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Factors Affecting Customers' Preferences for Nepalese Coffee in Kathmandu Valley: A Poisson Regression Analysis of Count Data

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Abstract

Background: Approximately 65 percent of Nepalese coffee is exported, while the remainder is processed and sold domestically. Nepalese coffee, recognized for its organic cultivation from high altitudes, is witnessing a shift in consumer preference from tea to coffee in Nepal. Despite this shift, the market for Nepalese coffee remains underdeveloped in the Kathmandu Valley.

Objective: This study aims to examine the factors affecting consumers' preferences for Nepalese coffee in the Kathmandu Valley. It seeks to identify the barriers to increasing domestic consumption and explore potential strategies to enhance the market for Nepalese coffee.

Method: An explanatory research design was employed, utilizing a structured questionnaire and convenience sampling to collect data from 403 coffee consumers in the Kathmandu Valley. The data was analyzed using Poisson regression to assess the factors influencing coffee consumption patterns and preferences.

Result: The study revealed that 99.06 percent of respondents consume coffee, but only 5.66 percent prefer Nepalese coffee. However, 32.78 percent of respondents expressed a strong interest in drinking Nepalese coffee. Key barriers identified include the perceived quality of Nepalese coffee, insufficient promotion, and unfavorable government policies. The analysis indicates that improving advertising, enhancing coffee quality, and increasing promotional efforts could significantly boost domestic consumption.

Conclusion: To develop the market for Nepalese coffee, coffee businesses should focus on investing in production, marketing, and promotional activities. Additionally, government incentives and subsidies for coffee entrepreneurs could facilitate growth. Effective advertising and promotion, combined with quality improvements, are essential for expanding the Nepalese coffee market and increasing consumer preference.

Paper Types: Research Paper

Keywords: Coffee, Nepalese Coffee, Costumers', Costumers' preferences, Kathmandu valley

JEL Classification: M10, C83, J2

Introduction

After water, coffee is the second most consumed beverage on the planet (Cucina, 2016), and is the second most traded commodity after gasoline. Espresso is grown on smallholder farms in more than 50 poor countries with more than 20 million households relying on the crop (Pena Moreno & Salgado, 2014). There are just roughly 100 different types of coffee blooms that are botanically distinct. All varieties of coffee beans eventually end up in one of these espresso plants. Arabica and Robusta coffee are the most common types of espresso plants that also generate the majority of all coffee beans (Rodrguez et al., 2010). However, several different types of coffee beans can be derived from a single type of coffee plant that is only modified after the harvest. It is determined by how humans process and roast espresso beans. While the kind of coffee plant is biologically determined, the type of coffee bean is determined by system and technique (Godos et al., 2014). As a result, there are practically infinite varieties of coffee available on the global market (Latskomedia & Rezepte, 2019).

Coffee is a beverage that is consumed all over the world, thus its health consequences are of particular importance. The global perspective on coffee's influence on health has shifted from a mostly damaging balance to a probable favorable profile (Cano-Marquina et al., 2013). Nobody knows when or how coffee was first discovered. Espresso is commonly consumed to relieve mental and physical exhaustion as well as to improve mental alertness. It is also used to prevent diseases including Parkinson's, Alzheimer's, dementia, and cognitive decline (Faculty, 2018), it's also used to prevent gallstones, gout, type 2 diabetes, and several cancers. Coffee is utilized as an enema in the treatment of most malignancies (Malik & Hu, 2012). For millions of people, coffee is a morning ritual that helps them get their day started (Wagner et al., 2019). However, when we consider how much coffee we drink and how it affects our health, we should be concerned. There are some intriguing and entertaining facts, trends, and statistics about the sector as mentioned by Briggs et al. (2013) that coffee is worth around $40 billion each year. When a person reaches their twenties, their coffee consumption jumps by 25% whereas coffee consumption is highest among those aged 60 and up and they are daily consumers in 68 percent of cases. Likewise, coffee is consumed by 37% of children aged 13 to 18 and 54 percent consume it on a daily basis.

