# An Analytical Assessment of Potato Marketing Dynamics in Baglung

District, Nepal

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# ABSTRACT

Potato farming is one of the most lucrative enterprises in the Baglung district, primarily due to the favorable geographic and edaphic conditions. The major goal of our research was to analyze the marketing dynamics of Potatoes in the district, focusing on marketing channels, actors involved and major problems. A survey was undertaken with a representative sample size of 106 farmers using the simple random sampling technique and 14 traders (collectors, wholesalers and retailers) using the snowball sampling technique, encompassing all PMAMP potato zones.

Data collection methods included Household Surveys, FGD, KII, along with various secondary sources of information and data analysis was done using SPSS and Ms. Excel. An indexing/scaling technique was utilized to rank the identified problems in marketing. Additionally, value chain mapping was employed to illustrate the actors, their functions, and enablers in the value chain activities related to potatoes and a SWOT analysis was done to find strengths, weaknesses, opportunities, and threats of the potatoes at the producer's level. Three main marketing channels were identified, with the marketing margin at NRs. 12.24/kg and the producer's share at 79.6%. Farmers predominantly sold sorted and graded products, with transportation means ranging from tractors to porters. Market information primarily came from friends, with a 51.72% satisfaction level among farmers.

Farmer's illiteracy and lack of awareness emerged as the most serious problem in marketing of potatoes followed by dominance of middlemen/intermediaries.

Keywords: Potato, marketing, Baglung, value chain, market information, middlemen

## **INTRODUCTION**

Agricultural marketing is defined as a process that begins with a decision to produce a saleable farm commodity and involves all aspects of the market structure of the system, both functional and institutional, based on technical and economic considerations, and includes pre and post-harvest operations such as storage, transportation, and distribution (National assembly. grading, Commission on Agriculture, 1976). In its broadest sense, an agricultural marketing system is a physical and institutional setup that carries out all the tasks necessary to move goods and services from the point of original agricultural production to the final consumers' hands. It is a vital part of the agricultural value chain that includes the agricultural commodity assembly, handling, storage, transportation, processing, wholesale, retailing, and exporting, as well as related supporting services like market intelligence, standardization and grading, commodity trading, finance, and price risk management, and the organizations that carry out the above tasks (Improvements in Agricultural Marketing Final Report, 2008). It simply, refers to the transfer of farm, horticultural, and other agricultural products from producers to consumers. Agricultural marketing encompasses the movement of produce from rural to rural, rural to urban, and rural to industrial consumers. Traditionally, agricultural produce was sold directly between producers and consumers for money or barter. Briefly, the focus was on selling rather than marketing. The modern world presents challenges due to technological advancements and the presence of middlemen and commission agents who increase profits by moving goods (Goyal et al., 2018).

Equally crucial to improved agricultural performance as farming itself is marketing (H.M. Saxena, 2004). The agricultural markets have the potential to be an effective instrument for enhancing agriculture's economic sustainability, lowpromoting sustainable agricultural rural poverty, and growth ering (Improvements in Agricultural Marketing Final Report, 2008). The agricultural marketing system offers crucial connections between the farm production sector and the non-farm sector in a dynamic and expanding economy. The marketing system not only carries out the physical and facilitating tasks of moving goods from producers to consumers, but it also finds prices at various points in the marketing process and sends price signals along the marketing chain. Thus, any policy for agricultural development must include market reform as an integral part (Acharya & Agarwal, 2022).

Agriculture plays a crucial role in the economy of Nepal, with a large portion of the rural population involved in farming. The potato (*Solanum tuberosum*) is the fourth-most important food crop in Nepal following the rice, maize and wheat in terms of overall production volume. It accounts for 2.17% of national GDP and 6.57% of AGDP (Kharel, 2022). The national production of potato crop is 3,410,829 ton and the area occupied by potato cultivation is around 198,253 hectare in Nepal. The average productivity is approximately 17.02 t/ha (FAO, 2024). In Baglung district, it is cultivated in 3,120 ha and has a productivity of 16.25 ton/ha with the total production of 50,700 ton (MoALD, 2023). Potato farming is one of the most lucrative agricultural enterprises in Baglung district. Baglung is a promising potato growing region mainly due to its favorable edaphic and geographical characteristics (Kandel et al., 2024). Geographically, it is located at 28°16'N and 83°36'E in Province 4. It has a subtropical climate (Cwb) based on Köppen-Geiger classification (Nomadseason, 2023).

