) and government workers (3.9851) have slightly lower mean scores. The relatively minor differences in mean scores among major occupational groups suggest a consensus among respondents regarding the benefits of the product (Kumari, 2026). The study found moderate standard deviations across all categories, suggesting moderate consistency in responses, with very few differences observed in perceptions among different occupations (Kumari, 2026).

Table 11: Analysis of Variance (ANOVA) for Consumer Perception towards Hair Care Product Benefits based on Occupation

Source of Variation	Sum of Squares (SS)	Degrees of Freedom (df)	Mean Square (MS)	F-Statistic (F)	Significance Value (Sig.)	Eta Squared (η^2)
Between Groups	1.477	5	.295	.649	.663	.085
Within Groups	202.299	444	.456			
Total	203.776	449				

Interpretation: The ANOVA results for the mean and standard deviation of perception by occupation are reported in Table 11. The profession of respondents, as one of the demographic factors examined, did not result in significant differences in consumer perception of hair care product benefits, as indicated by the significance value of 0.663 (Kumari, 2026). The

sum of squares for occupation, as compared with the total of squares, is very small; this indicates that there is very little between-group variation, compared to the within-group total of squares. A smaller effect size is indicated by the Eta squared value of .007. As a result, respondents' perceptions of the product's advantages are not greatly influenced by their work. The small mean differences in Table 10 are not statistically significant.

Table 12: Mean Values of Consumer Perception towards Hair Care Product Benefits across Districts

District	Mean	Number of Respondents (N)	Standard Deviation (SD)
Kangra	4.1619	203	.66704
Mandi	3.9250	135	.71059
Shimla	4.1507	112	.60848
Total	4.0881	450	.67368

Interpretation: Table 12 presents the mean perception values for each district. Respondents from the Kangra region reported the highest mean score of 4.1619, followed by those from the Shimla area with a mean score of 4.1507, while respondents in Mandi recorded the lowest mean score of 3.9250, which remains comparatively high. These results demonstrate that consumer perceptions of hair care product benefits differ by district and are influenced by various demographic factors, including place of residence, as discussed by Kumari (2026). The study indicates that the standard deviation is highest in Mandi when compared to Kangra and Shimla, reflecting greater variability in responses from Mandi respondents. Additionally, the findings demonstrate that individuals in Kangra and Shimla generally hold more positive perceptions, whereas respondents from Mandi tend to be comparatively negative (Kumari, 2026).

Table 13: Analysis of Variance (ANOVA) for Consumer Perception towards Hair Care Product Benefits based on District

Source of Variation	Sum of Squares	Degrees of Freedom	Mean Square	F-Statistic	Significance Value	Eta Squared
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Variation	res (SS)	om (df)	are (MS)	tic (F)	Value (Sig.)	(η)	red (η^2)
Between Groups	5.137	2	2.568	5.780	.003	.159	.025
Within Groups	198.640	447	.444				
Total	203.776	449					

Interpretation: According to Kumari (2026), the ANOVA results in Table 13 indicate a p-value of 0.003, which is less than the 0.05 threshold, and an F-value of 5.780. This demonstrates that there are statistically significant differences in consumer perceptions of hair care product benefits among respondents from different districts. The between-group sum of squares is large enough to be significant compared to the variation within the groups. A tiny but significant effect size is indicated by the Eta-squared value of .025. As a result, respondents' perceptions of the product's benefits are significantly influenced by the district. So, there is statistical evidence supporting the differences in descriptions presented in Table 12.12.

Table 14: Mean Values of Consumer Perception towards Hair Care Product Benefits across Educational Levels

Educational Level	Mean	Number of Respondents (N)	Standard Deviation (SD)
Under Graduate	4.1411	31	.74003
Graduate	4.0130	125	.71558
Post Graduate	4.1331	216	.64650
Professional	4.0625	78	.65178
Total	4.0881	450	.67368

Interpretation: The mean perception scores by educational level are presented in Table 14 below. The mean scores for perception of hair care product benefits among undergraduates (4.1411),

postgraduates (4.1331), professionals (4.0625), and graduates (4.0130) show minimal differences across educational groups, indicating similarly positive attitudes toward these products among all education categories (Kumari, 2026). The results indicate that educational level is one of several demographic factors correlated with consumer behaviour, brand awareness, and preference, with minor differences in perception across educational groups and overall positive opinions reported (Kumari, 2026).