According to Tiwari (2010) coffee is one of the most important money-generating crops in Asia's middle hills. Coffee is a high-value crop that is typically farmed in marginal locations with minimal usage of enhanced technologies (Nahar & Ozores-hampton, 2011). It is critical to understand customer preferences for coffee and to identify consumer roles in the coffee value chain by identifying gaps between producers and consumers (Humphreys & Grayson, 2008). Nepalese coffee has one-of-a-kind possibility to join international specialty markets because of its biological surroundings in the Himalayan slopes. High-altitude coffee cultivated by small farm holders' farmers under organic circumstances has been exported from Nepal. Similarly, in Nepal as well customers are shifting from tea to coffee as their preferred beverage (Karki & Regmi, 2016). However, the relevant organizations have not taken appropriate initiatives to promote low cultivation, which is in line with the basic goal of agricultural policies. Insufficient access to credit facilities, limited agricultural subsidies, and poor soil fertility are categorized as moderate constraints in agriculture (Phuyal et al., 2017). Similarly, the absence of state policies has led to many areas in Nepal having barren lands, while development projects and urbanization have significantly impacted fertile agricultural lands (Rai et al., 2020). As a result, Nepalese coffee is of poor quality compared to international standards. Around 65 percent of Nepalese coffee is exported, with the remainder being processed and sold on the domestic market. Instead of using a structured selling channel, majority of coffee are exported through personal interaction with traders (Tiwari, 2010). As a consequence, a proper evaluation is needed to investigate those topics in the context of Nepalese coffee consumption. Thus this study tries to address the status of Nepalese Coffee consumption in Kathmandu valley, develop customer preference index for Nepalese Coffee, analyzing factors determining preferences of Nepalese coffee among customers in Kathmandu valley.

Remaining part of this study is organized as: second section covers research methods, followed by results in section 3. Section four covers results, fifth section includes discussion and finally section sixth concludes the study with recommendation.

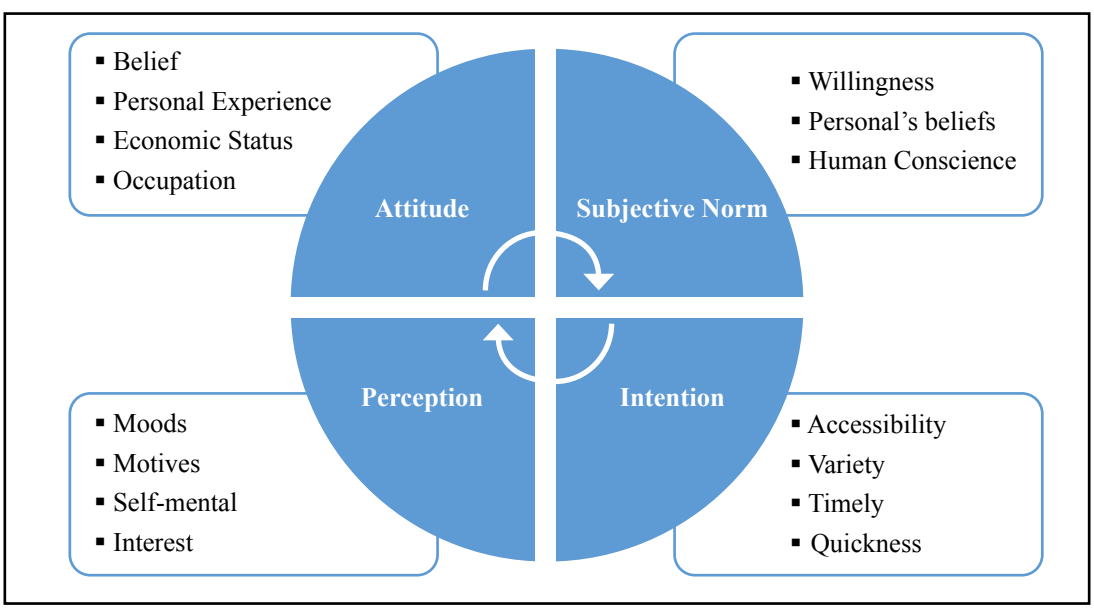
Research Method

Conceptual Framework

Customer satisfaction and expectations may be outstanding, depending on their perceptions towards the firm and attitudes about the products (Mmutle & Shonhe, 2017). To comprehend buyer expectations, the employer must comprehend what clients truly require from a product and its offerings. If the carrier falls below the minimum expectation level, the customer's expectations will no longer be met, but if the service exceeds their expectations, they will be pleased. These days with the increase in demand of coffee many espresso shops now offer a distinctive type of coffee through the use of new technology and making it available 24-hours (Cordoba et al., 2019). Tea has long been the most popular smooth beverage among Nepalese since long period of time. However, as a result of the growing coffee culture among many urban adolescents, coffee consumption has surged in the domestic market (Subedi, 2011). Various foreign and local owners of café in Kathmandu, such as Himalayan Java, Beautiful Coffee Café, and others, were found to be the top coffee sellers of the home markets (Luitel, 2017).