Potato marketing in Baglung confronts a number of obstacles that restrict its profitability, despite the commodity's enormous potential. Lack of cold storage facilities, poorly managed supply chains, farmers' ignorance and illiteracy, prevalence of middle man which affects small holder farmers, restricted market access, and other issues constitute Baglung's marketing scenario. Addressing these marketing issues is necessary for improving feasibility and profitability of Potato farming in Baglung. This paper seeks to provide a comprehensive evaluation of the marketing aspects of potato farming in the region, analyzing parameters such as marketing channels, marketing margin, and producer's share. The study also aims to identify the major challenges of potato marketing and propose strategies to address them. The article will also provide useful insights for policymakers, agricultural extension agents, and farmers themselves, as well as recommendations for future agricultural marketing and rural development activities in Baglung and other similar regions of Nepal.

### MATERIALS AND METHODS

The research materials and methodologies employed in this study can be broadly categorized under the following headings:

#### Study site

The study was carried out in the Baglung district of Province No. 4, which is a hilly area from 83'E to 83'36"E and 28'15"N to 28'37"N. It is located in the Central Himalayas, almost in the center of Nepal. The survey was conducted in all PMAMP potato zones, which included Dhorpatan municipality ward no.3-9, Galkot municipality ward no.10, Badigad rural municipality ward no.1-10, all wards of Tamankhola rural municipality, all wards of Tarakhola rural municipality, Nisikhola rural municipality ward no.5, 6 of Baglung district, ward no.1, 2, 5 of Madane rural municipality, and Malika rural municipality of Gulmi district under PMAMP, Baglung. Figure 1 illustrates a map of the research site.

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**Figure 1**: Map showing the research site [Map source: (Kandel *et al.*, 2024)]

# Sample and sampling technique

These villages/wards were purposefully chosen as potential sites for potato cultivation. A representative sample of 106 farmers was drawn using a simple random sampling technique with the Rao-soft calculator software, and 14 traders (collectors, wholesalers, retailers and consumers) were sampled using the snowball sampling technique.

### Household survey

The household survey was carried out using a pre-tested questionnaire. The data was collected using a structured interview schedule. A total of 106 potato producers and 14 traders were interviewed in the research area. For reliable data collection, interviews were conducted with people aged 25 to 60.

## Focus group discussion

Focus group discussions provided information that may have been missed during the household survey. Typically, it involved interviewing a small group of eight to twelve people. Farmers, traders and local leaders of all ethnicities, both male and female, were among the participants. A follow-up focus group discussion (FGD) was organized to verify the survey results.

## Key informant interview

Key informant interview was conducted with progressive farmers, cooperative personnel, traders, and stakeholders who were interviewed using semi-structured checklists. They provided extensive expertise, experience, and insight into past initiatives.

## Sources of data

#### Primary data

Primary data was obtained directly from potato farmers to gain firsthand knowledge of potato farming practices, production costs, predicted output, value chain of food, and associated restrictions. Primary data was gathered using the household (HH) survey questionnaire. These findings were supplemented and confirmed by data gathered through Focus Group Discussion (FGD) and Key Informant Interview (KII).

## Secondary data

Secondary data was obtained from many statistical sources, including relevant literature, reports, bulletins, pertinent articles, MOALD publications, NARC journals, Agriculture Knowledge Centre, PM-AMP publications, Krishi diary, and so on.

## Data analysis techniques

The data obtained from both primary and secondary sources was coded and entered into the Statistical Package for Social Science (SPSS) and Microsoft Excel. The data was analyzed using statistical tools such as descriptive statistics, mean comparison, frequency distribution and so on.

## **Marketing analysis**

# Marketing cost

The expense of getting the product to the final consumer is known as the marketing cost. It includes expenses for grading, packaging, loading, unloading, shipping, and storing (Kohls, R. I., & Uhl, 1985).

## Marketing margin

The marketing margin of crop is the difference between the actual price that a consumer pays and the price that a farmer receives for an equivalent quantity and quality of crop. It could be described in terms of price spread applied for a particular situation. Studies on marketing margins or price spread suggests that as the number of market actors or players increases, they raise the price of the commodity in the marketing channel which lowers producer's price (Goyal *et al.*, 2018). The marketing margin is determined by deducting the farm gate price from the retail price (Amgai *et al.*, 2015).