Table 15: Analysis of Variance (ANOVA) for Consumer Perception towards Hair Care Product Benefits based on Educational Level

Source of Variation	Sum of Squares (SS)	Degrees of Freedom (df)	Mean Square (MS)	F-Statistic (F)	Significance Value (Sig.)	Eta Squared (η^2)
Between Groups	1.281	3	.427	.940	.421	.079
Within Groups	202.496	446	.454			
Total	203.776	449				

Interpretation: According to Kumari (2026), the ANOVA results detailed in Table 15 show a significance value of 0.421 and an F value of 0.940, both greater than the 0.05 threshold. This indicates that there is no statistically significant difference in consumer perceptions of hair care product benefits across different educational levels. The variation between groups is very small compared to the variation within groups. A negligible effect size is also indicated by the Eta-squared value of .006. Therefore, consistent with meta-analytic findings on broader consumer samples, education level does not significantly affect perceptions of the product's benefits (Blut et al., 2024). The minor descriptive variations in Table 14 are not statistically significant.

Table 16: Mean Values of Consumer Perception towards Hair Care Product Benefits across Monthly Income Groups

Monthly Income	Mean	Number of Respondents (N)	Standard Deviation (SD)
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Below 25,000	4.0874	176	.67593
25,000–50,000	4.1403	196	.67303
50,000–1,00,000	3.9495	52	.65691
1,00,000 and above	3.9760	26	.68193
Total	4.0881	450	.67368

Interpretation: The mean perception values for monthly income are presented in Table 16. People earning between \$25,000 and \$50,000 agreed most with the product's benefits, with a mean score of 4.1403. Respondents in the 50,000–1,000,000 group had the lowest mean score (3.9495). The mean scores for those under 25,000 and those above 1,000,000 are 4.0874 and 3.9760, respectively. There are some differences between the groups, but they are not very large, suggesting overall positive sentiment across income levels. A modest, generally even distribution of responses is indicated by the very close standard deviation values. Overall, the table shows that monthly income does lead to some changes, but all income groups have positive perceptions.

Table 17: Analysis of Variance (ANOVA) for Consumer Perception towards Hair Care Product Benefits based on Monthly Income

Source of Variation	Sum of Squares (SS)	Degrees of Freedom (df)	Mean Square (MS)	F-Statistic (F)	Significance Value (Sig.)	Et (η)	Eta Squared (η²)
Between Groups	1.860	3	.620	1.369	.251	.096	.009
Within Groups	201.917	446	.453				
Total	203.776	449					

Interpretation: The ANOVA results for perception as the dependent variable, by monthly income, are shown in Table 17. According to Kumari (2026), the empirical study investigates correlations between the use of cosmetic products and demographic factors, including monthly salary, but does not report statistically significant differences in consumer perception of hair care product benefits across different income groups. As shown in Table 16, there are some fluctuations in the mean values; however, these fluctuations are not statistically significant. The within-group sum of squares is significantly larger than the between-group sum of squares, suggesting that most of the variation is within the income groups. The Eta squared value is very small (.009), indicating a small effect size. As a result, respondents' perceptions of the product's advantages are not greatly affected by monthly income.

5. Discussion

The present study focused on consumers' perceptions of hair care product benefits in Himachal Pradesh and whether these perceptions differed significantly by demographic variables. The responses provide valuable information about consumer attitudes towards different functional attributes of hair care products, such as reducing hair breakage, strengthening hair roots, nourishing the scalp, moisturising hair, promoting hair growth, preventing hair loss, giving shine and controlling dandruff.