As perception is based solely on clients' standard behavior, goal, mindset, and subjective conduct, this study focuses on the use of Nepalese coffee by coffee consumers which is important to the country's economy. A number opposing and overlapping qualities of those coffees aid in the commercialization of smallholder agriculture, including a shift from subsistence-oriented to increasingly marketplace-oriented manufacturing patterns, and entry into use through customers who rely on their tendencies. The vast bulk of research into the prospects of Nepalese coffee commercialization assesses the extent of customers' consumption patterns in terms of market share. This examination will aid in gaining a better understanding of the consumer's perspective on how well Nepalese coffee will make them happy if they consume it consistently. The conceptual framework for the study is illustrated in figure 1.

Figure 1: Conceptual Framework



Source: Modified from Mehedi & Kuddus (2017)

Empirical Framework

The statistical treatment of rely records is better than that of binary records, in which the observations can take best values, commonly represented with the aid of 0 and 1, and from ordinal records, which may additionally include integers but in which the person values fall on an arbitrary scale and handiest the relative ranking is important. The dependent variable in matter records possess handiest a negative integer like y = 0, 1, 2, 3, 4… The pattern is focused on a few small discrete values. We observe the factors affecting the common range of the structured variable.

Underneath this observe, Poisson version is the ideal version for reading subject depend so its miles given more priority for further research on subjective research. The Poisson version predicts the number of occurrences of an event. The Poisson version states that the probability that the structured variable Y may be identical to a sure quantity y is:

$$P\ Y = y = e^{-\mu}\ \mu^{y} / y^{!} \quad \ldots\ldots\ldots\ldots\ldots\ldots\ (1)$$

For the Poisson version, Mu is the intensity or price parameter which can be seen as:

$$\mu = \exp x_i\ \beta \quad \ldots\ldots\ldots\ldots\ldots\ (2)$$

An interpretation of the coefficients: one unit increase in *x* will increase/decrease the average number of the dependent variable through the coefficient expressed as percent. The equality of imply and variance in Equal-dispersion assets of the Poisson distribution can be expressed as;

$$E\ y|x = var\ y|x = \mu \quad \ldots\ldots\ldots\ldots\ldots\ (3)$$

This is a restrictive asset and regularly fails to maintain in exercise, i.e., there is "over dispersion" in the records. In this case, we use the negative binomial version. An Extra zeros trouble of the Poisson distribution: there are generally extra zeros in the records than a Poisson version predicts. In this example, use the zero-inflated Poisson model. The marginal effect of a variable on the average variety of events is:

$$\partial E\ y|x\ /\ \partial xj = \beta_j \exp x_i\beta \quad \ldots\ldots\ldots\ldots\ldots\ (4)$$

An interpretation of the marginal outcomes illustrates one unit increase in x will boom/decrease the average number of the structured variable by means of the marginal effect. With an application of this version, it helps to deliver out powerful questionnaire version for field survey and hence, contributes out appropriate survey for proper records regarding subjective be counted on Nepalese espresso respectively. The variables used in this study are as mentioned in Table 1.

Table 1: Variables and Expected Sign of Variables

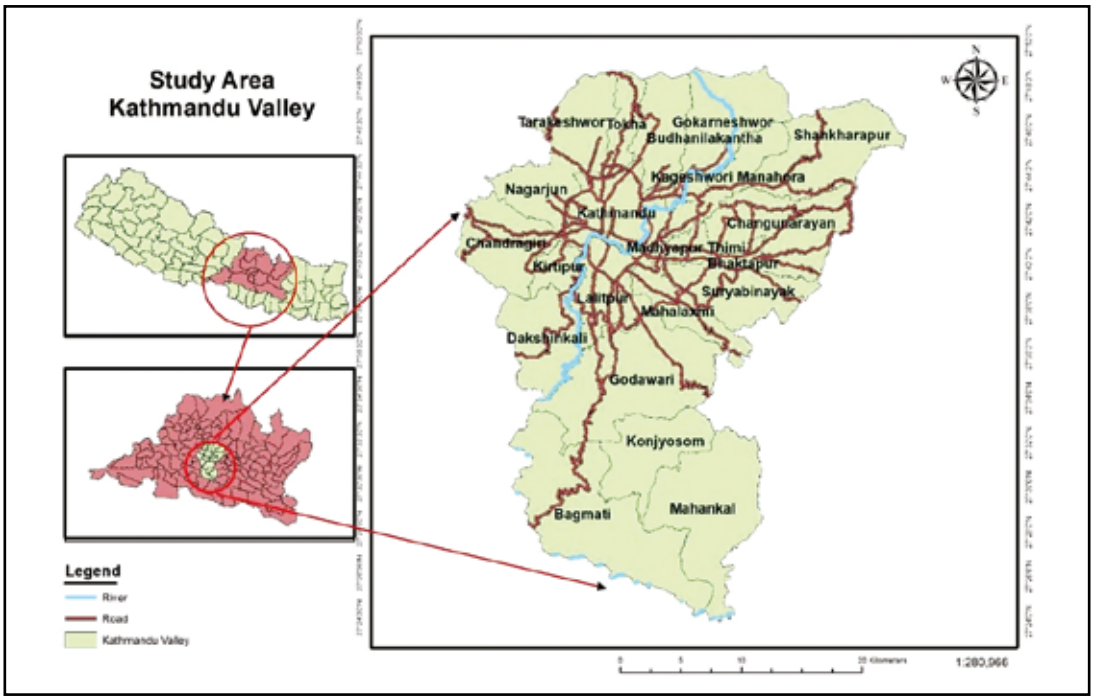
Variables	Description	Value	Expected sign
Socio-demographic			
Age	Respondent's age	In Years	±
Education	Respondent's level of education	In Years	+
Gender	Respondent's gender	0 = Male 1 = Female	±
Marit_Status	Marital status of customers	1 = Married 2 = Unmarried	±
Family	Members of Respondent's family	In category	+
Customers Attitude			
Beliefs	Cultural beliefs towards coffee consumption	1 = Yes, 0 = No	±