Marketing margin = Retailer price (Pr) – Farm-gate price (Pf)

### Producer's share

The amount received by the farmer, expressed as a percentage of the retail price, is known as the producer's share (Amgai et al., 2015).

Producer's share= Price received by Farmers/ The price paid by Consumers  $\times$  100

# Value chain mapping

Mapping of the value chain includes identification of major actors and flow of products and information along the value chain. Mapping the key policies and institutions helps to influence the functioning of value chain along with the role of small-scale producers across the value chain (Mohapatra & Ramadas, 2022). The value chain of potatoes in Baglung district has been mapped primarily based on secondary data, complemented by field interviews with farmers, traders as well as the FGDs. The chain map has been represented in a standard format, with the main stages of the value chain presented on the left side and the corresponding actors associated with each stage outlined on the right.

## Indexing of marketing problems

The indexing/scaling technique is appropriate for ranking the marketing problems faced by sampled respondents. The severity of production problems was determined using a five-point scale (1, 0.8, 0.6, 0.4 and 0.2), with 1 indicating the most serious and 0.2 indicating the least serious.

The following formula was used to estimate the importance (or severity) index value for the severity of various problems:

Where,

 $I = \sum (S_i f_i / N)$ 

I= Index of importance,  $\sum$ = Summation, S<sub>i</sub>= Scale value, f<sub>i</sub> = Frequency of importance given by respondents, N= Frequency

#### SWOT analysis

SWOT analysis is strategic planning tool that can be used to help a person or organization find strengths, weaknesses, opportunities, and threats in relation to business rivalry or project planning. It is meant to lay out the goals of the project or business endeavor and list the internal and external factors that are helpful and harmful to achieving those goals. To make the tool useful and determine their competitive advantage, users of a SWOT analysis frequently ask and respond to questions to produce relevant information for each category (Shrestha & Yadav, 2018). A SWOT analysis was done using information gathered through interviews, key informant interviews, and focus group discussions with farmers and traders.

#### **RESULTS AND DISCUSSION**

#### Marketing cost

The term "marketing cost" refers to the expenses associated with delivering goods to the final customer. These costs include transportation, packaging, and other miscellaneous expenses. Marketing costs varied across the study regions; regions with distant markets, such as Dhorpatan and Tarakhola, faced higher marketing costs owing mostly to increased transportation costs. On the contrary, regions with relatively closer markets, like Hatiya and Galkot, had lower marketing costs. The average marketing cost estimated in our study was NRs. 617.4 per ropani. The marketing cost was determined to be NRs. 1155 per ropani in Kathmandu district (S. Shrestha et al., 2022), 208.23 USD per ha (NRs. 1,416.35 per ha) in Saptari district (Teyung & Luitel, 2023) and NRs. 436.44  $\pm$  48.16 per ha in central Nepal (Luitel, 2017).

[Note: 1 ha= 20 ropani, 1 USD=135 NRs.]

#### Marketing Channels

A marketing channel is a set of exchange relationships that generate customer value through product and service acquisition, consumption, and disposition. Therefore, a marketing channel is any relationship between people and/or organizations that permits or facilitates an exchange. According to this definition, exchange relationships are formed to meet market needs. A marketing channel works together to transport resources and goods from their point of origin to their point of ultimate consumption, sharing risks and resources. Organizations within marketing channels are more cohesive when they have a common goal, especially when they see an opportunity to win a crucial market share competition (Dibb, 2020).Vegetables are marketed through a variety of methods, varying from commodity to commodity, producer to producer, lot to lot, and time to time (Acharya & Agarwal, 2022).

The marketing channels in the study region involve several participants, including local traders/collectors, wholesalers, retailers, contractors, and consumers. Producers are the farmers who are responsible for the production of the potatoes. Local traders or collectors act as brokers who gather potatoes from the farmers and supply them to wholesalers or retailers. Wholesaler markets are the large distribution hubs that are located in the important towns such as Burtibang and Hatiya. Wholesalers purchase potatoes in bulk from farmers, collectors and occasionally contractors, and then sell to retailers, processors and consumers. They also supply retailers outside the study area and sometimes to large markets like Baglung Bazaar and even Pokhara. Similarly, retail markets are a collection of numerous retail shops and are more widespread than wholesale markets. Retailers typically purchase and handle products in small quantity with local retailers purchasing directly from farmers or through collectors while domestic retailers acquire potatoes from wholesalers. As far as contractors are concerned, contract farming is not really a common practice in the study site, therefore, only a handful of large-scale farmers have access to contractors. Consumers, as the final link in the chain, are the ultimate beneficiaries of the potatoes.