5.1 Overall Consumer Perception towards Hair Care Product Benefits

The descriptive analysis indicates that most respondents hold positive views regarding the benefits of hair care products. Functional efficacy is a primary criterion in product evaluation, as demonstrated by strong consensus on benefits such as hair strengthening, scalp nourishment, and reduced hair breakage. While agreement was comparatively lower for dandruff control, perceptions remained positive for moisturization, hair growth, and hair fall prevention. Overall, the findings suggest that consumers perceive hair care products as essential for maintaining hair health and appearance.

5.2 Gender and Consumer Perception towards Hair Care Product Benefits

The results of the independent-samples t-test reveal no significant difference in consumers' perceptions of the advantages of hair care products by gender. There was some difference in perception scores between female

and male respondents, but this was not statistically significant. The findings show that, for both men and women, views on the usefulness of hair care products in practice were similar, indicating the importance of personal grooming for both.

5.3 Place of Residence and Consumer Perception towards Hair Care Product Benefits

The results demonstrate that consumers' perceptions of hair care product benefits are strongly associated with place of residence. Respondents from rural areas exhibited more positive attitudes compared to their urban counterparts. This finding suggests that product awareness, purchasing habits, expectations, and satisfaction may differ between rural and urban consumers.

T-Taste, product availability, exposure to ads, and the ability to purchase them may all be contributing to this difference. Hair care products could be more popular in rural areas because more people are familiar with and accept branded cosmetics there. Urban consumers, on the other hand, may be more critical of products due to higher expectations and greater exposure to alternative options. This outcome is consistent with the findings of Mandeville et al. (2024), who reported a relationship between socioeconomic and demographic differences and perceptions and use of personal care products.

5.4 Age and Consumer Perception towards Hair Care Product Benefits

Perceptions of Hair Care Product Benefits data showed no obvious differences by age. Although the age groups had marginally higher perception scores than the older groups, there was no statistical difference between the ages. The findings suggest that perceptions of benefits from hair care products are generally positive among consumers across age groups. Hair care products are widely used across age groups, as customers of all ages are always concerned about personal hygiene, hair health, and protection. Thus, the perception of the benefits from hair care products may not be significantly associated with age. It's Status and Consumer Perception towards Hair Care Product Benefits

5.5 Marital Status and Consumer Perception towards Hair Care Product Benefits

The results show that consumers' perceptions of the advantages of hair care products are greatly influenced by their marital status. Compared to married respondents and widows, unmarried respondents had relatively more positive attitudes. This research

suggests that marital status may affect consumers' expectations for a product, the priority they give to purchasing it, and their personal grooming. One reason may be that single consumers are more conscious about their appearance and are involved in personal grooming. This means they may focus more on the product's benefits to help their hair look shinier, grow, and feel better overall, as well as on their appearance. Married consumers would be able to prioritise differently or view things more realistically. A similar finding was found by Mohammed et al. (2021), who found that demographic factors are significant determinants of cosmetic views and purchasing behaviour.

5.6 Occupation and Consumer Perception towards Hair Care Product Benefits

According to the ANOVA results, career does not significantly affect consumers' perceptions of the benefits of hair care products. The mean scores for the various occupational groups were slightly different, but not statistically significant. This study revealed that consumers' attitudes towards the benefits of hair care products across different occupations are generally similar. There was no significant difference, which may be attributed to the fact that most job categories use hair care products. Consumers from different professions might be equally concerned with the cleansing, grooming, and health of their hair when it comes to hair care products.

5.7 District and Consumer Perception towards Hair Care Product Benefits

The results indicate that differences in consumer impression by district are significant. Mandi's respondents were more negative in their opinions than those in Kangra and Shimla. The discovery suggests that geographic location could be a factor in consumer knowledge, accessibility, purchases and cosmetic marketing exposure. The differences in perception at the district level may reflect differences in consumer exposure to advertising, market access, the economy, and metropolitan influence. Consumers from other regions where the brand is more familiar and has a greater consumer experience will have more positive thoughts about the product's benefits. The result was consistent with a previous study, which found that awareness, accessibility, and buying intention for cosmetic products can differ across geographic and demographic factors (Philavanh, 2013).