Variables	Description	Value	Expected sign
Pers_Exp	Personal experience of customers	1 = Yes, 0 = No	+
Eco_Stat	Economic Status of customers	1 = Yes, 0 = No	±
Occupation	Occupation of the customers	1 = Yes, 0 = No	±
Subjective Norm			
Willingness	Willingness of the customers to drink coffee	1 = Yes, 0 = No	+
Pers_Beliefs	Person's Beliefs towards consumption of coffee	1 = Yes, 0 = No	+
Hum_ Consc	Human conscience related to emotion and rational associations based on consumption of coffee	1 = Yes, 0 = No	±
Customer's Perception			
Moods	Temporary state of mind or feeling of customers	1 = Yes, 0 = No	±
Motives	Motivation of customers for knowing varieties of coffee	1 = Yes, 0 = No	+
Self-mental	Self-mental with drinking coffee to boost energy by customers	1 = Yes, 0 = No	+
Interest	Interest of customers to drink coffee	1 = Yes, 0 = No	±
Intention of customers			
Accessibility	Ease of access of coffee in every outlet	1 = Yes, 0 = No	+
Timely	Timely availability of coffee as per wish of customers	1 = Yes, 0 = No	+
Quickness	Rapidly resonance of coffee service as retained by customers	1 = Yes, 0 = No	+
Variety	Availability of variation of coffee in every parts of country	1 = Yes, 0 = No	±

Study Area, Population and Sample Size Determination

Nepal has 77 districts, of which three districts in the Kathmandu valley (Kathmandu, Bhaktapur, and Lalitpur) in Bagmati province were chosen as the study region (Devkota et al., 2023). The latitudes of 27°3213" and 27°4910" north, and the longitudes of 85°1131" and 85°3138" east, are the geographic coordinates of Kathmandu valley (Maharjan et al., 2022). The population of Kathmandu is 1,442,271 (Devkota et al., 2022) making it the most populous district in Nepal. This has opened up opportunities for Nepalese coffee in the Kathmandu valley. The majority of Kathmandu valley residents consumed copious amounts of espresso in recent years, making an excessive delivery of espresso tough. There were several espresso shops, but we chose only a few of the larger ones, such as Thamel, Durbarmarg, Baneswor, Patan, and others areas. Kathmandu valley was chosen as the study location because it has Nepal's largest population and a diverse range of high-quality coffee cafeterias, which is crucial in determining the impact of proximity to urban areas on coffee consumption and climate change awareness in the espresso industry (See Figure 2). The rationale for choosing the study area in the research is the presence of more consumers and online businesses in Kathmandu Valley (Devkota et al., 2021).

Figure 2: Study Area



Sampling

Explanatory research design is used in this study and non-probability sampling size is selected to complete the survey as there is no roper record of coffe consumer. The sample size formula $n = z^2pq/l^2$ is applied in this study following Pattanshetty et al. (2013) and Karki et al. (2021). Where, n_0 = sample size required for study, Standard tabulated value for 5% level of significance (z) = 1.96, p = Prevalence of customer awareness on coffee consumption practices 50% = 0.5 (Cappelletti et al., 2014). So, P = 0.5, q = 1-p, = 0.5, Allowable error that can be tolerated (e) = 5%. Total sample for the study = $(1.96)^2 \times 0.5 \times 0.5/(0.05)^2 = 384.16$. Non-response error 5%, i.e. 384.16*5/100 = 19.20. Thus, sample size taken for study was (384.16+19.20) = 403.36 (≈403). However, the study was able to collect the data from 424 respondents which were abundant for the study.