Mainly three marketing channels were found in the study area. Figure 2 shows the volume distribution of potatoes through various channels. Among the total respondents, 23.6% were identified as utilizing the producer-consumer marketing channel, meaning they directly sold their potatoes to end consumers without involving intermediaries like retailers or wholesalers. In this distribution model, farmers sold their produce directly to the customers who visited their homes or farm gate to make purchases. This channel was notably the most profitable for farmers. Likewise, 38.2% of respondents were engaged in selling potatoes to retailers who subsequently marketed the produce to end consumers. Another 38.2% of respondents were involved in the producer-collector-wholesaler-retailer-consumer marketing channel. This indicates that farmers sold their potatoes to wholesalers through collectors, who then distributed the produce to retailers, ultimately reaching the end consumers.





### Marketing Margin and Producer's Share Analysis

The marketing margin is the difference between the net price given by the farmer and the price that consumers actually pay. Similarly, the producer's share is the amount received by the farmer, expressed as a percentage of the retail price. The marketing margin and producer's share in study area was calculated as follows:

Marketing margin MM) = Retailer price (Pr) – Farm-gate price (Pf) =60- 47.76 = NRs 12.24/kg Producer's share= Farm-gate price (Pf)/ Retailer price (Pr) × 100 % = (47.76/60)\*100%= 79.6%

Thus, the study shows that the marketing margin was NRs 12.24/kg and producer's share was 79.6%. The marketing margin was lower than the overall marketing margin determined by Chaudhary, (2010) in tomato in Lalitpur district (NRs. 20/Kg) and by Amgai *et al.*, (2015) in apple in Mustang district (NRs. 29.85/kg) of Nepal. However, the producer's share was found to be higher than that of both (Chaudhary, 2010 and Amgai *et al.*, 2015).

## Value chain mapping

The value chain map of potato in the study area is presented in Figure 3. The diagram illustrates the relationships between the actors, their functions, and the enablers or the institutions that offer the supportive environment at every stage.

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**Figure 3**: Value Chain Map of Potato in Study Area Source: Field Survey (2024) and own representation

Since marketing is a crucial element of an agricultural value chain, understanding the value chain through the mapping of various actors and key stakeholders involved in the production, distribution and consumption of potato in Baglung district is essential.

The chain map offers a visual representation of the organization that illustrates the flow of goods via both the main system and secondary channels. The channels are typically vertical chains of enterprises which transform raw materials and then deliver the final products to consumers. The map displays the final markets across the top and lists functions vertically along the left-hand side. The value chain's actors or participants are identified by boxes (Shrestha & Yadav, 2018).

# Sorting and grading

Sorting and grading is crucial particularly because graded potatoes fetch higher price. Besides, grading practice, helps the farmer and seller to determine the price (Goyal *et al.*, 2018).

All respondents (100%) sold their products after sorting and grading, indicating that every respondent considers sorting and grading to be an essential step in their selling process. However, it must be noted that the farmers had no any grading equipment and the practice was done purely based on the eye assessment on the basis of size, appearance and presence of spots and decays in the potatoes.

#### Means of transportation for marketing

The majority of respondents (41.6%) were found to use jeeps for transportation, while a similar number (40.4%) utilized tractors for transporting their potatoes. Only a few respondents (1.1%) employed porters as a means of transportation for marketing their harvested potatoes.

The remaining respondents (16.9%) utilized other means of transportation, primarily horses, especially in the Dhorpatan area (Figure 4). Bus/truck was the means of transport for majority of respondents (48%) while only 16% of the respondents used jeep/van to transport their potatoes to the market in Tokha Municipality of Kathmandu District (Shrestha *et al.*, 2022).

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Figure 4: Pie- chart showing means of transportation of the produced potato for marketing

Nearest market for sale of potato

The chart as shown in Figure 5 shows that Burtibang Bazaar emerged as the closest market for the majority of respondents, comprising 49% of the total. This market serves as a common and accessible option for farmers in the Dhorpatan, Nishikhola, and Tamankhola areas.

Hatiya Bazaar also holds significance as a proximate market for a considerable number of farmers, particularly those engaged in potato cultivation in Tarakhola and Galkot, constituting 29% of respondents.