5.8 Educational Level and Consumer Perception towards Hair Care Product Benefits

The results indicate that education level has little impact on consumers' perceptions of the benefits of hair care products. There were slight differences in perception scores across educational attainment levels, but these differences were not statistically significant. The findings suggest that consumers across all educational levels may be aware of the benefits of hair care products. Consumers with different levels of education may be exposed to information about hair care products through advertising, social media, peers, and personal experiences.

5.9 Monthly Income and Consumer Perception towards Hair Care Product Benefits

Data shows that consumers' perceptions of hair care products are largely independent of income, with both rich and low-income individuals viewing them as essential rather than luxury items. This leads to similar expectations regarding product efficacy across economic levels. Marketers should focus on benefit-oriented products that provide long-term results, like hair loss prevention and quality improvement. Demographic factors, such as location and marital status, also play a role in consumer attitudes, particularly in rural areas. There is a strong demand for innovative, well-packaged products and effective digital marketing, especially through social media and influencers. Furthermore, consumers increasingly prefer herbal and safer options, highlighting the importance of promoting product safety to build trust and loyalty.

7. Conclusion

The present study examined the perceived benefits of hair care products among consumers and the influence of demographic factors on those benefits in Himachal Pradesh. The findings indicate that the largest proportion of cosmetic product consumers are youths, particularly those aged 18–25 years, with women comprising the majority of cosmetic users. The study also showed that consumer impression is not entirely influenced by demographics. The results showed that perceptions of the benefits of hair care products differed significantly by district, marital status, and place of residence. However, the findings indicate that women and individuals aged 18-25 constitute the largest proportion of cosmetic product customers, rather than gender or age having a statistically significant effect. The findings show that diverse demographic groups are increasingly seeing hair care products as vital for maintaining good health, appearance, and personal grooming. With changing

consumer lifestyles and increased awareness of hair care, there is a greater demand for specialised, benefit-oriented hair care products. In general, the study contributes to the existing knowledge of cosmetic consumer behaviour by providing empirical evidence of consumers' perception of the utilitarian benefits of hair care products in the state of HP. The findings may help marketers and cosmetic firms align their products with consumer expectations and craft marketing strategies tailored to specific target demographics.

8. Recommendations

- i **Development of Benefit-Oriented Hair Care Products:** Companies should focus on products that reduce hair breakage, strengthen roots, nourish the scalp, prevent hair loss, and enhance quality for long-term effectiveness.
- ii **Promotion of Herbal and Natural Hair Care Products:** With growing concerns for natural ingredients, manufacturers should emphasise herbal and chemical-free products to align with consumer preferences and boost market acceptance.
- iii **Rural Market Expansion Strategies:** Rural consumers have a positive attitude towards hair care products. Companies can enhance their marketing in these areas by increasing availability, conducting promotions, raising awareness, and offering more affordable packaging.
- iv **District-Specific Marketing Strategies:** There are significant differences in district perceptions in the results. Hence, based on consumers' preferences, awareness, and buying habits across different districts, cosmetic entrepreneurs should adopt region-specific marketing strategies.
- v **Use of Digital Marketing and Social Media Promotion:** Digital advertising, influencers, and social media should be prioritised to raise consumer awareness of product benefits, particularly among younger audiences influenced by digital marketing.
- vi **Directions for Future Research:** Future studies could expand their scope by using larger samples from other states and districts. These studies may examine psychological variables, brand loyalty, advertising effectiveness, product satisfaction, and the influence of social media on consumers' perceptions of hair care products.

9. Limitations of the Study

When evaluating the results, it is important to consider the limitations of the current study. First, the scope of the study is limited because it was not possible to include other geographical areas; second, because the study was limited to the districts of Kangra, Mandi and Shimla, the results may not apply to other districts. Secondly, the study considers only some demographic factors and the benefits of hair care products. Other behavioural, psychological, or social factors impacting customer perception were not studied in the present research. Answers were self-reported and collected via a standardised questionnaire, which may lead to subjective interpretation and respondent bias. Finally, the study employs a cross-sectional research design, limiting the capture of consumers' impressions to a single point in time. Consumer preferences and perceptions can change as a result of changing market trends, product innovation and promotional influences.

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