Research Instruments

Structured questionnaire was developed in order to collect the information. Kobo Collect was used as data collection tool. Since this paper intends to measure consumers' preferences of Nepalese coffee in Kathmandu valley, customers' preference index is prepared. To measure customer's preferences, total 22 questions that contain yes and no as response options to respondents where questions regarding convenience, efforts, user interface, communication and information, risk, stability vs. variety, values, sensory and time are considered to identify preferences. Following Paudel et al. (2020) if individual customer mention yes for more than 75% questions, then they are considered as highly preferred Nepalese coffee compared to other coffee. Similarly, if respondents receive less than 50% questions no or incorrect, then they can be considered as less preferred. The general form of identifying customers' preferences on Nepalese coffee can be calculated, as suggested by Paudel et al. (2020), Kharel et al. (2022), Bhandari et al. (2021), Devkota et al. (2020) as:

$$Y = \begin{cases} Y = 1, \text{ if scale score } <50\% \\ Y = 2, \text{ if scale score } 50\% \text{ to } 75\% \\ Y = 3, \text{ if scale score above } 75\% \end{cases}$$

Further the data was analyzed and presented in the form of graphs, charts and tables. Primary and secondary data were used in the study.

Data Analysis and Results

Socio-Demographic Characteristics

Personal characteristics of the population expressed statistically, such as age, sex, marital status, education level, and work experience, are all examples of socio-demographic characteristics (See Table 2). 45.99% of the 424 respondents were from Kathmandu, 27.59% from Bhaktapur, and 26.42% from Lalitpur. Males made up 41.75% of the respondents, while females made up 58.25%. Because the majority of respondents (57.31 percent) were between the ages of 15 and 25, it can be concluded that the majority of persons who drink coffee are between the ages of 15 and 25, and the majority of those who like coffee (59.43%) earn between NRs. 40,000 and 60,000. However, only 0.71% of those with an income of NRs. 80,000-1,00,000 consume coffee, implying that a rise in income does not lead to people preferring coffee over tea or other beverages.

Table 2: Socio-Demographic Characteristics

Characteristics	Frequency	Percentage (%)
Gender		
Male	168	41.75
Female	235	58.25
Age (in years)		
15-25	231	57.31
25-35	152	37.73
35-45	19	4.72
45 and above	1	0.24
Income (in NRs.)		
Up to 20,000	41	10.14
20,000-40,000	73	18.16
40,000-60,000	240	59.43
60,000-80,000	47	11.56
80,000-1,00,000	3	0.71
Education		
SLC	39	9.67
Intermediate	209	51.89
Bachelors'	125	30.90
Masters'	30	7.55

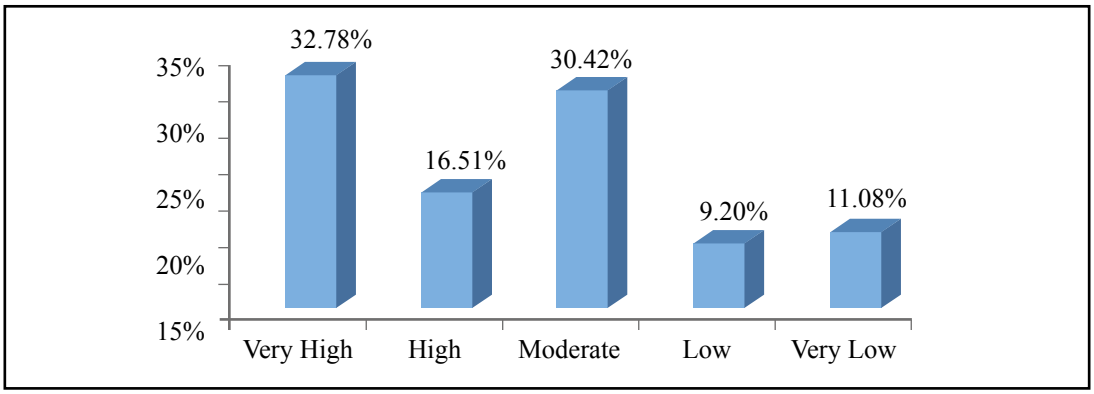
Characteristics	Frequency	Percentage (%)
Marital Status		
Married	100	25
Unmarried	302	75
Family Types		
Joint	360	89.15
Nuclear	42	10.38
Extended	2	0.47
Profession		
Government Employee	26	6.37
Business Sector	15	3.77
Education Sector	35	8.49
I/NGOs	38	9.43
Health Sector	290	71.93

Students in the intermediate level (51.89 percent) were found to like coffee more than students at other levels, with masters' level students consuming the least (7.55%). In addition, unmarried folks drink 75 percent more coffee than married persons (25%). Similarly, people in joint families were found to drink coffee at a higher rate than people in nuclear and extended families. When compared to other professions, health workers were found to be more inclined to drink coffee (71.93%).