Additionally, 6% of farmers from Galkot identified Galkot Bazaar, while an equivalent percentage from Madane indicated Phedi Bazaar as their nearest market. Furthermore, other notable nearby markets include Bungodoban (3%), Tamghas (2%), Thulachaur Bazaar (1%), Simaltari Bazaar (1%), Bhimgithe Bazaar (1%), Masalgaau (1%), and Ramua (1%).

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Figure 5: Nearest market for selling of potato in the study area

## Distance up to nearest market

Table 1 shows that the average distance to nearest market was around 13 km with minimum being 1.5 km and maximum being 21 km.

Table 1:	Distance	up to	nearest	market	in the	study area

Items	Minimum	Maximum	Mean	Std. Devia- tion
Distance to near- est market(km)	1.50	21.00	12.9780	5.59708
Source: Field Surve	2024			

Source: Field Survey, 2024

## Materials used for packaging

The respondents utilized sacks as the primary packaging material for their products. All the respondents (100%) were found to employ sacks, whether made of plastic, jute, or any other material, for packaging potatoes.

# Facilitators of marketing of potato

A significant majority of respondents (65.9%) recognized local traders as key contributors to the marketing of potatoes. Similarly, 31.8% of the surveyed participants indicated that government organizations play a crucial role in facilitating potato marketing, while only 2.4% considered cooperatives as significant actors in this aspect of the market (Figure 6).



Figure 6: Bar- chart showing actors facilitating the marketing of potato

# Level of satisfaction with price

Table 2 indicates that the majority of farmers (55) were satisfied, while the remaining individuals (51) expressed dissatisfaction with the received price. A satisfaction level of 51.72% was observed, reflecting a

Table 2: Level Items	l of satisfaction 1.0	on of farmers with 0.5	h received price Weightage	Index	
Satisfaction	55	51	80.5	0.759	

. . . .

Source: Field Survey, 2024

relatively equal division between respondents who were satisfied and dissatisfied with the price they received. In Mustang district, the majority of farmers (77.78%) were satisfied with the price of potato they received, while 22.22% expressed dissatisfaction (Karki et al., 2023), whereas in Saptari district, 35% of households were satisfied with the price of ginger, 25% were moderately satisfied, and 40% were dissatisfied with the price obtained (Ghimire & Shah, 2023).

## **Decision** of price

The results presented in the Table 3 indicate that precisely 50% of the farmers determined the price according to their own judgment or preferences when selling directly to consumers. Furthermore, 27.3% of the total farmers decided the price based on some form of agreement or negotiation with the con-

sumer, while 22.7% determined the price based on existing market conditions. Table 4 shows that 6.2% farmers determined the price when selling to collectors and retailers. On the other hand, 29.2% farmers had no role in decision as price was determined by the retailers and collectors while 12.3% farmers determined through a mutual understanding with the buyer.

Table 3: Decision maker when directly sold to consumers

Items	Frequency	Percent
Farmer	11	50.0
Both	6	27.3
Based on existing market condition	5	22.7
Total	22	100.0

Source: Field Survey, 2024

**Table 4:** Decision maker when sold to wholesaler, trader/middlemen & collector

Items	Frequency	Percent	
Farmer	4	6.2	
Retailer/collector	19	29.2	
Understanding of both	8	12.3	
Based on existing market condition	34	52.3	
Total	65	100.0	

Source: Field Survey, 2024

The majority of the farmers (52.3%) decided the price based on existing market conditions, which was consistent to the findings of (Shrestha *et al.*, 2022) who reported that the selling price was majorly set by demand and supply (64%).

# Agreement before selling

The majority of farmers (73.6%) did not engage in any form of agreement before selling, whereas only a small percentage of farmers (26.4%) participated in some type of agreement, (mostly verbal), prior to selling their produce (Figure 7). Shrestha *et al.*, (2022) also found the almost similar result of majority of farmers of Kathmandu (74%) district selling the produce without any contractual agreement with traders or buyers.

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Figure 7: Pie- chart showing status of agreement before selling of potato

## Source of market information

Market information includes price, demand, supply, and buyer-seller dynamics. Having access to current market information is crucial to minimize the risk of losing money on a transaction (Teka, 2009). Farmers can negotiate with traders from a stronger position when they have access to up-to-date, or current, market information.

It also, helps the spatial distribution of products from rural to urban areas, as well as between urban markets, by delivering clear pricing signals from urban buyers to rural producers about the amounts and varieties needed (Shepherd, 1997).

Figure 8 reveals that approximately 48.3% of individuals depend on information acquired from friends, possibly through conversations, recommendations, or shared experiences with friends involved in the agricultural sector. Similarly, 40.2% obtain market information and prices through direct



Figure 8: Source of market information and prices of a crop produce and its products

market visits, while the remaining 11.5% cross-check market information and prices with other producers. (Chaudhary, 2010) reported that 55% of farmers gathered market information from neighbors and friends, followed by radio and phone calls to market centers.

### Problems in potato marketing

Several problems related to marketing of potato were prevalent in the study area. The detail of intensity of the problems and their index value are presented in the Table 5.

Problems	Index Value	Ranking of Severity
Farmer's illiteracy and limited awareness	0.935	Ι
Dominance of middlemen	0.876	II
Lack of cold storage facilities	0.706	III
Difficulty in transport	0.582	IV
Limited market demand	0.325	V

Table 5: Ranking of marketing problems in potato in the study area

The most serious problem in potato marketing in Baglung was found to be the widespread illiteracy and lack of awareness among farmers. Many farmers lack essential knowledge of market dynamics and current prices as well as post-harvest management practices. As a result, they usually accept prices de-

cided by local traders or intermediaries, who benefit from significant marketing margins due to farmers' limited bargaining ability and price awareness. They are thus unable to generate a substantial profit from their produce since they lack information on the price structure. This knowledge deficit also impacts production efficiency, as many farmers are ignorant of management practices such as the proper application of fungicides and insecticides, necessary to control diseases and pests. Limited market information and technical knowledge was similarly determined to be a significant problem in their studies by Shrestha *et al.*, (2022); Luitel, (2017) and Prakash *et al.*, (2015).

Dominance of middlemen/intermediaries like local traders and collectors was identified as the second most important problem affecting marketing. Only a few farmers sell the potatoes directly to the consumers from their home or their farm while most of them sell it through different middlemen or local traders. These traders exploit the farmers' limited market awareness and purchase the produce at significantly low prices and sell it to wholesalers or retailers at high price ultimately disadvantaging the farmers financially. Karki et al., (2023) and Phulara et al., (2022), also identified predominance of middlemen to be a major challenge in potato marketing in Mustang and Okhaldhunga district, respectively. Another critical marketing constraint was the lack of accessible cold storage facilities for the potatoes. Cold storage is necessary to prevent post-harvest losses due to diseases and pests. However, the study region had only a handful of these storage infrastructures and even those were far and inaccessible to poor farmers. This, coupled with lack of post- harvest management knowledge in farmers, compelled the farmers to sell their produce immediately after harvest, missing out on the higher off-season prices that the better storage could afford. This problem was consistent to the findings of Chauhan et al., (2022); Shrestha et al., (2022) and Kharel et al., (2021).

Additionally, there was the difficulty in transport of the potatoes to the large markets like Burtibang, Galkot. In some of the areas like Tarakhola and Dhorpatan, the lack of motorable roads restricts farmers's ability to transport their produce to large markets, compelling them sell to collectors or local traders at lower prices. The transport cost of potatoes to market is also quite high for farmers, so they preferred selling to local traders rather than accessing distant markets.

Finally, although market demand is generally high across the study region and the availability of market and market demand was not such a significant problem, limited demand was noted in a few areas such as Madane and Malika rural municipality of Gulmi, where the potatoes imported from Butwal and India was preferred thereby lowering the demand of local grown produce. Similarly, low farm gate price and low scale of production were reported to be the major concerns of marketing in coffee (Luitel, 2017). (Chaudhary, 2010) identified unorganized market and fluctuation in market price to be among the marketing constraints in his study. Besides, lack of support from local government was another marketing challenge as reported by Chauhan *et al.*,(2022).

## SWOT analysis:

The SWOT analysis of potatoes reveals numerous strengths and opportunities for enhancing value-added interventions. Researchers and development agencies should prioritize addressing weaknesses and threats when designing interventions to promote the growth of the potato sector (Shrestha & Yadav, 2018). Table 6 illustrates the strengths, weaknesses, opportunities, and threats of the potato sector in the study area.