Consumption of Nepalese Coffee

This study found that 99% respondents drinks coffee, among them 66.04% drink it because of their habit. Besides habit, work and study (14.39%), interest (16.51%), and other reasons (11.79%) are also there. Interesting fact is that 10.38% respondents consume coffee for re-energizing purpose. Among the respondent, 66.04% consumes coffee in daily basis, followed by sometimes (20.75%), weekly (9.91%), and 3.3% for other purposes. Among the consumers, 76.65% consumes coffee mostly at home and, while less number of respondents consumes coffee at restaurants (4.01%), coffee shops (8.49%), and others (5.66%). Respondents also asked for which brand of coffee they consumed, and found that 70.05% of them don't care about the type of coffee they drink, while 19.58% argue they use both type of coffee. It is also found that 4.72% customers only consumed foreign brand coffee and 5.66% consumes only Nepalese brand coffee. It indicates the scope of Nepalese brand coffee is highest as it can serve 95% of the total coffee users. However, Neupane (2019) viewed that surprisingly, while tourists like Nepali coffee, Nepali people themselves choose immediate brands. In terms of types of coffee, 70.28% respondent don't care its types, 15.80% consumes both types while 8.49% consumes only packet coffee and 5.42% consumes bean coffees. It indicates consumers' needs and preference are not very specific. Consumers also mentioned that they visited coffee shop very rarely (45.25%), rarely (18.40%), sometimes (20.99%), and only 15.09% coffee users visit coffee shop/ and restaurants frequently. We further ask important things considered by the respondents at the time of coffee consumption in order to identify consumers' preference on Nepalese coffee. The result indicates that price (33.08%), quality (24.56%), brand (18.96%), package (10.83%), and other reasons (12.57%) are the important things they considered to consume Nepalese coffee. Consumers were also asked about their willingness to purchase Nepalese coffee; it is observed that respondents are highly willingness to purchase it (see figure 3).

Figure 3: Willingness to Purchase Nepalese Coffee



Challenges and Managerial Solutions

Customers were also identified with some challenges while consuming Nepalese coffee. Quality of the coffee seems to be most challenging factor in consuming Nepalese coffee (28.07%), followed by brand (19.10%) and market (16.27%). Respondents opined that effective promotion and distribution channel to reach towards customer and final consumer; aggressive marketing strategy and product innovation strategy; expand the market in all areas of Nepal then in different packaging to cover all class of family; encourage Coffee entrepreneurs, provide subsidies on coffee production and enforce tariff on imported coffee are some of the strategies needed to undertake for the best result to the prospects of Nepalese Coffee. Hence, producers, government, and manufacturers are main responsible and liable agents for handling out current situation in particular manner.

Customers' Preference Index

Consumer Preference is described as the subjective tastes of consumers, measured with the aid of their pleasure with these items after they have purchased them. In order to check out the preference index of customer while consuming Nepali coffee, consumers' preference index has been prepared (See Table 3). Fair availability indicated whether Nepalese coffee is readily available on the market and whether customers are aware of it. In this regard, the majority of customers, 52.36% claimed that Nepalese coffee is widely available. Similarly, 55.9% of buyers stated that they are willing to buy Nepalese coffee at any cost, regardless of price. Furthermore, 55% of consumers say that the quality of Nepalese coffee has lately improved. When asked about government efforts to promote Nepalese coffee, the majority of customers (80.44%) stated that while the Nepalese government has abundantly supported tea exportation, it has not given more priority to expanding Nepalese coffee widely in both the domestic and international markets. Furthermore, producers' efforts, like government initiatives, play a larger role in the marketing of Nepalese coffee. Producers must go through many steps in order to establish the coffee industry and make it available to customers, which, in turn, make it popular in various market sectors. In this circumstance, Pudasaini et al. (2023) contended that the coffee-drinking habit is being increasingly popular in Nepal amongst locals as well as tourists and travelers. According to the study, 61.56% of customers believe that producers are making enough effort to make Nepalese coffee known in the market, and that as a result of their effort, Nepalese coffee is becoming more popular in Nepal.

The study also revealed that 57.08% consumers consider the quality of the coffee's packaging when deciding whether or not to buy it. According to the statistics, consumers believe that the quality of Nepalese coffee packaging raises the standard of Nepalese coffee. Similarly, it is believed that the actions and behaviors of service providers play a significant role in raising the standard of Nepalese

coffee, which has been proven true to a degree in this study, with the majority of consumers (50.24%) stating that the actions and behaviors of coffee service providers have a significant impact on the coffee business.