Strengths	Weakness		
• Favorable climate for potato production	<ul> <li>Severe infestation of diseases and pests</li> </ul>		
<ul> <li>Higher return than cereal crops</li> </ul>	<ul> <li>Lack of irrigation facilities</li> </ul>		
<ul> <li>Easy market access to farmers</li> </ul>	<ul> <li>High labor wage and high cost of production</li> </ul>		
•Provision of reasonable subsidy on inputs and	•Lack of market awareness		
other technical services from municipality,	<ul> <li>Lack of training and extension services</li> </ul>		
PMAMP and AKC	<ul> <li>Lack of cold storage facilities</li> </ul>		
Opportunities	Threats		
•High demand in the local and provincial mar-	Dominance of middlemen		
ket	•A severe threat of late blight, cutworm and red		
<ul> <li>Scope for value-added goods</li> </ul>	ant		
•Increasing support from both state and local	•Declining trend of farm labor availability and		
government	high cost of production		
<ul> <li>Potential to increase productivity</li> </ul>	<ul> <li>Attack of wild boar and porcupines</li> </ul>		

Table 6: SWOT analysis of study area at potato producer's level

#### **Conclusion**

The study highlights the marketing status of Baglung district, a prominent potato growing region in Nepal. Despite its tremendous potential and increasing demand for potatoes, the ineffective marketing system has constrained the profitability and hindered the region from achieving its full potential. Significant problems include illiteracy and lack of market awareness among farmers, predominance of middleman and inadequate cold storage facilities, all of which resulting into an inefficient marketing system in the district.

The study recommends adopting effective marketing and value chain strategies to enhance the marketing efficiency. Efforts may be made to make the farmers more aware and informed through periodic training programs on market trends and price dynamics, so that they wouldn't get manipulated and exploited by brokers. Thus, the farmers need to have accurate and up-to-date market information to ensure fair pricing. In addition, substantial investments are needed for the development of cold storage infrastructures accessible to

farmers. Provision of effective post-harvest and storage system allows farmers to store their potatoes for longer time and sell them at higher price during the off-season.

Moreover, the Government and all the concerned stakeholders must play crucial role in developing the effective marketing system in the district. Addressing these challenges could help establish potato farming as the thriving enterprise contributing to the extensive economic growth of the district.

# REFERENCES

- Acharya & Agarwal. (2022). *Agricultural Marketing In India* (7th ed.). Oxford and IBH Publishers. https://a.co/d/hGcfIQb
- Amgai, S., Dutta, J. P., Regmi, P. P., & Dangol, D. R. (2015). Analysis of marketing practices of apple in Mustang district of Nepal. *Agriculture Development Journal*, 11(2091-0738 (Print) 2091-0746 (Online)).
- Chaudhary, K. R. (2010). Analysis of Tomato Marketing System in Lalitpur District, Nepal. Van Hall Larensteijn, September. http:// edepot. wur.nl/166729
- Chauhan, B., Joshi, D., Banjade, D., Bhatta, B. D., Awasthi, P., Paneru, M., Shrestha, M., & Chand, P. B. (2022). Economics of potato (Solanum tuberosum L.) production and marketing in Darchula district of Nepal. *Archives of Agriculture and Environmental Science*, 7(3), 393–401. https://doi.org/10.26832/24566632.2022.0703013
- Dibb, S. (2020). Marketing Channels. *Marketing Briefs: A Revision and Study Guide*, 2016(1019), 147–151. https://doi.org/ 10. 4324/ 9780080511085-35
- FAO. (2024). FAOSTAT. FAO. https://www.fao.org/faostat/en/#data/QCL
- Ghimire, A., & Shah, M. (2023). Agriculture Extension in Developing Countries (AEDC) 1(2) (2023) 52-58 Agriculture Extension in Developing Countries (AEDC) Economics Of Production And Marketing Of Ginger In Sindh. Agriculture Extension in Developing Countries (AEDC) 1(2) (2023) 52-58. 1(September), 52–58. https://doi. org/ 10.26480/aedc.02.2023.52.58
- Goyal, S. K., P., Rai, J. P., aurya, K., & ingh, hree R. (2018). Marketing of Agricultural Commodities – An Indian Profile. South Asian Journal of Food Technology and Environment, 04(01), 643–659. https://doi.org/10.46370/sajfte.2018.v04i01.07