Table 3: Customer's Preference Index

Value	Yes		No	
	Number	Percentage	Number	Percentage
Fair Availability of Nepalese Coffee	211	52.36	192	47.64
Afford Nepalese Coffee at any Cost	225	55.9	178	44.1
Increment in Quality of Nepalese Coffee	222	55.0	181	45.0
Government Efforts in Promoting Nepalese Coffee	79	19.6	324	80.44
Producers Efforts in Promoting Nepalese Coffee	248	61.56	155	38.44
Quality of Packaging in terms of Information	230	57.1	173	42.9
Actions and Behaviors of the Coffee Service Providers	202	50.2	201	49.8
Available Information Sources	89	22.17	314	77.83
Beliefs, Emotions, Values to Consume Nepalese Coffee	220	54.48	183	42.52
Personal Expectations	206	51.0	197	49.0

Similarly, when it comes to Nepalese coffee, the majority of customers (54.48%) said they have connected thoughts, emotions, and specific beliefs to the product. However, some people may have personal expectations of the goods. Personal expectation indicates that people may believe to lose weight; they have health and skin benefits from drinking Nepalese coffee, and it was discovered that 51% of consumers had personal expectations from Nepalese coffee. In this regard, Pudasaini et al. (2023) contended that the coffee-drinking lifestyle is becoming increasingly popular in Nepal amongst locals as well as tourists and travelers.

Econometric Estimations

Pre and Post Estimation Result: Under pre-test estimation, we operate specification error, goodness of fit and different diagnostic test. _hat value is statistically insignificant and _hatsq value is not statistically significant. The _hat value is 0.100 and _hatsq value is 0.542. So, we can conclude that we have chosen few meaningful predictors and the few variables are wrong or have errors and some of them are correct respectively. To be a goodness of fit, the anticipated frequency and located frequency should match closely and that the more closely they match, the higher the fit. This helps to determine goodness of fit, we look towards count R2 in this section and the more it is, more it is better. But here, there is no count R2 and going through Mc Fadden's R2, we can see R2 value is 0.052 which is less than 0.7, as well as adjusted R2 value is also 0.030 which gives out poor result.

As a post-estimation test, this study tested multicollinearity and heterocedasticity. To overcome this, the Variance Inflating Factor (VIF) test was performed to solve the problem of multicollinearity. This study performs the multicollinearity test for checking the similarity on variables because the existence of collinearity inflates the variances of the parameter estimates and consequently incorrect inferences about the relationships between explanatory and response variables. Variance Inflating Factor (VIF) is a test to multicollinearity in our regression model. Variance Inflating Factor as per the calculation

for model is 1.49 and we know that if VIF is greater than 10, there exists multicollinearity. So, we can say that there is no multicollinearity in the data set. Thus, the assumption is that there doesn't exist multicollinearity if the data set is less than 10 respectively. Looking towards het-test, the result appeared for the model is Prob>Chi2=0.2219. The assumptions show that there is presence of heteroscedasticity if the value is less than but in above data set the value is higher to the 0.05 which shows that there is no heteroscedasticity issue in the dataset. This implies that dataset is free from heteroscedasticity problem respectively.

Final Poisson Regression Result: Poisson regression is a statistical analysis technique applied when the purpose of a research is to assess if a set of independent variables predict a dichotomous dependent variable (Stevens, 2009). In this study the Poisson regression is performed to predict the prospects of Nepalese coffee in Kathmandu valley (See Table 4). The Poisson Regression shows the significance between the dependent variable frequencies of consumption with the various independent variables like age, educational level, gender and so on. This study highlights the significance of frequency of consumption with the independent variables like age, education level, gender, marital status and so on. For understanding whether the data set follows the Ordinary least square (OLS) properties some post estimation test has been performed. It is analyzed by two processes:

Table 4: Final Regression Result

	Poisson Regression Estimation		**Marginal effects Estimation**	
VARIABLES	**Coefficient**	**Std. Error**	**Coefficient**	**Std. Error**
Freq_con				
Age	***0.0114****	***0.0048***	***0.0426****	***0.0181***
Gender	-0.0453	0.0530	-0.169	0.1980
Edu	-0.0256	0.0396	-0.0958	0.1480
mari_stat	***0.130****	***0.0611***	***0.486****	***0.2290***
act_behavior	0.0102	0.0523	0.0382	0.1960
talk_family	***0.138*****	***0.0532***	***0.515*****	***0.1990***
personal_exp	0.0194	0.0673	0.0723	0.2510
incom_consump	-0.0133	0.0588	-0.0496	0.2200
occup_family	-0.0166	0.1010	-0.0622	0.3790
cons_mood	-0.00111	0.0540	-0.00417	0.2020
motives_coffee	0.0436	0.0648	0.163	0.2420
self_mental	0.0600	0.0571	0.224	0.2140
int_alert	***0.301*****	***0.0813***	***1.125*****	***0.3050***
accessib_imp	***0.179****	***0.1010***	***0.669****	***0.3790***
exist_market	0.0553	0.0546	0.207	0.2040
serv_pref	***0.150****	***0.0760***	***0.560****	***0.2840***
exp_delivery	-0.0704	0.0544	-0.263	0.2030
variat_culti	***0.110****	***0.0647***	***0.411****	***0.2420***
Constant	0.201	0.2840		
Observations	424		424	

*** p<0.01, ** p<0.05, * p<0.1

This study is related to the prospects of Nepalese Coffee in Kathmandu Valley which indicates that the dependent variable which is significant with the various independent variables mentioned in the above final regression result like age, education level, gender, education level, marital status and actions and behaviors are significantly related to frequency of consumption. In other way it can be said that the probability of prospects of Nepalese Coffee increases with the age, marital status, talk with family, interest and alertness, accessibilities, service preferences and variation in culture.

The final part of the final regression model deals with the marginal effects. The marginal effects show that the coefficient of the frequencies of consumption increases by 0.0426 times with the different age of respondents, 0.486 times when the respondent depending on their marital status, 0.515 times when the respondents shares their talk with their family, friends and surroundings. Similarly, the frequencies of consumption increase by 1.125 times relating with the interest and alertness for the consumption of Nepalese coffee, 0.560 times when the services and preferences are rendered with the respondent's assumptions and 0.411 times with the variation in culture simultaneously.

Thus, from the above result we can conclude that, dependent variable frequencies of consumption are significant with the age, marital status, talk with their family, friends and surroundings, interest and alertness, services and preferences and variation in culture whereas remaining variables are insignificant to frequencies of consumption which can be noted in the above dataset respectively.

Conclusion and Recommendations

As this study aims to analyze prospects of Nepalese coffee in Kathmandu valley, it showcased that Nepalese coffee is consumed very less in Nepal i.e. 5.66%. Though the market seems prospering, still various challenges mentioned above in the study are hindering the prospect of Nepalese coffee market and various strategies are also suggested by consumers that would mitigate the challenges of Nepalese coffee market. Thus, this study concludes that if proper advertisement and promotion programs are initiated and Nepalese coffee is made known to maximum citizens, then that would be very beneficial for Nepalese coffee market. Likewise, quality of the product should be maintained so that consumers can rely upon it and government should also start focusing in promoting Nepalese coffee market. Along with government all the responsible authorities should take their responsibility respectively for enhancing Nepalese coffee and making it accessible in both domestic and international market. Based on the findings and conclusion of the study, following recommendations are kept forward:

- **Focus on productivity enhancement:** Appropriate combination of water, plant nutrients, shed crops and efficient labor will obviate all concurrent problems in productivity. Such a combination will also reduce the infestation of white stem borer, which is currently plaguing the Nepalese coffee farming.
- **Irrigation management:** Where there is shortage of water, an appropriate size of rainwater collection tank is recommended. Drip irrigation has been successfully managed in many coffee plantations around the world. Drip systems are the most efficient irrigation method. It is estimated that localized irrigation like drip systems have irrigation efficiency of 80 to 95 % compared to only 40 -75 % in surface irrigation method.
- **Ecological Factors:** As stated earlier, ecological conditions affect the increase of espresso bushes and this is finally mirrored in coffee quality. It is consequently vital to develop espresso in the perfect ecological zones in order to maximize on first-rate of the beans as properly as quantity.
- **Nutritional Factors:** Proper agronomic practices are imperative and will lead to higher yields and quality. The nation's concerned need to make certain desirable education to farmers on these practices with the aid of employment and coaching of adequate agricultural extension people and availing all the sources required for suitable extension work. The trouble of savings to farmers for buy of farm inputs like fertilizers ought to be addressed.

- **International Collaboration:** Coffee is a globally traded commodity. Nepalese coffee is exported to limited countries and has not reached many potential countries where number of fair-trade and organic coffee consumers is increasing. This highlights the importance of Inter-Governmental trade cooperation aimed at exploring new markets and strengthening the existing ones. Technical support from international research institutions like World Coffee Research and specialty coffee associations like SCA and SCAJ might be helpful in strengthening the research capacity and technological advancement of coffee sector.

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