- Kandel, P., Khanal, Y. R., Poudel, N., Magrati, B., & Dhakal, N. (2024). Comprehensive Economic Evaluation of Potato Farming in Baglung, Nepal: Productivity, Profitability, and Resource Use Efficiency. *Economic Growth and Environment Sustainability*, 3(1), 35–44. https://doi.org/10.26480/egnes.01.2024.59.68
- Karki, A., Bhusal, N., Bhandari, N., Bastakoti, B., Shrestha, K., & Sharma, B. (2023). Economics of Potato Production in Mustang District of Nepal. *Journal of Agriculture and Environment*, 2023(Figure 1), 59–67. https://doi.org/10.3126/aej.v24i01.58128
- Kharel, M. (2022). Factors Affecting Potato Marketed Surplus in Kavre District of Nepal. International Journal of Applied Sciences and Biotechnology, 10(4), 254–258. https://doi.org/10. 3126/ijasbt.v 10i4. 50882
- Kharel, M., Ghimire, Y. N., Timsina, K. P., Adhikari, S. P., Subedi, S., & Poudel, H. K. (2021). Economics of production and marketing of wheat in Rupandehi district of Nepal. *Journal of Agriculture and Natural Resources*, 4(2), 238–245. https://doi.org/ 10.3126/ janr. v4i2. 33844
- Kohls, R. I., & Uhl, J. N. (1985). Marketing of agricultural product Macmillan Publishing company Inc.
- Luitel, G. (2017). Value chain analysis of coffee production in central Nepal. *Agricultural Economics*, *June*. https://www.researchgate.net/profile/Gaurab-Luitel-
  - 2/publication/321161193\_Value\_Chain\_Analysis\_Of\_Coffee\_Product ion\_In\_Central\_Nepal/Links/5a12717baca27287ce2a7a08/Value-Chain-Analysis-Of-Coffee-Production-In-Central-Nepal.pdf
- MoALD. (2023). Statistical Information on Nepalese Agriculture 2078/79 (2021/22). MoALD, 269. https://medium.com/ @arifwicaksanaa/ pengertian- use-case-a7e576e1b6bf
- Mohapatra, S., & Ramadas, S. (2022). Value Chain Mapping and Analysis.
- National Commission on Agriculture. (1976). Report of the National Commission on Agriculture, Part IX: Forestry. In *Ministry of Food and Agriculture*. Ministry of Agriculture and Irrigation.
- Nomadseason. (2023). *Monthly climate in Baglung, Province 4, Nepal.* Nomadseason. https://nomadseason.com/climate/nepal/province-4/ baglung. html
- Phulara, B., Acharya, B., Adhikari, S., Ojha, B., & Sigdel, U. P. (2022). Production Economics and Marketing of Potato in Okhaldhunga, Nepal. *Food and Agri Economics Review*, 2(1), 26–33. https://doi.org/10.26480/faer.01.2022.26.33

- Prakash, J., Amgai, S., Dutta, J. P., Regmi, P. P., & Dangol, D. R. (2015). Analysis of Marketing Practices of Apple in Mustang District of Nepal. Agriculture Development Journal, 11(September), 2091–0746. https://www.researchgate.net/publication/356128451
- Saxena, H.M. (2004). *Marketing Geography* (English ed). RAWAT PUBN. https://amzn.eu/d/3TrQYIE *Improvements in Agricultural Marketing Final Report*. (2008). 7(2).
- Shepherd, A. (1997). Market Information Services and Their Problems. *FAO*. https://www.fao.org/4/AB795E/ab795e02.htm#TopOfPage
- Shrestha, K., & Yadav, S. (2018). Value Chain Analysis of Potato in Ilam District, Nepal. South Asian Journal of Social Studies and Economics, March, 1–13. https://doi.org/10.9734/sajsse/2018/v2i325861
- Shrestha, S., Shrestha, R., Paudel, A., Paudel, A., Gurung, B., & Poudel, U. (2022). Value Chain Analysis of Potato in Tokha Municipality of Kathmandu District, Nepal. *Economic Growth and Environment Sustainability*, 1(1), 19–31. https://doi.org/10.26480/ egnes. 01. 2022. 19.31
- Teka, A. G. (2009). Analysis of Fruit and Vegetable Market Chains in. Teyung, P., & Luitel, G. (2023). A Comprehensive Value Chain Analysis of Mango Production and Distribution in Saptari District, Nepal. International Journal of Applied Sciences and Biotechnology, 11(4), 197–208. https://doi.org/10.3126/ijasbt.v11i4.60370